WILMAPCO Council
Action Item Summary Sheet
Meeting Date: September 14, 2023

Action Item #12: To Endorse the Southbridge Transportation Action Plan

Description/Summary of Item:
The Southbridge Transportation Action Plan (STAP) examines recommended mobility improvements in the 2021 Southbridge Neighborhood Action Plan. It also builds off other area studies, including: the City's 2028 Comp Plan; the Rt. 9 Master Plan, the Analysis of Proposed Truck Access Improvements in the Port of Wilmington Area; and the 2008 Southbridge Circulation Study.

The STAP proposes short, medium, and long-term recommendations and projects to reduce traffic speeds in Southbridge; recommendations to slow, reduce, and reroute through heavy truck trips; recommendations to improve walkability and lighting; and recommendations to increase bus connectivity, especially to grocery stores and job clusters.

Featured projects include:

- Street reconfigurations, including a road diet and raised intersections to calm traffic and provide more space for sidewalks, beautification, and lighting.
- Signage and an intersection reconfiguration to direct through trucks around the community, along with concept routes for a more efficient potential future truck bypass route.
- Sidewalk and pathway enhancements to better link into surrounding parks and future trails.
- Seventeen recommendations to improve streetlighting, based on community surveying and a nighttime audit.
- Proposed enhancements to existing bus service, such as adding Sunday service to a nearby supermarket, and longer-term improvements – such as the re-routing of nearby bus lines into Southbridge.

Summary of Action Taken by PAC: The WILMAPCO PAC did not take action on this item, but received presentations about it and reviewed the draft plan.

Summary of Action Taken by TAC:
The TAC recommended that Council endorse the Southbridge Transportation Action Plan via email in August.

Summary of Action Taken by Subcommittee/Task Force *(if applicable)*:
The draft STAP was presented at the July Southbridge Civic Association meeting, where it received support, and was out for public comment through August 6. No negative comments were received.

WILMAPCO Staff Recommendations:
The WILMAPCO staff recommends that Council endorse the Southbridge Transportation Action Plan.

Wilmington Area Planning Council

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DRAFT

RESOLUTION

BY THE WILMINGTON AREA PLANNING COUNCIL (WILMAPCO) ENDORSING THE *SOUTHBRIDGE TRANSPORTATION ACTION PLAN*

WHEREAS, the Wilmington Area Planning Council (WILMAPCO) has been designated the Metropolitan Planning Organization (MPO) for Cecil County, Maryland and New Castle County, Delaware by the Governors of Maryland and Delaware, respectively; and

WHEREAS, the WILMAPCO Council recognizes that localized transportation planning is key to implementing the goals, objectives, and actions in the 2050 Regional Transportation Plan (RTP): 2023 Update; and

WHEREAS, the City of Wilmington, Delaware requested that WILMAPCO update the 2008 Southbridge Traffic Circulation Study; and

WHEREAS, the *Southbridge Transportation Action Plan* addresses key transportation issues, such as: traffic circulation, speeding traffic, heavy truck traffic, poor street lighting, and limited bus and walking connectivity; and

WHEREAS, the *Southbridge Transportation Action Plan* employed continuous, rigorous, and innovative public engagement throughout the planning process; and

WHEREAS, *Southbridge Transportation Action Plan* builds upon previous studies and plans, such as: the Southbridge Neighborhood Action Plan, Wilmington 2028: A Comprehensive Plan for Our City and Communities, the Port of Wilmington Traffic Circulation Study, the Route 9 Corridor Transportation and Land Use Master Plan, and the 2008 Southbridge Traffic Circulation Study; and

WHEREAS, *Southbridge Transportation Action Plan* puts forth many short, medium, and long term recommendations to calm traffic; to slow, reduce, and reroute trucks; to improve bus service; and to enhance walking and bicycling safety and connectivity;

NOW, THEREFORE, BE IT RESOLVED that the Wilmington Area Planning Council does hereby endorse the final report and recommendations of the *Southbridge Transportation Action Plan*.

Date:

John Sisson, Chairperson
Wilmington Area Planning Council

WILMAPCO
Wilmington Area Planning Council

CENTURY ENGINEERING
A Kleinfelder Company

SOUTHBRIDGE TRANSPORTATION ACTION PLAN

SEPTEMBER 2023

DRAFT

8.7.23

South Wilmington PLANNING NETWORK

SBCA SOUTH BRIDGE

SEAL OF THE CITY OF WILMINGTON DELAWARE

SouthBridge CDC
SouthBridge Community Development Corporation

RK&K
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DelDOT

DART
Moving Forward

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1. Executive Summary

The Southbridge Transportation Action Plan (STAP) is a community driven plan conducted by the Wilmington Area Planning Council (WILMAPCO) with support from the Southbridge Civic Association (SBCA), the South Wilmington Planning Network (SWPN), and many others. The purpose of the STAP is to build upon and update the 2008 Southbridge Circulation Study, as well as the more recent Southbridge Neighborhood Action Plan (SNAP). The SNAP is an update of the 2006 South Wilmington Neighborhood Plan and addresses several components of Wilmington's 2028 Comprehensive Plan. The SNAP was endorsed by the SBCA and SWPN on September 27, 2021.

The STAP fulfills the SNAP recommendation to analyze the mobility elements in more detail with assistance from the community. Key focus areas include reducing traffic speeds and trucks, improving conditions for people biking and walking, and enhancing bus connectivity.

Traffic/Road Diets	Trucks/Freight	Bicycle/Pedestrian	Transit

• US 13 (Heald St)
• SR 9 (New Castle Ave)
	• Slow
	• Reduce
	• Reroute
		• Heald Street Bridge Over Christina River
		• Eden Park
			• Connectivity to
			  • Jobs
			  • Health
			  • Food

The STAP was developed over a year-long process guided by an Advisory Committee that met at regular meetings of the SWPN. Existing conditions and recommendations were vetted through the SWPN for feedback and suggestions. The Project Team employed community representatives who assisted the Team in advertising the project and presenting ideas.

Recommended improvements were developed based upon stakeholder and public outreach; identified issues pertaining to economic development, land use, transportation, environment; opportunities; constraints; safety; and proposed plans for soon-to-be constructed projects. The preferred concepts were compared to existing conditions using measures of effectiveness such as level of service, bicycle level of traffic stress, and traffic diversions to determine feasibility. To maintain the momentum of this project, recommendations were developed in three tiers of implementation:

- Short Term - 0-5 years
- Medium Term - 5-8 years
- Long Term - 9+ years

As analysis progressed, some recommendations were categorized as "quick action" or able to be completed with relatively low cost and short time frames. These quick action items were summarized in a memo and submitted to the City of Wilmington on February 10, 2023 (**Appendix C**). As funding and staffing becomes available, it is anticipated these items can be completed in 0-5 years. They include mostly signing, striping, and signal timing improvements that can improve truck routing, enforce no truck parking,

reduce speeding, and improve pedestrian safety. Despite there being many recommendations in the short-term timeframe, the remaining elements of this entire Action Plan will take many years to complete with a total cost of about $15-20 million dollars.

Based on stakeholder feedback, community outreach, and technical analysis, preferred concepts were identified to improve transportation. Planning level cost estimates were developed for the recommendations. Next steps for implementation were identified and documented in a Planning and Environmental Linkages (PEL) Report in compliance with National Environmental Policy Act (NEPA) standards to enable eligibility for future Federal funding.

Feedback and engagement of the Southbridge community members was crucial for developing the STAP. Multiple public workshops, youth engagement workshops, and surveys were organized for the community to participate in and be a part of the project. There was a total of three public workshops, two youth engagement workshops, and two public surveys. All these public outreach activities were highly effective as they provided great feedback on recommendations for the neighborhood and got the community members enthusiastic about STAP.

The first public workshop was held from 4-6 pm at the Southbridge Neighborhood House prior to the Southbridge Civic Association Meeting on October 18, 2022. Members of the community who attended were greeted with boards providing information on the Plan including the study area, project purpose and goals. Maps where the community was prompted to provide information on bicycle/pedestrian concerns, trucks, traffic calming, transit, connectivity, lighting, beautification, landscaping, and stormwater among other topics were shown. During the Civic Association Meeting a summary of the Plan goals were discussed and the community was introduced to two community members who were appointed by the Civic Association and hired to assist with the plan development: Sauntra Kanu and Diana Dixon. A local area resident who has experience in survey collection, Dora Williams, was hired as well. The project schedule was provided along with a survey that attendees could take in person during the event or submit later. Overall, the feedback provided was positive and the community was enthused for the Transportation Plan. The workshop welcomed 25 community members and representatives. Thirteen of the attendees requested to be added to project updates. Forty-three surveys were completed and submitted.

The second public workshop was held from 4:30-6pm at the Southbridge Neighborhood House prior to the Southbridge Civic Association Meeting on March 21, 2023. The Plan's study area, main purpose, and schedule was reviewed. A presentation with information on the Plan and previous community feedback including how to reduce traffic speeds and truck volumes, as well as improving walking, biking, driving, and bus travel throughout Southbridge was given by Century Engineering. A summary of Workshop #1 was also provided, as well as the survey results that were collected. Both of the Youth Workshops were discussed. Overall, the second workshop was a success as the community continued to be enthusiastic about STAP. The workshop welcomed 25 community members and representatives.

The third public workshop was held on June 10, 2023 from 12pm-1pm at Hicks Park. The community was presented with boards that showed locations for implementation of the recommendations that have been received. The second survey results displayed varied from potential road configurations to adding beautification amenities along paths. The overwhelming majority favored the addition of raised intersections in key areas, sidewalks near Hicks Park, and the improvement of connectivity and circulation between streets. Community members were shown specific locations of additional lighting, potential raised intersections, and shared use paths. Everyone is in favor of improving all existing transportation methods, whether that is walking, biking, driving, or bus transit. Overall, the takeaway from this workshop was extremely positive as the community members were appreciative of the in-depth review of the recommendations. There was a total of 8 attendees from the community. This workshop was "replayed" before the July 18, 2023 Civic Association meeting. A brief presentation was also provided at the Civic Meeting. Both were well received by about two dozen residents in attendance.

The first youth outreach event was on December 6, 2023 from 4-5:30 at the Southbridge Neighborhood House. Children in grades ranging from first through tenth grade who attend after school programs at the Neighborhood House were invited to attend. The workshop welcomed 20 youth representatives from the Southbridge community. The children were very engaged in the event and provided unique feedback from their perspective of living in and traveling within Southbridge. The event was divided into three mini-sessions. The first session included a brief discussion on careers in Transportation Planning, Urban Design, and Civil Engineering. Types of work within each of the career choice was discussed. The second session included a discussion on specifics about the Southbridge Transportation Action Plan to introduce the youth to the study and the types of information we collect. The project schedule and workflow were discussed as well. The final session was an interactive session to gather feedback spanning topics such as bicycle/pedestrian concerns, speeding, transit, connectivity, lighting, and safety. The feedback received from the third session echoed the information received from the first public workshop. The children discussed how it takes a long time waiting for buses to arrive for trips to school, shopping, groceries, and doctors. The children discussed how different areas of Southbridge are not well lit and feel scary at night. Most of the children find it difficult to cross intersections because of the higher speeds of traveling cars. The children like the community parks but want a safer more direct route to some of them with better lighting. The children also would like more infrastructure to ride their bicycles around the community. The children also like the idea of more trees and grass areas.

The second youth outreach workshop for the Southbridge Transportation Action Plan was held on March 2, 2023. Approximately seventeen youth members of the Southbridge Neighborhood House attended the meeting. The meeting began with a summary of the STAP study and a summary of the information that Century Engineering was hoping to gather from them such as areas where additional lighting is needed, where it is difficult to cross the street, or where the children would like to see improvements for walking/biking/playing. Children from first through ninth grades attended the workshop. Maps were placed on each table with markers, stickers, post-it notes, and other materials for the children to use. The children gave feedback that was similar to that received during the community workshop. Parks and their

surrounding areas and streets feel dark and scary. They feel unsafe crossing some streets and are not allowed in some parts of Southbridge due to safety concerns.

Survey 1 was conducted with the purpose of confirming and prioritizing the transportation recommendations made in the Southbridge Neighborhood Action Plan. The results of this survey will greatly help in making the final recommendations for implementation with the Southbridge Transportation Action Plan. A total of 43 surveys were submitted with over half being completed online and about 45% being completed at the first public workshop and health fair. The majority of respondents reside in Southbridge, with the others frequently traveling through the area or working in Southbridge. The limitations for residents due to lack of transportation are their ability to grocery shop and gather socially. Related to this, grocery stores were the most popular destination where residents would like to see more bus services. The top recommendations for improvements are to reduce truck traffic, reduce overall traffic speeds, and add additional lighting throughout the neighborhood. However, residents are either conflicted or against reducing the number of travel lanes to reduce speeds or closing travel lanes all together to promote biking. Overall, the purpose of this first survey was fulfilled as the priorities and recommendations from Southbridge residents proved to be very valuable to the Southbridge Transportation Action Plan.

Survey 2 was conducted with the purpose of refining the transportation recommendations from the first STAP survey and SNAP. This second survey helped solidify the implementation of these recommendations throughout Southbridge. Similar to the first survey, the majority of the respondents were residents of Southbridge, with the others frequently traveling through the area or working in Southbridge. The questions in this survey were more specific than the first, as the participants were asked to give specific locations and instructions for improvements they would like to see. In general, the responses showed positive feedback towards recommendations that would reduce truck traffic and overall traffic speed, which as we know from the first survey is a top priority for the community. There were many recommendations and locations given to add additional lighting throughout Southbridge, which is another top priority. Adding sidewalks to promote pedestrian safety and more beautification throughout the neighborhood also received extremely positive feedback. One particular question asked about the lack of transportation and access to jobs, grocery shops, medical care, and social events. There was a total of 102 responses from Southbridge residents, of which 14 said they are limited in reaching their job and 21 said they were limited in reaching grocery stores. That combines to 35% of respondents struggling to access their employment and grocery stores, which is alarming. STAP will help minimize this problem and provide Southbridge residents with reliable transportation. In conclusion, the purpose of this second survey was fulfilled as specific locations and recommendations were refined and received positive feedback from the residents of Southbridge.

Identifying potential funding sources to complete the STAP is an important next step. A Monitoring Committee that meets regularly should be established to coordinate this work.

2. Location Map

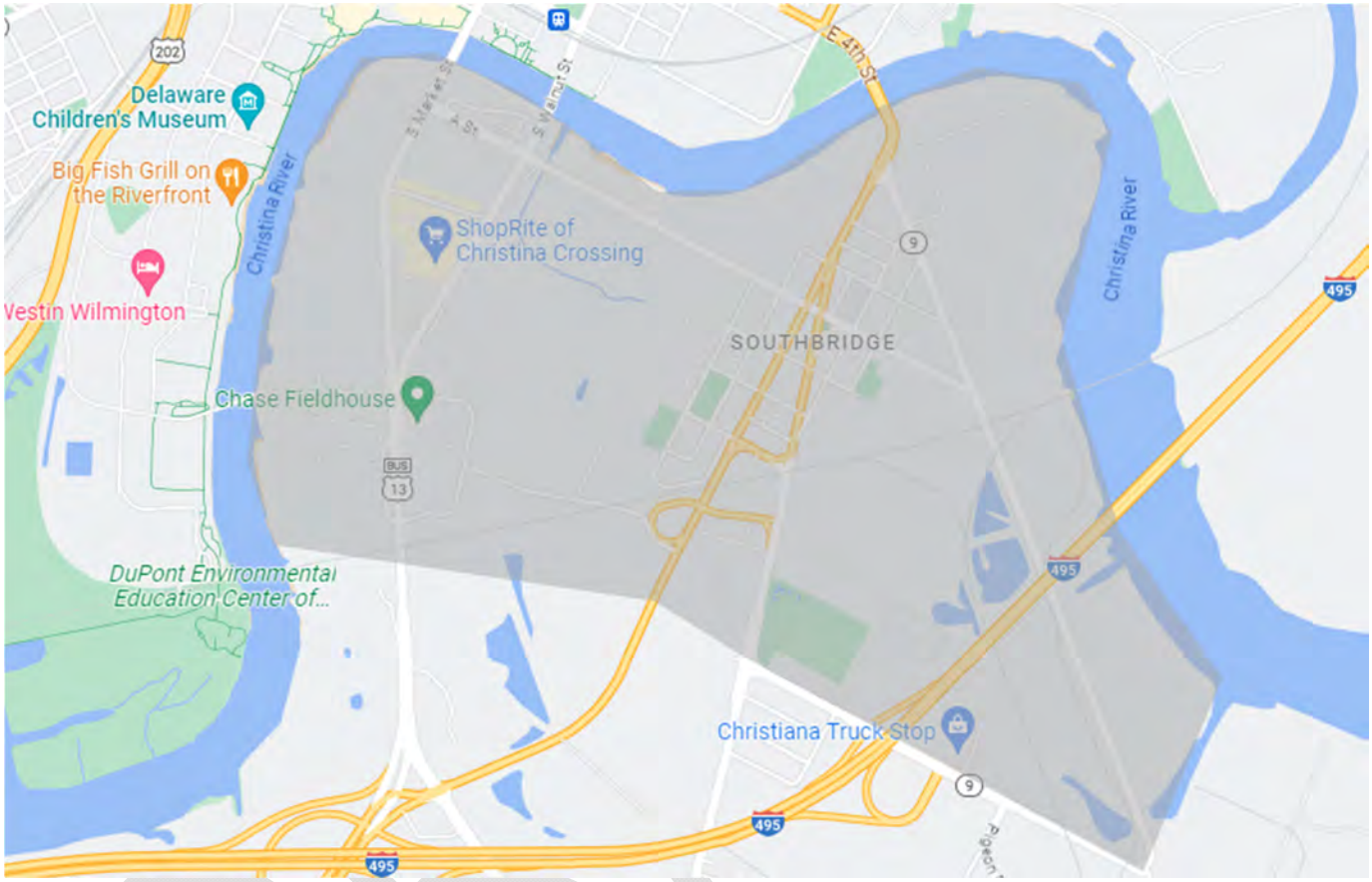

Figure 1 - Location Map (Study Area Shaded)

3. Project Purpose, Need, and Approach

The purpose of the Southbridge Transportation Action Plan (STAP) was to build upon and update the 2008 Southbridge Circulation Study, as well as the more recent Southbridge Neighborhood Action Plan (SNAP)[1]. The SNAP was a community driven planning study conducted by the Southbridge Civic Association (SBCA), and the South Wilmington Planning Network (SWPN), with funding from Healthy Communities Delaware. The SNAP was an update of the 2006 South Wilmington Neighborhood Plan and addresses several components of Wilmington's 2028 Comprehensive Plan. Recommendations from the SNAP address community empowerment, economic revitalization, youth and education, affordable living, better health, improved mobility, and resilience to climate change. The SNAP was endorsed by the SBCA and SWPN on September 27, 2021.

[1] https://swpn.org/southbridge-neighborhood-plan/

The actions identified in the Improve Mobility (IM) section of the SNAP include:

IM 01	Transit study	Coordinate with DART to enhance transit access to jobs and healthy foods. Begin by extending the planned shuttle route between the train station and South Market Street to Southbridge.
IM 02	Road diet	Conduct a road diet analysis to study improvements that would reduce speeds and improve safety—while still maintaining good traffic flow—through Southbridge.
IM 03	Updated circulation study	In coordination with the Southbridge Main Street and WILMAPCO, update the 2008 Southbridge Circulation Study.
IM 04	Gateways	Create a branded neighborhood gateway and high-quality walkways that improve the bike and pedestrian access at the new Heald Street Bridge (BR 1-684) at D Street, and at the triangular intersection of New Castle Avenue, S. Heald Street, and A Street at the northern gateway into Southbridge.
IM 05	Priority streets	Continue to develop a series of pedestrian and bike prioritized streets and make targeted investments in ensuring the sidewalks are ADA compliant and supportive of local businesses on S. Heald Street, New Castle Ave. and A Street.
IM 06	New Sweden extended	Extend New Sweden Street to Church Street, with a focus on multi-modal access.
IM 07	4th Street bridge (BR 1-693) connectivity	Improve sidewalks and bike linkages on the 4th Street Bridge on Heald Street over the Christina River.
IM 08	Eden Park connectivity	Improve the pedestrian and bike linkages between the core of Southbridge and Eden Park.

IM 09	Bike loop	Investigate and invest in a Healthy Street Loop, as suggested in a June 2020 SWPN letter to the City of Wilmington, which closes B Street and half of A Street to thru traffic on certain days of the week as a walking/biking loop.
IM 10	Kids bike program	Take advantage of Urban Bike Project's Earn-a-Bike Program to organize a neighborhood bike ride and connect residents with a bike. Develop program opportunities for youth to learn about bicycling, bike repair and give them opportunities to earn a bike through volunteer hours.
IM 11	Bikeshare feasibility	Building on the 2016 Wilmington Bikeshare Feasibility Study, expand access from Southbridge to other parts of the city by bringing a bike share program and provide subsidized bike share options and adaptive bikes.
IM 12	Local walkable destinations	Locate and connect community gardens, gathering spaces, and parks, strategically, reutilizing vacant land to create walkable destinations within Southbridge.
IM 13	River access via Diamond Oil site	The City's Department of Planning should work with the owners of the former Diamond Oil site to ensure there is public access to the waterfront and to ensure that the site is used in a way that adds to the community's neighborhood feel
RCC 09	Roads at flood risk	Identify critical roads at risk for future flooding and develop mitigation strategies. This will involve working collaboratively with key partners at the state and regional level to ensure climate change risks are incorporated into long-term planning efforts.
RCC 10	Landscaping and banner maintenance agreement	Along with traffic calming measures such as bump outs and curb extensions, install and maintain green infrastructure with water-absorbing plants and trees. Installation should be by DelDOT and maintenance should be coordinated by the Southbridge CDC.

CE 04	Amtrak high speed rail proposal	Continue to monitor Amtrak's NEC FUTURE, which is proposing new routes for high-speed rail. The "alternative" route uses the freight line in Southbridge, which would significantly and negatively impact the neighborhood. The Southbridge Civic Association, Southbridge CDC, and SWPN should work with the City of Wilmington and WILMAPCO and engage Amtrak and the Federal Railroad Administration (FRA).

The present study, the STAP, fulfills recommendation IM 01, 02, 03, and 09 above. It also advances IM 04, 05, 07, 08, and 13 to just short of implementation. The SNAP pointed out mobility elements that should be analyzed in more detail with assistance from the community. Key focus areas include reducing traffic speeds and trucks, improving conditions for people biking and walking, and enhancing bus connectivity.

The STAP encompassed all of South Wilmington, roughly Census Tract 19.02. The residential community of Southbridge comprised the Core Study Area, which was the primary area of focus of the study. As shown in **Figure 2** below, the Greater Study Area included adjacent lands, including Riverfront East and the southern end of Christina Avenue.

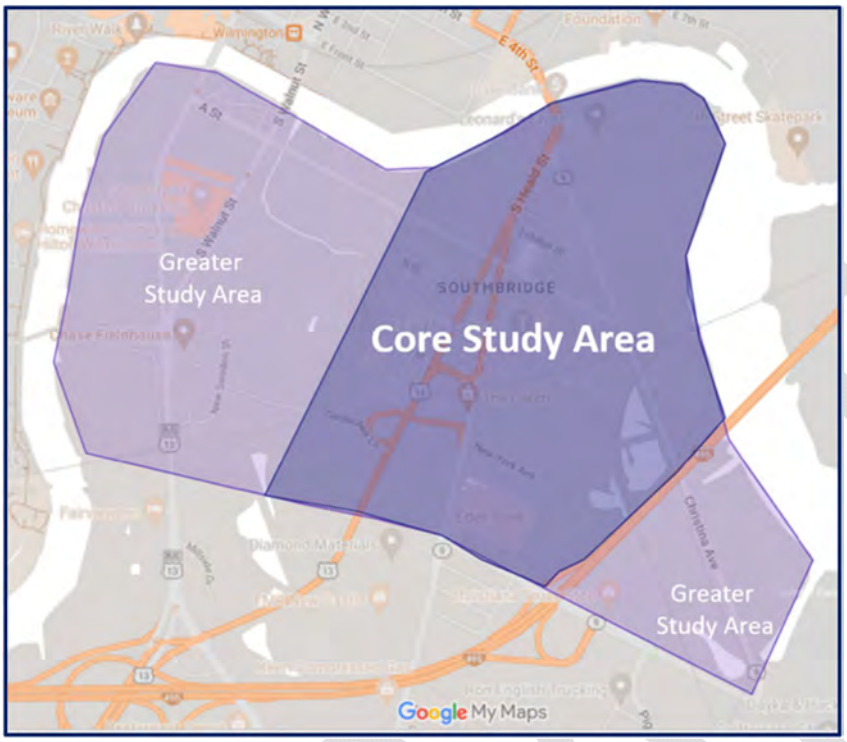

Figure 2 – Study Area

The STAP was developed over a year-long process and was guided by an Advisory Committee that met at regular meetings of the SWPN. Existing conditions and recommendations were vetted through the SWPN for feedback and suggestions. The Project Team employed community representatives who assisted the Team in advertising the project and presenting ideas. Two community representatives were chosen by the SBCA to help guide and support the plan through its development. The committee met five times on August 23, 2022, November 28, 2022, February 28, 2023, March 23, 2023, and May 23, 2023. A link to the meeting materials worksheet for more details and minutes can be found here: http://www.wilmapco.org/southbridge/.

WILMAPCO prepared a report of existing conditions and data gathering that formed the foundation of the technical analysis. Available in Appendix A, the Task 1 Report included Demographics, Land Use/Zoning, Transportation Conditions, and Planned Transportation Initiatives.

Task 2 addressed the community vision component of the study. It included developing an overall outreach strategy that built upon the community visioning completed as part of the SNAP. A project logo was developed to give the STAP its own identity and help distinguish it from other studies, yet tie it to the SNAP. A survey was completed (Survey 1) as part of this task to collect community feedback regarding existing conditions, concerns, challenges, barriers, issues, as well as feedback of things that are going well. A video was developed and posted on YouTube to introduce the study to viewers from numerous methods

of outreach. Survey results were gathered at Community Workshop 1 held on October 18, 2022 at the Neighborhood House in Southbridge and through the STAP webpage. A postcard mailing was sent to Southbridge residents to encourage their attendance at the Workshop. Community youth were separately engaged in the study through activities geared towards gathering their feedback based on their unique experiences traveling through the study area. The first of two Youth Outreach events occurred on December 6, 2022. Elected officials were briefed prior to each community workshop and their input was gathered.

Task 3 consisted of analyzing the existing conditions and developing proposed solutions. Recommended improvements were developed based upon stakeholder and public outreach; identified issues pertaining to economic development, land use, transportation, environment; opportunities; constraints; safety; and proposed plans for soon-to-be constructed projects. The preferred concepts were compared to existing conditions using measures of effectiveness such as level of service, bicycle level of traffic stress, and traffic diversions to determine feasibility. The proposed designs were evaluated and presented to the public at Community Workshop #2 on March 21, 2023, Youth Outreach Meeting #2 on March 2, 2023, and through a YouTube video. A public officials briefing was held prior to the community workshop. Community Survey #2, which was prepared in consultation with the SWPN and the community representatives, identified consensus, concerns, and disapprovals. A door-to-door live survey collection of Community Survey #2 was conducted by a community member who resides just outside of Southbridge in Rose Hill Gardens, who was also employed by the Project Team.

Task 4 consisted of selecting preferred improvements and preparing a final report. Based on stakeholder feedback, community outreach, and technical analysis, the preferred concepts were identified. Planning level cost estimates were developed for the recommendations. Next steps for implementation were identified and documented in a Planning and Environmental Linkages (PEL) Report in compliance with National Environmental Policy Act (NEPA) standards to enable eligibility for future Federal funding. Final recommendations will be presented at Community Workshop #3 on June 10, 2023. The final recommendations were posted on the project webpage. The draft report was made available for public comment on June 20, 2023, with a comment period available through the SBCA meeting on July 18, 2023 till August 6, 2023. The STAP will be presented to WILMAPCO's Council for adoption in September 2023.

4. Existing Conditions

Demographics

The Southbridge community is located in the southeast section of the City of Wilmington, DE. The Core Study Area's population is 1,430 according to the 2020 US Census and covers 0.15 square miles. Roughly 86% of Southbridge residents are African American.[2]

Due to data limitations and how the localized Census block group boundaries are drawn, more detailed Census data are largely unavailable for Southbridge. However, at the larger Census tract level data show:

- A median household income of $43,200
- 16% of households do not have a computer
- 25% do not have internet access
- 5% of residents aged 5 or older have limited English proficiency
- 11% are 65 or older
- 8% have a disability
- 25% do not have access to a vehicle

It is very likely median household income, computer and Internet access, and vehicle access is lower in Southbridge than what is shown above. The data could be skewed by the inclusion of the nearby Christina Landing, a nearby luxury residential development of nearly 700 residents, in the Census tract data.

Community and Environmental Assets

Southbridge is a neighborhood that takes pride in its rich history of civic engagement, community unity, historical significance, and unique culture. Southbridge is a historic African American neighborhood with historical patterns of development including agriculture, industrial, and residential uses. At its inception, industry was located primarily on the south side near Market Street, residential areas were located along S. Heald Street along A, B, and C Streets, and in the marshy center flower farms were thriving[3].

One of the strongest assets of Southbridge is the community bonds and legacy of a robust Civic Association. Southbridge includes numerous locations for gathering spaces including churches to share faith and service, as well as, parks to provide overall health and socialization. In addition, the Southbridge Community Development Corporation (SBCDC) is incorporated in Delaware and is a federally designated 501C3 tax-exempt Non-Profit Organization by the U.S. Department of the Treasury. Housing and economic development are the primary areas of focus for the SBCDC. Southbridge Community Development Corporation is dedicated to improving the vital conditions to enable all Southbridge residents to thrive without exception. These vital conditions include basic needs for health and safety, housing, meaningful work, learning, and reliable transportation.

[2] https://djph.org/wp-content/uploads/2022/09/djph-83-013.pdf

[3] Southbridge Neighborhood Action Plan

There are numerous community and environmental features in the study area including several places of worship and neighborhood parks. A community center, senior center, medical center, and fire station are all located within the core neighborhood. The Henrietta Johnson Medical Center is part of a national network of federally Qualified Health Centers delivering quality, comprehensive health services to America's medically underserved communities. Henrietta Johnson Medical Center offers comprehensive family health services from prenatal and adolescent care to adult and geriatric medicine. The Neighborhood House is a multi-purpose non-profit community center founded on Christian principles providing transformational programs that positively impact low to moderate-income individuals and families. Mt. Joy Methodist Church has serviced the Southbridge community for over 100 years. The Church is a central organizing hub for community fellowship, outreach initiatives, and services. The Southbridge Wilmington Wetlands Park is located just west of the neighborhood in response to issues caused by flooding and climate change. ShopRite, a source for fresh, healthy food is located about one mile to the west of the central study area. **Figure 3** identifies the location of these resources.

Figure 3- Community Resources

Land Use & Land Cover

Southbridge is primarily an urban setting, but there are several parks, natural areas, and open spaces that give portions of the area the feel of a suburban community.

New Castle Avenue and S. Heald Street are the primary north/south corridors through the community and A Street provides an important east/west connection. Interstate 495 and Business US 13 traverse South Wilmington and provide important regional connections to the northeast corridor and other parts of Delaware. The Penn Central Rail Line which carries freight to and from the region lies south of D Street and traverses S. Market Street, S. Heald Street, New Castle Avenue, and Christina Avenue.

Southbridge's land use is primarily residential, commercial, industrial, and other mixed urban/built-up uses. There are some areas of open space throughout the community and several community parks, including the Southbridge Wilmington Wetland Park. A nearby seaport and local industries conflict with the residential portion Southbridge's core as large trucks travel through Southbridge to access other destinations. Illegal truck parking and idling in residential areas is also an issue in Southbridge. **Figure 4** depicts the land use and land cover of the study area.

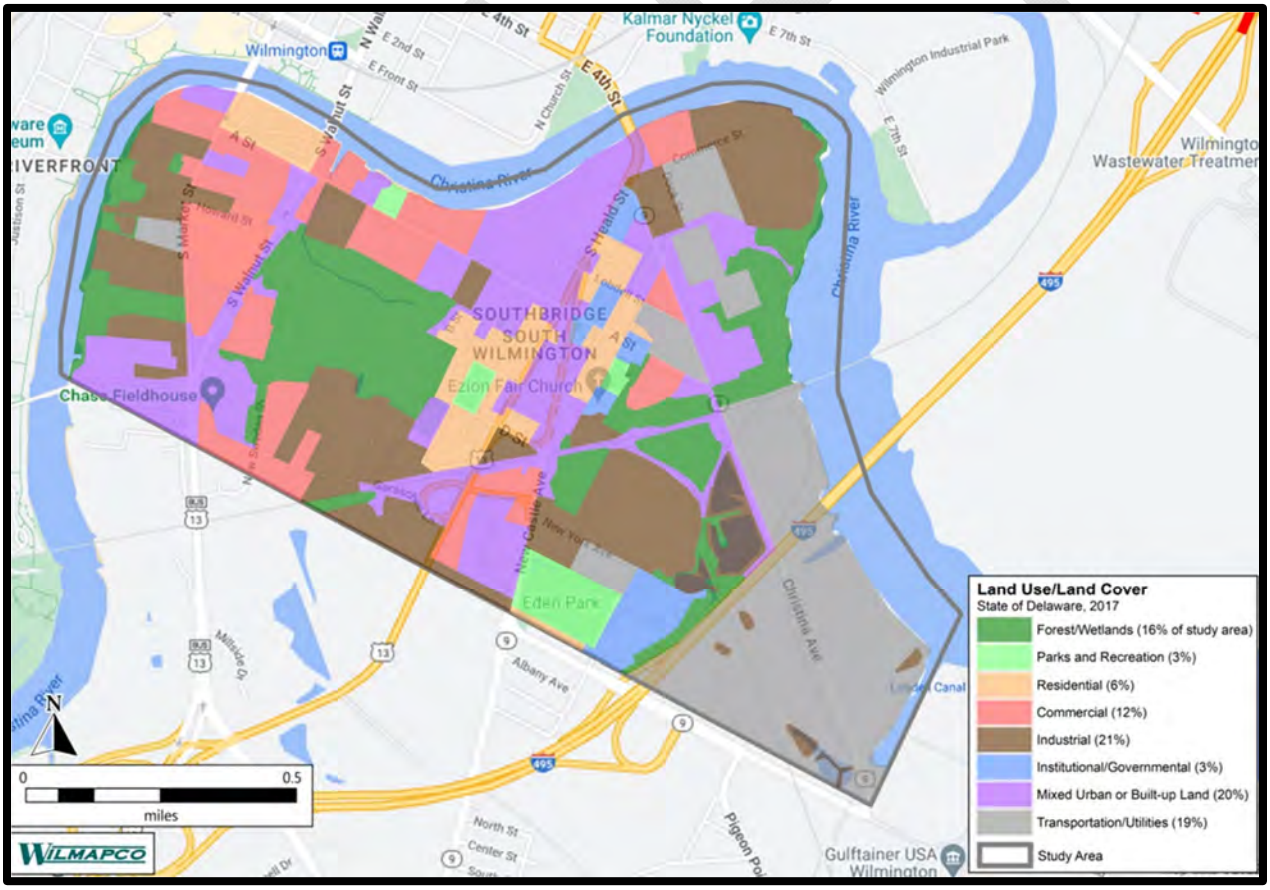

Figure 4 - Existing Land Use/Land Cover

Zoning

The Southbridge neighborhood is primarily zoned single-family residential, but also contains zoning for apartments and open space. The neighborhood is mostly surrounded by light manufacturing. The western area is zoned residential/commercial, and the eastern waterfront area is zoned for manufacturing. East of I-495 is zoned general industrial. **Figure 5** provides a map of current zoning.

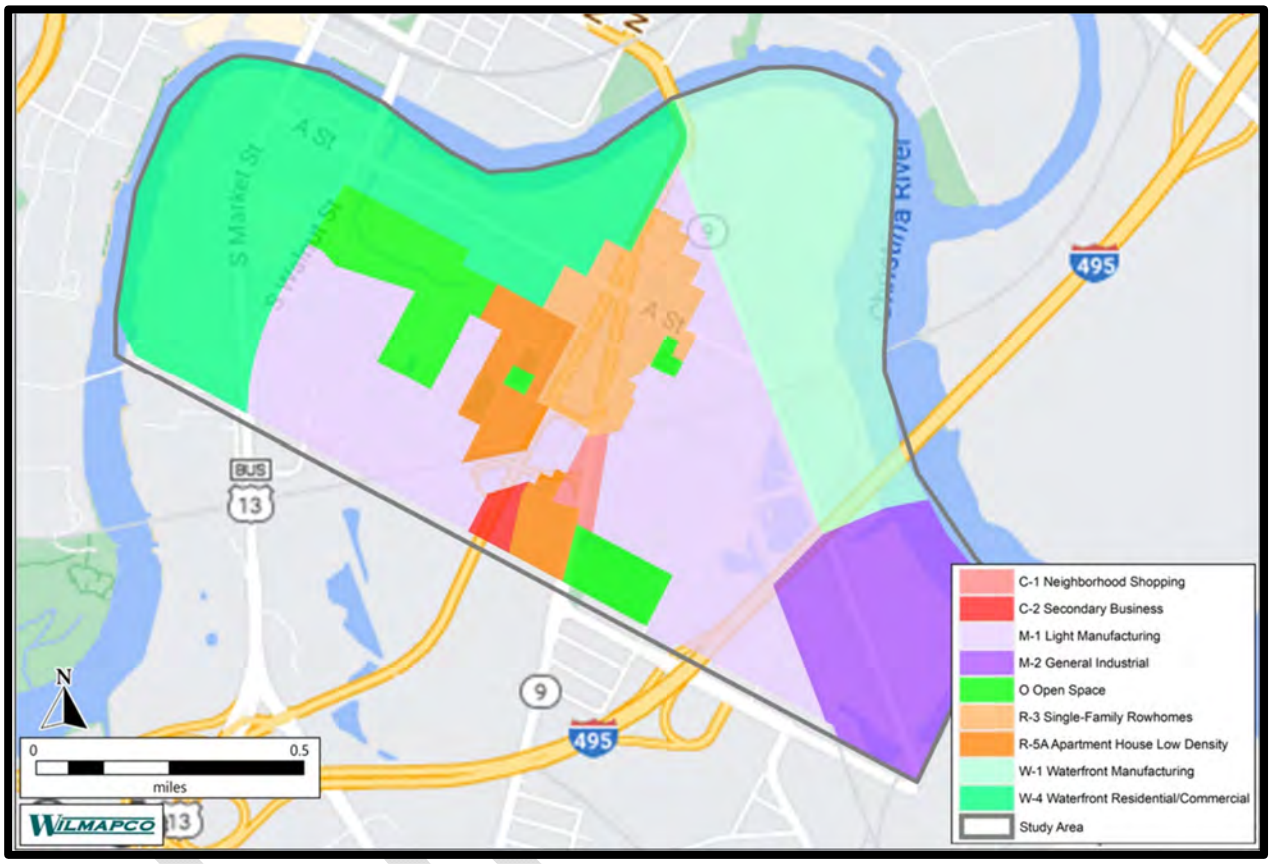

Figure 5 - Existing Zoning

Sidewalks, Crosswalks, and Trails

DelDOT's nonmotorized network inventory identifies sidewalks, marked crosswalks, and trails in the study area. The Southbridge Wilmington Wetlands Park features a boardwalk trail stretching from S. Walnut Street to S. Church Street, which has been extended north to A Street. The Jack A. Markell Trail is just outside the study area across the Christina River. The core Southbridge neighborhood generally contains completed sidewalk connections and crosswalks with few gaps. Most gaps in sidewalks and connectivity occur outside of the core study area, as well as connecting the core study area to areas outside of Southbridge such as the Wilmington Riverfront. Outside of these residential and commercial areas, the study area lacks sidewalks and crosswalks. **Figure 6** depicts the nonmotorized inventory in the study area.

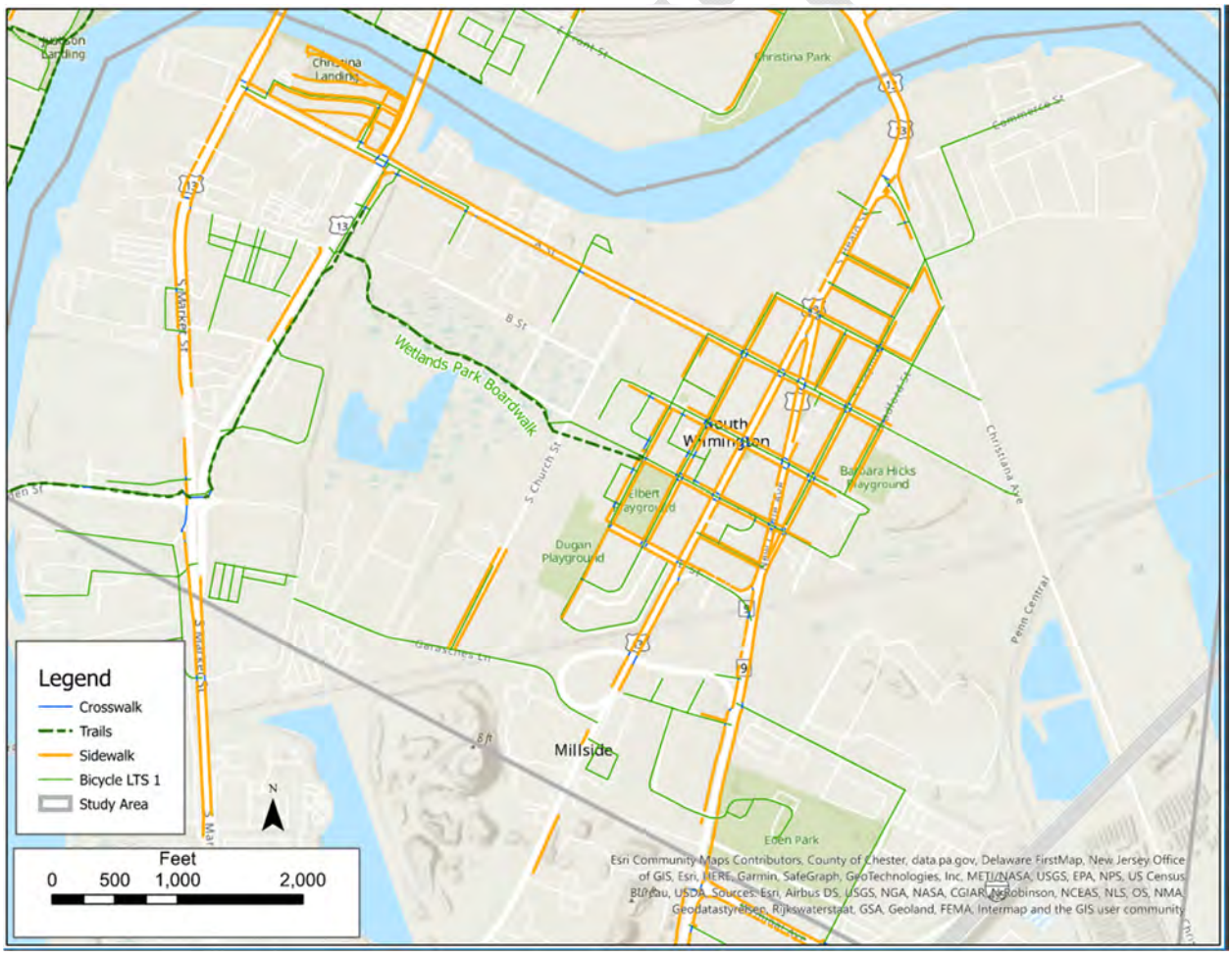

Figure 6 - DelDOT's Non-Motorized Inventory

Bicycle Level of Traffic Stress

Bicycle level of traffic stress (bike LTS) is a measure of how stressful roads are for bicycling based on infrastructure conditions including traffic speeds, volumes, and number of lanes. DelDOT's bike LTS assigns a score to road segments ranging from 1 (least stressful) to 4 (most stressful).

The majority of residential streets in Southbridge are low stress. S. Heald Street is a one-way southbound street that has two wide lanes with no bike infrastructure, giving it a bike LTS score of 3. New Castle Avenue travels northbound and has a similar configuration to S. Heald Street, with sections ranging from bike LTS 2 to 4. These two streets bisect the neighborhood, serving as a barrier to biking and pose a challenge to pedestrian crossings, especially for young people. S. Market Street and S. Walnut Street are both LTS 4, posing a barrier for bicyclists and pedestrians to access the commercial area of the study area. A Street is considered low stress (LTS 1) and connects portions of residential areas with commercial areas. **Figure 7** shows bike LTS in the study area.

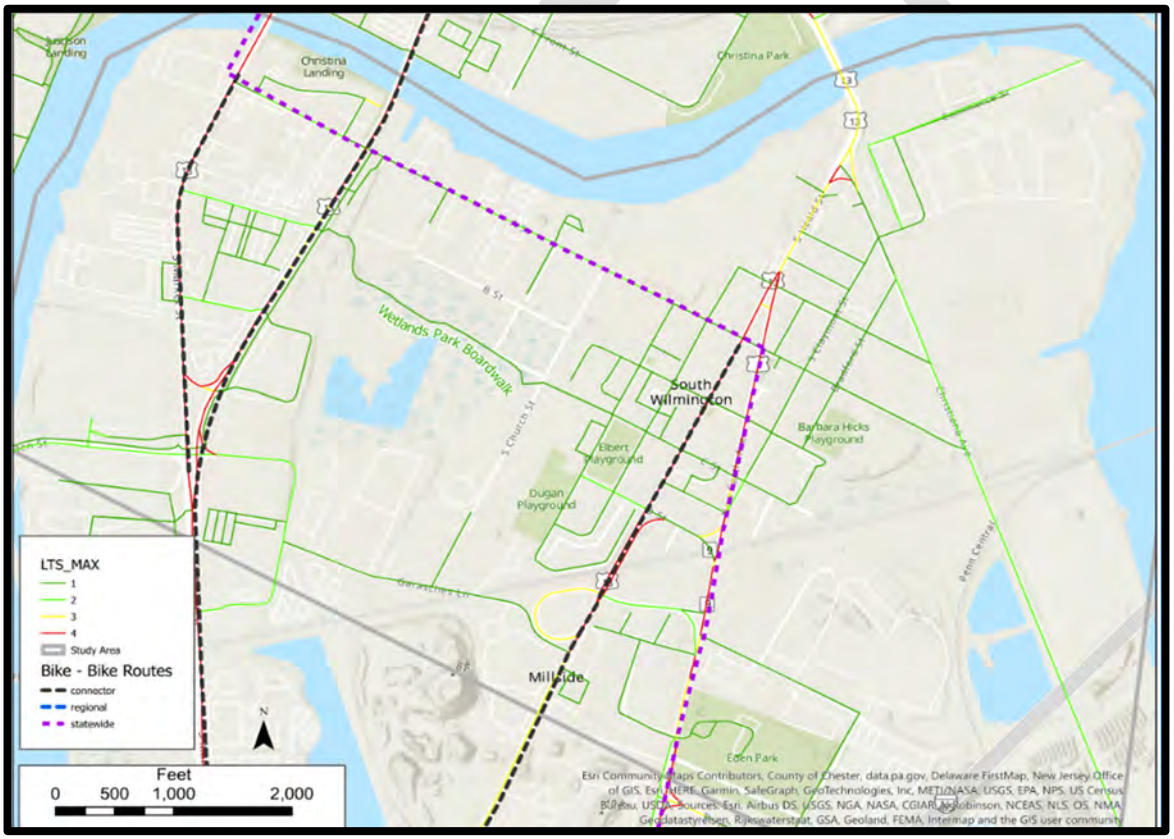

Figure 7 - Existing Bicycle Level of Traffic Stress

Bus Ridership

The study area is well served by transit, featuring many DART bus routes and bus stops with moderate to high ridership. Many of these routes connect to downtown Wilmington and the train station, making nearly the entire DART network, as well as SEPTA's Wilmington/Newark line, accessible with no more than one transfer. Southbridge residents can take Bus Routes 15 and 51 directly to the City of New Castle and the Christiana Mall, which serves as another transfer hub. **Figure 8** shows bus routes, bus stops, and ridership throughout the study area.

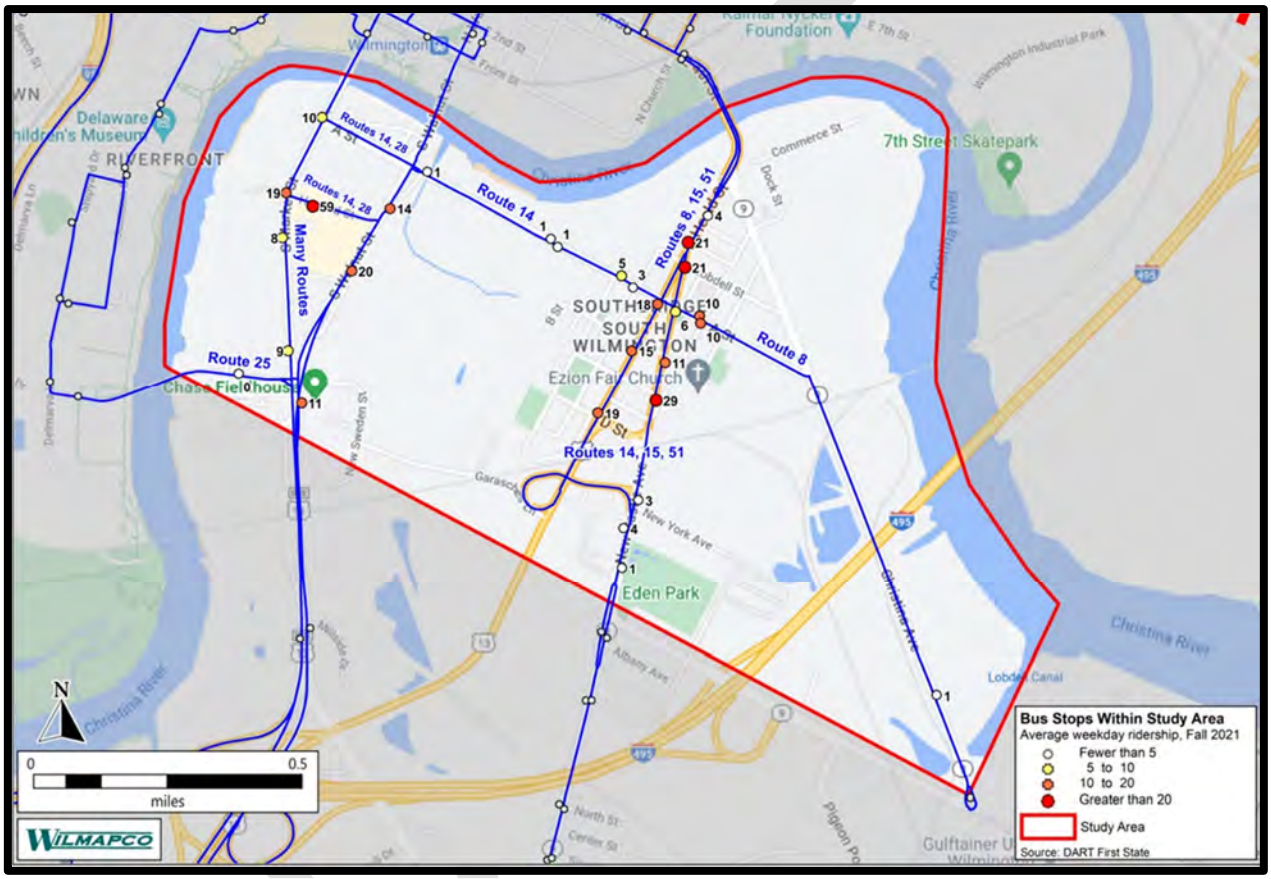

Figure 8 - Existing Bus Routes, Stops, and Ridership

Traffic Volumes

About 20,000 vehicles travel through the Southbridge core on the average day. Most of these trips are generally evenly split between S. Heald Street and New Castle Avenue, with approximately 8,700 and 10,600 trips respectively. **Figure 9** shows traffic volumes throughout the study area.

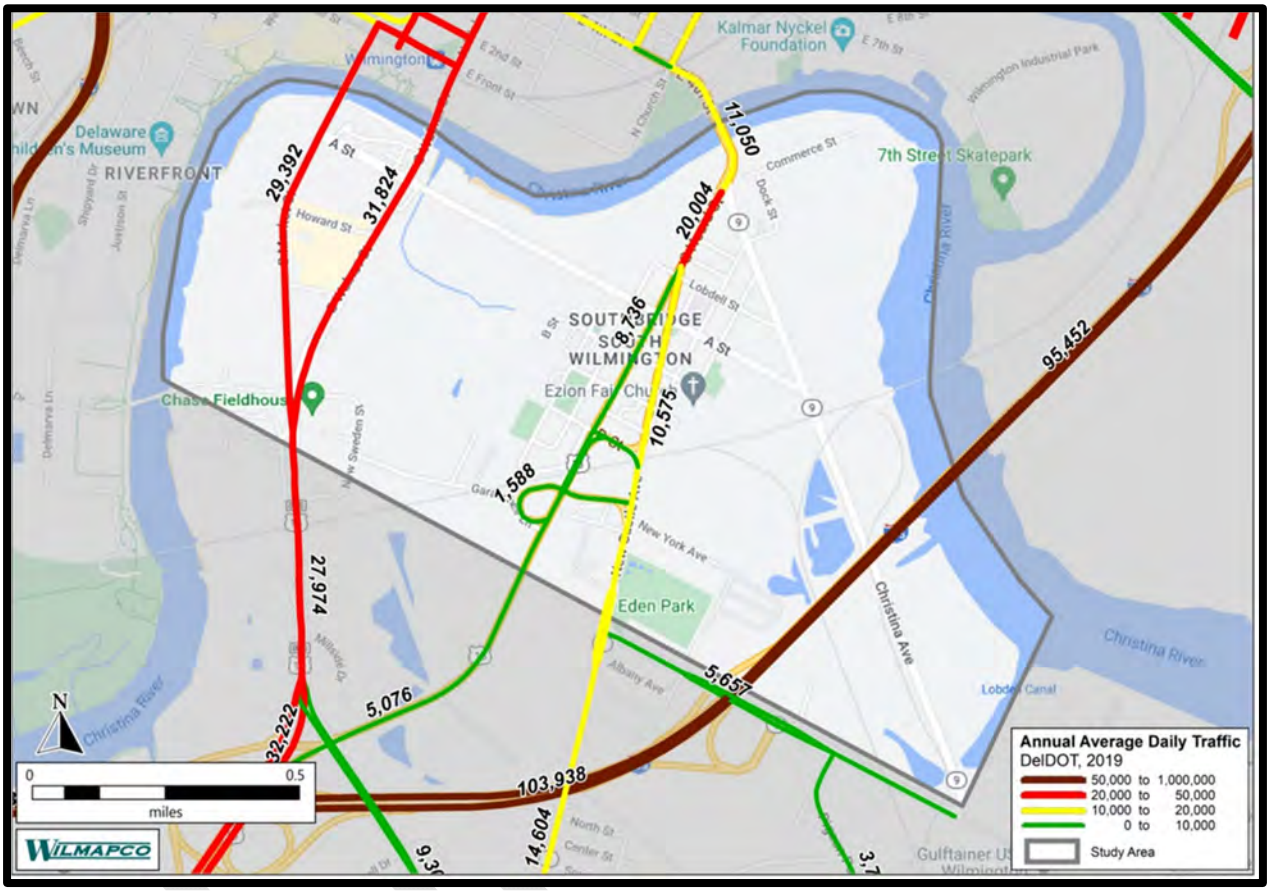

Figure 9 - Existing Traffic Volumes

Lighting

A lighting inventory was completed and amended through community outreach. Each community workshop, as well as Surveys #1 and #2 provided opportunities for the community to suggest lighting deficiencies. The results of the feedback and analysis determined that most main roadways do have some level of lighting. Cobra head fixtures are most commonly located at intersections without additional lighting at mid-blocks resulting in several dark or lower-lighting areas along many corridors. Areas where this occurs include roadways and sidewalks leading to Southbridge parks, residential corridors, and along the residential outer limits such as along Buttonwood Street.

Crashes

Between 2019 and 2021, a total of 480 reported vehicle crashes occurred within the study area. Three fatalities were registered, including one at Buttonwood Street and B Street. One pedestrian fatality occurred on S. Walnut Street, and four pedestrian crashes occurred on S. Heald Street at its merge with New Castle Avenue. 191 crashes occurred within the core study area, and 127 occurred in the commercial area bounded by A Street, S. Market Street, and S. Walnut Street. 50 crashes occurred on A Street from S. Market to S. Walnut Streets (inclusive of intersections). Crashes at intersections ranged from 6 to 35, with 35 crashes (including one fatality) at the intersection of S. Walnut and A Streets, and another 35 crashes at S. Market and A Streets. **Figure 10** provides the location and type of crashes in the study area.

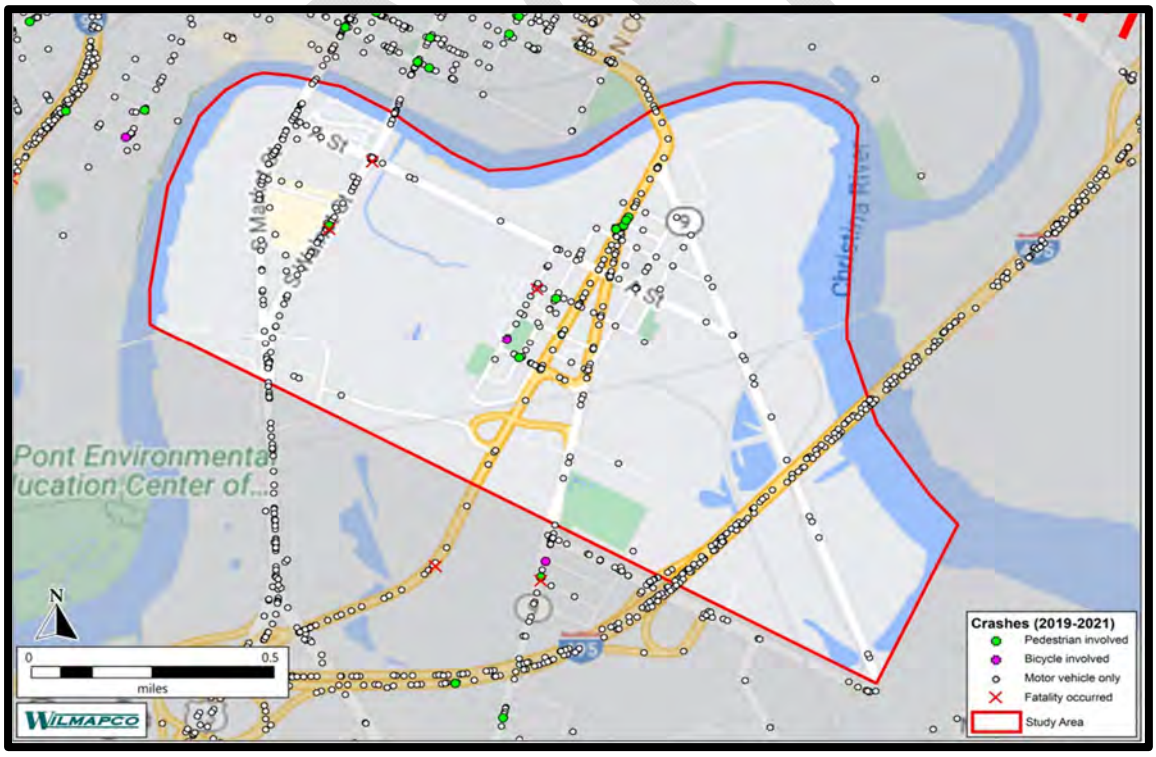

Figure 10 - Crashes

Figure 11- Crash Clusters

As shown in **Figure 11**, the locations with the most crashes involving any mode of transportation are intersections. These crashes are caused by numerous factors, but ultimately are a safety issue for drivers, bicyclists, and pedestrians.

Speed

Some correlation can be made between the crash clusters shown in **Figures 10 & 11** and the 85th percentile speeds shown in **Figure 12**. 85th percentile speeds define most traffic speeds along a roadway. They are the speed that 85% of motorized traffic reach. Posted speeds are generally 25 mph throughout most of Southbridge, particularly in the residential areas. Speeds are highest in the southern part of the study area where residential areas are less dense. However, S. Heald Street and New Castle Avenue carry the highest speeds in the study area, in addition to Christina Avenue. Speeds range between 35 and 44 mph along S. Heald Street and New Castle Avenue between C Street and A Street, which connect the main thoroughfare to smaller residential streets creating situations of high turning traffic, frequent stops, traffic lights and high speeds. This could be a catalyst for the crash cluster seen in this area.

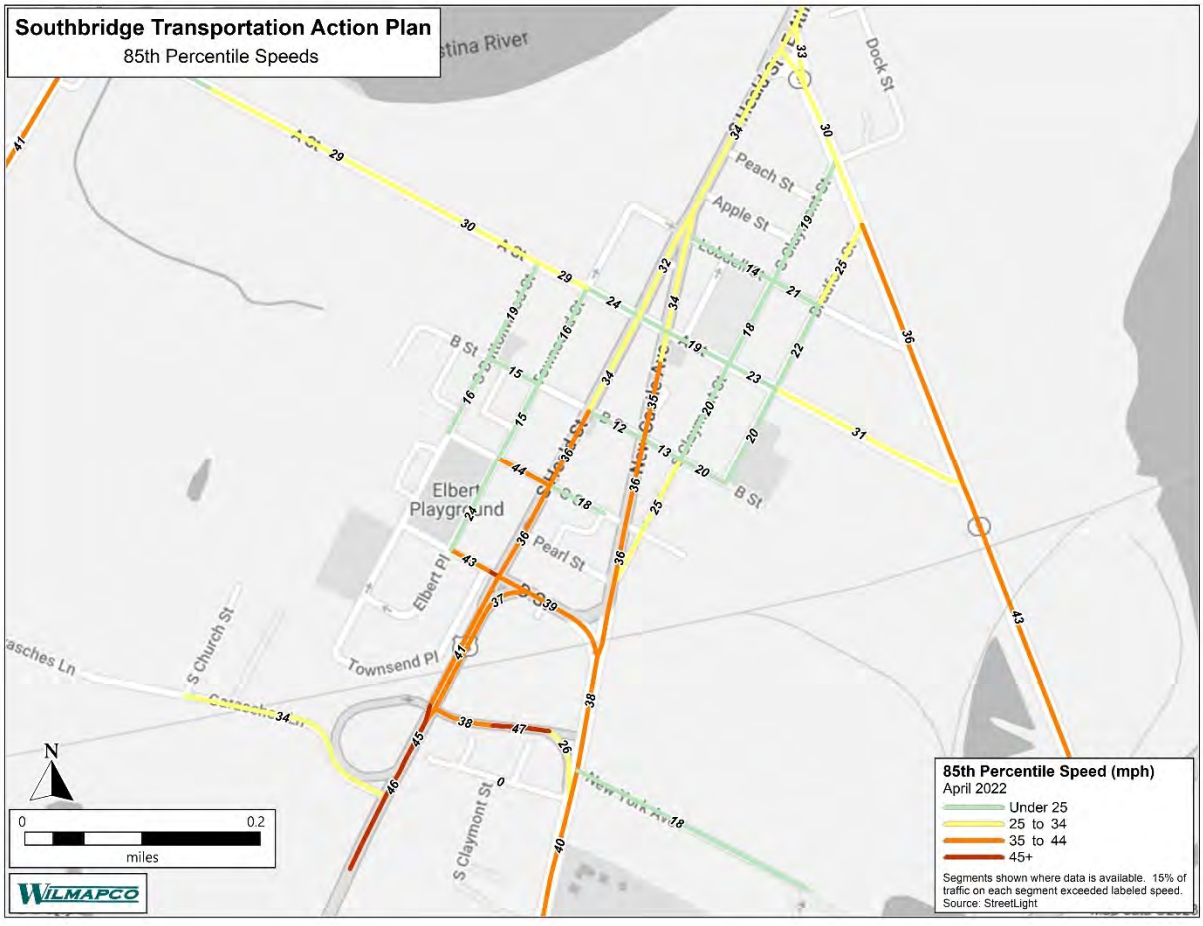

Figure 12 - 85th Percentile Speeds

Flooding

Flooding has been a concern for many Southbridge residents for decades and was a part of the Southbridge Neighborhood Action Plan. As shown in **Figure 13**, residents reported numerous areas of flooding concern. The blue notations are from the 2022 South Wilmington Shoreline Protection Survey and the red notations are from STAP's first public workshop in October 2022. This map will also be cited in the forthcoming Shoreline Protection Plan and can continued to be monitored and updated with reports.

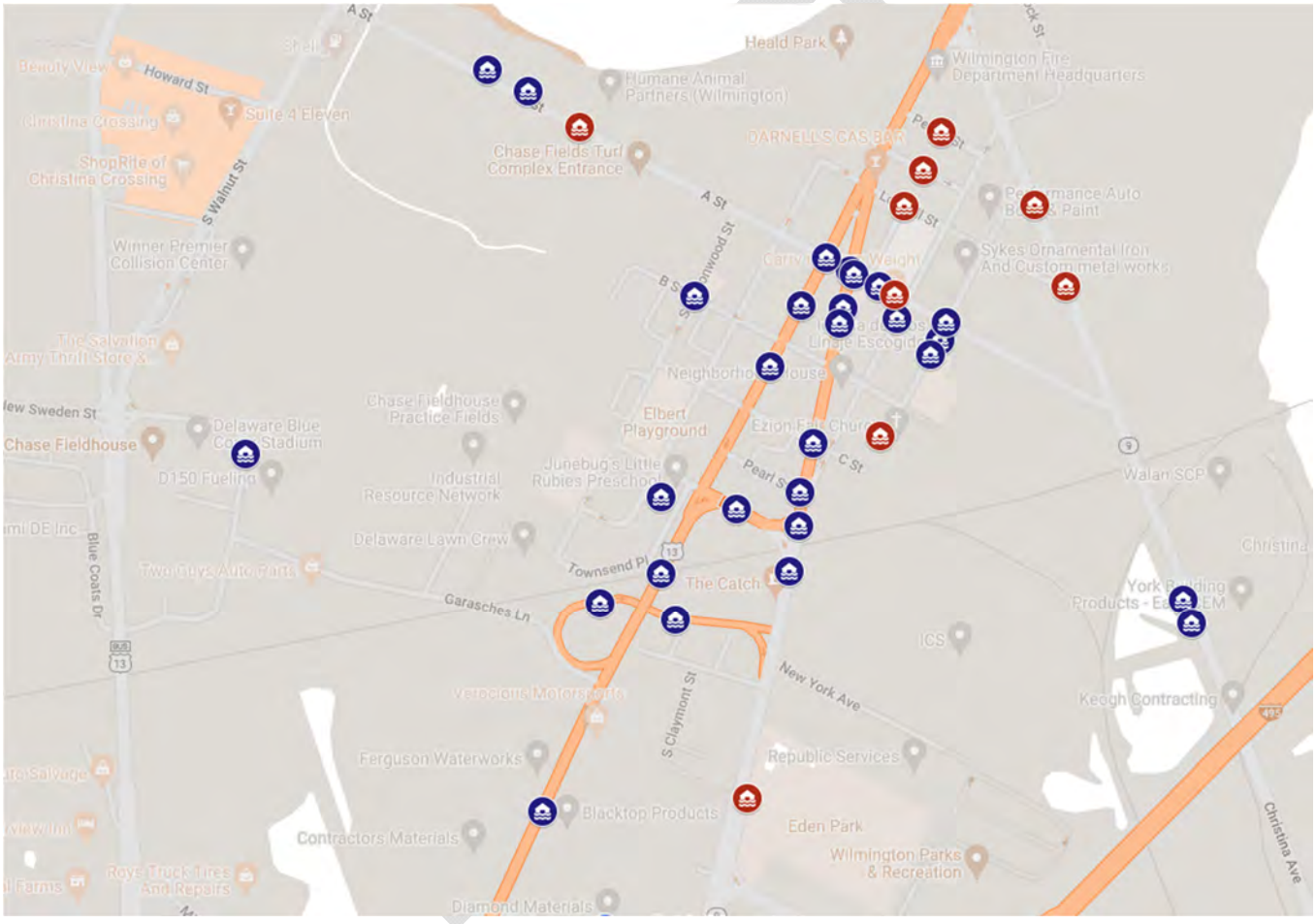

Figure 13- Resident Reported Flood Sites

Planned Transportation Projects (Plans, Design, and Recently Completed)

Figure 14 provides an overview of area projects. Projects shown on this map are newly constructed, in construction, in design, or planned. The following section provides an in-depth summary of these projects.

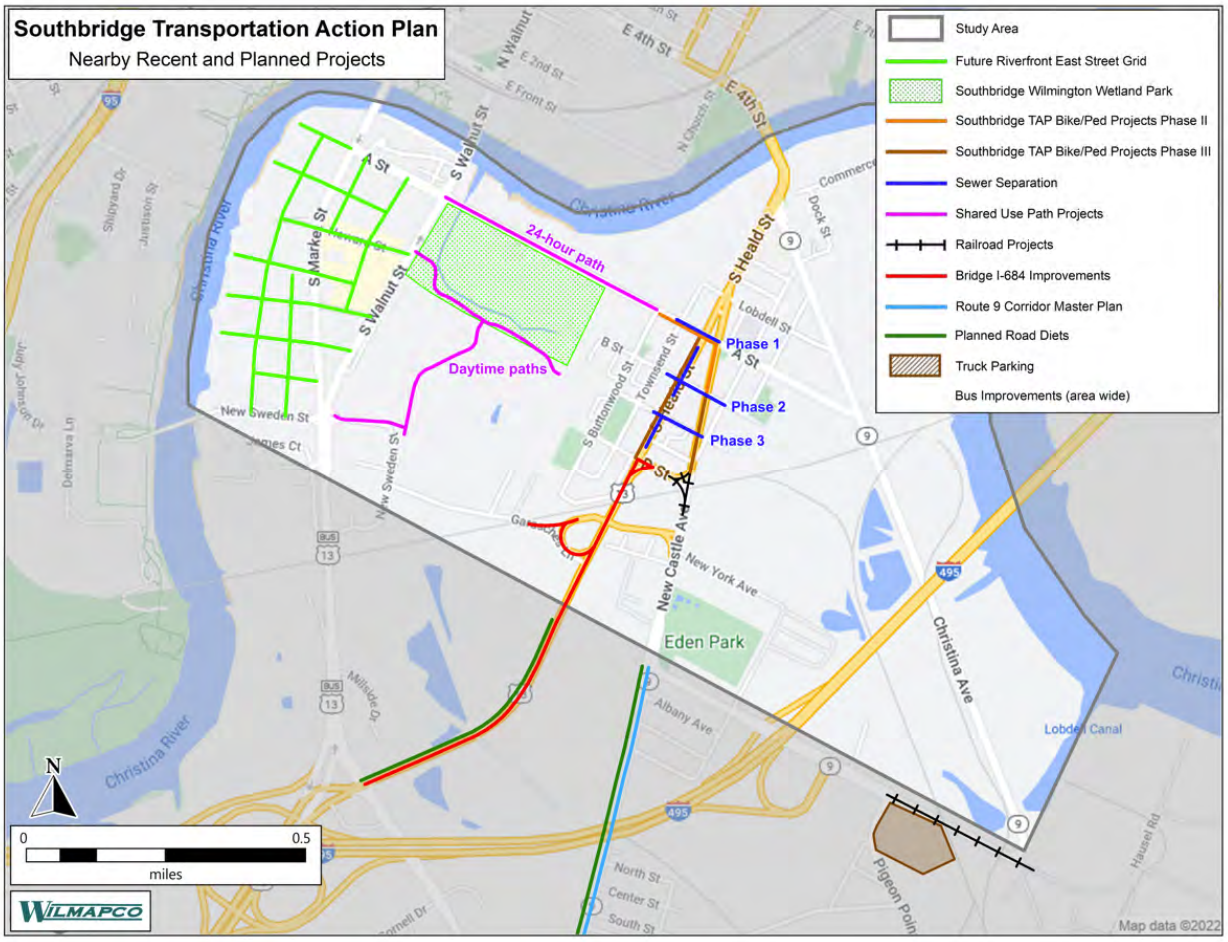

Figure 14 - Transportation Projects in the Area

Southbridge Wilmington Wetlands Park

The Southbridge Wilmington Wetlands Park was created in the wetlands in South Wilmington, between the core Southbridge neighborhood and the Christina Crossing shopping center. Recommended in the 2006 South Wilmington Neighborhood Plan, this $26 Million project was partially funded by a $2.9 million federal grant, and construction began in June 2019. The primary purpose of the park is to reduce flooding in Southbridge, while also restoring a damaged wetland habitat. The park also features a boardwalk trail that stretches across the park from S. Walnut Street to S. Church Street, providing a low-stress, car-free

connection between residential and commercial areas. The park officially opened to the public in September 2022 (**Photos 1 & 2**).

Photo 1 – Southbridge Wetland Park

Photo 18 – Southbridge Wetland Park

Shared Use Path Connections to Wetlands Park

DelDOT developed a concept plan for an additional shared use path(s) that would extend south from the Wetlands Park boardwalk to various destinations. As shown on **Figure 15**, alternative path connections are being considered to S. Walnut Street, Garasches Lane, and the Chase Field House. These paths would provide a connection between the Wetlands Park boardwalk and the existing shared use path on the Christina River Bridge along New Sweden Street, which connects to Riverfront West. The design is yet to be finalized, and construction is anticipated to begin in 2024.

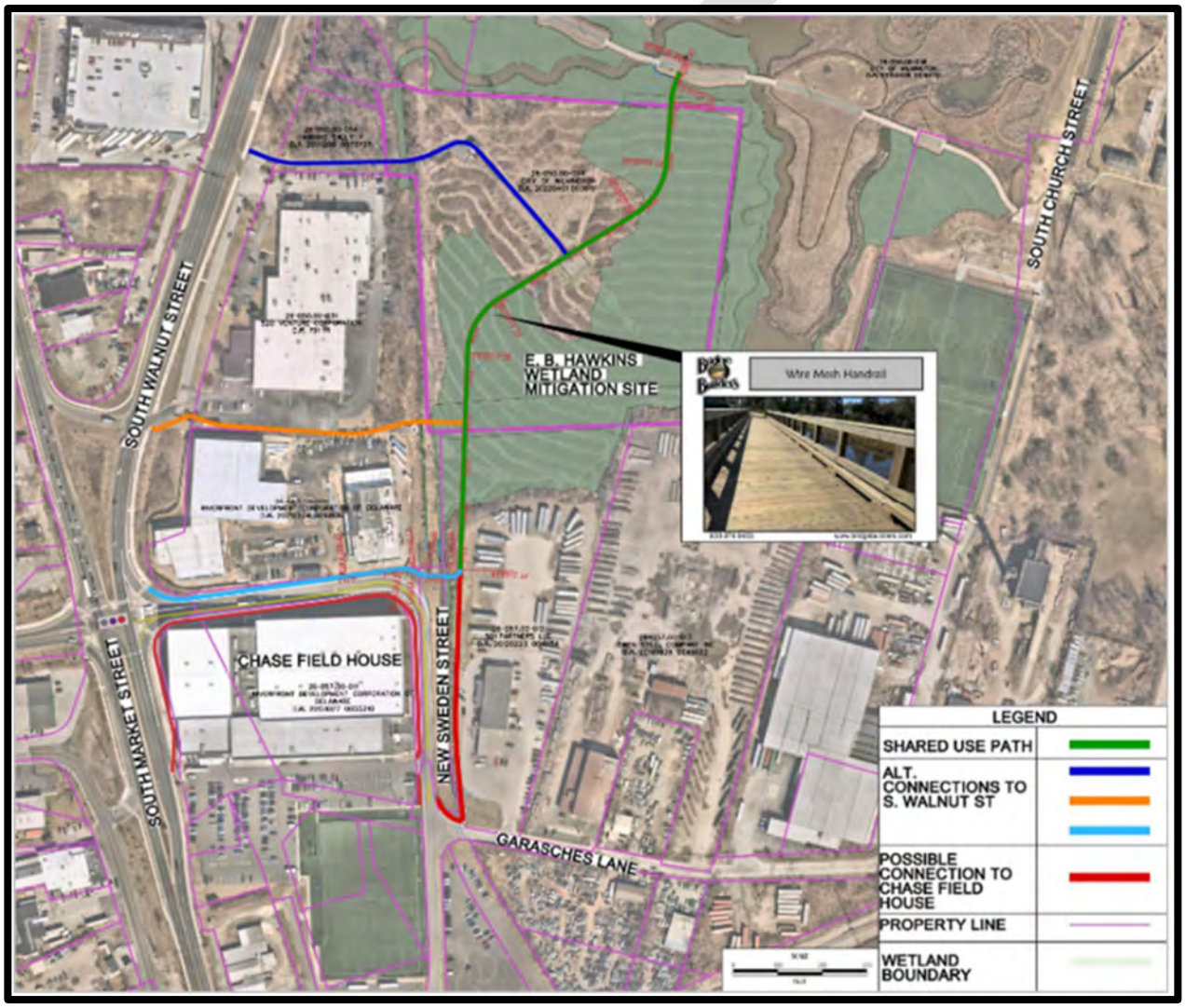

Figure 15 - Connectivity to Southbridge Wetland Park

Figure 16 shows the future improvement to complete a bicycle and pedestrian connection between the Southbridge Wetland Park and New Sweden Street. This connection will provide more direct access from Southbridge to New Sweden Street and the Riverfront area. DelDOT provided this project in the Capital Transportation Program (CTP) to address community concerns regarding safe and proper pedestrian and bike connections between the growing Riverfront District in Wilmington and the nearby community of Southbridge. This is in keeping with the Federal Highways "Livability" initiatives in urban areas.

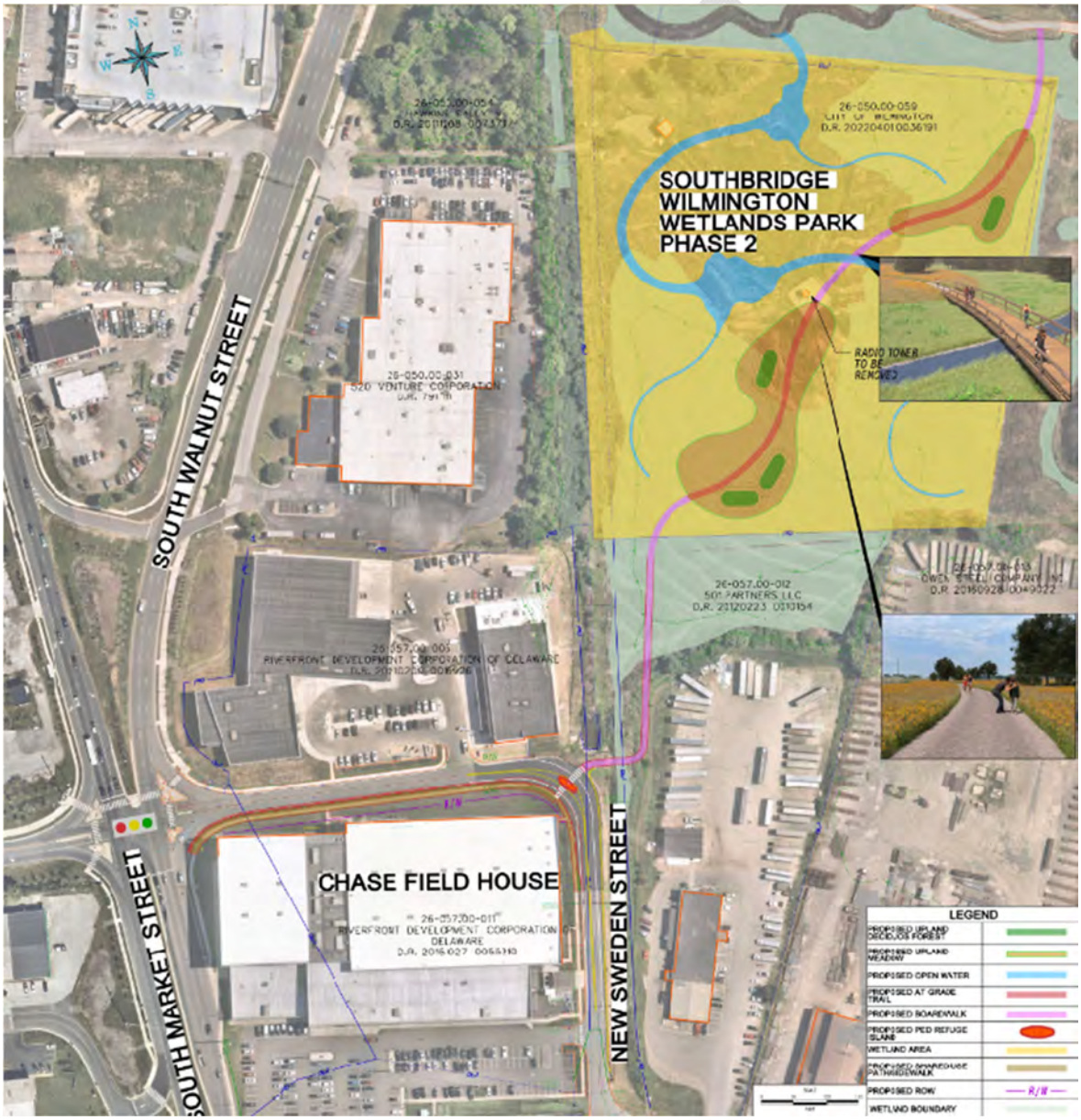

Figure 16- Planned Pedestrian Connector from Southbridge to New Sweden Street

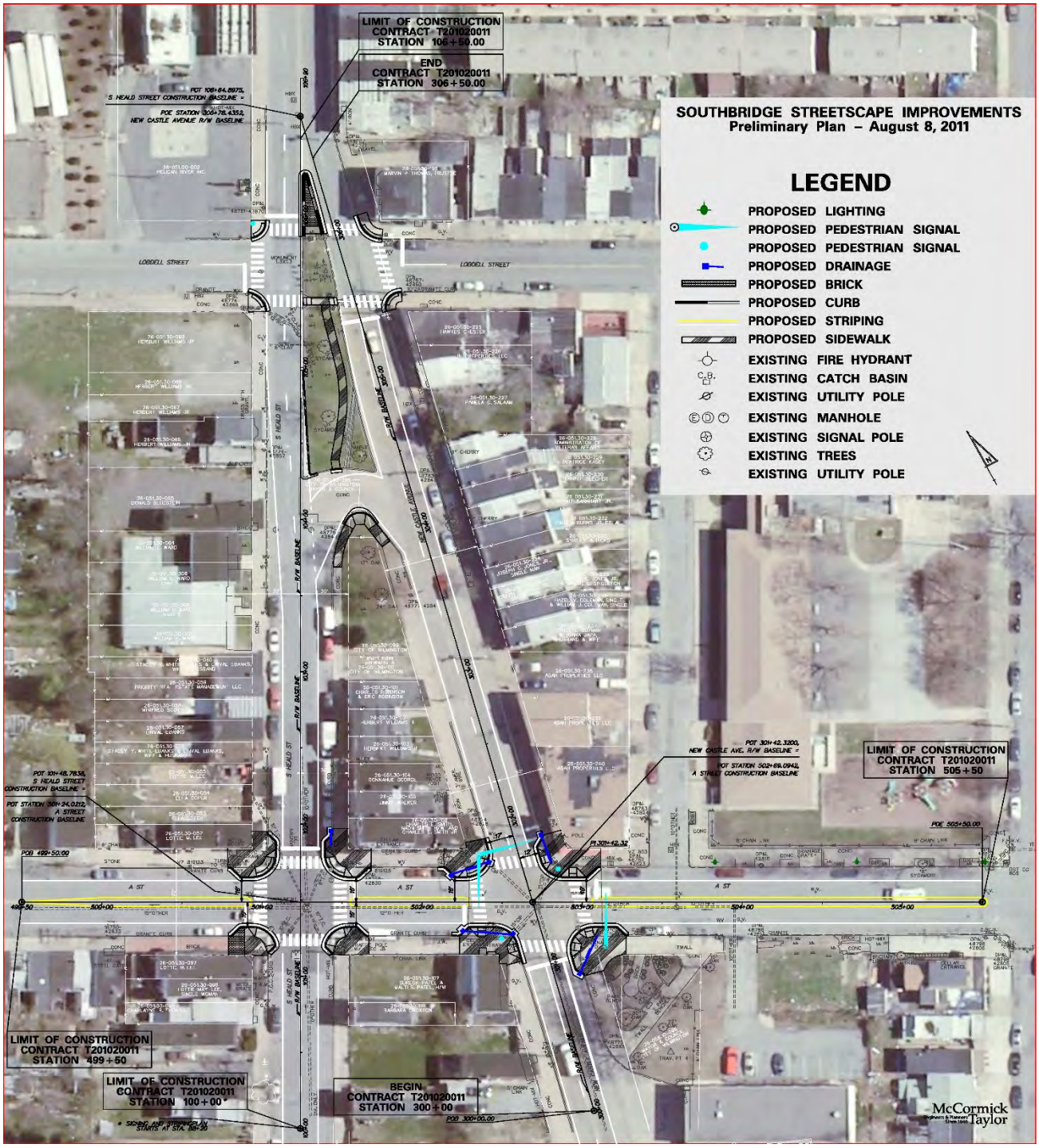

Figure 17- Southbridge Streetscape Improvements, Phase I

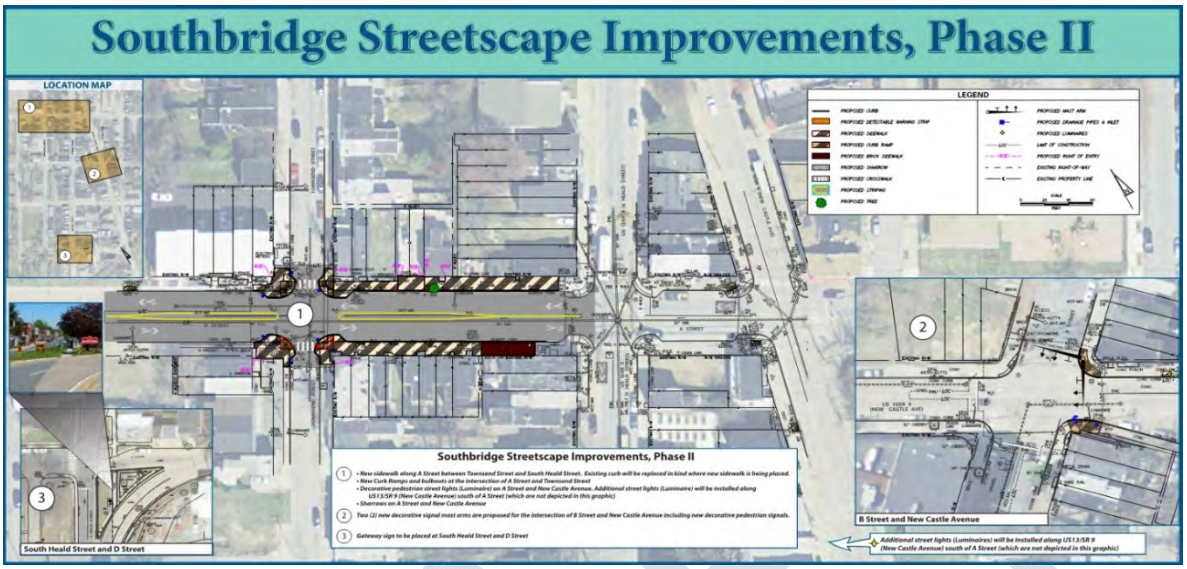

Figure 18- Southbridge Streetscape Improvements, Phase II

DelDOT funded the Southbridge Streetscape Improvements, Phases I and Phase II project under the Transportation Enhancements Program. Phase II, which is still largely awaiting construction, includes new sidewalk along A street between Townsend Street and S. Heald Street including new curb ramps and bulb-outs at the intersection of A Street and Townsend Street. New decorative pedestrian streetlights on A Street and New Castle Avenue are included in this project as well as additional streetlights along New Castle Avenue south of A Street. See **Figure 18.** New decorative signal mast arms were installed for the intersection of New Castle Avenue and B Street. See **Photo 3**. The remained of Phase II is expected to be constructed in the Spring of 2024.

Through the Transportation Alternatives Program (TAP), DelDOT is also funding Southbridge Streetscape Improvements Phase III, which will include a new traffic signal at New Castle Avenue and C Street, pedestrian level lighting along New Castle Avenue, S. Heald Street, B Street, and Bradford Street, as well as new sidewalk and curb ramps at Bradford Street and Hicks Park. The expected completion date of Phase III is spring 2025. See **Figure 19**.

Figure 19- Southbridge Streetscape Improvements Phase III

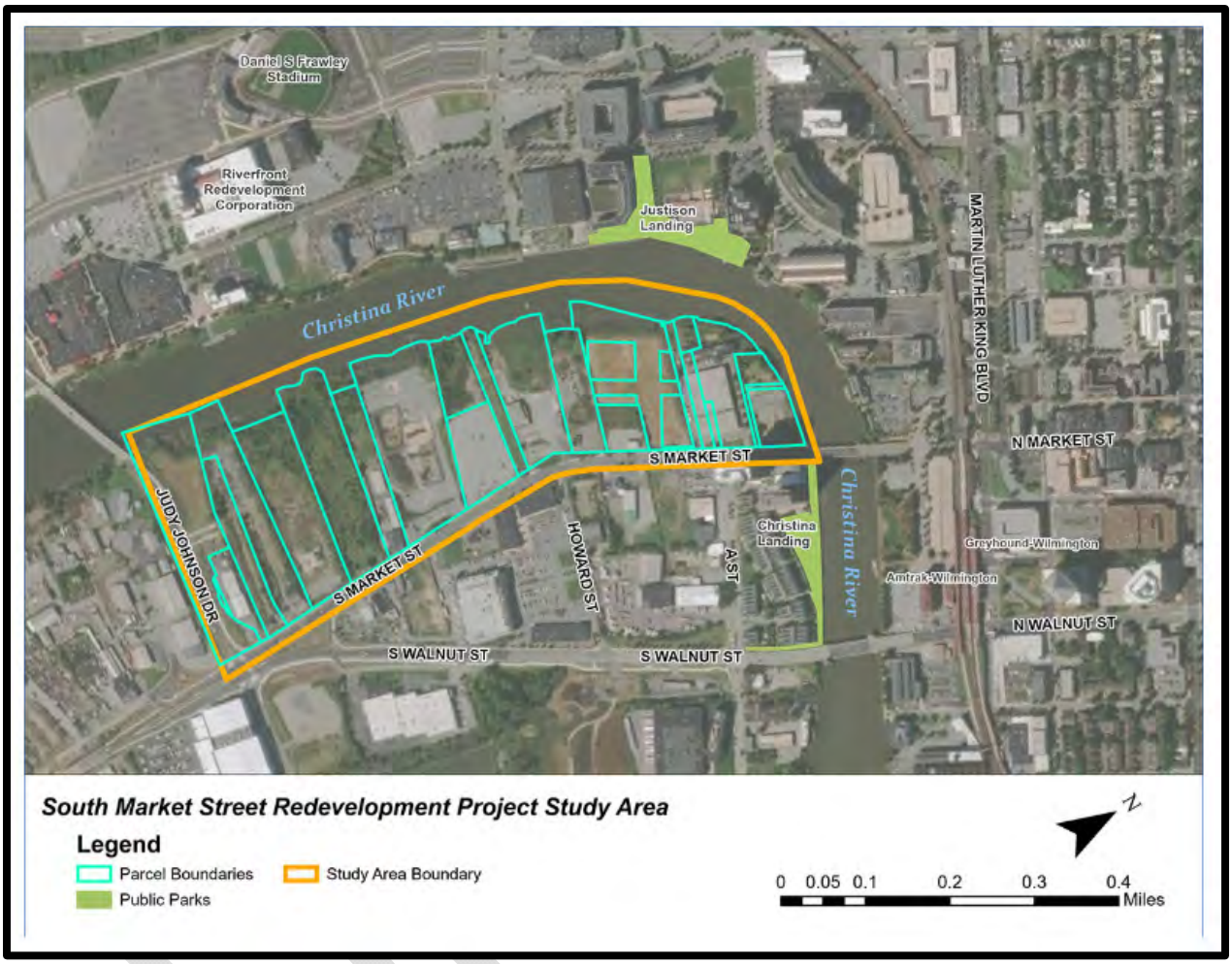

Figure 20- South Market Street Redevelopment

The City of Wilmington in partnership with the Riverfront Development Corporation of Delaware (RDC), is preparing an Environmental Assessment (EA) for the Federal Highway Administration (FHWA) for the South Market Street Redevelopment Project. The City is a recipient of federal funds through a US Department of Transportation FY 2021 Rebuilding America with Sustainability and Equity (RAISE) Grant and is therefore an undertaking under the National Environmental Policy Act (NEPA) process.

The Project is located along the east Christina riverbank in Wilmington, New Castle County, Delaware. The Project's study area extends east from the Christina River to South Market Street and is bound in the south by New Sweden Street. This project provided infrastructure for vehicles, pedestrians, and bicycles in support of the City of Wilmington's Comprehensive Plan for redeveloping the South Market Street Riverfront East Area. See **Figure 20**.

Heald Street Bridge Replacement and Road Diet

Bridge 1-684 (US-13, South Heald Street over the Norfolk Southern Railroad) underwent inspection in early 2016. The study was completed in May 2017, recommending full replacement of the bridge. A preliminary design was completed in April 2021, which includes full-depth pavement reconstruction from Garasches Lane to the southern bridge abutment as well as replacement of the existing bridge structure. This project includes a proposed road diet for S. Heald Street, which will eliminate one travel lane in each direction. A two-way center left-turn lane would be included on surface sections, but not on the bridge. Project construction was expected to begin in 2024; however, the project is currently delayed while a sewer project is constructed first. Construction is expected to last a full year, with traffic detours along S. Market Street, S. Walnut Street, and New Castle Avenue. **Figure 21** shows a concept of the Heald Street Bridge Replacement and Road Diet.

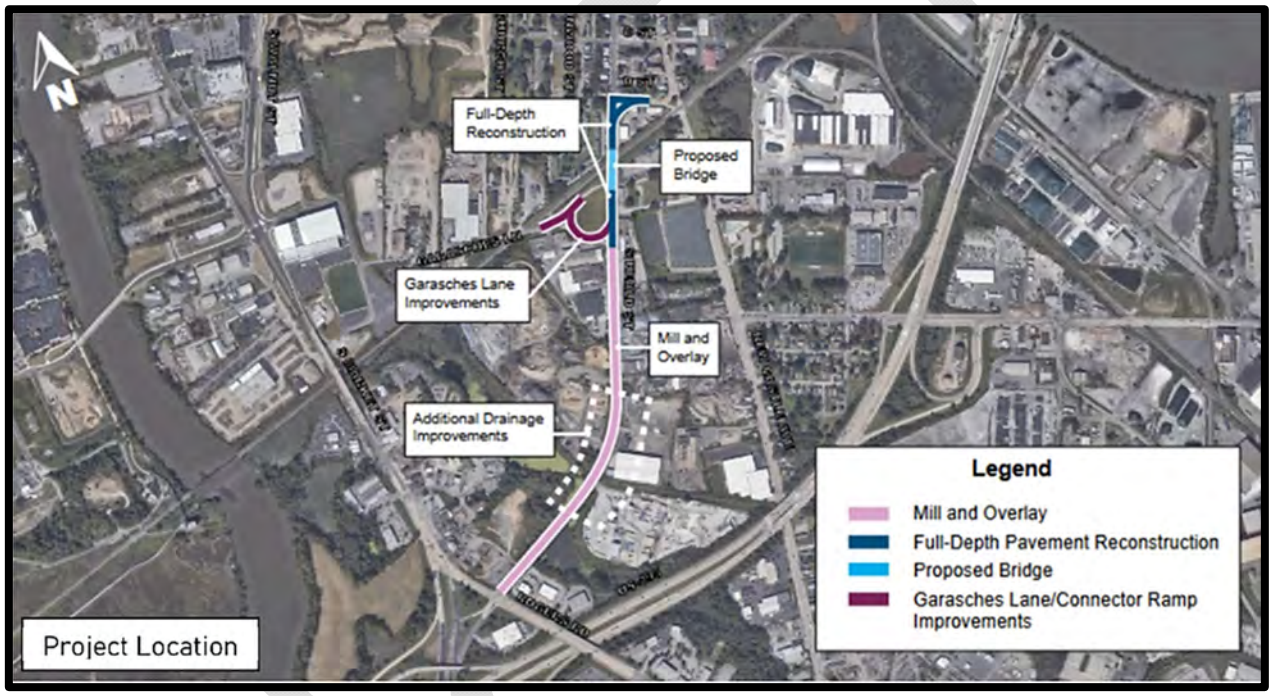

Figure 21 - Bridge 1-684 (US-13, South Heald Street over the Norfolk Southern Railroad)

Garasches Lane Reconfiguration

WILMAPCO's Port Circulation Study (May 2022) recommended a reconfiguration of Garasches Lane to facilitate truck access to the Port of Wilmington, among other potential alternatives. This reconfiguration would combine Garasches Lane with the existing off-ramp from southbound US-13 (South Heald Street), creating a direct connection from Garasches Lane to New Castle Avenue. This will be built as part of the Heald Street bridge replacement project. **Figures 22 and 23** show existing Garasches Lane and the proposed Garasches Lane reconfiguration.

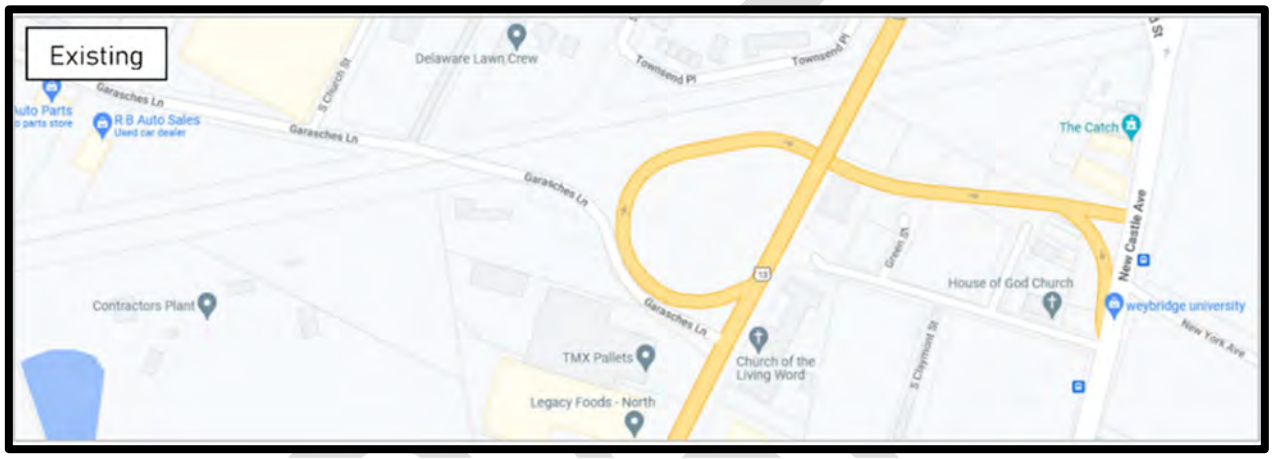

Figure 22 - Existing Garasches Lane

Figure 23 - Proposed Garasches Lane

Connecting Route 9 Corridor Communities

DART has recently been awarded an $810,000 grant from the Federal Transit Administration (FTA) under the Areas of Persistent Poverty Program. Under the project title "Connecting Route 9 Corridor Communities," this grant funding will be utilized for public outreach and technical analysis, including evaluating fixed-route bus improvements, micro transit initiatives, and enhanced connections to transit within Southbridge and other neighborhoods, as well as Complete Streets strategies for multimodal corridor improvements to augment the recommended transit enhancements. This analysis will cover the three-mile stretch of Route 9 from Southbridge to I-295. This project is just getting started due to funding allocation discussions, which are now complete.

Route 9 Master Plan / Route 9 Redefined

The Route 9 Corridor Master Plan was endorsed in May 2017 and proposed a road diet along Route 9 north to Terminal Avenue. The SNAP proposed extending this road diet into Southbridge, and the STAP studied the feasibility of this extension into Southbridge. The road diet through Southbridge would eliminate one travel lane, potentially widen sidewalks, potentially add street trees and green space, potentially narrow crossings by adding curb extensions or potentially add parking to both sides of the roadways. These efforts would improve bicycle and pedestrian safety and reduce the risk of crashes.

Delaware also received $6 million Rebuilding American Infrastructure with Sustainability and Equity (RAISE) grant to fund preconstruction activities for the 12 projects identified in the Route 9 Corridor Master Plan.

Community Feedback

Overview

To gain a better understanding of the traffic, transportation, and mobility issues in the Southbridge community, the STAP conducted an extensive community outreach program. Through numerous public workshops, civic association meetings, public official meetings, youth engagement activities and surveys, the local transportation needs, visions, and preferred project alternatives were gathered and recognized.

At the onset of the STAP, three community members were hired by the Consultant Team to support the project. Two community members from the Southbridge Core Study area were appointed by the Southbridge Civic Association to attend all meetings and provide support to the project team. The third representative lives just outside of the community in the Rose Hill Gardens Community, but carries extensive experience in survey canvassing, which is the focus of this community member. They also supported the SNAP with surveying efforts and a strong familiarity with Southbridge. These community members provided feedback throughout the development of the STAP and helped build and maintain momentum for the project.

The SWPN served as the project's Advisory Committee. The role of the Advisory Committee was to provide overall guidance and feedback throughout the study. It was an opportunity to provide information and gather feedback from community leaders and representatives throughout Southbridge, including those in decision making positions as well as residents. Portions of regularly scheduled SWPN meetings were set aside for the STAP Advisory Committee to conduct business. STAP material was presented to the SWPN four times on August 23, 2022, February 28, 2023, November 28, 2023, and May 23, 2023.

The SBCA was also utilized as an opportunity to disseminate information and gather feedback. The first presentation to the SBCA was a kickoff meeting held on August 23, 2022, at the Neighborhood House to introduce the project. A presentation was delivered to 29 attendees that included the project goals and an introduction to the project team. The study area was presented and discussion focused on the four focus areas of traffic/road diets, trucks and freight, bicycle and pedestrians, and transit. During the meeting, the community provided valuable information and feedback including a reminder of the historical importance of Southbridge to the City of Wilmington. Southbridge proper and the greater Southbridge area are two distinct areas with different aesthetics. Speeding, crashes, and truck traffic were at the forefront of the community's concerns. Summaries of the first two community workshops were provided at the October and March SBCA meetings and the SBCA was presented with the final draft of the STAP at their July meeting.

Community workshops were held in October and March before regular SBCA meetings. These occurred in the same building prior to the official SBCA meeting. Representatives from the project team were also available after the SBCA meetings for questions from the community and to provide additional information to those who were interested in hearing more. A third community workshop was held on June 10, 2023 in Hicks Park and repeated prior to the SBCA meeting on July 18th.

Prior to each community workshop, public officials were contacted to provide information on the workshop with an invitation to attend a meeting with them individually or collectively to provide more information. The following public officials were notified of the community workshops:

- Senator Darius Brown
- Representative Franklin Cooke
- Councilwoman Michelle Harlee
- Mayor Mike Purzycki

An individual project meeting was held with Representative Franklin Cooke prior to Community Workshop 2. The discussion included specifics about landscaping and the required agreements that need to be in place for landscaping options to be considered for Southbridge. Flooding locations were also discussed.

Community Surveys

Two surveys were launched during the STAP study. The first survey was launched in conjunction with Workshop #1 with a goal of gathering additional feedback and existing conditions from the community. 43 surveys were received through an online portal and paper copy format. Information gathered included demographics on residents/frequently travel through/work in Southbridge/other, transit ridership and challenges, priorities of concerns, travel lane reconfiguration of removing one travel lane along S. Heald Street and New Castle Avenue, and safety. The second survey had 93 responses with a goal of gaining feedback on the recommendations presented in the second community workshop. Comments for Survey 2 resulted in overall positive feedback on the recommendations. Both surveys were completed by people who are either residents of Southbridge or closely connected to Southbridge, such as through work, relatives, or frequently traveling through the area.

Youth Engagement

In addition to community workshop and surveys, a parallel effort was made to engage the community's youth. Two youth events were held during the STAP Study on December 6, 2022 and March 2, 2023 (**Photos 4, 5 & 6**). Both events were attended by approximately 20 children ranging from first grade through high school age. The children were very engaged and provided numerous topics for discussion and feedback, which mirrored the feedback received from the first community workshop.

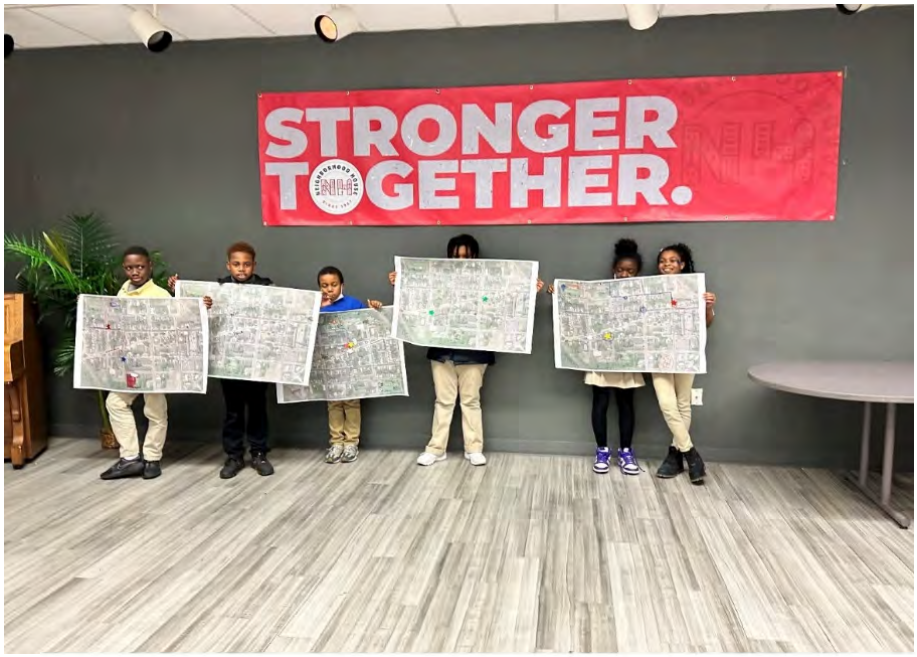

Photo 4 – Youth Engagement Event #2

Photo 5- Youth Engagement Event #2

Photo 6- Youth Engagement Event #2

Summary of Community Feedback

Workshop 1

The first community workshop was held on October 18, 2022, at the Southbridge Neighborhood House with 25 attendees. Information was presented on the study area, project purpose and goals, and roadway reconfiguration suggestions. This visioning workshop included an opportunity for the community to provide extensive feedback to the project team about a large number of topics including:

- Traffic calming
- Trucks
- Transit and connectivity
- Lighting
- Beautification and landscaping
- Stormwater/Flooding

Figure 24- Community Workshop Feedback Map

Blank maps were provided so that the community could draw, provide marks, and/or write comments on each of the suggested topics, in addition to any other topics the community wanted to discuss. An example map is shown in **Figure 24.** The community drew locations and wrote comments pertaining to requested topics and project goals such as lighting, connectivity, pedestrian crossings, and trucks.

Workshop 2

The second community workshop was held on March 21, 2023, at the Southbridge Neighborhood House with 30 attendees. This community workshop reviewed initial recommendations and kicked off Survey 2, to gather community preferences on those recommendations. Recommendations were presented that provided input, feedback, and solutions to the variety of goals, issues, and challenges provided through the Project Needs statement as well as the data gathering phase of the study. The community provided feedback pertaining to the recommendations and whether they supported the recommendations, wanted more feedback, or did agree with the recommendations. Feedback included requests for more information and requested discussions on the analysis used to determine recommendations such as the road diet and its potential impacts to congestion, delays, and circulation.

Workshop 3

A third and final community workshop was held on Saturday June 10, 2023. The event was attended by 8 community members who expressed gratitude in learning more about the recommendations and expressed positive feedback toward the recommendations. Analysis and in-depth discussions about the road diet, signal retiming, and the D Street recirculation were held with attendees to their satisfaction. Workshop 3 was also repeated on July 18th.

Workshop summaries can be found in Appendix B.

Survey 1

A total of 43 surveys were submitted with over half being completed online and about 45% being completed at the first public workshop and health fair. The majority of respondents reside in Southbridge, with the others frequently traveling through the area or working in Southbridge. The main source of limitations for residents due to lack of transportation is their ability to grocery shop and gather socially. Related to this, grocery stores were the most popular destination where residents would like to see more bus services. The top recommendations for improvements are to reduce truck traffic, reduce overall traffic speeds, and add additional lighting throughout the neighborhood. However, residents are either conflicted or against reducing the number of travel lanes to reduce speeds or closing travel lanes altogether to promote biking.

Survey 2

Similar to the first survey, the majority of the respondents were residents of Southbridge, with the others frequently traveling through the area or working in Southbridge. The questions in this survey were more specific than the first, as the participants were asked to give specific locations and instructions of what improvements they would like to see. In general, the responses showed positive feedback towards recommendations that would reduce truck traffic and overall traffic speed, which as we know from the first survey is a top priority for the community. There were many recommendations and locations given to add additional lighting throughout Southbridge, which is another top priority. Adding sidewalks to

promote pedestrian safety and more beautification throughout the neighborhood also received extremely positive feedback.

Youth Workshop 1

The feedback received from the children echoed the information received from the first public workshop. The children discussed the long wait time for buses to arrive for trips to school, shopping, groceries, and doctors. The children discussed how different areas of Southbridge are not well lit and feel scary at night. Most of the children find it difficult to cross intersections because of the higher speeds of traveling cars. The children like the community parks but want a safer more direct route to some of them with better lighting. The children also would like more infrastructure to ride their bicycles around the community. The children also like the idea of more trees and grass areas.

Youth Workshop 2

The children gave similar feedback to what was received during the second community workshop. They expressed how some parks and streets that are dark and scary due to limited lighting. They even mentioned how they are unable to travel to certain places in Southbridge due to safety concerns. Most common transportation mode for them is walking, mainly on sidewalks, but they fear crossing some streets due to cars and speeding and difficulty seeing cars coming.

5. Recommendations

Building upon the mobility recommendations identified in the SNAP, as well as the extensive community input provided through the robust public involvement campaign numerous transportation improvements were considered. In an effort to maintain the momentum of this project, recommendations were developed in three tiers of implementation:

- Short Term (ST) 0-5 years
- Medium Term (MT) 5-8 years
- Long Term (LT) 9+ years

As analysis progressed, some recommendations were categorized as "quick action" or able to be completed with relatively low cost and short time frames. These quick action items were summarized in a memo and submitted to the City of Wilmington on February 10, 2023 (**Appendix C**). As funding and staffing becomes available, these quick action items can be completed. It is anticipated these items will be completed in 0-5 years. They include mostly signing, striping, and signal timing improvements that can improve truck routing, enforce no truck parking, reduce speeding, and improve pedestrian safety.

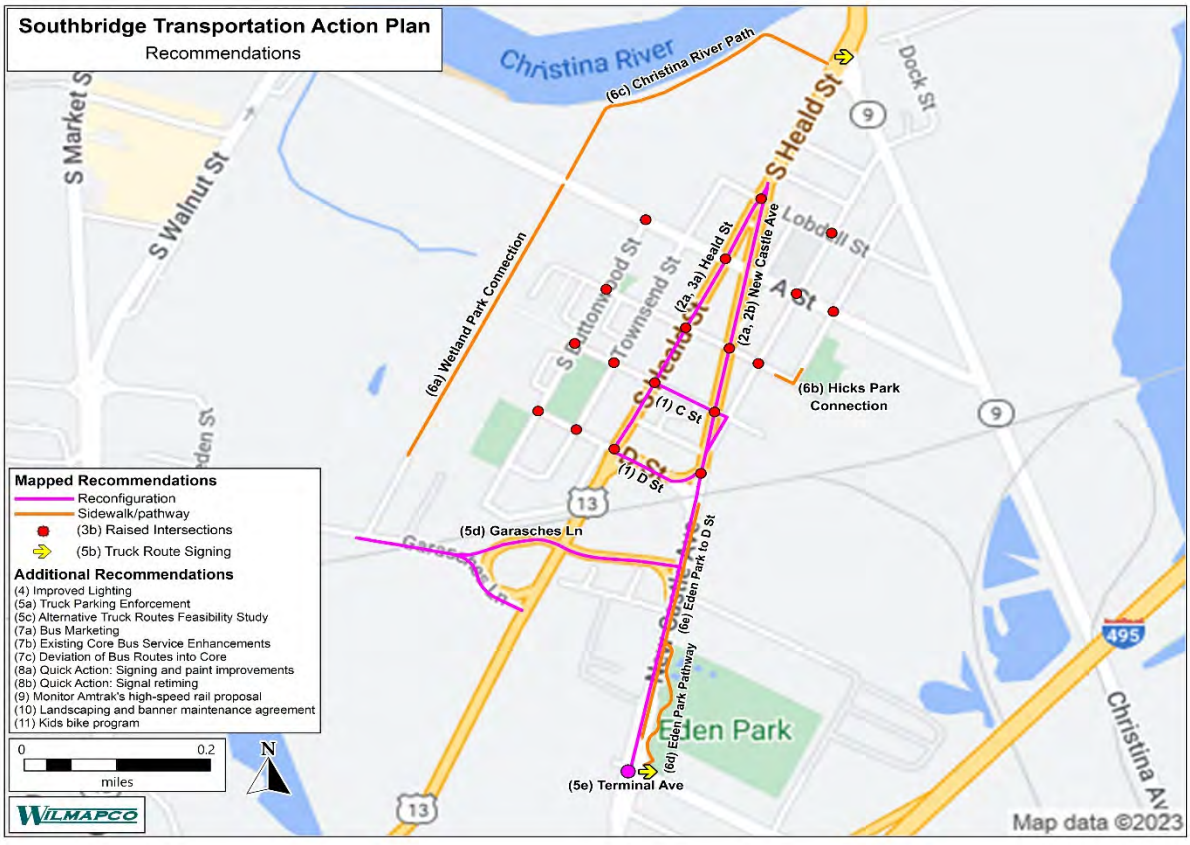

Figure 25- Southbridge Mapped Recommendations

Figure 25 shows the location of most recommendations.

Traffic Calming

Recommendation 1 – D St and C St Reconfiguration

The area bound by S. Heald St to the west, D Street to the south, Claymont Street to the east, and C Street to the north has several concerning issues. Speeding was noted both from community input, as well as the 85th percentile speed map. Vehicles often miss the turn from New Castle Avenue to S. Claymont Street due to low visibility of the slight skew in the road. C Street and Pearl Street are one-way streets traveling in opposite directions. C Street's direction is toward S. Heald Street and Pearl Street's direction is toward New Castle Avenue. Vehicles use Pearl Street to reach S. Heald Street and travel in the wrong direction on Pearl Street. In addition, the area known as the D Street Sweep has curves from S. Heald St to New Castle Avenue that are very large and encourage higher speeds. This area between the D Street Sweep and Pearl Street is an area noted on the crash cluster map as well as community input. The speeds that vehicles are reaching along New Castle Avenue are not ideal for pedestrians either. Although signed for 25 mph, most vehicles travel in excess of 40 mph over the bridge and over 35 mph on New Castle Ave and Heald Street.

As a result, short term recommendations include replacing existing stop signs with larger stop signs, adding stop ahead signs, adding no left turn signs, improving street signs for S. Claymont Street, and refreshing crosswalks. This intersection will still be navigable by trucks and busses, but these recommendations will encourage them and cars to travel at slower speeds.

A long-term recommendation for this area is to reconfigure many of the existing traffic movements as shown in **Figure 26**. This would include removing S. Claymont Street between D Street and C Street. All traffic would enter S. Claymont Street through C Street from New Castle Avenue. The two lanes along New Castle Avenue would be reconfigured with a dedicated left turn lane and a through-right turn lane. The church entrance and exit would operate as it does in the existing scenario, but the entrance from S. Claymont Street would be extended to reach New Castle Avenue. The residential properties between Pearl Street and C Street would have the sidewalks to their front doors extended to New Castle Avenue and parking would be along New Castle Avenue. Parking would be inset into the side of New Castle Avenue to reduce conflicts with vehicles traveling along New Castle Avenue. The curve radii at the intersection of D Street with both S. Heald Street and New Castle Avenue would be reduced to curb radii closer to 90 degrees while remaining large enough to accommodate tractor trailer turns, thereby removing the "D Street Sweeps." This would be similar to most of the other intersections throughout Southbridge and reduce the travel time of pedestrians through the intersection. The curb line at Pearl Street from New Castle Avenue would also be angled making illegal left turns more difficult to accomplish.

The benefits of these reconfigurations would be to slow car and truck traffic, improve pedestrian safety, provide an opportunity for green space/stormwater management or community art, and an opportunity for welcome or directional signage. Removing the D Street Sweeps would shorten pedestrian crossing time across the intersection and slow traffic.

Figure 26 - Recommended Improvements to D Street

A southbound gateway will also be added to the triangle intersection of New Castle Ave, Heald St, and A St to meet SNAP recommendation IM04, as part of Recommendation 1.

Community Survey 2 revealed that 70% of respondents were in favor of this recommendation. The comments received were generally positive and most respondents thought that the improvement would slow traffic. There were positive comments on the inset parking along New Castle Ave, however two of 91 respondents were opposed to the reconfiguration of Claymont Street. In the youth workshops, the children expressed how they feel unsafe crossing streets and walking on the sidewalk due to cars

speeding. This recommendation will help eliminate that concern as cars and trucks will be forced to slow down.

This recommendation would fall into DelDOT's Capital Transportation Program (CTP) and would be a long-term project. There may be opportunities to include some of the components of this recommendation into the current DelDOT BR 1-684 project on Heald Street which would allow some of the improvements to be implemented in a short-term timeline. With regards to landscaping, DelDOT will pay for the installation of advanced landscaping, such as trees. However, a local maintenance agreement must be in place beforehand because DelDOT will not maintain the landscaping.

Speed Reduction Strategies

Recommendation 2a- Interim Road Reconfigurations: New Castle Ave and Heald St

The initial outreach and community survey indicated that speeding throughout the Southbridge community was a significant concern for the residents. Speeding was identified on S. Heald Street, New Castle Ave, and the D Street Sweep. During the youth outreach events speeding was identified as an issue that made the youth feel unsafe when walking and riding bikes in the neighborhood.

There is an opportunity to implement the lane reduction on New Castle Avenue and S. Heald Street through a restriping project. This type of interim project would allow some of the benefits of the road diet to be realized much sooner than waiting for a larger more expensive capital project. As part of a restriping project bike lanes could be added along each roadway, but unfortunately most of the roadside amenities identified to occupy the space created by the lane reduction would have to wait until the larger capital project to be implemented.

Recommendation 2b- New Castle Ave Reconfiguration (including raised intersections and 2 gateways)

The STAP analyzed the recommended lane reductions on New Castle Avenue proposed in the SNAP to reduce speeds and improve safety. Separate planning studies have identified, and plans are moving forward for lane reductions on both New Castle Avenue and Heald Street south of Southbridge. There are currently two travel lanes plus parking on each side. Vehicular volumes were analyzed to determine if one lane of each roadway could be removed so that additional amenities could be provided in its place, such as wider sidewalks or additional parking, without reducing the operations or increasing delays along each roadway.

The traffic analysis determined that delays generated through the one lane reduction did not result in adverse effects to the roadway's operation. Existing traffic volumes were collected in 2022 and 2023. The highest peak volumes were used for the analysis. An annual growth factor of 1.5% was applied to these traffic volumes over 30 years. By comparison, DelDOT anticipated 0.65% growth through Southbridge, which is lower than the anticipated growth used in the analysis. Each major intersection shown in **Figure 27** was analyzed for delays. Level of Service (LOS) measures how well traffic moves along a roadway or through a signalized intersection. LOS is based on vehicle delay and speed. Level A is considered Free Flow and Level F is Highly Congested. Level D is the design standard minimum, and Levels A-C are considered optimal. As shown in **Figure 27**, all intersections on New Castle Ave and Heald St meet at least the minimum level and the majority are optimal.

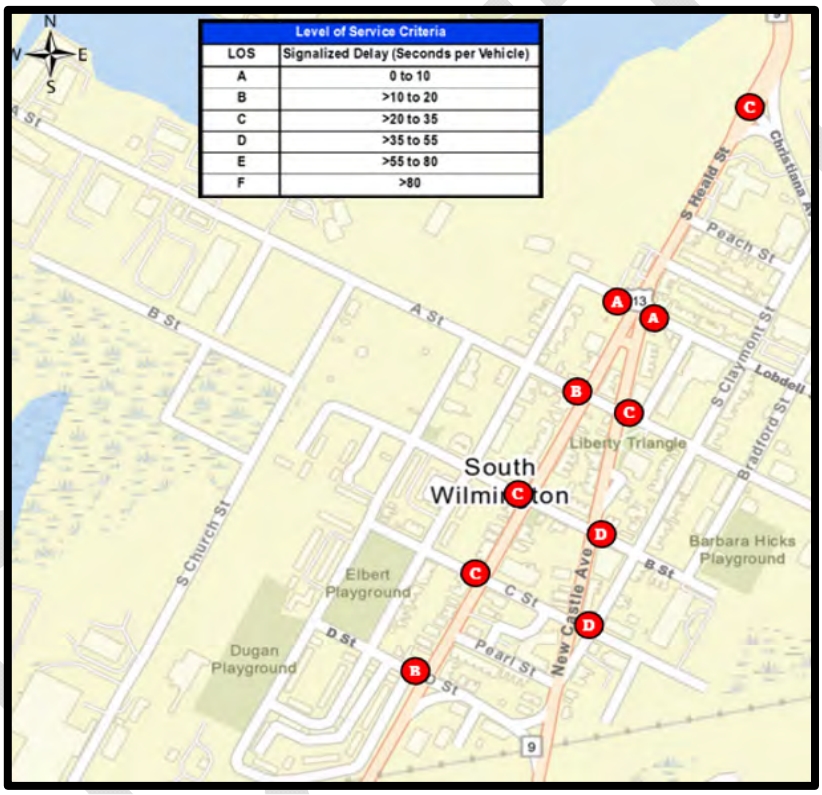

Figure 27 – Intersection Level of Service After Road Diet

The result indicates that all intersections are below the maximum allowable delay allowed by DelDOT through the year 2050. The results included trip generations developed as part of the South Market Street Master Plan's Riverfront East development expected to occur in the near future. The trip distribution for the proposed Riverfront East assumed 2% of new trips generated by the proposed development would arrive/depart via A Street (and therefore to some degree to/from Southbridge). At full buildout 2% of the trips would add 107 trips to the AM peak hour and 73 trips to the PM Peak Hour. The traffic analysis assumed all of the new trips generated by the additional 2% of traffic were traveling through Southbridge

on S. Heald Street and New Castle Avenue. As a result, it was determined that Riverfront East will not affect the success of the traffic lane reconfiguration.

The traffic lane reconfiguration would help slow car and truck traffic and would allow for some additional benefits like additional parking or wider sidewalks. According to the Federal Highway Administration, removing a lane that is not needed reduces crashes by 19-47%. Successful lane reductions have been implemented locally on Union Street, Memorial Drive, Philadelphia Pike and more, leading to a drop in excessive speeds and crashes. This recommendation does not remove any parking and could add parking. This reconfiguration would improve safety for people walking and biking and reduce the risk of crashes. It may also reduce through-traffic in Southbridge.

The limits for the lane removal along New Castle Avenue are between Terminal Avenue and Apple Street. As part of the lane restriction, signal timings will be adjusted on New Castle Ave in such a way as to allow vehicles traveling at the posted speed to progress through the corridor and cause vehicles speeding through the corridor to encounter more red signals. Raised intersections will be added at D St, C St, B St, and Lobdell St.

It is important to note that recommendations for lane reductions/restrictions will be evaluated on a block-by-block basis. For example, we are aware that Wilmington Fire Station #2 is located on New Castle Avenue between A and B Streets. Depending on the location of the call being answered, they sometimes turn left out of the Station (against the flow of traffic) on New Castle Avenue to expedite their response time to an emergency. In this block we recommend not allowing parking on the left side of the road and striping the left side as a Fire Lane ensuring that it remains free of traffic and available for emergency vehicle to use as needed.

Youth feedback mentioned wanting to be able to travel to the gas station near Apple St, so recommendations that will make that route safer for pedestrians or bicyclists could be implemented along with other work to improve safety in the northern part of Southbridge as part of this recommendations and Recommendation 3.

Survey 2 results indicated that 51% of the respondents were in favor of the road diet and 29% were not in favor of removing a lane. The other 20% were unsure. Survey 2 also asked respondents how they would like to repurpose the space gained by the lane reduction. The top 5 requests were wider sidewalks, beautification, landscaping, lighting, and parking on both sides of the roadway. See Appendix I, Existing and Proposed Typical Sections: New Castle Ave. and Heald St. for concept typical street sections.

Recommendation 3a- Heald Street Reconfiguration (including raised intersections)

The STAP also analyzed the recommended lane reductions on Heald Street proposed in the SNAP to reduce speeds and improve safety. Separate planning studies have identified, and plans are moving forward for lane reductions on S Heald St in Southbridge. There are currently two travel lanes plus parking

on each side. See Appendix I, Existing and Proposed Typical Sections: New Castle Ave. and Heald St. for concept typical street sections.

The same traffic analysis process for New Castle Ave was followed for Heald St and it was determined that delays because of the one lane reduction did not cause any unfavorable effects to the roadway. The limit for the lane removal is between D St and Apple St. Signal timings will be altered to allow vehicles following the speed limit to travel through with all green signals. Speeding vehicles will experience more red signals. Raised intersections will be added at D St, C St, B St, A St, and at Lobdell St.

Recommendation 3b- Side Street Raised Intersections

In conjunction with a lane reduction, raised intersections are also recommended. A raised intersection is different from a speed hump or speed table. A raised intersection raises the entire intersection to the height of the curb, which makes traveling at high speed through the intersection more difficult. Possible aesthetic treatments to the raised intersection also raise awareness that bicycles and pedestrians may be in the intersection. **Photo 7** is an example of a raised intersection at the Wilmington Riverfront.

Survey 2 results indicated that 87% of the respondents were in favor of the raised intersections to help control the speeding.

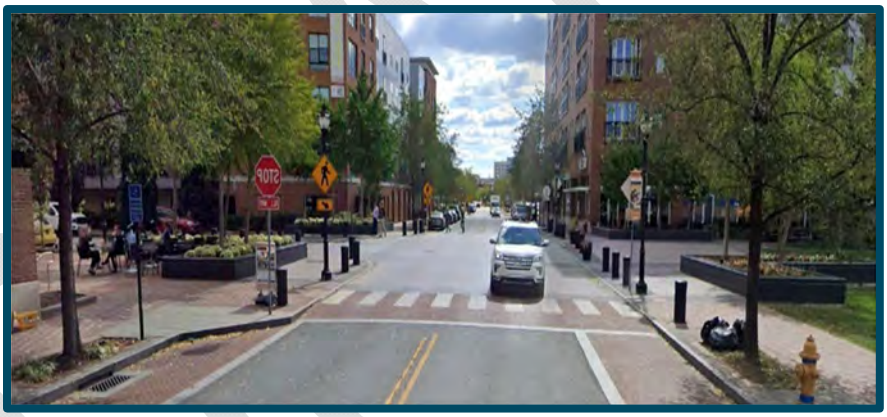

Photo 7- Raised Intersection

Based on community feedback, the following locations shown in **Figure 28** marked in blue are suggested locations for a raised intersection. These locations are also based on crash data shown in **Figures 10 & 11.**

Figure 28- Raised Intersection Locations

Lighting Improvements

Recommendation 4 – Improved Lighting

Based upon the lighting analysis, community feedback from the surveys, and a nighttime lighting audit, the following locations are suggested for additional lighting. See **Table 1** and **Figure 29**.

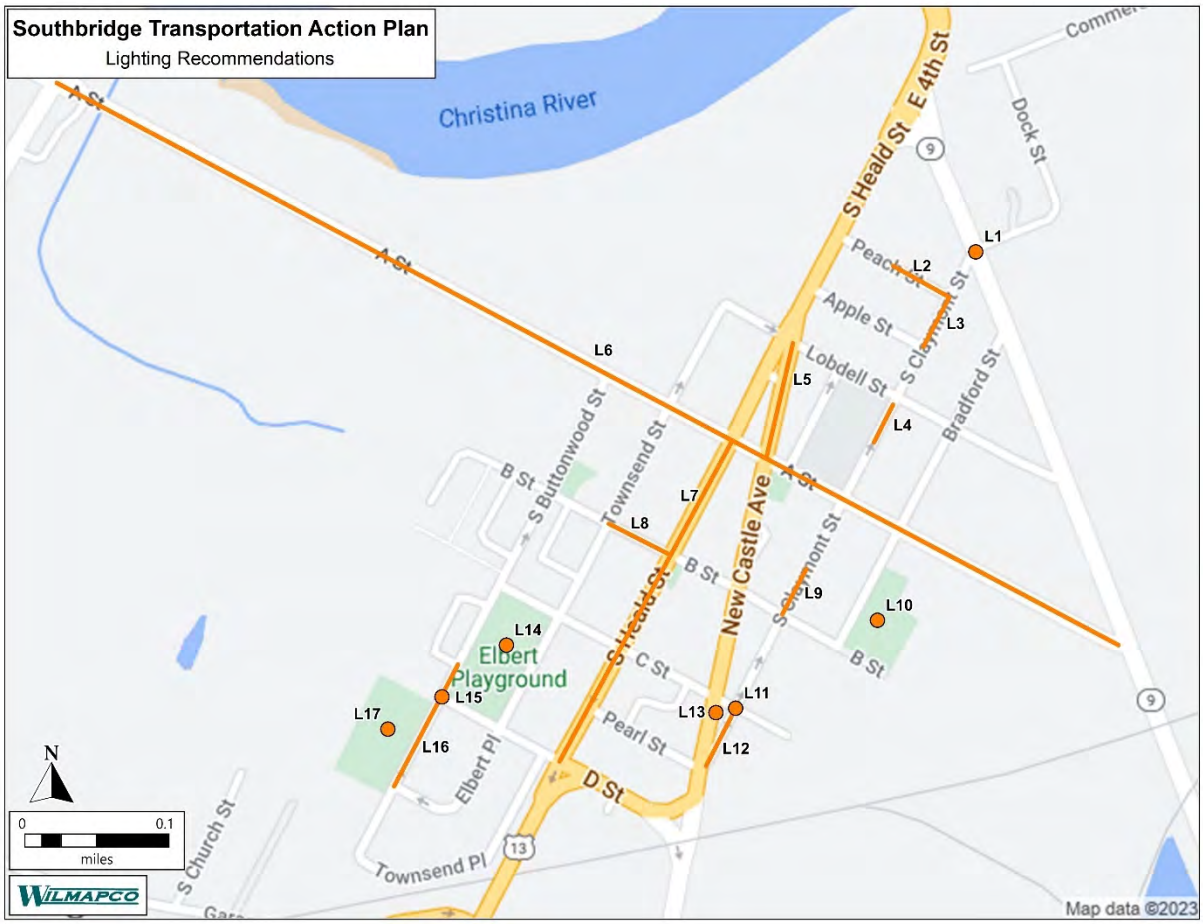

Figure 29- Lighting Recommendations Map

Map ID	Location	Existing Condition
L1	Claymont St. and Christina Ave.	Streetlight on southwest corner is dim; rest of intersection is dark
L2	Peach St. just west of Claymont St.	Street is dark
L3	Claymont St. from Peach St. to Apple St.	Light is blocked by tree branches
L4	Claymont St. south of Lobdell St.	Light is blocked by tree branches
L5	New Castle Ave. from Lobdell St. to A St.	Street is dark
L6	A St. from Walnut St. to Christina Ave.	Pedestrian-scale lights are dim
L7	Heald St. from A St. to D St.	Street is dark
L8	B St. from Townsend St. to Heald St.	Street is dark
L9	Claymont St. near B St.	Pole at 431 S. Claymont St. could support a light
L10	Barbara Hicks Park	Park is dark
L11	Claymont St. and C St.	Area is dark
L12	Claymont St. from C St. to Pearl St.	Street is dark
L13	Bus shelter on New Castle Ave. at C St. (DART Stop ID 1787)	Button-activated light not operational during lighting audit
L14	Elbert Palmer Playground	Park is dark
L15	Buttonwood St. from Locust St. to Elbert Pl.	Street is dark
L16	Buttonwood St. and D St.	Light is blocked by tree branches
L17	Dugan Park	Park is dark

Table 1 - Roadway Lighting Improvement Recommendations

In addition, as projects are implemented throughout Southbridge, decorative pedestrian lighting is recommended in addition to LED cobra lighting. It should be noted that the TAP Streetscape Phases II and III will be adding pedestrian-scale lighting to address these and other locations.

Slow, Reduce, and Reroute Truck Traffic

Recommendation 5a – Truck Parking Enforcement

Reducing commercial vehicle traffic was identified as a top community concern in survey one. This issue has also been identified in other studies in and around the Southbridge community. Throughout the study there were several issues concerning truck and commercial vehicles including trucks illegally parking on roadways creating issues with site distance and turning movements. The official ordinance in the City of Wilmington states that there shall be no commercial vehicle parking on any city street at any time except when the vehicle is actively loading or unloading. The full ordinance can be found in **Appendix D**. Three short term recommendations to address this issue are: enforcement by City of Wilmington police, community reporting to the police when trucks are parked illegally which would result in fines, and the distribution and placement of No Truck Parking signs throughout Southbridge particularly in the vicinity of neighborhood parks. Members of the community should call the non-emergency police number (302-573-2800) and provide a picture of the illegally parked trucks.

Recommendation 5b – Truck Route Signing

The no truck parking signs were identified in the Quick Action Memo which can be found in **Appendix C**. Trucks traveling to or from I-495 and the Port of Wilmington often travel along New Castle Avenue to reach 4th Street or other points in the city rather than turning right onto Terminal Avenue toward Christina Avenue. The analysis pointed toward missing signage telling trucks to turn right, small signs pointing toward I-495 and no change in the look or feel between this portion of New Castle Avenue and the residential portion. The STAP recommends a short-term solution of "Thru Trucks Use Terminal Ave" along northbound Terminal/Christina Avenues and altering the landscaping to indicate that the trucks are entering a residential area by changing the look and feel of the roadway. This recommendation will slow truck traffic entering Southbridge and potentially even deter trucks from entering the neighborhood all together. Traveling south from 4th Street, "Trucks Must Turn Left" signs will be added to direct trucks onto Christina Avenue and continue to Terminal Avenue where they can access I-495 or SR9.

Recommendation 5c – Alterative Truck Routes Feasibility Study

The long term, larger-scale recommendation is to create a new roadway to link trucks to and from Christiana Avenue. Ideally, this new route would make travel between Terminal Avenue and the 4th Street Bridge at least as efficient as traveling along New Castle Avenue or S. Heald Street. Many of these recommended routes shown in **Figure 30** will require a new at-grade rail crossing, which is extremely difficult to get approved. These long-term suggestions would require many years of coordination and a

very high amount of funding. It is recommended that a separate study analyze feasibility and solutions (short term recommendation).

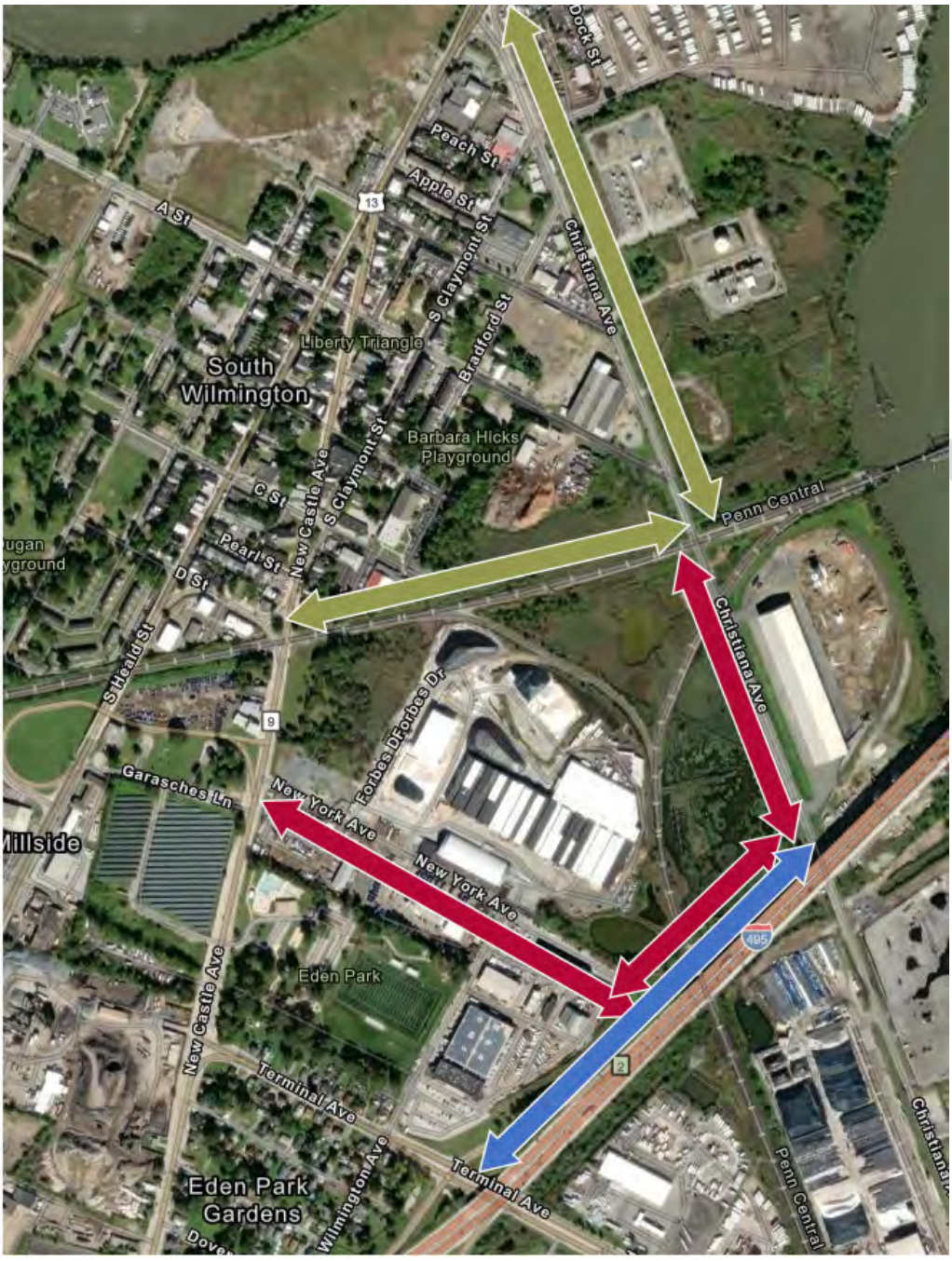

Figure 30- Alternate Truck Routes for Further Study

Recommendation 5d – Garasches Lane Reconfiguration

The STAP supports the previous recommendations for the Garasches Lane Reconfiguration to provide an efficient link to Christiana Avenue and serve as a truck bypass route.

Figure 31 - Garasches Lane reconfiguration

This concept was first recommended in the Rt. 9 Master Plan and then studied in the Port Access Study. The reconfiguration of Garasches Lane will allow a connection between New Castle Ave, Heald Street, and Market Street without having to enter Southbridge. It is anticipated that the project or portion of the project will be completed as part of the DelDOT Bridge BR 1-684 project. **Figure 31** depicts the concept for the Garasches Lane reconfiguration.

This recommendation was not included in the Survey 2, however this concept was shown at Public Workshop 3 and received general support.

The designated truck routes and intersection reconfigurations will deter trucks from entering Southbridge. Truck traffic wanting to go southbound on Heald Street could make a left onto Christina Avenue without having to do so in Southbridge. In addition, the other proposed traffic calming measures, road diet and raised intersections, in Southbridge will create slower operating speeds and be a deterrent for trucks wanting to cut through Southbridge. Based on the workshops and survey results, the community is very enthusiastic about any recommendations that slow speeds and deter trucks from traveling through Southbridge. According to the first survey, reducing truck traffic and overall traffic speeds are the top two priorities for recommendations.

This recommendation will support and complete the improvements to Garasches Lane currently funded in DelDOT's CTP providing connections to Southbridge to complete the overall grid system at D, C, and B Streets.

Recommendation 5e- Interim Terminal Avenue Reconfiguration

Improvements to the intersection of Terminal Avenue and New Castle Avenue are being recommended. The traffic study indicates that a single northbound lane on New Castle Avenue is adequate to handle the volumes now and in the future. The right most northbound lane will be signed as a "right lane must turn right" onto Terminal Avenue. **Figure 32** illustrates the recommended improvements at Terminal Avenue and New Castle Avenue.

Figure 32- Terminal Avenue and New Castle Avenue Improvements

This recommendation was not included in the Survey 2, however this concept was shown at Public Workshop 3 and received general support.

Initial signing of the truck route can be implemented as a short term project but the physical improvements at Terminal Ave require initial prioritization for funding and design and therefore can be

expected in the medium term timeframe. An even longer term solution could be the intersection reconfiguration imagined in the Route 9 Master Plan.

Improve Walking and Biking Connection Throughout Southbridge

Recommendation 6a- Sidewalk Connection: Wetland Park

There is an existing sidewalk and trail at the Southbridge Wetland Park; however, connectivity to the Park is somewhat hidden. The STAP recommends adding sidewalk to the Wetland Park along S. Church Street, including the extension of New Sweden Street to S. Church Street. Sidewalk or a multi-use path would coincide with the new connections as well and connect along New Sweden Street to the parking area at the Wetland Park to B Street.

Recommendation 6b- Sidewalk Connection: Hicks Park

Southbridge contains two public playgrounds within the study area, Hicks Park and Elbert Park. In addition, community members from Southbridge frequent Eden Park, particularly in the summer for the community pool. These parks currently have no children at play signs or other signage indicating speed limits or pedestrian activity. The short-term recommendation is to add signage where appropriate in advance of each park including speed limit signs, children at play signs, pedestrian crossing signs, advanced pedestrian crossing signs, and larger stop signs. In addition, lighting should be upgraded in and around the community parks as well as pavement marking crosswalks.

Sidewalk adjacent to Hicks Park is lacking. In addition, cars are not stopping at the existing stop sign at B Street and Bradford Street, potentially due to the lack of perceived traffic in the area. The long-term recommendation for this area is to add a sidewalk on both sides of the street at the intersection of B Street and Bradford Street. The sidewalk along the side of the park would be placed in the street in front of the church fence, entrance, and sign. See **Photo 8 (*Rendering*).** While this will not reduce travel lanes, which are one lane in each direction, it will reduce the width of the roadway thereby reducing speeds. Sidewalk on the other side of the road is currently in design and will be constructed in the near future.

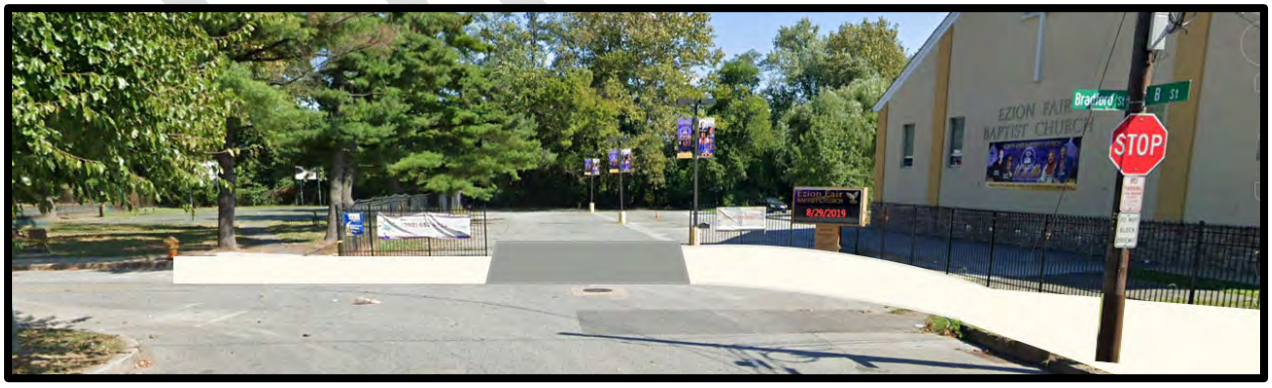

Photo 8- Sidewalk Addition at Hicks Park

Recommendation 6c- Christina River Path

Connectivity from Southbridge to the E. 4th Street Bridge is important to the overall connectivity of the area and the residents. Improving the sidewalks along S. Heald Street between A Street and the bridge is a recommendation of the STAP. In addition, development planned for this area includes a walking path along the river as shown in **Figure 33**. The STAP endorses this walking path and recommends adding amenities such as kiosks with information about the environmental and historical background of Southbridge, gateway signage, and benches. Responses from Survey 2 indicated the need to connect the internal Southbridge sidewalks to the proposed riverwalk. Several amenities were suggested in the survey and ensuring adequate lighting was the biggest concern for the Southbridge community. Picnic benches and community spaces were also very important.

Figure 33 - Walking Path

Recommendation 6d- Sidewalk Connection: Eden Park Pathway

A well-worn walking path is noticeable at Eden Park angled in the direction of Southbridge. This well-worn path is the result of a lack of existing infrastructure connecting the park to the sidewalk system leading to Southbridge. The long-term recommendation includes adding this connection and improving the interior paths within the park to connect this park to the Terminal Avenue intersection as shown in **Figure 34**.

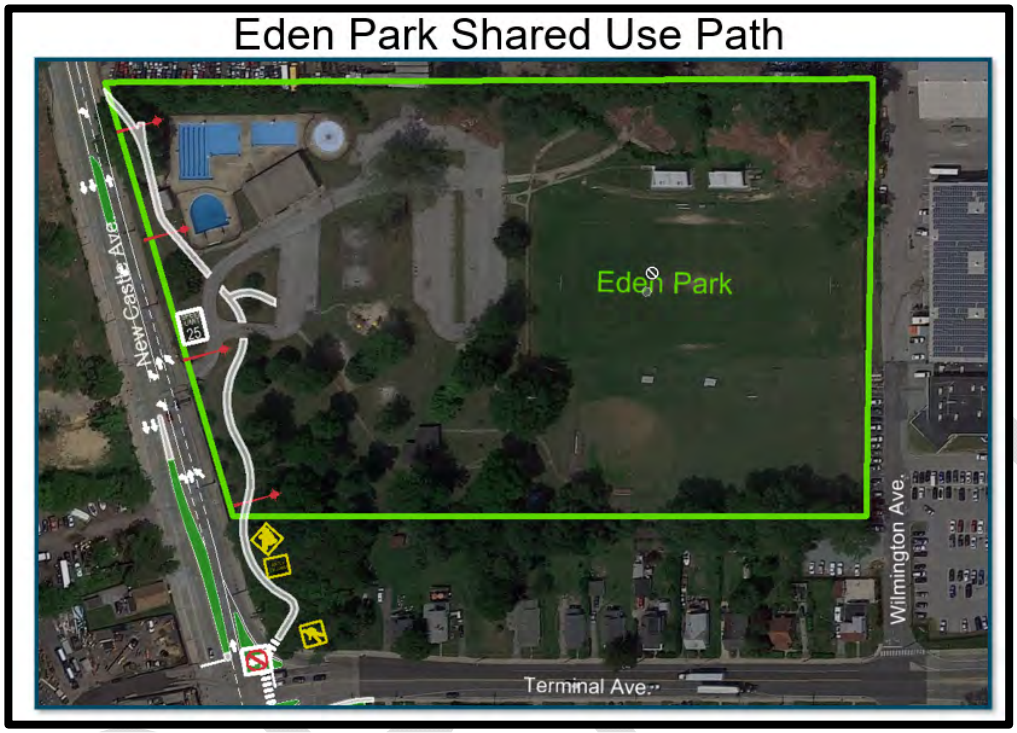

Figure 34 – Eden Park Shared Use Path

Recommendation 6e- Sidewalk Connection: Eden Park to D Street

In addition to the previous recommendation, improvements from Eden Park to D Street are also be included in this recommendation. The proposed improvements will include an 8' min. concrete sidewalk that will allow both pedestrians and bicyclers to use the facility to access Eden Park from the core of Southbridge.

Transit Improvements

Recommendation 7a- Bus Marketing

Another focus of the STAP is transit. In discussions with DART, they noted that knowledge about these routes and their times may not be widely known. As a result, one recommendation is for DART to market and meet with the community during community events to disseminate information and provide better marketing of transit.

Recommendation 7b- Existing Core Bus Service Enhancements

A concern of the community is reaching grocery stores, medical centers, and retail shopping. Concerns indicate issues with frequency, timing, and days of the week that bus routes are available. These concerns were quantified and documented in Post Workshop 2, Survey 2, Question 3, which asked *"Which grocery stores, shopping or jobs do you or someone you know have trouble reaching by bus? Please provide more detail with the bus problem: availability, frequency, reliability, time it takes, and any other information"*. Forty-three replies were received to this question, and some common responses included: concerns with timing and schedule of service; difficulty reaching shopping/grocery shopping destinations including the Shoprite, Acme, Target, and Walmart; as well as other destinations such as University of Delaware, the Wilmington Train Station, and connections to other bus routes. Survey 2 in its entirety can be found in **Appendix B** of this report.

Core bus routes, those along New Castle Avenue and S. Heald Street, provide access to (within a quarter to half-mile (5–10-minute walkshed)) to 22 supermarkets, 85 entry level job clusters, and 102,300 entry level jobs. Greater core area bus routes provide access to 74 supermarkets, 206 entry level job clusters, and 209,550 entry level jobs. Bus routes that serve the greater Southbridge area but not the core study area serve 49 supermarkets, 130 entry level job clusters, and 116,900 entry level jobs. **Figure 35** provides a graphical representation of the most common destinations identified as being difficult to access for Southbridge residents. By comparison, New Castle County averages collected through a WILMAPCO 2022 Public Opinion Survey show percentages much lower than those in **Figure 35**: Jobs – 9%, Grocery - 10%, Medical – 9%, and Social – 13%.

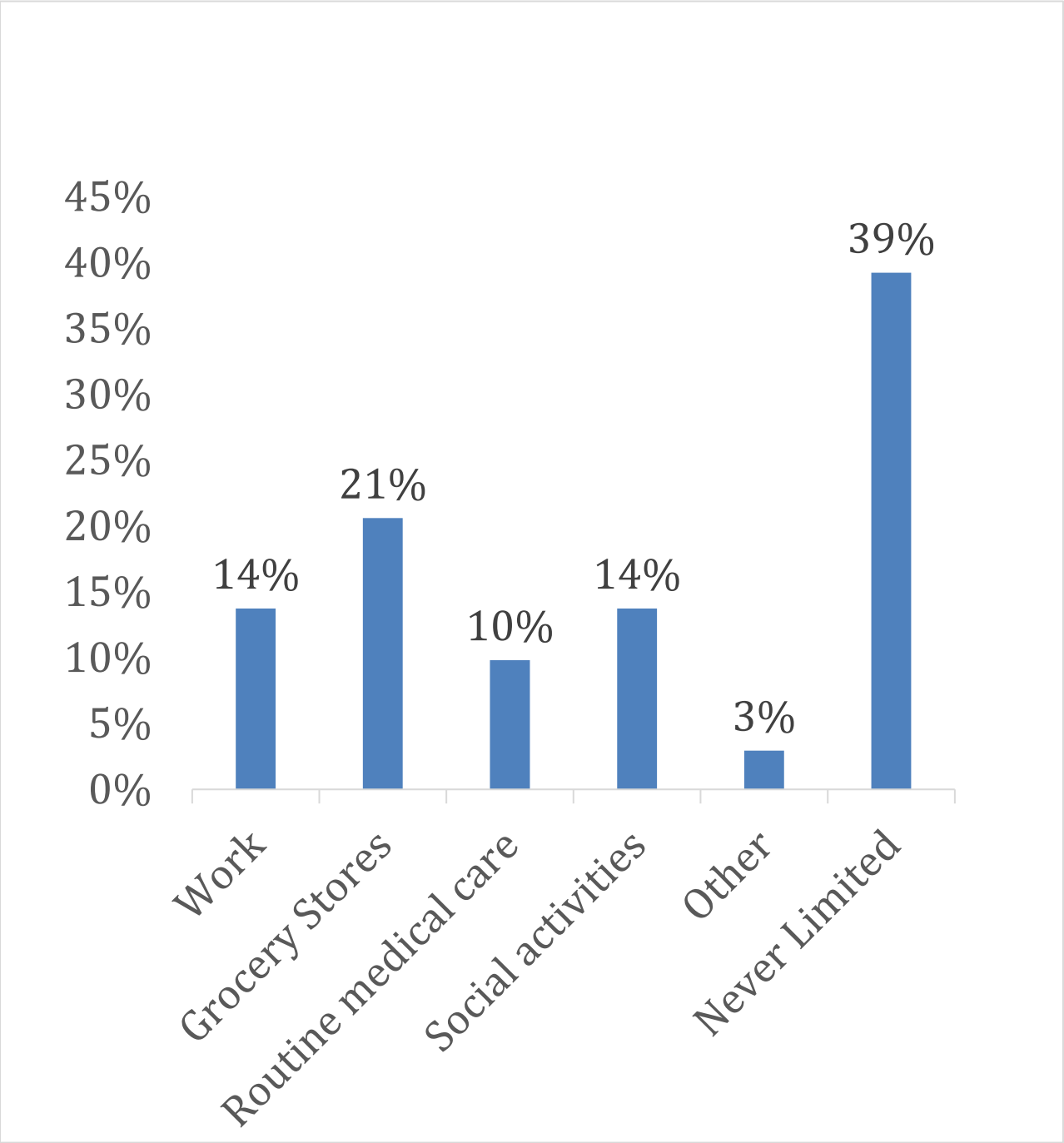

Figure 35- Transportation Destination Challenges

Bus routes that currently serve the core Southbridge study area are: Routes, 8, 14, 15, and 51; and those that serve the greater study area are: Routes 10, 13, 18, 25, 28, 33, 37, 40, and 42. A table depicting all of the bus routes which provide access to jobs and services from Southbridge area can be found in **Appendix E** of this report.

Implementing greater Sunday service, frequency, and/or shift work schedule changes would assist in connecting community residents to places of employment, shopping, and social activities with more opportunities. It is recommended to evaluate adding Sunday service to Bus Routes 8 and 14, enhancing Sunday service on Bus Route 15, and adding weekend service to Bus Route 51. Strengthening the service of these existing routes will greatly improve the connectivity throughout all of Southbridge, which is a priority for STAP.

Recommendation 7c- Deviation of Routes into Core

Another aspect of improving bus transit that STAP also recommends is for the DART to review key routes in the Greater Study Area and determine which routes could be deviated through Southbridge as shown in **Figure 36**. These routes currently travel near Southbridge along S. Market and S. Walnut Streets but could be re-routed through Southbridge. Routes to consider for this deviation would be Routes 33, 28, 40, and 42. Potentially, Route 10 could also be investigated for this route change. The deviations would add a few minutes of additional ride time to each route. The benefits of serving this community currently disconnected from many destinations outside of Southbridge likely outweigh the minor addition in route length. The deviation would still allow riders to reach the Wilmington Train Station and Transit Center. Additionally, by deviating these routes to better serve Southbridge, service to grocery stores would be increased to approximately double the current number of supermarkets served and would also increase service to additional entry level employment clusters and jobs. See **Figure 36**.

If a proposed future shuttle between Riverfront East and the train station is considered, as recommended by the South Market Street Master Plan, a further connection of that route into Southbridge should be examined.

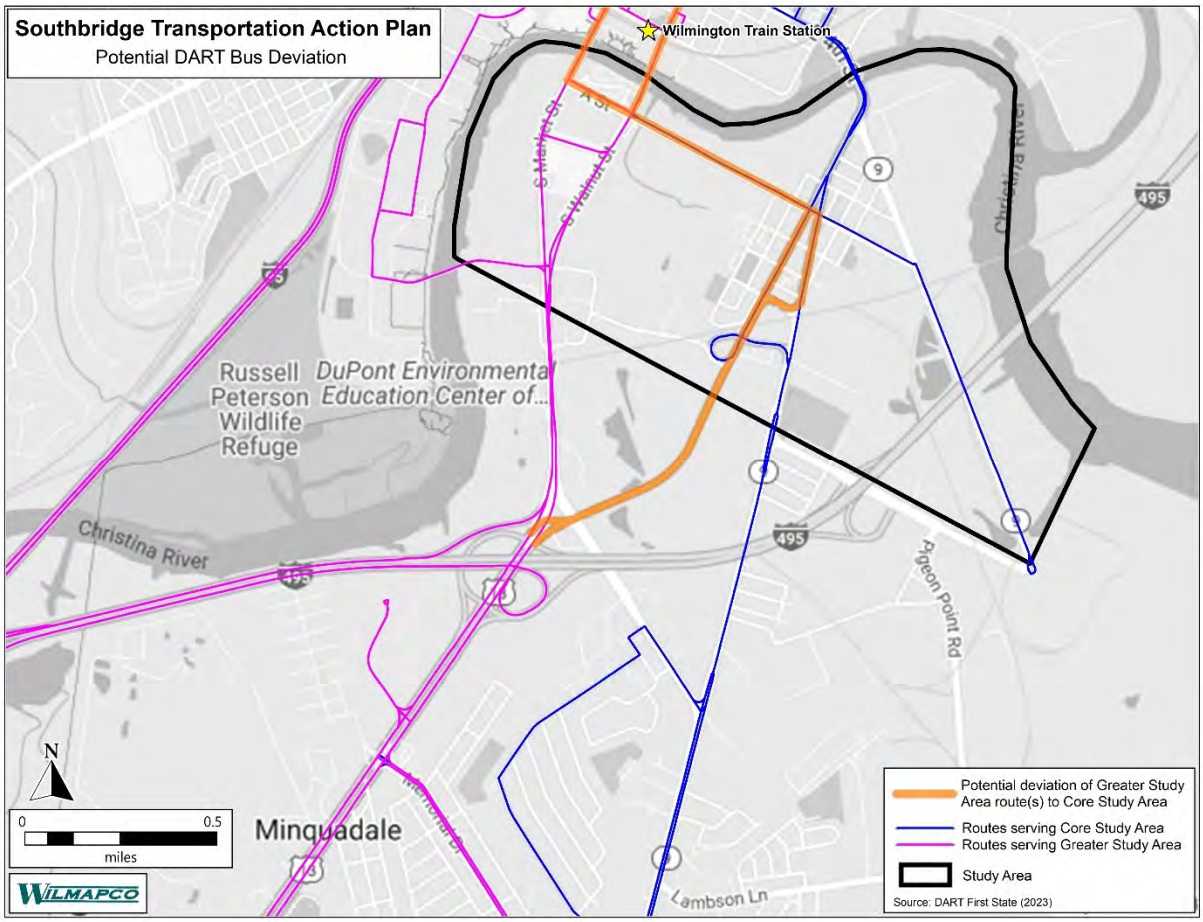

Figure 36- DART Bus Deviation Through Southbridge

Recommendation 8a- Quick Action: Signing and Paint Improvements

Due to speeding and truck traffic/illegal parking throughout Southbridge, additional signing and paint improvements have been a priority for the Quick Action Items. Truck drivers have a pattern of ignoring stop signs along Bradford St, so it was suggested that a stop bar pavement marking be added to the stop signs at B St left turn onto Bradford St and on Bradford St southbound right turn onto B St. Additional signage was also recommended along and approaching Braford St. Installing a "Caution Children at Play" sign and a 25-mph speed limit sign on northbound Bradford St north of B St was suggested. Also, "No Truck Parking" signs were suggested to be installed along Bradford St. To combat more truck parking issues, it was recommended that "No Truck Parking" signs also be installed on S Claymont St, Townsend St, and A St. Trucks travel down Heald St into Southbridge so the goal is to make north of Eden Park a no truck zone. This will be accomplished by installing truck wayfinding signs that direct trucks to I-95 and I-495 and installing truck wayfinding signs south of Terminal Ave on New Castle Ave northbound to direct

trucks to Terminal Ave, Christina Ave, and Route 9 northbound. “All Trucks Must Turn Right/Use Route 9” signs will also be installed. Speeding is a major concern of the community, so 25-mph speed limit signs will be installed on Heald St and New Castle Ave. Law enforcement will also be monitoring these areas as well as Christina Ave to make sure these speed limits are being followed. There is also an issue with vehicles driving in the wrong direction on Pearl St and making illegal turns at the bridge. This will be fixed by installing a “Do Not Enter” sign at New Castle Ave, installing a one-way sign on Pearl St midblock at Willow St, and installing a “No Right Turn” sign on Pearl St at Willow St. These signing and painting Quick Action Items will greatly improve the speeding and truck traffic concerns, along with improving the overall safety of Southbridge community members in a short timeframe.

Recommendation 8b- Quick Action: Signal retiming

Traffic signals will be retimed in order to promote drivers to follow the speed limit. The goal will be to have all vehicles traveling the speed limit have straight green lights for the entirety of the road. Vehicles that are speeding will run into red lights as they will not be following the preset time that is designed for the speed limit. This will discourage and prevent speeding throughout Southbridge.

Recommendation 9- Monitor Amtrak’s High-Speed Rail Proposal

Amtrak’s NEC FUTURE proposes new routes for high speed rails and the “alternative” route uses the line in Southbridge. This would greatly affect the entire Southbridge neighborhood in a negative way. SWPN, Southbridge CDC, and the Southbridge Civic Association should continue to work with WILMAPCO and the City of Wilmington and stay engaged with Amtrak and the Federal Railroad Administration (FRA). The FRA is responsible for making sure projects such as NEC FUTURE do not violate Title VI of the Civil Rights Act, Due to the fact that Southbridge is an Environmental Justice community and predominantly African American, this proposal raises concerns for violations of Title VI.

Recommendation 10- Landscaping and Banner Maintenance Agreement

As proposed in SNAP through the Main Street program, landscaping and banner maintenance will continue to be a part of STAP. Banners throughout the neighborhood promoting events, public safety, projects, and much more will be displayed. Landscaping in residential areas and main streets will help give Southbridge an even greater sense of community and pride. Banners can be put at pedestrian level to boost the look and feel of the streets. Overall beautification throughout Southbridge will enhance all projects being completed through STAP.

Recommendation 11- Kid’s Bike Program

The Kid’s Bike Program would be a program that teaches children about bicycling, bicycle repairs, and even provide them with opportunities to earn their own bike through volunteer work. There is also a program called “Urban Bike Project’s Earn-A-Bike” that connects residents with a bike. Both of these programs were first proposed in SNAP and will be continued to be pursued throughout STAP. Based on the community feedback and recommendations of adding wider sidewalks and shared use paths, these programs should be embraced by Southbridge residents, especially the children.

6. Recommended Projects and Cost Estimates

Costs were developed for most of the recommendations. See **Table 2**. Costs utilize recently bid and awarded contract unit projects from similar projects throughout New Castle County. Elements of the STAP could potentially be funding through DelDOT Community Transportation Funds (CTF), along with deeper funding pools and federal grants. Detailed cost estimates can be found in **Appendix F**.

Recommendation	Project	Timeframe	Capital Cost
1	D St. and C St. Reconfiguration	ST or LT	$1.6 million
2a	Interim Road Reconfigurations: New Castle Ave. and Heald Street	ST	$1.5 million
2b	Castle Avenue Reconfiguration (including raised intersections and 2 gatew	LT	$6.3 million
3a	Heald Street Reconfiguration (including raised intersections)	LT	$7.2 million
3b	Side Street Raised Intersections (10)	LT	$7 million
4	Improved Lighting	MT	$1.2 million
5a	Truck Parking Enforcement	ST or LT	$0
5b	Truck Route Signing	ST or LT	$50 thousand
5c	Alternative Truck Routes Feasibility Study	ST	$200 thousand
5d	Garasches Lane Reconfiguration	ST	$2.8 million
5e	Interim Terminal Avenue Reconfiguration	MT	$1.8 million
6a	Sidewalk Connection: Wetland Park	ST	$360 thousand
6b	Sidewalk Connection: Hicks Park	ST	$250 thousand
6c	Christina River Path (developer built)	ST	$0
6d	Sidewalk Connection: Eden Park Pathway	MT	$375 thousand
6e	Sidewalk Connection: Eden Park to D Street	MT	TBD
7a	Bus Marketing	ST	$0
7b	Existing Core Bus Service Enhancements	ST	$0
7c	Deviation of Routes into Core	ST	$0
8a	Quick Action: Signing and paint improvements	ST	TBD
8b	Quick Action: Signal retiming	ST	$0
9	Monitor Amtrak's high-speed rail proposal (SNAP, CE04)	Ongoing	$0
10	Landscaping and banner maintenance agreement (SNAP, RCC 10)	ST	$0
11	Kids bike program (SNAP, IM 10)	Ongoing	$0

Table 2 - Recommended Projects Implementation Timing and Costs

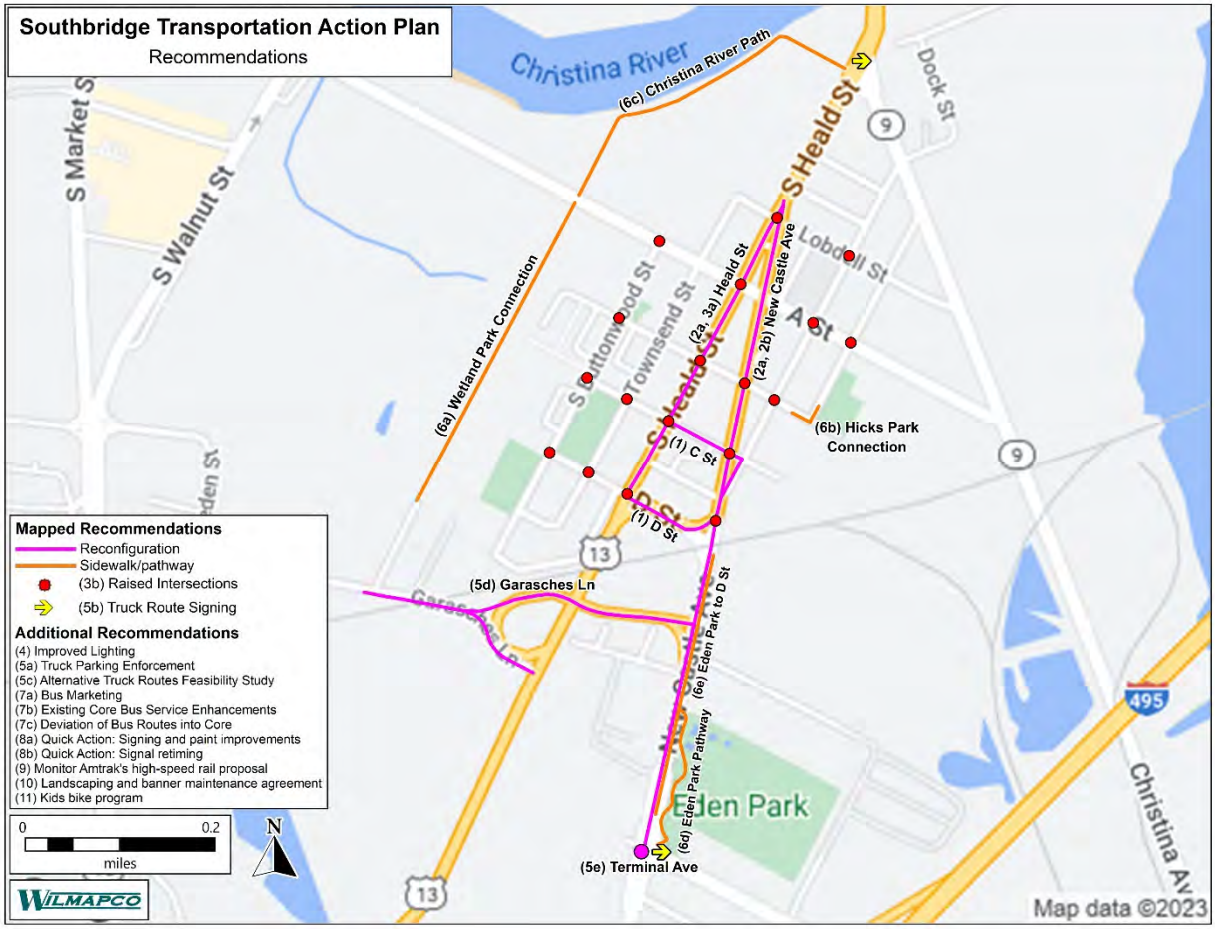

Figure 37- Southbridge Mapped Recommendations

Figure 37 depicts the general project locations of the recommended improvements.

7. Next Steps

Identifying potential funding sources is an important step in ensuring recommendations of a planning study move forward to future phases and eventually into DelDOT's Capital Transportation Program. There are numerous potential funding sources for planning studies, including grant opportunities. As an example, DART recently received a grant the Federal Transit Administration (FTA) under the Areas of Persistent Poverty Program. This grant, Connecting Route 9 Corridor Communities, will be used for public outreach and technical analyses looking at improved transit connections in Southbridge and complete streets strategies. Delaware also received a $6 million Rebuilding American Infrastructure with Sustainability and Equity (RAISE) grant to fund preconstruction activities for the 12 projects identified in the Route 9 Corridor Master Plan. These and other grant opportunities will be investigated further as a means of founding for the recommendations outlined in the Southbridge Transportation Action Plan.

Actions as part of the Riverfront East improvements will have an effect on traffic beyond the immediate Riverfront East area, including potentially increased traffic in Southbridge. It is therefore recommended that funding from some of these improvements be evaluated to potentially offset the burden of addition traffic they may generate in the Southbridge area.

Improvement recommendations in this report are categorized as short, medium, and long-term recommendations. To address some of the short-term recommendations, a series of "Quick Action Items" were developed and submitted to the City of Wilmington in February 2023. These items included signing and striping recommendations, installation and enforcement of "No Parking" signs, wayfinding and truck routing signs, speed limit and regulatory signs, signing and pavement markings to deter speeding, signing for pedestrians/children awareness, and signal timing awareness. Both the City and State can work to implement these items as resources allow.

Continued coordination with DelDOT will assist in advancing improvement recommendations forward. As an important next step to this study, it is recommended that continued coordination occur with DelDOT's Pave and Rehab Section, particularly as part of the New Castle Avenue and Heald Street stripe-in, road diet temporary project. This is an efficient and cost-effective way to gauge the effectiveness and acceptance of a recommended improvement before committing significant resources to a permanent alteration.

Further coordination with DelDOT's Transportation Alternatives (TAP) program is recommended to coordinate connections to parks and other open spaces, including the Southbridge Wilmington Wetlands Park. Additionally, continued coordination with DelDOT's maintenance activities is recommended to keep current on, and for future opportunities such as the new signal and mast arm replaced at B Street and New Castle Avenue.

A Monitoring Committee that meets regularly and draws attendance from DelDOT, DART, the City, and community leaders should be established to coordinate this work. This could take the form of SNAP's "Improved Mobility Action Team" which is run through the SWPN, or another body.

Appendix A: Task 1 Existing Conditions Report

Southbridge Transportation Action Plan

Task 1 Report

Identify Issues, Opportunities, and Constraints

August 2022

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Wilmington Area Planning Council

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Table of Contents

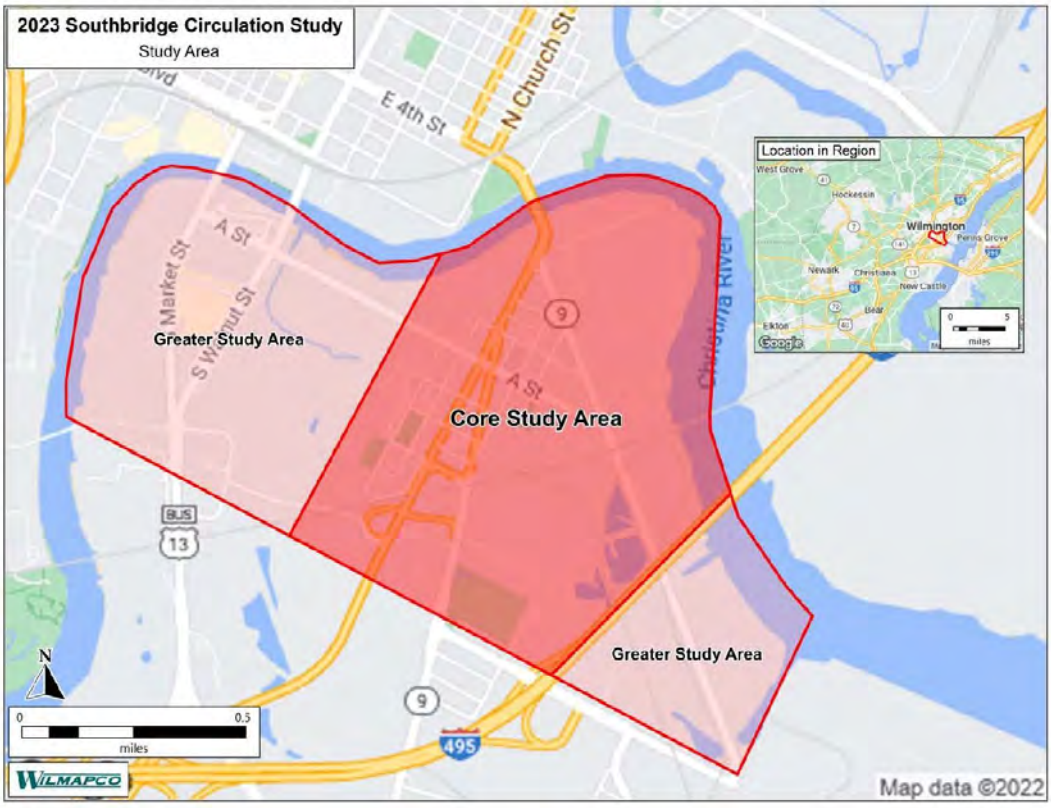
Introduction

The Southbridge Transportation Action Plan will update the 2008 Southbridge Circulation Study and extend the 2021 Southbridge Neighborhood Action Plan (SNAP) for the purposes of:

- **Exploring the extension of planned road diets** on US 13 (Heald Street) and SR 9 (New Castle Avenue) south of Southbridge north into Southbridge. This concept was proposed as a high-level recommendation in the SNAP which has, so far, received positive community support.
- **Examining alternatives to slow, reduce, and reroute truck movement** through Southbridge, an everyday burden for residents. While the "Garasches Lane Extended" project studied in the Port of Wilmington Truck Access Study may reduce some truck trips in Southbridge's core, a more comprehensive solution or alternatives are needed.
- **Improving walking and bicycle connectivity and comfort.** This work will carry forth concepts from the SNAP and build off several completed and ongoing projects, such as the Southbridge Wetland Park Trail, the Southbridge Transportation Alternatives Program Streetscape Project, A Street Pathway, etc.
- **Enhancing transit access to jobs and healthy, affordable food.** Concepts to increase the frequency and connectivity of bus service to key destinations will be uncovered.
- **Carrying forth all other mobility-related recommendations in the SNAP**, providing an update and refinement of each. These recommendations are mostly housed in the "Improved Mobility" section of the SNAP, while others, such as those related to flooding and climate change, are not.

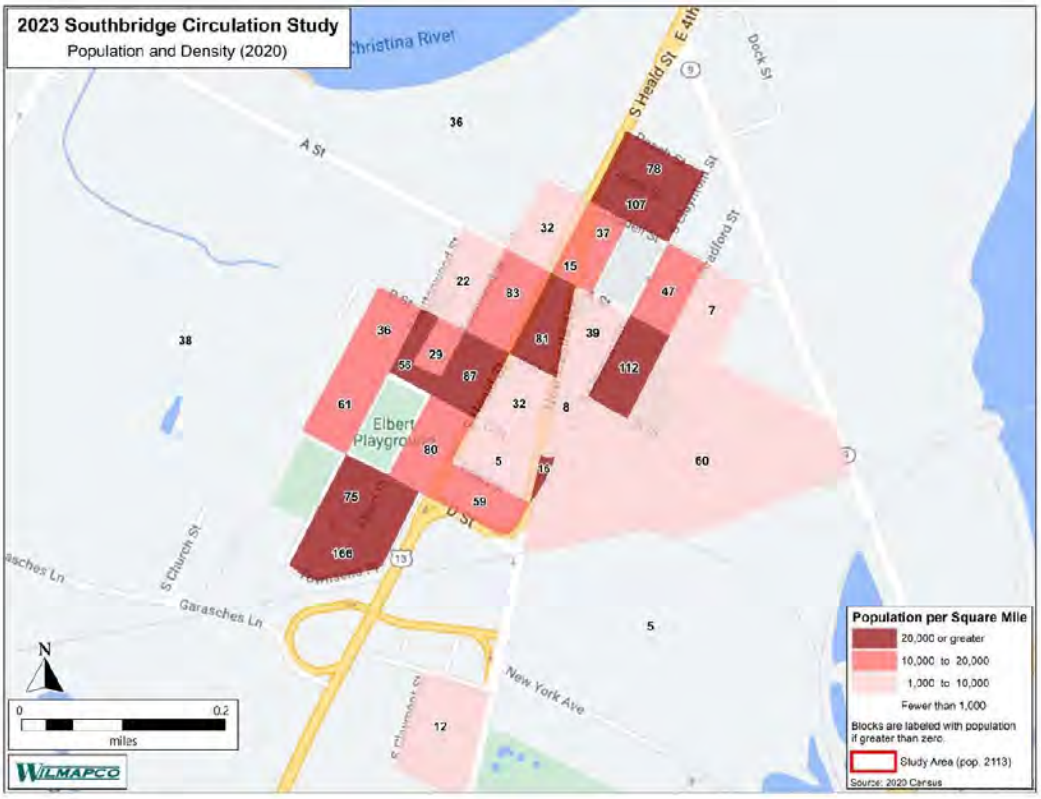
This report highlights existing demographics, transportation, and land use conditions in the study area, which roughly comprises Census Tract 19.02 in South Wilmington. The Core Study Area, as shown on the following page, focuses on the neighborhood of Southbridge. This report also summarizes plans for future transportation investments in the area. The contents of this report will help inform the recommendations of Southbridge Transportation Action Plan.

When viewing this report digitally, you can zoom in to the maps to see more detail. The maps will also be made available at wilmapco.org/southbridge.


2023 Southbridge Circulation Study
Study Area
E 4th St
N Church St
Location in Region
Wilmington
Greater Study Area
Core Study Area
Greater Study Area
A St
Market St
S Walnut St
Christina River
BUS
13
9
495
N
0
0.5
miles
WILMAPCO
Map data ©2022

Demographics

According to the 2020 Census, 2113 people live in the study area, 1430 of whom live in the core Southbridge neighborhood. The neighborhood is just 0.15 square miles in size, and the study area as a whole covers 1.1 square miles. The map below shows the population and density of each Census block in the neighborhood.



The study area is majority (66%) non-Hispanic Black, 18% non-Hispanic White, 6% Hispanic or Latino, and 5% non-Hispanic Asian.[1] The median household income is $43,200, but lower within Southbridge. House prices are three times greater in Christina Landing than in Southbridge.[2]

The study area was not identified as a tech desert (an area with limited computer or internet access), nor was it identified as an area with limited English proficiency. However, this is likely due to the influence of Christina Landing in the Census tract data used to make that determination. In the SNAP's public involvement process, face-to-face interactions with residents was essential. While all surveys taken during that process were available online, fewer than 1 in 10 were completed online.

For the study area as a whole, 16% of households do not have a computer, 25% of households do not have internet access, and 5% of residents aged 5 or older have limited English proficiency. 11% of residents are aged 65 or older, and 8% have a disability. 25% of households do not have access to a vehicle.

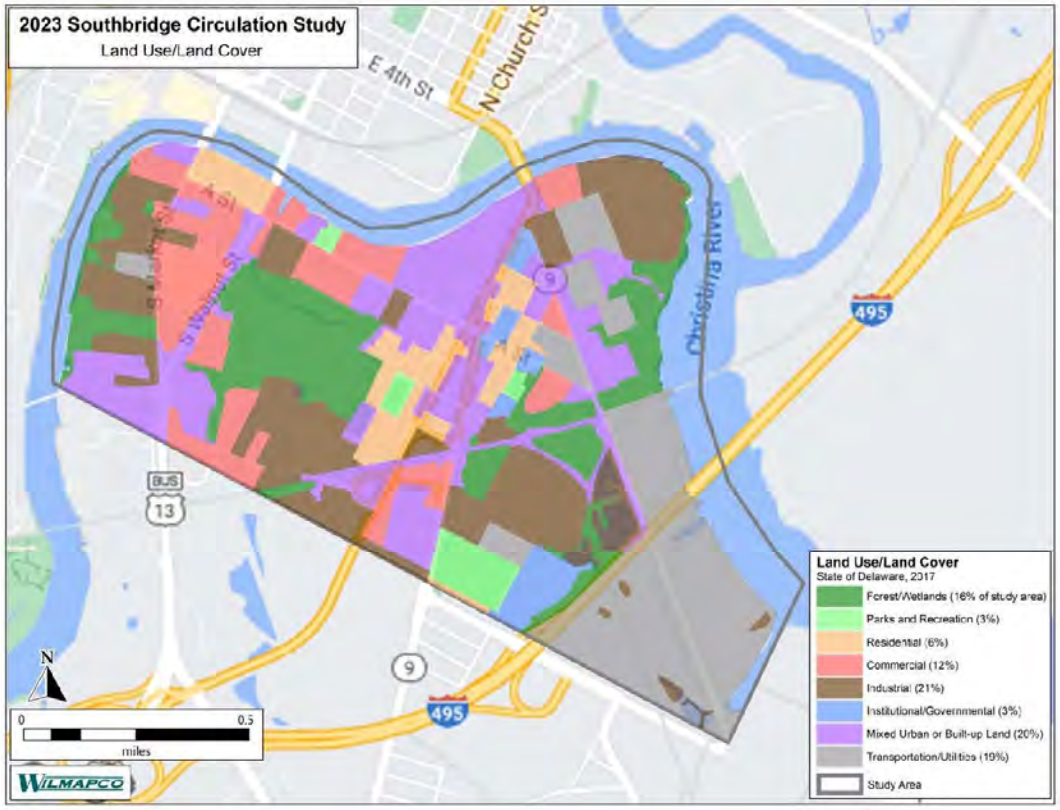
[1] While the Southbridge neighborhood (Core Study Area) is majority Black, recent White middle-class settlement in Christina Landing (Greater Study Area) has significantly skewed demographic and socio-economic data for Census Tract 19.02. For more information, see this Justice 40 letter: https://www.dropbox.com/s/9a8561f7etv6goi/Justice%2040%20Letter%20-%20SBCA%2C%20SWPN%2C%20SBCDC%20July%202022.pdf?dl=0 and this presentation: https://docs.google.com/presentation/d/1hvHYuMNU8jM1srP1qs3rvbfadj_1k284_08bo6XI22c/edit#slide=id.p

[2] Source: Southbridge Neighborhood Action Plan (SNAP)

Land Use and Zoning

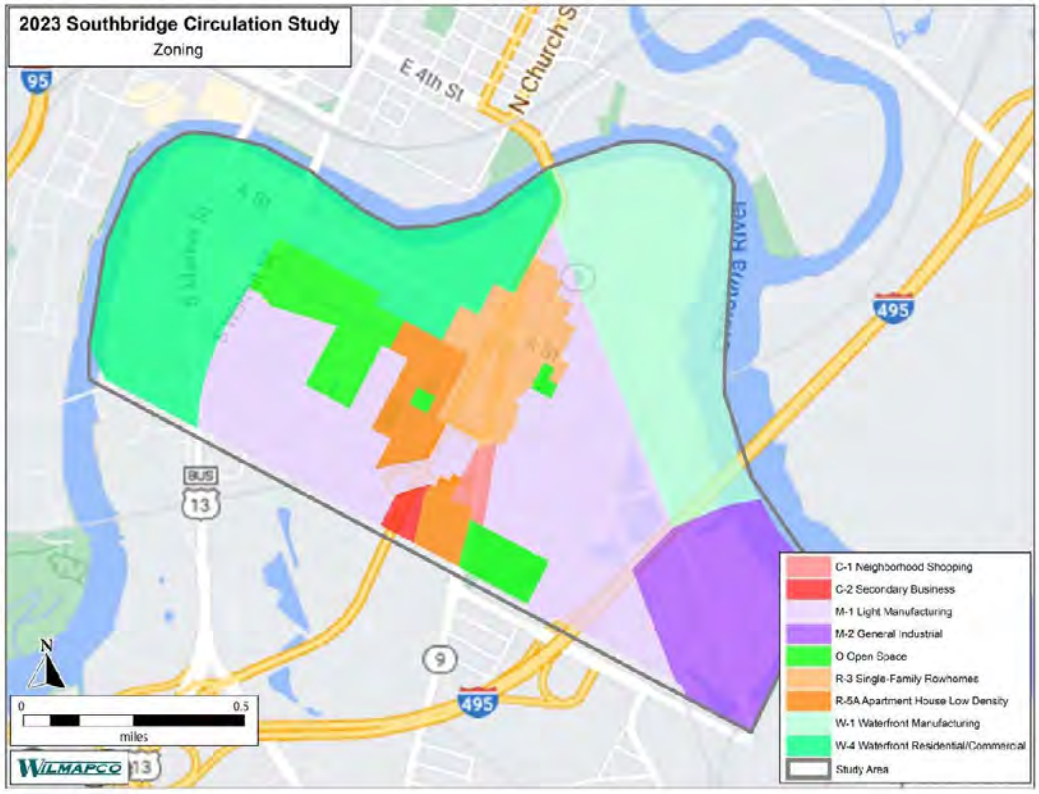
Land Use/Land Cover

The core study area is home to Southbridge, a densely populated neighborhood in the city of Wilmington. This neighborhood contains mixed-use, residential, and commercial land, as well as a few neighborhood parks and institutional buildings. The core neighborhood is surrounded by a mix of industrial and lower density urban development. While 16% of the study area is identified as forest or wetlands, a large portion of that has been developed into the Southbridge Wilmington Wetlands Park.



Zoning

The majority of the core Southbridge neighborhood is zoned single-family residential, but it also contains zoning for apartments and open space. The neighborhood is mostly surrounded by light manufacturing. The western waterfront area is zoned residential/commercial, and the northern waterfront area is zoned for manufacturing. East of I-495 is zoned general industrial.



Historic Properties

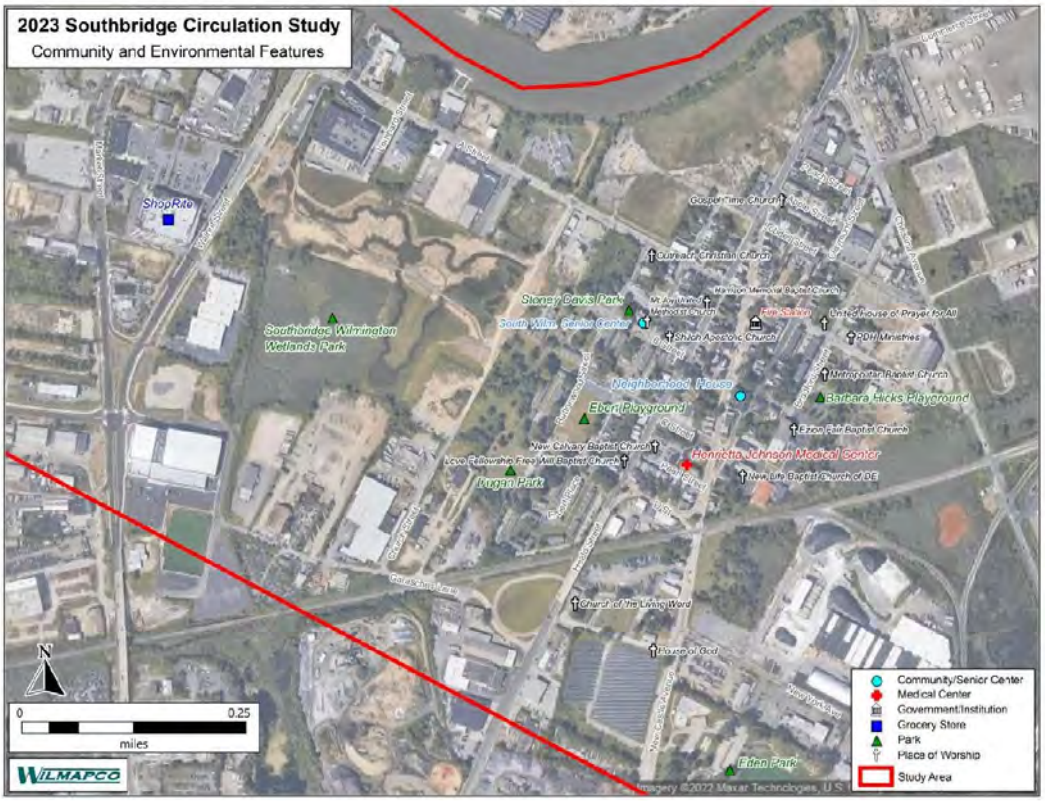
Southbridge is home to historic neighborhood institutions, such as Henrietta Johnson Medical Center, the Neighborhood House, and Mt. Joy United Methodist Church. Also, the Harriett Tubman Underground Railroad Byway passes through the study area on Route 9.

Sensitive Natural Network

According to the Conservation Fund, the study area does not contain any sensitive natural areas.

Community and Environmental Features

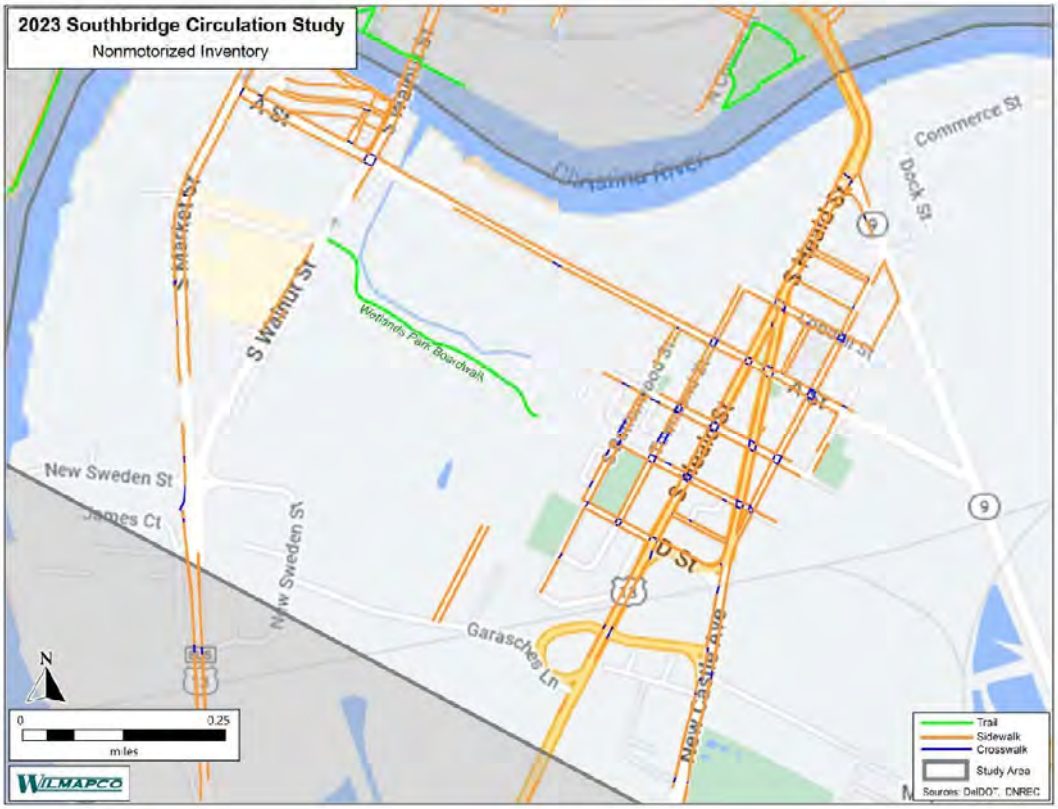
The Southbridge neighborhood is home to many places of worship and several neighborhood parks. A community center, senior center, medical center, and fire station are all located within a short walk of all homes in the core neighborhood. The Southbridge Wilmington Wetlands Park is located just west of the neighborhood. While there are no full-service supermarkets in the neighborhood, a ShopRite is located about a mile west. The boardwalk in the Southbridge Wilmington Wetlands Park roughly halves the walk to ShopRite.



Transportation Conditions

Nonmotorized Network

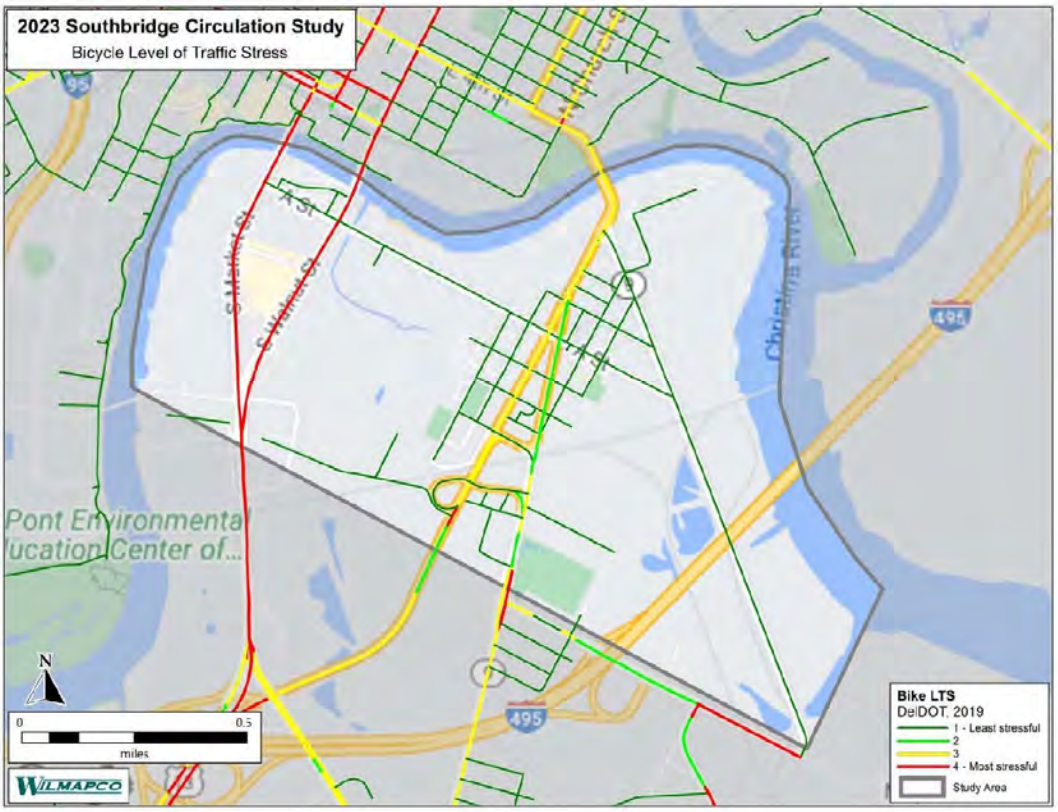
The map below shows the locations of sidewalks, marked crosswalks, and trails in the study area. The Southbridge Wilmington Wetlands Park features a boardwalk trail stretching from South Walnut Street to South Church Street, which has been extended north to A Street but is not yet visible on the map. The Jack A. Markell Trail is just outside the study area, across the Christina River. The core Southbridge neighborhood contains mostly complete sidewalks and crosswalks with few gaps. Most of South Market Street has sidewalks, but there are large gaps south of the Christina Crossing shopping center. South Walnut Street mostly lacks sidewalks except along the shopping center. Outside of these residential and commercial areas, the study area mostly lacks sidewalks and crosswalks.



Bicycle Level of Traffic Stress

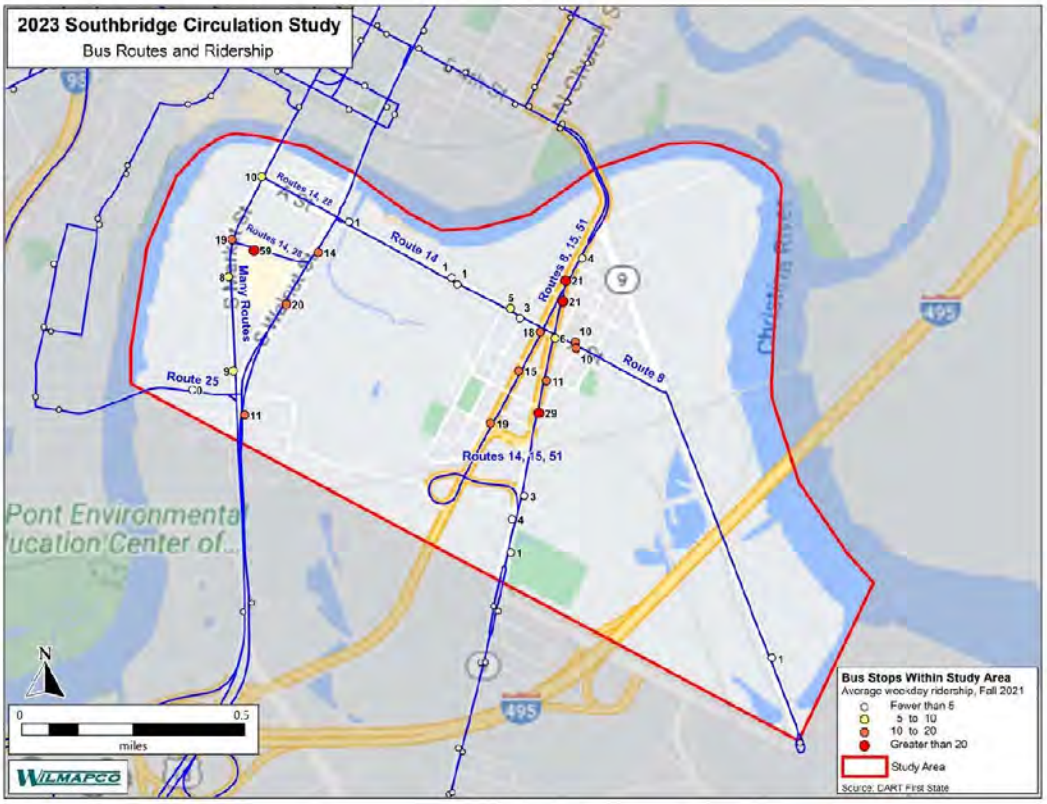
Bicycle level of traffic stress (bike LTS) is a measure of how stressful roads are for bicycling, based on infrastructure conditions including traffic speeds, traffic volumes, and the number of lanes. In 2019, DelDOT developed its own bike LTS methodology, giving each road segment in Delaware a bike LTS score ranging from 1 (least stressful) to 4 (most stressful).

The majority of residential streets in Southbridge are low stress and comfortable for most people to bike on. South Heald Street (part of US-13 and State Route 9) is one-way southbound and has two wide lanes and no bike infrastructure, giving it a bike LTS score of 3. New Castle Avenue (Route 9) has mostly the same configuration going northbound and has sections ranging from LTS 2 to 4. These two streets bisect the neighborhood and serve as a barrier to biking, and they may also pose a challenge to people crossing on foot. South Market Street and South Walnut Street are both LTS 4, posing a major barrier to access to the commercial businesses in the area. A Street connects these residential and commercial areas and is considered low stress.



Bus Ridership

Owing to its proximity to downtown Wilmington, the study area is well served by transit, featuring many DART bus routes, and bus stops in the area have moderate to high ridership. The majority of these routes connect to nearby downtown Wilmington and the train station, making nearly the entire DART network as well as SEPTA's Wilmington/Newark line accessible with no more than one transfer. Southbridge residents can take Routes 15 and 51 directly to the City of New Castle and the Christiana Mall, which serves as another transfer hub.

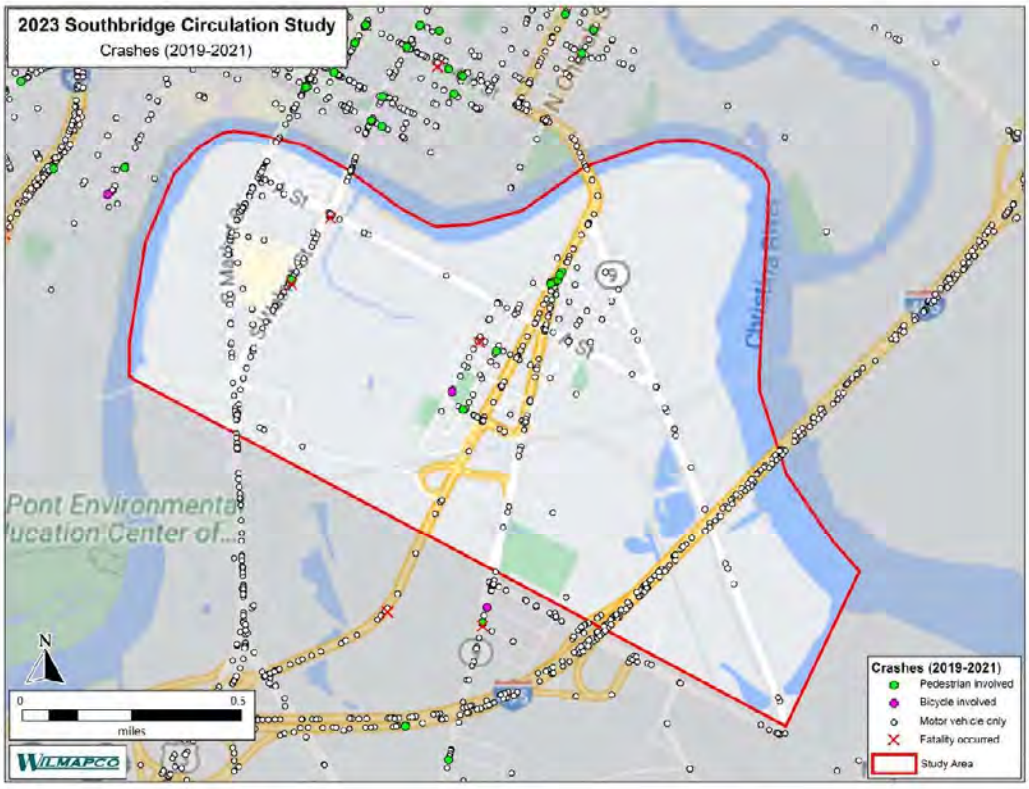


Traffic Volumes

DelDOT measures traffic volumes on state-owned roads, which in this study area include South Market Street, South Walnut Street, South Heald Street, and New Castle Avenue. Traffic volumes are high on Market and Walnut Streets (part of US-13 Business). Traffic volumes are lower in the core Southbridge neighborhood, though higher traffic volumes were recorded on Heald Street north of its merge with New Castle Avenue. I-495 carried roughly 100,000 average daily vehicles in 2019 through the study area.

Crashes

Between 2019 and 2021, a total of 480 reported vehicle crashes occurred within the study area, including seven crashes that involved a pedestrian, one that involved a bicycle, and three fatalities. One pedestrian fatality occurred on South Walnut Street, and four pedestrian crashes occurred on Heald Street at its merge with New Castle Avenue. 191 crashes occurred within the core Southbridge neighborhood, and 127 occurred in the commercial area bounded by A, Market, and Walnut Streets. 50 crashes occurred on A Street from Market to Walnut Streets (inclusive of intersections). Crashes at intersections ranged from 6 to 35, with 35 crashes (including one fatality) at the intersection of Walnut and A Streets, and another 35 crashes at Market and A Streets.



The map below shows the number of crashes that occurred at each intersection in the core Southbridge neighborhood (for each intersection with more than two crashes). 29 crashes, including four pedestrian crashes, occurred on Heald Street at its merge with New Castle Avenue. 10 crashes occurred at New Castle Avenue and A Street, and 8 crashes occurred at Heald and D Streets. 6 crashes occurred at each of the following intersections: Heald Street at A, B, and C Streets and New Castle Avenue at B, C, and Pearl Streets. 1 crash fatality occurred in the neighborhood, at Buttonwood and B Streets.

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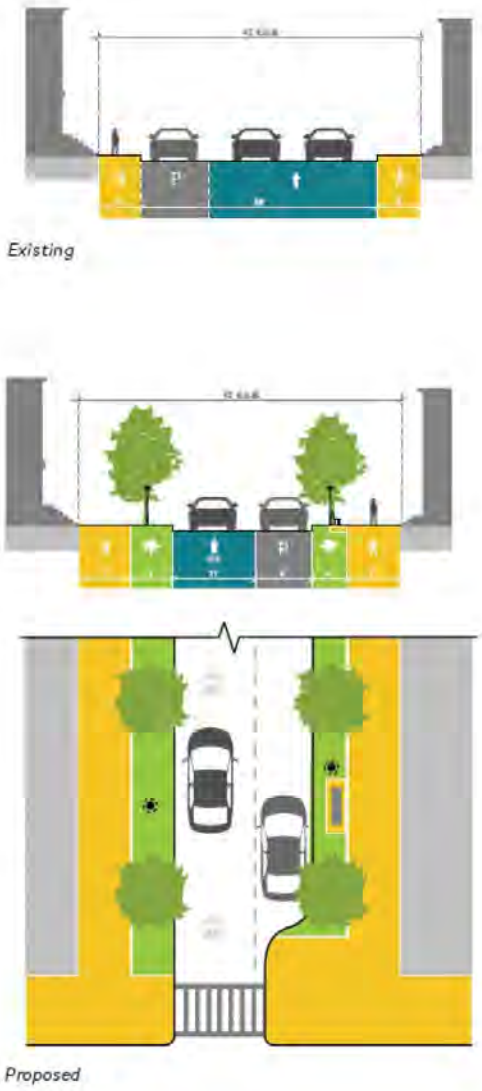
Planned Transportation

Route 9 Road Diet

The Route 9 Corridor Master Plan, endorsed in May 2017, proposed a road diet along Route 9 north to Terminal Avenue. The Southbridge Neighborhood Action Plan proposed extending this road diet into Southbridge. The project is funded in DelDOT's Capital Budget and labeled to extend to A Street in Southbridge. The Southbridge Transportation Action Plan will study the feasibility of extending this road diet into Southbridge and develop a preferred concept plan, including locally-preferred cross sections.

In Southbridge, the road diet will eliminate one travel lane, widen sidewalks, add street trees and green space, and narrow crossings by adding curb extensions. This road diet will improve safety for people walking and biking and reduce the risk of crashes. It may also reduce through-traffic in Southbridge.

This project is listed in the 2050 Regional Transportation Plan as a medium-term, fiscally-constrained project, with a planned service year of 2030. It is partially funded in the FY2023-2026 Transportation Improvement Program (TIP).



Existing

Proposed

Existing and proposed cross-sections for New Castle Avenue through Southbridge (Source: Southbridge Neighborhood Action Plan)

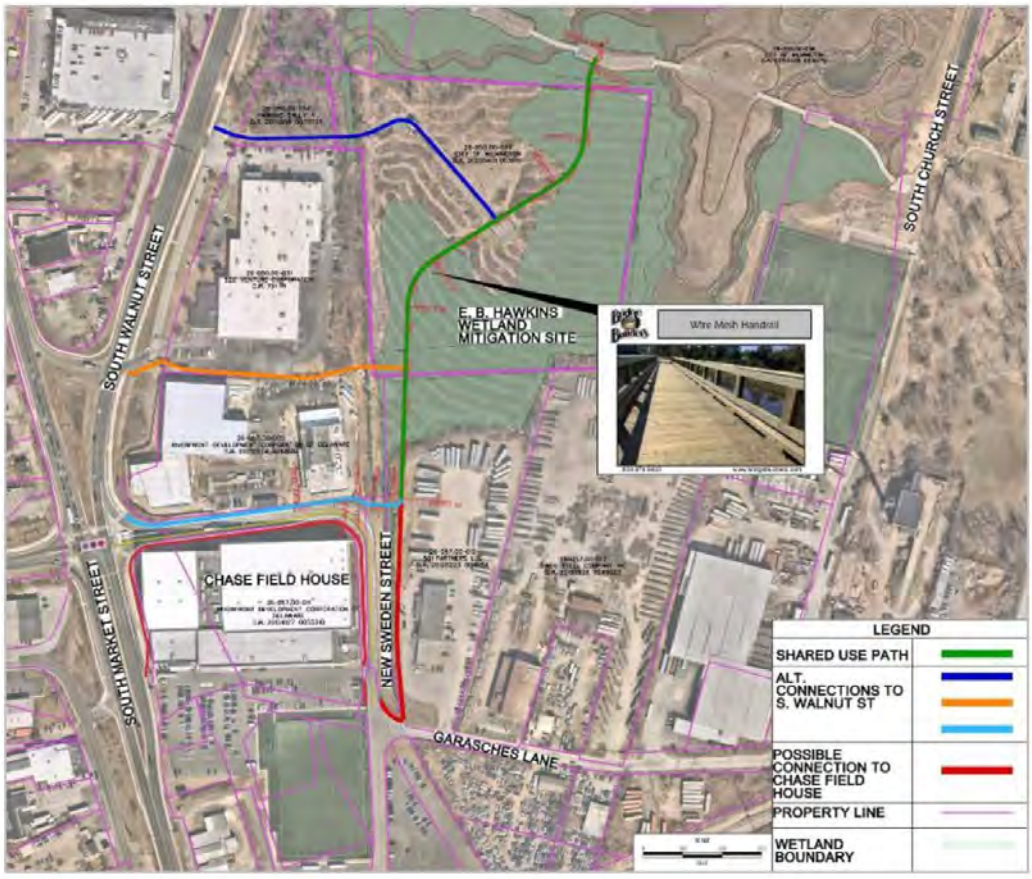
Southbridge Wilmington Wetlands Park

The Southbridge Wilmington Wetlands Park has been developed in the wetlands in South Wilmington, between the core Southbridge neighborhood and the Christina Crossing shopping center. This project was funded by a $2.9 million federal grant, and construction began in June 2019. The primary purpose of the park is to reduce flooding in Southbridge. The park also features a boardwalk trail that stretches across the park from South Walnut Street to South Church Street, providing a low-stress, car-free connection between the residential and commercial areas. Construction of the park has been completed, and it is set to be officially opened to the public in September 2022.

Renderings of the Southbridge Wilmington Wetlands Park and its boardwalk (Source: City of Wilmington)

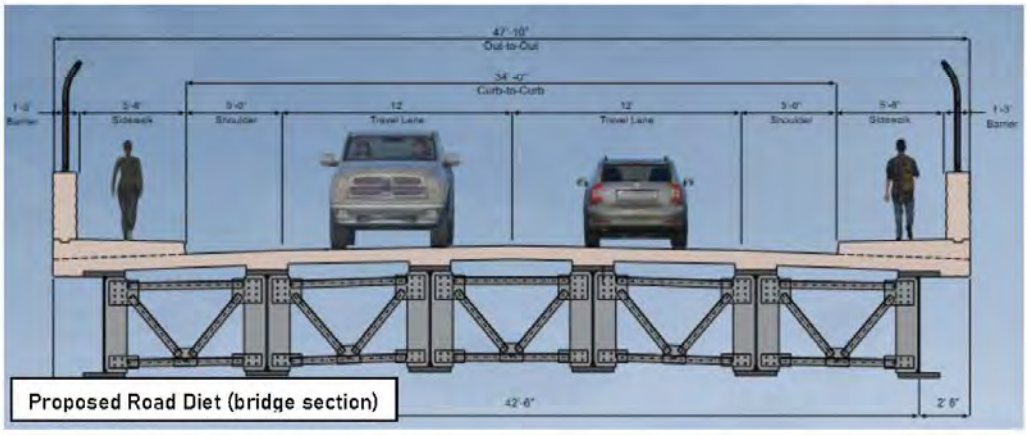
Shared Use Path Connections to Wetlands Park

DelDOT has developed a concept plan for additional shared use path(s) that would extend south from the Wetlands Park boardwalk, shown on the previous page. As shown on the map below, alternative path connections are being considered to South Walnut Street, Garasches Lane, and the Chase Field House. These paths would provide a connection between the Wetlands Park boardwalk and the existing shared use path on the Christina River Bridge. The design is yet to be finalized, and construction is anticipated to begin in 2024.



Heald Street Bridge Replacement and Road Diet

Bridge 1-684 (US-13, South Heald Street over the Norfolk Southern Railroad) underwent inspection in early 2016. The study was completed in May 2017, recommending full replacement of the bridge. A preliminary design was completed in April 2021, which includes full-depth pavement reconstruction from Garasches Lane to the southern bridge abutment as well as replacement of the existing bridge structure. This project includes a proposed road diet for Heald Street, which will eliminate one travel lane in each direction. A two-way center left-turn lane would be included on surface sections, but not on the bridge. Additional public meetings are planned for fall 2022 and spring 2023, and construction is expected to begin in 2024. Construction is expected to last a full year, with traffic detours along South Market Street, South Walnut Street, and New Castle Avenue.



Garasches Lane Reconfiguration

WILMAPCO's Port Circulation Study (May 2022) recommends a reconfiguration of Garasches Lane to facilitate truck access to the Port of Wilmington, among other potential alternatives. This reconfiguration would combine Garasches Lane with the existing off-ramp from southbound US-13 (South Heald Street), creating a direct connection from Garasches Lane to New Castle Avenue. This would be built as part of the Heald Street bridge replacement project, shown on the previous page.

"Connecting Route 9" Areas of Persistent Poverty Grant

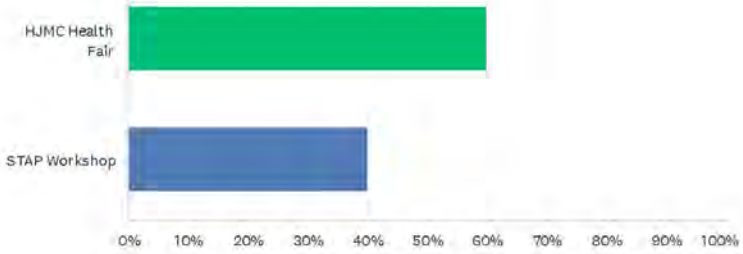
DTC has recently been awarded an $810,000 grant from the Federal Transit Administration under the Areas of Persistent Poverty Program. Under the project title "Connecting Route 9 Corridor Communities", this grant funding will be utilized for public outreach and technical analysis, including evaluating fixed-route bus improvements, microtransit initiatives, and enhanced connections to transit within Southbridge and other neighborhoods, as well as Complete Streets strategies for multimodal corridor improvements to augment the recommended transit enhancements. This analysis will cover the three-mile stretch of Route 9 from Southbridge to I-295.

Appendix B: Workshop Summaries

Southbridge Transportation Action Plan Survey

Q1 This survey taken during:

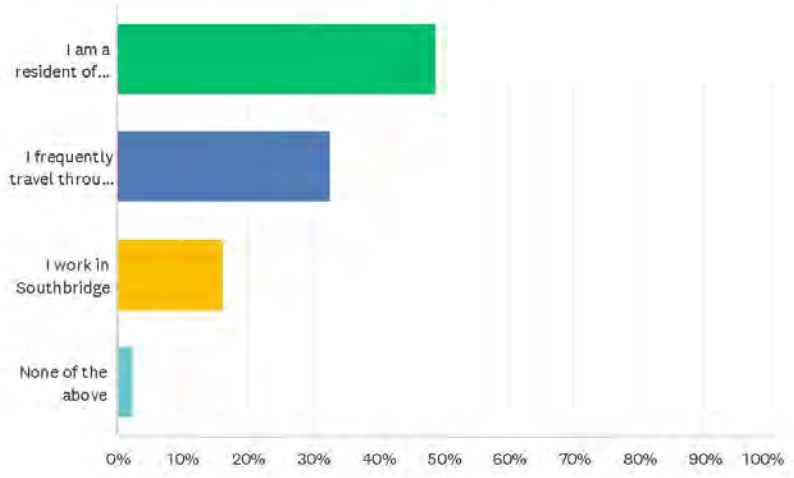
Answered: 20 Skipped: 23



ANSWER CHOICES	RESPONSES	
HJMC Health Fair	60.00%	12
STAP Workshop	40.00%	8
TOTAL		20

Q2 Please check any of the following that apply to you:

Answered: 43 Skipped: 0

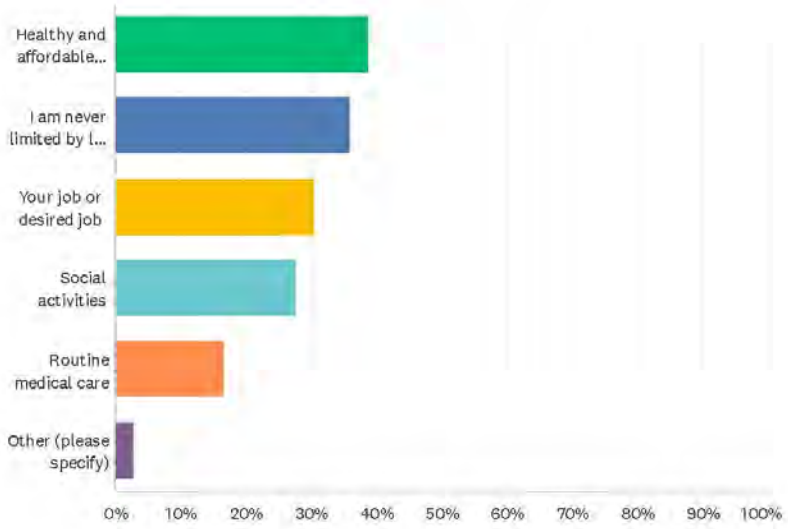


ANSWER CHOICES	RESPONSES	
I am a resident of Southbridge	48.84%	21
I frequently travel through, but don't live or work in Southbridge	32.56%	14
I work in Southbridge	16.28%	7
None of the above	2.33%	1
TOTAL		43

#	OTHER (PLEASE SPECIFY)	DATE
1	I live directly over the bridge.	10/24/2022 10:11 AM
2	I live less then 5 minute from Southbridge	10/16/2022 8:19 PM
3	I also attend church and have family in Southbridge	10/6/2022 7:00 PM
4	I work immediately across the bridge, and so "share" some concerns for this neighborhood	10/6/2022 8:58 AM
5	Trolley Square	10/5/2022 12:18 PM

Q3 Does lack of transportation (walking/biking/bus/car) ever limit you from reaching any of the following:

Answered: 36 Skipped: 7

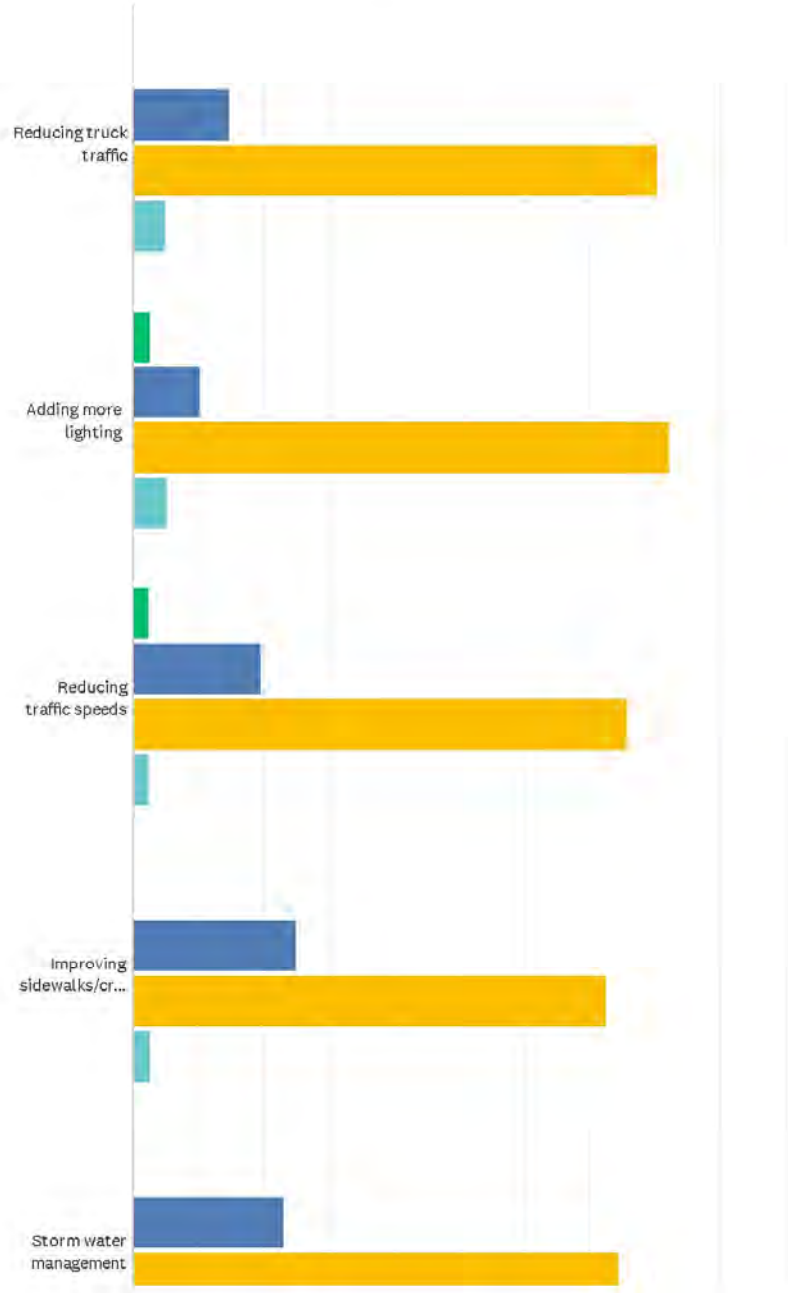


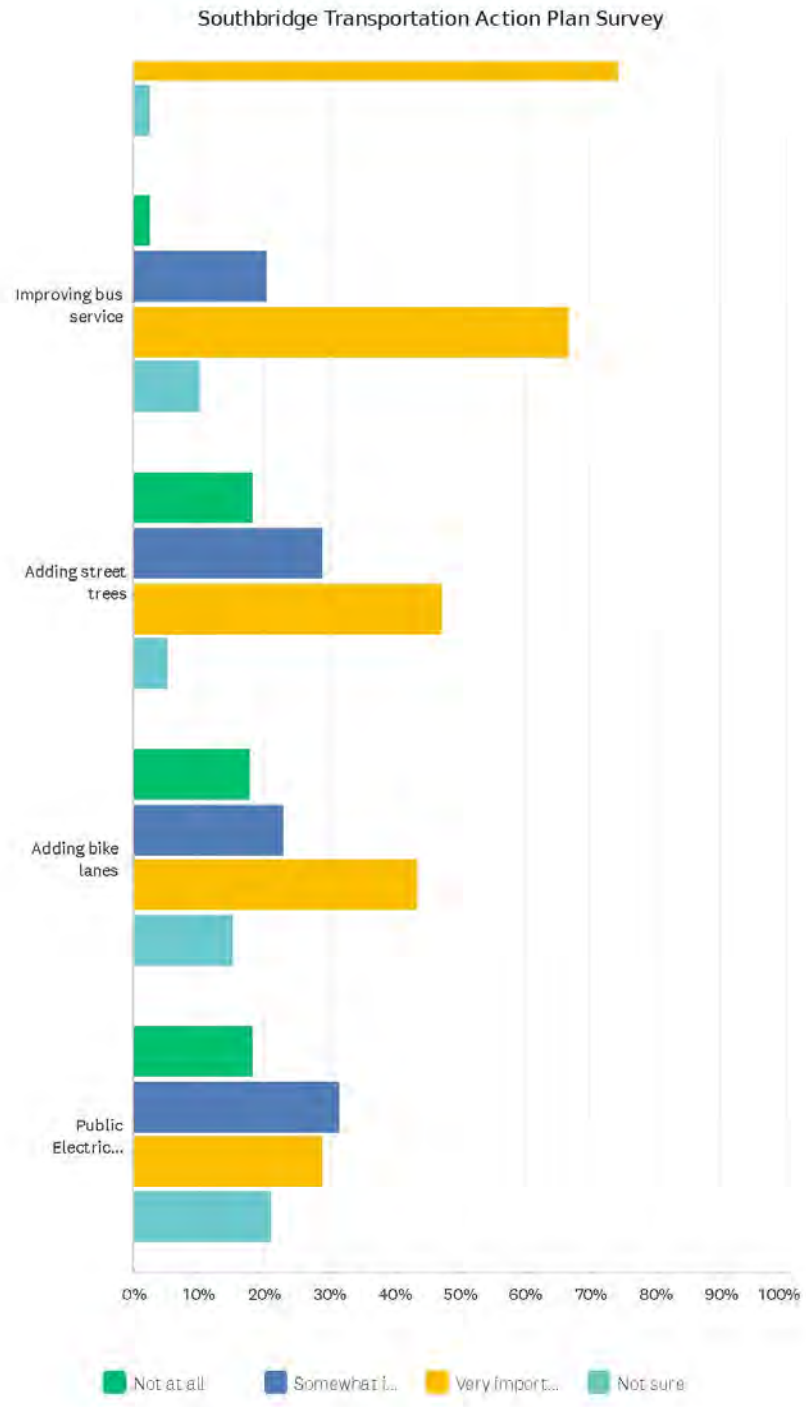
ANSWER CHOICES	RESPONSES	
Healthy and affordable grocery shopping	38.89%	14
I am never limited by lack of transportation.	36.11%	13
Your job or desired job	30.56%	11
Social activities	27.78%	10
Routine medical care	16.67%	6
Other (please specify)	2.78%	1
Total Respondents: 36		

#	OTHER (PLEASE SPECIFY)	DATE
1	No local bus in my neighborhood	10/24/2022 10:23 AM

Q4 How important are each of the following for Southbridge?

Answered: 41 Skipped: 2




Southbridge Transportation Action Plan Survey
Improving bus service
Adding street trees
Adding bike lanes
Public Electric...
0%
10%
20%
30%
40%
50%
60%
70%
80%
90%
100%
Not at all
Somewhat i...
Very import...
Not sure

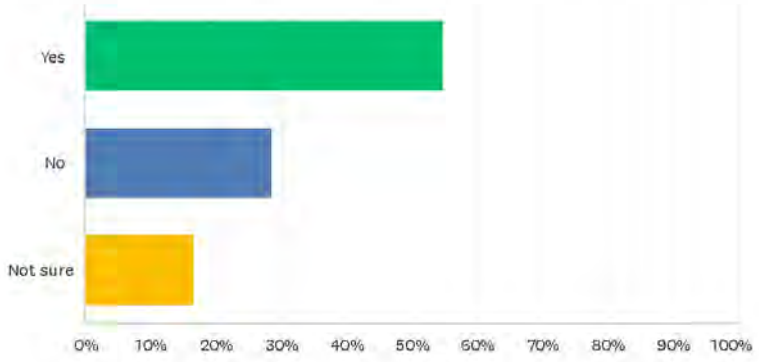
Southbridge Transportation Action Plan Survey

	NOT AT ALL	SOMEWHAT IMPORTANT	VERY IMPORTANT	NOT SURE	TOTAL
Reducing truck traffic	0.00% 0	14.63% 6	80.49% 33	4.88% 2	41
Adding more lighting	2.56% 1	10.26% 4	82.05% 32	5.13% 2	39
Reducing traffic speeds	2.44% 1	19.51% 8	75.61% 31	2.44% 1	41
Improving sidewalks/crosswalks	0.00% 0	25.00% 10	72.50% 29	2.50% 1	40
Storm water management	0.00% 0	23.08% 9	74.36% 29	2.56% 1	39
Improving bus service	2.56% 1	20.51% 8	66.67% 26	10.26% 4	39
Adding street trees	18.42% 7	28.95% 11	47.37% 18	5.26% 2	38
Adding bike lanes	17.95% 7	23.08% 9	43.59% 17	15.38% 6	39
Public Electric Vehicle charging locations	18.42% 7	31.58% 12	28.95% 11	21.05% 8	38

#	ARE THERE ANY OTHER IMPORTANT TRANSPORTATION IMPROVEMENTS NEEDED IN SOUTHBRIDGE?	DATE
1	yes	10/24/2022 10:20 AM
2	The streets	10/24/2022 9:53 AM
3	Repairing or re-surfacing holes in streets.	10/24/2022 9:50 AM
4	Streets/Pavements	10/24/2022 9:47 AM
5	Beautification and consistent maintenance	10/21/2022 9:59 AM
6	No tracker trailers should come through the neighborhood or park their trucks in the neighborhood. Streets should be well lit and stop signs clearly seen , remove overgrown hedges that obstruct the view	10/17/2022 8:43 PM
7	Not at this time	10/17/2022 1:40 PM
8	Public bike stations where people can make repairs to their bikes. Benches for people waiting on public transportation	10/13/2022 12:10 PM
9	Not important..Been trying to get the speed under control for years and that is still a problem..	10/12/2022 6:26 AM
10	Police need to be more active in pulling over snd stopping traffic violators	10/11/2022 4:47 PM
11	Truck traffic and traffic riding up the wrong way on S Claymont Street	10/6/2022 10:57 PM
12	repair the drawbridge (Winchester Bridge) on 4th street, so we do not have the detours when the bridge needs to open.	10/5/2022 5:24 PM
13	Get Rid of Diamond Materials	10/5/2022 12:29 PM

Q5 Heald Street and New Castle Avenue are currently two lanes in each direction. If one lane were reduced to improve safety by slowing speeds (without causing traffic delays) would you be in favor of this?

Answered: 42 Skipped: 1



ANSWER CHOICES	RESPONSES	
Yes	54.76%	23
No	28.57%	12
Not sure	16.67%	7
TOTAL		42

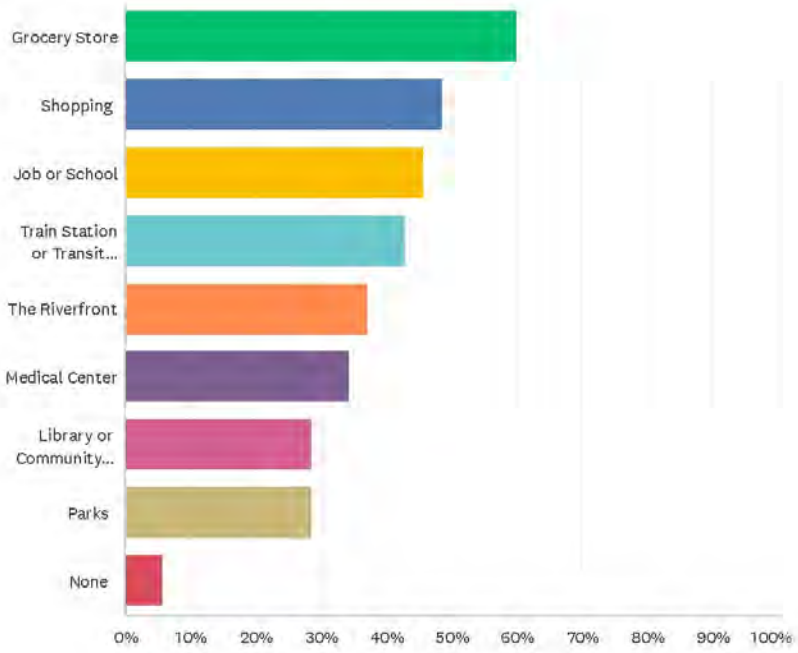
#	PLEASE EXPLAIN WHY OR WHY NOT.	DATE
1	Need more lanes	10/24/2022 10:26 AM
2	Too much traffic.	10/24/2022 10:09 AM
3	People are consistently speeding.	10/24/2022 10:08 AM
4	Would cause more traffic during AM & PM going to or coming from Rt 9. could make room for bike lanes	10/24/2022 9:53 AM
5	Would cause a traffic jam.	10/24/2022 9:47 AM
6	I believe changing those street to one lane will cause more issues and encourage drivers to use alternate streets. I.E. when there was construction on New Castle Ave, drivers went down S. Claymont.	10/24/2022 9:36 AM
7	These are the main traffic corridor in Southbridge. I would be in favor only if new traffic patterns were developed away from southbridge to get to the riverfront and new castle	10/21/2022 9:59 AM
8	It will add congestion	10/17/2022 8:43 PM
9	Some different is always a benefit	10/17/2022 1:40 PM
10	Because the development of Rosegate has a problem getting out on heavy traffic day , we seat and wait for 20 minute to leave the development because of traffic	10/16/2022 8:19 PM

Southbridge Transportation Action Plan Survey

11	Speed reduction is essential	10/16/2022 3:59 PM
12	I would be ok with one lane on each side because I think it would reduce traffic speeds while adding safe space for street parking. I do not want to see bike lanes added, instead would like to see wider sidewalks, and more trees/greenery.	10/13/2022 12:10 PM
13	Residents been complaining about speed on Heald for years and nothing was done.. This could of been resolved easily without changing to one lane..	10/12/2022 6:26 AM
14	Because people drive at dangerously fast speeds and people get hurt almost every month	10/11/2022 4:47 PM
15	Safety is the most important	10/10/2022 10:00 PM
16	Traffic at most times travel very fast on these two streets and that bend by the BP could prove to be a dangerous spot from my evaluation.	10/6/2022 10:57 PM
17	I don't think there is a way to do that, that will not increase traffic delays, especially with public transportation and school buses.	10/6/2022 7:00 PM
18	Yes, if it will make bike lanes and side walks, and trees work out better, otherwise no. But seperately, after you come over that bridge on Rt. 13 (heading form NC to Wilm) which is Heald St, then it curves around to the right, then the left getting you onto New Castle Ave, the lanes are ambiguous, and then New Castle Ave merges into it from the right, during the ambiguous lane situation. That spot is not safe.	10/5/2022 5:24 PM
19	What is needed is for the roads to be fixed. Why are the roads so damaged in Southbridge, it has been like this for over 10 years with not improvement. A Street is horrible, and with the construction of the "Luxury Apartments" it is worse. How can they place "Luxury Apartments" in our neighborhood and not help with the streets, flooding, and uplift of the Southbridge Community.	10/5/2022 12:29 PM
20	When you come down new castle avenue, right before apple street, it curves and people are going so fast that making a right or left hand turn gets pretty dicey, accident waiting to happen.	10/5/2022 12:03 PM

Q6 What destinations need better bus service to or from Southbridge?

Answered: 35 Skipped: 8



ANSWER CHOICES	RESPONSES	
Grocery Store	60.00%	21
Shopping	48.57%	17
Job or School	45.71%	16
Train Station or Transit Center	42.86%	15
The Riverfront	37.14%	13
Medical Center	34.29%	12
Library or Community Center	28.57%	10
Parks	28.57%	10
None	5.71%	2
Total Respondents: 35		

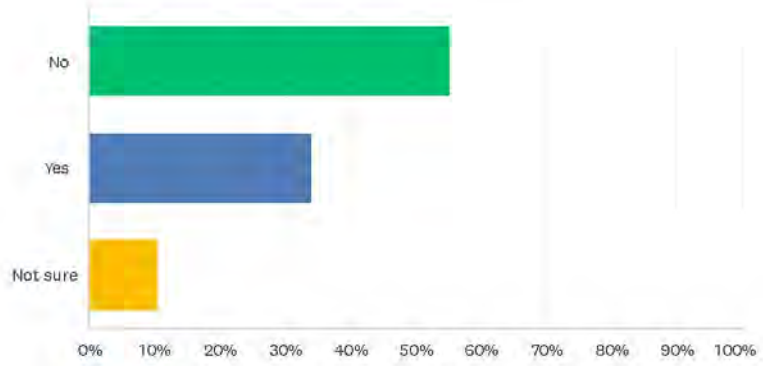
#	PLEASE SPECIFY THE EXACT LOCATION OF ANY DESTINATIONS CHECKED ABOVE.	DATE
1	Need better service	10/24/2022 10:23 AM

Southbridge Transportation Action Plan Survey

2	Bancroft School	10/24/2022 10:09 AM
3	From SB to Shoprite.	10/24/2022 9:56 AM
4	Shoprite, Christina Care	10/21/2022 9:59 AM
5	I have my own car	10/17/2022 1:40 PM
6	Not sure if bus goes to library on NewCastle Ave.. Will be looking into that for teen age son to ride bus to library..I seen the 15 go by but he would have to cross 4 lanes to get across the street.	10/12/2022 6:26 AM
7	All of these locations need it	10/11/2022 4:47 PM
8	Wilmington should invest in uplifting Southbridge not gentrifying the community. Now that the apartments and condos have been built at A & Walnut Street the average income level for Southbridge has increased so the real occupants of Soutbridge no longer qualifies for Federal HUB Zone or Opportunity Zone status. The City of Wilmington is failing Southbridge.	10/5/2022 12:29 PM
9	White clay creek park	10/5/2022 12:18 PM
10	Would be nice if there was direct transportation, instead of having to change buses.	10/5/2022 12:03 PM

Q7 Would you be in favor of closing streets at certain times or days to promote walking and biking?

Answered: 38 Skipped: 5



ANSWER CHOICES	RESPONSES	
No	55.26%	21
Yes	34.21%	13
Not sure	10.53%	4
TOTAL		38

#	PLEASE EXPLAIN WHY OR WHY NOT	DATE
1	This effects many aspects. Budget and manpower to do this.	10/24/2022 10:31 AM
2	Inconvient	10/24/2022 10:20 AM
3	the whole community, due to the crime.	10/24/2022 10:08 AM
4	Closed streets make drivers use alternative routes. Speed bumps would make the streets safer.	10/24/2022 9:36 AM
5	Is there demand for walking/boking in Southbridge?	10/21/2022 9:59 AM
6	If it was safe, and fines were enforced by law	10/16/2022 8:19 PM
7	With wider sidewalks and clear crosswalks, I don't see the need to close streets from traffic. I don't want to see anyone ability to drive limited.	10/13/2022 12:10 PM
8	Because there's very limited roads in the city to begin with this qould make it worse to get around	10/11/2022 4:47 PM
9	Not in this typical area that is highly residential but making one lane traffic would be sufficient to reduce the speed along with adding bike lanes.	10/6/2022 10:57 PM
10	I am in theory in favor of closing streets to vehicle traffic, but doing it "at certain times or days" creates confusion in most cases.	10/6/2022 8:58 AM
11	walking and biking should be built into the community and work at all times!	10/5/2022 5:24 PM

12	The City of Wilmington is failing Southbridge.	10/5/2022 12:29 PM
13	I walk on my street now, and use a parking lot for more steps, but if I wanted to expand my walking distance, some streets, are not safe.	10/5/2022 12:03 PM

Q8 Are there any areas you feel are unsafe traveling by car, bike, walking, or bus? Please specify location, streets, or intersections; and why.

Answered: 23 Skipped: 20

#	RESPONSES	DATE
1	New Castle Ave near Terminal Ave is still too dar.	10/24/2022 10:31 AM
2	South Heald New Castle Ave speeding need speed bumps	10/24/2022 10:20 AM
3	4th St.	10/24/2022 10:11 AM
4	A Street not enough lights	10/24/2022 9:53 AM
5	B Street - vehicles travel two ways even though its a one-way.	10/24/2022 9:50 AM
6	A Street New Castle Ave B Street	10/24/2022 9:47 AM
7	New Castle, S. Heald, A & B St., S. Claymont	10/24/2022 9:36 AM
8	New Castle Ave	10/24/2022 9:32 AM
9	S. Claymont and Christiana New Castle Ave A Street	10/24/2022 9:29 AM
10	There's no pedestrian access after you get over the S. Heald street bridge heading south	10/21/2022 9:59 AM
11	Some of the areas by the liquor store where everyone be at drinking and more	10/17/2022 1:45 PM
12	Speeding down on New Castle Ave street	10/17/2022 1:40 PM
13	The main street, riding from new castle ave straight to down town Wilmington, not safe	10/16/2022 8:19 PM
14	Traffic speed can be unsafe at times on New Castle Ave & Heald Streets	10/13/2022 12:10 PM
15	Heald and NewCastle due to speeding cars all day and night including city vehicles traveling threw Southbridge all day..	10/12/2022 6:26 AM
16	All parts of the city due to lack of policing and due to lack of care or concern from residents	10/11/2022 4:47 PM
17	At the intersection, there are many people and traffic	10/10/2022 10:28 PM
18	At the intersection, there are many people and traffic	10/10/2022 10:26 PM
19	At the intersection, there are many people and traffic	10/10/2022 10:00 PM
20	New Castle Ave & A Street intersection at the small park by the firehouse holds a crowd of people with a lot going on. Also the old school is highly unsafe with kids climbing the smaller roof, busting out windows and even entering the building.	10/6/2022 10:57 PM
21	The City of Wilmington is failing Southbridge.	10/5/2022 12:29 PM
22	Delaware Ave crossing over highway	10/5/2022 12:18 PM
23	New castle Ave, A street.	10/5/2022 12:03 PM

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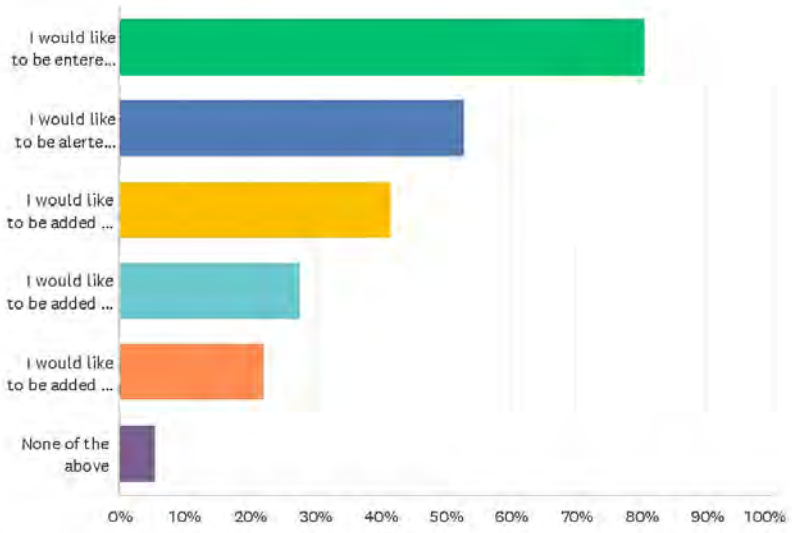
Q9 Please check any that apply to you:

Answered: 36 Skipped: 7



ANSWER CHOICES	RESPONSES	
I would like to be entered in a drawing to win a $50 Visa Gift Card	80.56%	29
I would like to be alerted of opportunities to participate and updates on the Southbridge Transportation Action Plan	52.78%	19
I would like to be added to WILMAPCO's monthly e-newsletter	41.67%	15
I would like to be added to the South Wilmington Planning Network (SWPN) email list	27.78%	10
I would like to be added to the Southbridge Civic Association email list	22.22%	8
None of the above	5.56%	2
Total Respondents: 36		

Q10 Please provide your contact information below:

Answered: 35 Skipped: 8

ANSWER CHOICES	RESPONSES	
Name	97.14%	34
Company	0.00%	0
Address	77.14%	27
Address 2	0.00%	0
City/Town	91.43%	32
State/Province	0.00%	0
ZIP/Postal Code	91.43%	32
Country	0.00%	0
Email Address	80.00%	28
Phone Number (text messages)	57.14%	20

#	NAME	DATE
1	Yolanda Mohammed	10/24/2022 10:32 AM
2	Mavella Daus	10/24/2022 10:27 AM
3	Evarjelistic Godson	10/24/2022 10:24 AM
4	Bobbie Foote-Poge	10/24/2022 10:21 AM
5	Donna Collins	10/24/2022 10:14 AM
6	Teirra White	10/24/2022 10:12 AM
7	Patty King	10/24/2022 10:08 AM
8	Laretta Wilson	10/24/2022 9:56 AM
9	Betty Anderson	10/24/2022 9:51 AM
10	Marlene A. Wright	10/24/2022 9:48 AM
11	Geneen Chase	10/24/2022 9:39 AM
12	Capri Wiggins	10/24/2022 9:30 AM
13	East Holdings, LLC	10/21/2022 10:00 AM
14	Sharmeka	10/17/2022 8:44 PM
15	Patricia	10/17/2022 1:46 PM
16	Pamela Salaam	10/17/2022 1:41 PM
17	Hanifa G.N. Shabazz	10/16/2022 3:59 PM
18	Shakilah	10/15/2022 11:43 AM
19	Haneef Salaam	10/13/2022 12:11 PM
20	Cheryl Martinez	10/12/2022 9:27 PM

21	Monique Davis	10/12/2022 6:26 AM
22	Eric Shores	10/11/2022 4:47 PM
23	Darlene F Spaulding	10/10/2022 10:29 PM
24	Brice C Richey	10/10/2022 10:27 PM
25	Kelli J Miller	10/10/2022 10:00 PM
26	Gerald T Ramos	10/10/2022 9:11 PM
27	Mike Cephas	10/6/2022 10:57 PM
28	Stephanie Winchester	10/6/2022 7:01 PM
29	Lauren Morgens	10/6/2022 8:58 AM
30	Sharon Dounce	10/5/2022 5:24 PM
31	Karen Anderson	10/5/2022 12:29 PM
32	Emily Van Vlack	10/5/2022 12:19 PM
33	Arlene Johnson	10/5/2022 12:04 PM
34	Marie Reef	10/5/2022 11:08 AM

#	COMPANY	DATE
	There are no responses.	

#	ADDRESS	DATE
1	428 Carver Dr.	10/24/2022 10:32 AM
2	751 Townsend Pl	10/24/2022 10:27 AM
3	PO Box 25322	10/24/2022 10:24 AM
4	523 New Castle Ave	10/24/2022 10:21 AM
5	1216 A Pearl	10/24/2022 10:14 AM
6	425 N. Church Street	10/24/2022 10:12 AM
7	621 South Heald Street	10/24/2022 10:08 AM
8	38 Victoria Blvd	10/24/2022 9:51 AM
9	326 S. Claymont Street	10/24/2022 9:48 AM
10	602 W. Lea Blvd #B3	10/24/2022 9:39 AM
11	1220 Apple Street	10/24/2022 9:30 AM
12	511 N. Jackson Street	10/21/2022 10:00 AM
13	421 Bradford Street	10/17/2022 8:44 PM
14	225 west 4TH Street, Apt 2H	10/17/2022 1:46 PM
15	304 New Castle Ave	10/17/2022 1:41 PM
16	Bradford Street	10/16/2022 3:59 PM
17	606 west 6 street	10/15/2022 11:43 AM
18	3009 Stoddard Place	10/13/2022 12:11 PM
19	615 S Heald street	10/12/2022 6:26 AM
20	634 Townsend street	10/11/2022 4:47 PM
21	332 S Claymont St	10/6/2022 10:57 PM

22	210 MANSION PKWY	10/6/2022 7:01 PM
23	1124 E 7th St	10/6/2022 8:58 AM
24	1124 E 7th St	10/5/2022 5:24 PM
25	1403 Shallcross Ave 104	10/5/2022 12:19 PM
26	1212 Apple Street	10/5/2022 12:04 PM
27	1111 D St	10/5/2022 11:08 AM

#	ADDRESS 2	DATE
	There are no responses.	

#	CITY/TOWN	DATE
1	Wilmington	10/24/2022 10:32 AM
2	Wilmington	10/24/2022 10:27 AM
3	Wilmington	10/24/2022 10:24 AM
4	Wilmington	10/24/2022 10:21 AM
5	Wilmington	10/24/2022 10:14 AM
6	Wilmington	10/24/2022 10:12 AM
7	Wilmington	10/24/2022 10:08 AM
8	Newark	10/24/2022 9:51 AM
9	Wilmington	10/24/2022 9:48 AM
10	Wilmington	10/24/2022 9:39 AM
11	Wilmington	10/24/2022 9:30 AM
12	Wilmington	10/21/2022 10:00 AM
13	Wilmington	10/17/2022 8:44 PM
14	Wilmington	10/17/2022 1:46 PM
15	Wilmington	10/17/2022 1:41 PM
16	Wilmington	10/16/2022 3:59 PM
17	Wilmington	10/15/2022 11:43 AM
18	Wilmington	10/13/2022 12:11 PM
19	WILMINGTON	10/12/2022 9:27 PM
20	Wilmington	10/12/2022 6:26 AM
21	Wilmington	10/11/2022 4:47 PM
22	Wilmington	10/10/2022 10:29 PM
23	Wilmington	10/10/2022 10:27 PM
24	Wilmington	10/10/2022 10:00 PM
25	Wilmington	10/10/2022 9:11 PM
26	Wilmington	10/6/2022 10:57 PM
27	NEW CASTLE	10/6/2022 7:01 PM
28	Wilmington	10/6/2022 8:58 AM
29	Wilmington/DE/19801	10/5/2022 5:24 PM

30	Wilmington	10/5/2022 12:19 PM
31	Wilmington	10/5/2022 12:04 PM
32	Wilmington	10/5/2022 11:08 AM

#	STATE/PROVINCE	DATE
	There are no responses.	

#	ZIP/POSTAL CODE	DATE
1	19801	10/24/2022 10:32 AM
2	19801	10/24/2022 10:27 AM
3	19801	10/24/2022 10:24 AM
4	19801	10/24/2022 10:21 AM
5	19801	10/24/2022 10:14 AM
6	19801	10/24/2022 10:12 AM
7	19801	10/24/2022 10:08 AM
8	19702	10/24/2022 9:51 AM
9	19801	10/24/2022 9:48 AM
10	19802	10/24/2022 9:39 AM
11	19801	10/24/2022 9:30 AM
12	19805	10/21/2022 10:00 AM
13	19801	10/17/2022 8:44 PM
14	19801	10/17/2022 1:46 PM
15	19801	10/17/2022 1:41 PM
16	19801	10/16/2022 3:59 PM
17	19801	10/15/2022 11:43 AM
18	19802	10/13/2022 12:11 PM
19	19801	10/12/2022 9:27 PM
20	19801	10/12/2022 6:26 AM
21	19801	10/11/2022 4:47 PM
22	19801	10/10/2022 10:29 PM
23	19801	10/10/2022 10:27 PM
24	28401	10/10/2022 10:00 PM
25	28401	10/10/2022 9:11 PM
26	19801	10/6/2022 10:57 PM
27	19720-1374	10/6/2022 7:01 PM
28	19801	10/6/2022 8:58 AM
29	19801	10/5/2022 5:24 PM
30	19806	10/5/2022 12:19 PM
31	19801	10/5/2022 12:04 PM
32	19801	10/5/2022 11:08 AM

#	COUNTRY	DATE

Southbridge Transportation Action Plan Survey

There are no responses.

#	EMAIL ADDRESS	DATE
1	yrsmann@gmail.com	10/24/2022 10:32 AM
2	llaplaindo605@gmail.com	10/24/2022 10:24 AM
3	b.footes@gmail.com	10/24/2022 10:21 AM
4	chasegeneen8@gmail.com	10/24/2022 9:39 AM
5	capri.wiggins@gmail.com	10/24/2022 9:30 AM
6	Eastholdingscorp@gmail.com	10/21/2022 10:00 AM
7	sharnekat@icloud.com	10/17/2022 8:44 PM
8	lumjonesp@gmail.com	10/17/2022 1:46 PM
9	pamelasalaam@comcast.net	10/17/2022 1:41 PM
10	vwdallas19@yahoo.com	10/16/2022 8:20 PM
11	hshabazz@southbridgecdc.org	10/16/2022 3:59 PM
12	samirahlarry3@icloud.com	10/15/2022 11:43 AM
13	buildingsuccessde@gmail.com	10/13/2022 12:11 PM
14	CherylLMartinez@outlook.com	10/12/2022 9:27 PM
15	davistiller@yahoo.com	10/12/2022 6:26 AM
16	shoreseric25@yahoo.com	10/11/2022 4:47 PM
17	floydjdbbobby@gmail.com	10/10/2022 10:29 PM
18	ae471870@gmail.com	10/10/2022 10:27 PM
19	everettdkallie97@gmail.com	10/10/2022 10:00 PM
20	mw921841@gmail.com	10/10/2022 9:11 PM
21	mikecephas@ecamot.com	10/6/2022 10:57 PM
22	swinchester1981@gmail.com	10/6/2022 7:01 PM
23	captainlauren@kalmarnyckel.org	10/6/2022 8:58 AM
24	captainsharon@kalmarnyckel.org	10/5/2022 5:24 PM
25	kea_1@yahoo.com	10/5/2022 12:29 PM
26	vanvlack@udel.edu	10/5/2022 12:19 PM
27	Jocely531@gmail.com	10/5/2022 12:04 PM
28	mariereed@yahoo.com	10/5/2022 11:08 AM

#	PHONE NUMBER (TEXT MESSAGES)	DATE
1	302-622-8645	10/24/2022 10:27 AM
2	858-668-6844	10/24/2022 10:24 AM
3	302-898-2967	10/24/2022 10:14 AM
4	302-345-5500	10/24/2022 10:08 AM
5	302-613-9922	10/24/2022 9:39 AM
6	302-669-5989	10/24/2022 9:30 AM
7	3029851303	10/17/2022 8:44 PM

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8	2679728514	10/17/2022 1:46 PM
9	302299660	10/17/2022 1:41 PM
10	3028977683	10/16/2022 3:59 PM
11	3023844817	10/15/2022 11:43 AM
12	3022501393	10/13/2022 12:11 PM
13	3023334104	10/12/2022 6:26 AM
14	3029936006	10/11/2022 4:47 PM
15	3022907855	10/6/2022 10:57 PM
16	3027844331	10/6/2022 7:01 PM
17	13024637848	10/5/2022 5:24 PM
18	3028933493	10/5/2022 12:19 PM
19	3028980763	10/5/2022 12:04 PM
20	3025216379	10/5/2022 11:08 AM

Quadrant (circle): 1 2 3
Name:
Address:
City/Town/Zip Code:
Email:
Phone Number:

In 2021, the Southbridge Civic Association and South Wilmington Planning Network (SWPN) worked with residents to produce the Southbridge Neighborhood Action Plan, or SNAP. SNAP is the blueprint for reinvestment and revitalization in Southbridge to benefit residents. Improving Mobility was one of the key action areas and several recommendations were suggested. Among these were to engage with residents more deeply around ways to: slow traffic, reduce trucks; and make bus, walking, and biking safer for all in Southbridge.

The Southbridge Transportation Action Plan (STAP), led by the Wilmington Area Planning Council (WILMAPCO) in collaboration with the Southbridge Civic Association and SWPN, is the next step and will make final recommendations for implementation in Southbridge. Learn more here: www.wilmapco.org/southbridge. This second survey will help us to refine the transportation recommendations we developed from the results of the first STAP survey, SNAP and this study. We greatly appreciate your time. Don't forget to enter your contact information above to stay up-to-date on the Action Plan and for a chance to win a $50 Visa gift card!

Quadrant
1: 16
2: 22
3: 25
RUQ: 8
Out of Area: 16

One overarching comment that can be applied to all that make sense: keep or add the historic characteristics to the look of street lights, curbs and sidewalks.

1. **Please check all that apply:**

   73 I am a resident of Southbridge

   0 I work in Southbridge

   3 I frequently travel through

   4 I own/rent my home

   9 Other (what is your connection to Southbridge Community), please specify: _____

- 2 Kids go to neighborhood house
- City
- Southbridge Civic Assoc President
- Lifetime resident
- I used to live here (kids go to neighborhood house)
- Church and Outreach
- 66 years in Southbridge; former Civic Assoc Pres (10 years)
- Live in sister's house
- Community leader – GM of Coreten Fitness
- I work with residents of Southbridge through my work with Urban Bike Project
- Vendor
- SWPN Member
- On route to work
- Active in the beautification of my community
- Attends church
- Henrietta Johnson Medical Center Outreach
- Mother lives in Southbridge
- Friends and family live in Southbridge
- Volunteer at open streets

2. **Does lack of transportation (walking/bus/car/biking) ever limit you from reaching any of the following:**

16 Your job or desired job

22 Healthy and affordable grocery shopping

11 Routine medical care

17 Social activities

4 Other, please specify_____

- I have transportation
- Some residents expressed challenges but I'm not one of them.
- BUS
- Sometimes

51 I am never limited by lack of transportation

- Except when taking SEPTA to Philly...need direct train to airport

3. Which grocery stores, shopping or jobs do you or someone you know have trouble reaching by bus? Please provide more detail with the bus problem: availability, frequency, reliability, time it takes, and any other information.

_____

- Timing and schedule
- Timing
- Shoprite
- Shoprite
- Fresh grocery
- Walmart and stores across town
- Daughter going to work in Newark, buses running every half hour
- My friends have cars I'm not limited
- My job: 422 B and D Lane Wilm DE 19804
- Shoprite, walking to and from the Shoprite
- Shoprite
- It takes about 3 hours out of your day to catch a bus to the market
- I have some car travel
- Shoprite, Acme, Target, Walmart
- Shoprite
- I took the bus to/from work for one month. I had to get up so early so that I could catch the connecting bus to work. Getting the bus from work was not an issue but the wait time for the connecting bus was almost an hour!
- I own a car (not limited)
- Issue is frequency
- Shoprite, acme, Walmart, anywhere downtown
- Shoprite and Christina Crossing
- Grocery stores, shopping and jobs
- Shoprite and South Market Street
- University of Delaware
- Shoprite, Acme
- n/a
- difficult to go to stores and work
- McDonalds
- Northeast
- Food Lion on Governor Printz
- Buses run slow or not at all
- Train Station and Shoprite
- Do not have any trouble getting around

- All bus
- Bus route 14
- I have friends that would like the buses to run better
- Time it takes is a problem
- I have a car
- Shoprite
- Newark colleges

- Shoprite

- Shoprite has declined over the past few years so if people can only get to this store it is a problem.

- From Southbridge South to New Castle Avenue more frequently

- Shoprite
- Consider bus times during night shifts, especially going to Port of Wilmington and along 202 corridor

4. We have heard more lighting is needed in Southbridge. These reports occur at Lobdell Street, A Street, B Street, C Street, D Street, and S. Buttonwood Street.

Please provide specific locations where additional lighting is needed on the attached map and/or provide in the comments the address of which blocks it's needed.

- Lighting on New Castle Avenue is excellent
- 300 block of New Castle Avenue
- Agree more lighting is needed
- Lighting is needed but downlighting with no uplighting or light pollution. Add light shades.
- All of A st
- 1100 block of b street
- 1200 block of d st
- All of buttonwood st
- Agree with all stated
- B Street children are out in front of neighborhood house very early
- Agree with streets named
- Everywhere

-
- Lobdell
- C Street
- C Street
- B St
- Claymont St
- Agree with those stated
- Brighter on A and Heald St
- S. Claymont St
- Bradford
- B, Townsend St, C and D Streets too
- Agree with streets named above
- Bradford Street
- Townsend and Elbert Place front and back
- Lobdell and Chapel, Lobdell and Claymont, Lobdell and Bradford, and Bradford and Claymont
- All over Southbridge
- S. Buttonwood St
- Agree
- B st
- Agree with all
- A street between the construction road block and the new apartment building being built
- Lobdell
- Agree with streets already named
- Sidewalk lighting on all streets
- Around school and new KNF Market
- Pearl St
- A Street and B Street near neighborhood house and KNF corner Store
- A, B, and C Street
- n/a
- Terminal Ave from AST up to the Port of Wilm more lighting on S. Claymont St from A to C Streets
- A Street, C Street, by the park on C Sr
- From Southbridge to the bridge where Shoprite is
- All streets need lighting
- Buttonwood and Townsend Streets
- B St, Bradford St, D St

- D Street
- C and Buttonwood St
- S Heald St
- S Claymont Street
- Yes
- D Street need more clarity. Missing stop signs, should consider one-way traffic or limiting parking to one side
- S. Heald St and South Claymont St

5. Raised intersections, like shown in the picture below, make cars and trucks slow down and help people walk more safely. They can be installed strategically in Southbridge, such as at Lobdell St. and New Castle Ave.

Do you agree with this improvement?

YES_76__ NO___ Unsure_10_

Why or why not?

- Anything is an improvement
- Cars are always speeding and it's dangerous
- Yes with brickwork just like on Justison St
- Willing to support positive changes
- Safety concepts
- Need speed bumps as well
- Unsure because it might be useful on A Street, but there isn't much pedestrian traffic on New Castle Ave and Heald so I'm not sure of this design
- They can hit someone
- Slow down speeders
- Better for safety
- Safer for children and pedestrians
- On all major blocks
- Change the speed limit
- Yes please! We live on corner of B Street and New Castle Ave and our entire house shakes when large trucks and cars fly through the intersection. Come feel it and you will understand how fast cars through especially during the night.
- It's nice to know when the sidewalk ends and begins
- Traffic anywhere in Delaware is too fast
- Overall safety for all
- More attractive

- Better walking
- More needed in downtown Wilmington
- Too much speeding now and too many 18 wheelers
- D Street needs speed limit signs, not tractor trailer signs and parking signs
- It's crazy teenage drivers
- A Street
- Bring awareness to pedestrians and drivers
- New Castle Ave is more like a highway
- C Street corner store needs to be knocked down
- To make people slow down
- Crosswalks
- People driving too fast around neighborhood while children are out
- It helps children and others become more noticeable at night
- To help the people of the community
- All streets
- Wholeheartedly agree
- Everyone could benefit from this
- Cars speed down New Castle Ave and Claymont Streets
- Makes it safer for the children
- Pedestrians typically have to walk in unsafe places
- Claymont and Peach Street
- Everywhere
- Helped people around be more safe
- Townsend St
- Prioritize safety over speed where people live
- More speed safety less running of the lights
- Don't let people lose sidewalks for this

Where would you like to see them?_____

- New Castle and Lobdell

- Along New Castle Ave
- New Castle Ave and C Street
- Where the residents want them
- New Castle Ave between train tracks and A street
- A, B, C, D Streets
- Cars run too fast/put them all over Southbridge
- In housing communities close to downtown
- Claymont Street and Lobdell St
- South Claymont and A Street
- Heald and New Castle Ave
- New Castle and Lobdell
- Heald and New Castle
- Everywhere
- New Castle and C street all ways
- Neighborhood House
- Henrietta Johnson Medical
- Where handicap is needed
- Lobdell
- New Castle Ave
- 600 block Townsend St
- Everywhere out to Shoprite
- Everywhere
- Everywhere
- As many places as possible
- Where needed

6. As shown in the map below these improvements will: reduce traffic speeds, make it easier to walk, and make more space for beautification or landscaping:
   - Remove S. Claymont Street between D Street and C Street
   - Reconfigure lanes on New Castle Ave. at C. Street
   - Moved parking along New Castle Ave would be offset from the roadway as shown in the picture
   - New sidewalk to each property and along New Castle Ave between Pearl Street and C Street
   - New curb to prohibit illegal left turns onto Pearl St.
   - Replace D Street sweep with tighter corners

Do you agree with these improvements?

YES_55_ NO_5__ Unsure_24_

Why or why not?

- For improvement yes
- I like the inset parking on New Castle and Claymont
- Yes but maybe some and not others
- 600 block of south Heald St just as bad
- No, because I would like to read more about the changes
- Effectiveness/upgrades to safety issues are always a good thing.
- Safety: anything to slow down
- Reconfiguring lanes and offset street parking could make a huge impact on traffic speeds and walking safety in this area
- Will reduce traffic patterns and create a safe place for individuals to walk
- Safer and slows down drivers
- Parking strategies are necessary
- I need a copy of the above to investigate this myself
- Because I want to help with my parking which way in discretion with those who goes to the bus
- Safer for all
- Yes to off set parking and new sidewalks with new curbs, but are you getting rid of the traffic thru way back south?
- Better for safety
- NO to removing S. Claymont, reconfig parking lanes, moving parking and offsetting it from the roadway, yes to new sidewalks, and yes to the D Street Sweet and Pearl Street changes.

- NO leave Southbridge just the way it is; everything needs to be two lanes with more lights
- Don't remove S Claymont Street
- Problem area is cars turning left on B Street onto Heald St
- Safety
- It would help make the streets safer and neighborhood nicer
- They are really needed
- Should leave it as is !!!
- This will make it worse
- It will reduce traffic speeds and may save a life or property
- Not super familiar with traffic flow in this neighborhood but I generally support anything that improves safety, especially reducing the turning radius

7. Heald Street and New Castle Avenue are currently 2 lanes in each direction. A traffic analysis indicates one travel lane in each direction can be removed to slow speeds and reduce crashes between Apple Street and Terminal Avenue. This will not cause additional traffic delays or take away parking.

Do you agree with this improvement?

YES_43_ NO_27__ Unsure_18

Why or why not?

- To much confusion, put speed bumps in to slow traffic

- Slow traffic
- One lane is the best
- Keep Street Parking on both sides of the street
- If you do this there will not be parking for the people who want it on both sides
- Not fond of anything that limits access
- Needs more
- Need two lanes
- Unsure because wondering if the trucks will be rerouted
- Better for safety
- More Traffic
- Always been
- Lots of accidents on Heald Street and Children
- Test the one lane out for 5 years
- No because more volume of traffic will be an issue
- Because of impatient drivers
- Leave it like it is
- Cars go too fast
- To slow traffic in front of homes where traffic travels too fast
- While it may slow speeds, it will increase traffic. I don't want heavy traffic in this area
- Traffic will be tight
- Slowing down the traffic for children, less traffic jams, and big trucks
- It would really help
- If it helps traffic flow it's fine
- Traffic in and out of southbridge
- Love this improvement
- This will make it worse
- It absolutely will cause slow downs
- One lane will create more traffic
- More room for people without hurting traffic flow
- Need to see the perspective traffic patterns to agree or disagree with this change

If we reduce New Castle Avenue and Heald Street to one travel lane in each direction, what would you like to see put back in its place:

31 Wider sidewalks

28 More parking

21 Landscaping

19 Bicycle lanes

33 Beautification

38 More lighting

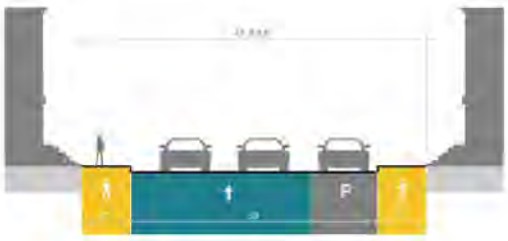
10 Gathering space

2 Other, Please specify

- Kids areas
- More trash cans

19 I would prefer two travel lanes in each direction to stay

Existing: New Castle Ave.



8. The intersection of B Street and Bradford Street has speeding traffic and vehicles not stopping at the stop signs. New sidewalk in front of the Church, as shown below, would help slow traffic by tightening the turn.

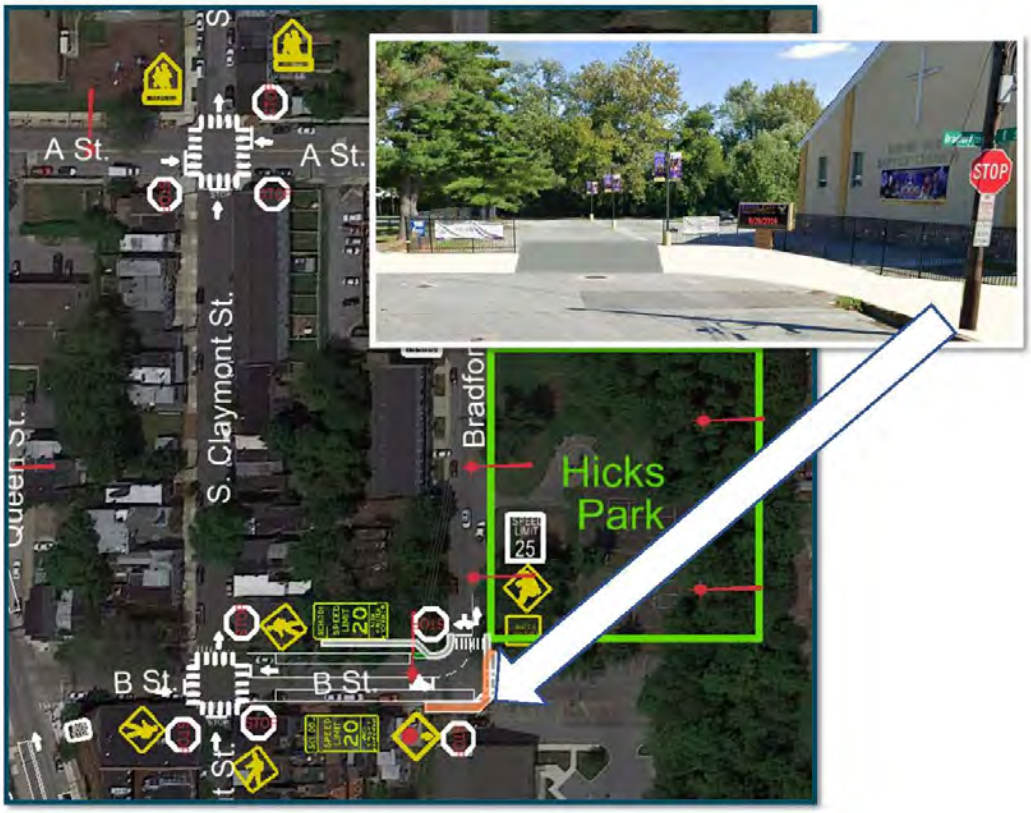
Do you agree with adding a sidewalk in this location and better signage:

YES_63__ NO_5__ Unsure_15 __

Why or why not?

- Better for safety
- Put sidewalks on both sides of the street
- No, we need signs and speed bumps
- Safety concern/traffic slow down
- Yes as long as the sidewalks still allow for two way traffic
- Add speedometers
- Always been
- For safety
- Yes, will create a safe space for peds to walk
- Would a speed bump serve this purpose

- It would make the park area look better and also the park could use some beautification as well maybe new play equipment
- Need sidewalks wider on B Street
- Yes please, many cars do not stop here and speed through B St across front of our house. A tighter turn would force cars to at least slow down.
- Great idea
- Safer to walk
- Improve traffic and walking
- Need stop sign on main street needed
- Should add a traffic light to reduce speeds and possibly fatalities
- This will make it better for people who are walking
- There should be safe, legal crossing for people walking at intersections



9. In addition to sidewalk improvements to S. Heald Street what amenities would you like provided along a new proposed riverwalk connecting S. Heald Street to A Street?

61 Lighting

37 Picnic benches

17 Kiosks

29 Wildlife and historical informational signs

11 Other: _____

- bus stop
- need it to be a gateway into Southbridge
- seating at bus stops
- investment in a walkway that would go through Southbridge; the proposed walkway goes around Southbridge
- fountain and benches in what is Winston park
- positive events for families like movie nights
- benches, plants and flowers
- wider sidewalks, speed limit signs, flashing light signs, and speed monitor
- rest areas (bathrooms, vending machines, water fountains for reusable bottles, bike stations to secure your bike with a lock)
- stop signs
- have a trail coming from the riverfront trail down into southbridge
- swimming pool or playground
- community refrigerator and/or take a book community library
- concerned with loitering

Where are you comfortable having bicycle lanes in Southbridge:

23 Side streets

34 Main streets

42 Areas leading to the community parks

6 I do not want bicycle lanes in Southbridge

10. Please check all that apply:

- ☐ I would like to be entered into a drawing to win a Gift Card for completing this survey (must provide your address to receive winning gift card)
- ☐ I would like to get updates on the Southbridge Transportation Action Plan
- ☐ I would like to be added to WILMAPCO's monthly e-newsletter
- ☐ I would like to be added to the South Wilmington Network (SWPN) email list
- ☐ I would like to be added to the Southbridge Civic Association/CDC email list

This survey can be mailed back to WILMAPCO at the following address:
100 Discovery Boulevard * Suite 800 * Newark, DE 19713
Learn more here: www.wilmapco.org/southbridge

For more information on the recommendations or this study to help answer this survey please contact:
Sauntra Kanu sauntraka@gmail.com, Diana Dixon 302-409-9679, or Bill Swiatek bswiatek@wilmapco.org

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THANK YOU FOR PARTICIPATING IN OUR SURVEY

CENTURY ENGINEERING
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Southbridge Transportation Action Plan

Workshop 1 Summary

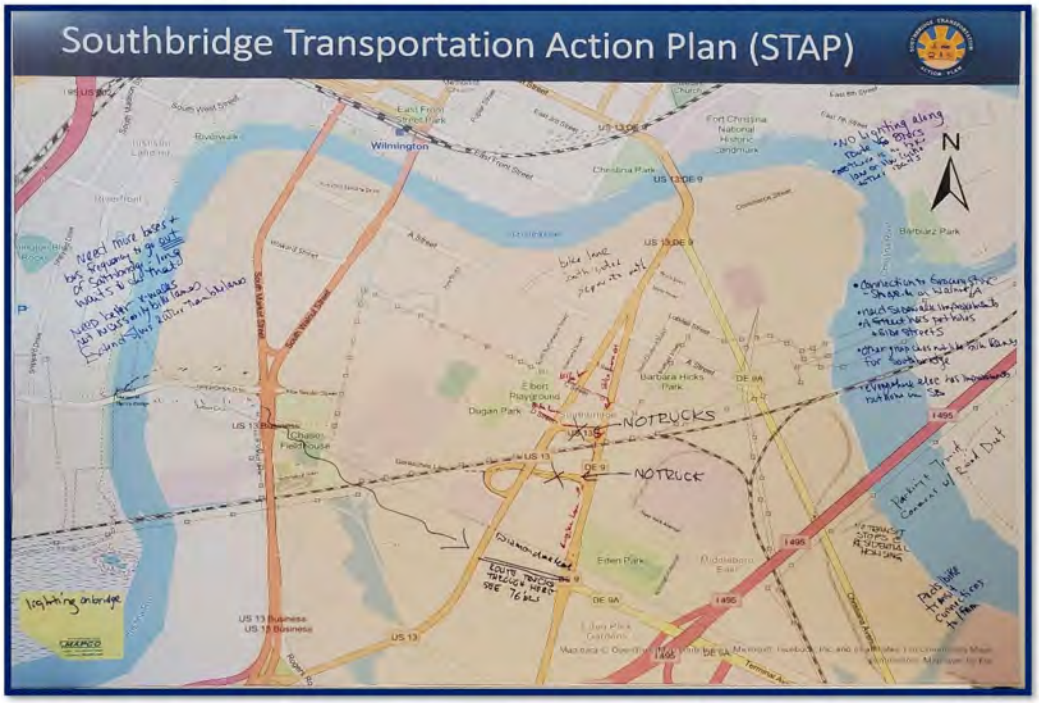
Century Engineering prepared and attended the first public workshop for the Southbridge Transportation Action Plan. Members of the community who attended were greeted with boards providing information on the Plan including the study area, project purpose and goals, roadway reconfiguration ideas, and maps where the community was prompted to provide information on bicycle/pedestrian concerns, trucks, traffic calming, transit, connectivity, lighting, beautification, landscaping, and stormwater among other topics. The workshop was held from 4-6 pm at the Southbridge Neighborhood House prior to the Southbridge Civic Association Meeting on October 18, 2022. During the Civic Association Meeting a summary of the Plan goals were discussed and the community was introduced to two community members who were hired to assist with the plan development: Sauntra Kanu and Diana Dixon. A local area resident experienced in survey collection, Dora Williams, was hired as well. The project schedule was provided, as well as a survey which attendees could take in person during the event or submit at a later date. Overall, the feedback provided was positive and excited for the Transportation Plan.

The workshop welcomed 25 community members and representatives. Thirteen of the attendees requested to be added to project updates. Forty-three surveys were completed and submitted.

Community Feedback

The Community Workshop provided various opportunities for the community to provide input on Transportation concerns and issues throughout Southbridge. In addition to issues and concerns, the community was offered the opportunity to discuss what is in place that is already successful as well. The interactive portion of the workshop included three maps of the study area which were located throughout the walk-through discussions. A moderator was positioned at each map to discuss specific topics. The feedback was written onto the maps and maps were later scanned and saved as project documents. The following maps provide information collected during the community workshop. The topics discussed were based on action items and major topics of discussion that were presented in the Southbridge Neighborhood Action Plan (SNAP)

Pedestrian and Bicycle Traffic Related Suggestions



The community was asked to provide input on concerns, issues, or areas that are currently successful and working properly as it pertains to bicycle and pedestrian transportation. The community was encouraged to think of origins and destinations that currently have connectivity issues or issues and concerns that they are aware of as they travel throughout the study area. The following were the suggestions and results:

- Improve crosswalks throughout
- Widen sidewalks throughout
- Route to Chase Fieldhouse needs improvement
- Widen sidewalks instead of placing bike lanes
- Bike lane needed along New Castle Ave between A Street and Terminal Avenue
- Add bike lanes along D Street and C Street between New Castle Avenue and Heald Street
- Build a Shared Use Path along A Street between South Market Street and Barbara Hicks Park
- Build a bike lane and improve walking route to Chase Fieldhouse

Public Transit Suggestions

The community was also asked to provide feedback on public transportation and connectivity within the study area but also to destinations outside of the study area like greater Wilmington and beyond. The following feedback was captured:

- Need more route options to destinations outside of Southbridge
- Operate buses more frequently
- Limited bus options between ShopRite on Walnut St. and A St. from Southbridge
- Create transit stops in Southbridge

Lighting Requests

A concern that was reiterated throughout the SNAP and subsequent community meetings was the need for lighting. As a result, the community was asked to provide feedback on locations where additional lighting is needed to be added or improved. We understand that the City of Wilmington is currently replacing existing lighting within the Study Area with LED lighting, which a few residents have noted that the changes improved over all lighting. As part of this study the limits of that efforts will be investigated and noted. The following are the feedback received as it pertains to lighting improvement locations:

- On bridge over Christina River
- A Street between S. Market St. and Christiana Ave.
- B St.
- C St.
- D St.
- South Buttonwood St.
- Townsend St.
- Elbert Palmer Playground
- Along route between Southbridge and Field House
- Peach St. and Apple St.
- South Claymont St.
- Bradford St.
- Barbara Hicks Park
- Heald St.
- New Castle Ave.
- Eden Park

Beautification Locations

The community was asked to provide feedback on locations where beautification, landscaping, streetscaping, and gateways into Southbridge could be added or improved. Beautification, landscaping, and streetscaping included topics such as, but not limited to, decorative light poles, decorative pedestrian light poles, amenities such as benches, brick accents, tree planting, shrub planting, and overall improvements to enhance the look and feel of specific areas. The following are the results of this query:

- Route to Chase Fieldhouse
- Gateway sign on East Front St. and E 4th Street
- Heald St and Christiana Ave near the City Maintenance Yard
- Heald St. and A St.
- Barbara Hicks Park
- Gateway sign at Terminal Ave.

Flooding/Stormwater Management Requests

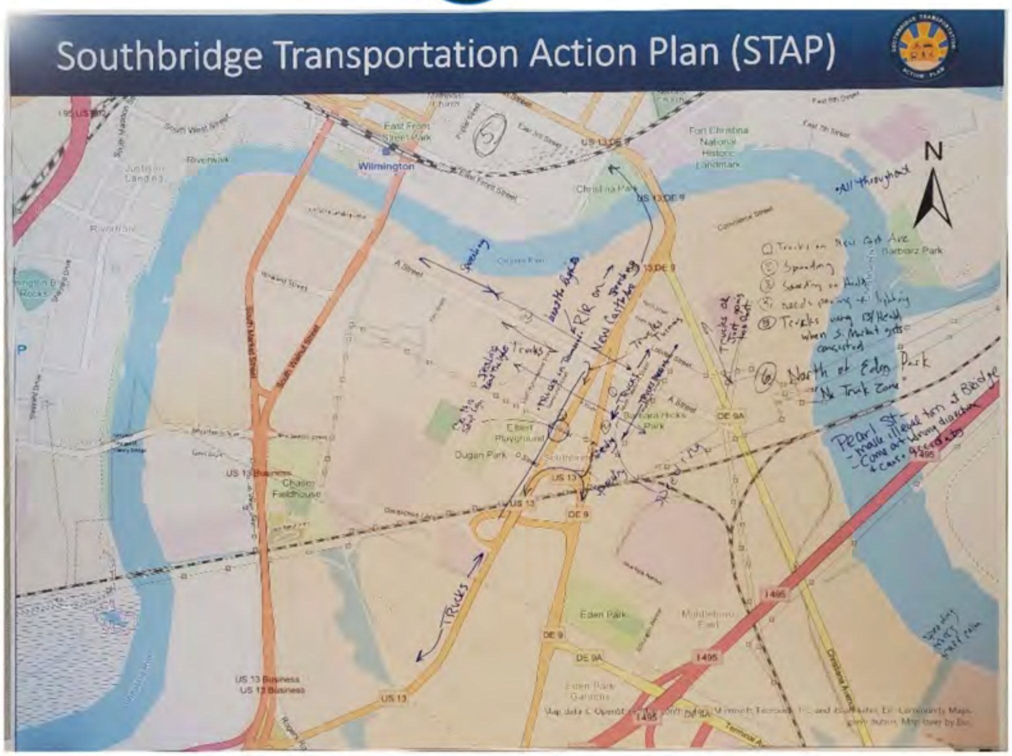
While the wetland park is assisting in the mitigation of flooding issues within the study area, other areas not encompassed in the wetland park mitigation are also in need to flood mitigation strategies. The community was asked to identify those areas and potential solutions. The following are the results of that query providing locations of existing flooding:

- Commerce Street near junkyard
- Ezion Fair Baptist Church
- Electrical Substation along Christiana Avenue
- Along New Castle Ave at the entrance to Eden Park Gardens
- Address stormwater management and flooding in the area of A Street and Lobdell Street, Peach Street, Apple Street and the area south of the Christina River
- Along Christiana Avenue at Lobdell Street

Traffic, Truck, and Road Diet Suggestions

Many of the action items and discussions in the SNAP pertained to truck traffic and speeding being an issue throughout Southbridge. To understand the issues in more depth the community was asked to expand on the issues with trucks and speeding within the community. Locations where trucks are traveling, parking and speeding was discussed as well as roadway issues pertaining to speeding, configurations, accidents, and condition. The following is the feedback collected during this discussion:

- Apply and enforce truck restrictions on D Street, Garasches Lane, and the off ramp from US 13 to New Castle Avenue in the area between New Castle Avenue and Heald Street
- Enforce no truck parking on Bradford Street
- Enforce no truck parking on S Claymont Street



- Add signage and enforce no truck parking along Townsend Street
- Enforce no truck parking on A Street
- Trucks turning unsafely from A St. to Heald St.
- Maintain trucks being allowed on Christiana Avenue
- Trucks travel down Heald Street and enter Southbridge – Make north of Eden Park a no truck zone
- Trucks use US 13 and Heald St. when S. Market St. gets congested
- Fix potholes along A St. and side streets
- Concern about lack of parking and taking away space for bus stops
- Speeding and unsafe driving along A Street between Christina Ave and South
- Walnut St. – vehicles race down the street trying to "beat the lights"
- The New Castle Ave and South Claymont Ave split is confusing
- Speeding along E 4th St. near Christina River
- Speeding along South Claymont Street between Lobdell Street and D Street
- Speeding on B St. - vehicles race down the street trying to "beat the lights"
- Speeding on D Street Sweep
- Trucks are speeding on Christina Ave.
- Trucks speeding on New Castle Ave.
- Trucks speeding on Heald St.
- Vehicles driving through stop sign near Heald St. and C St.
- Vehicles driving wrong direction at Pearl St. and make illegal turn at the bridge

Miscellaneous Requests

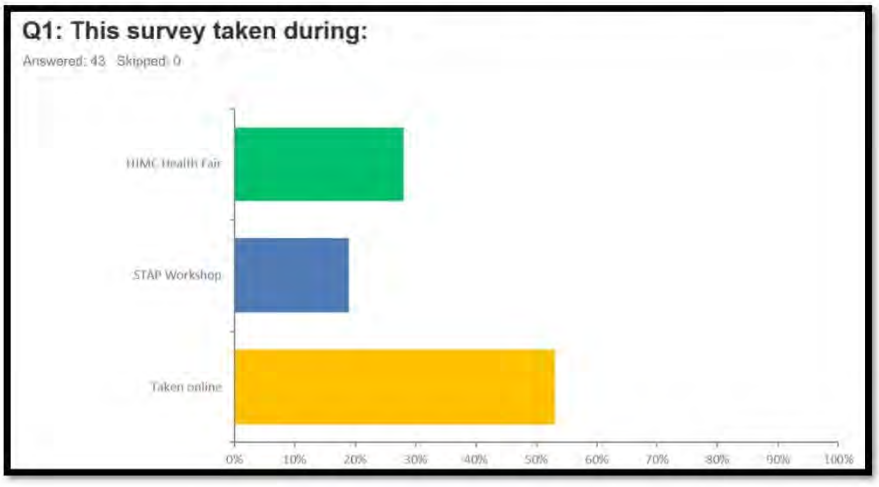
- Revise zoning to be less industrial and more residential
- Revise zoning to allow for nicer destinations within Southbridge such as nicer retail or restaurants
- Build soccer fields for recreation

Survey Results

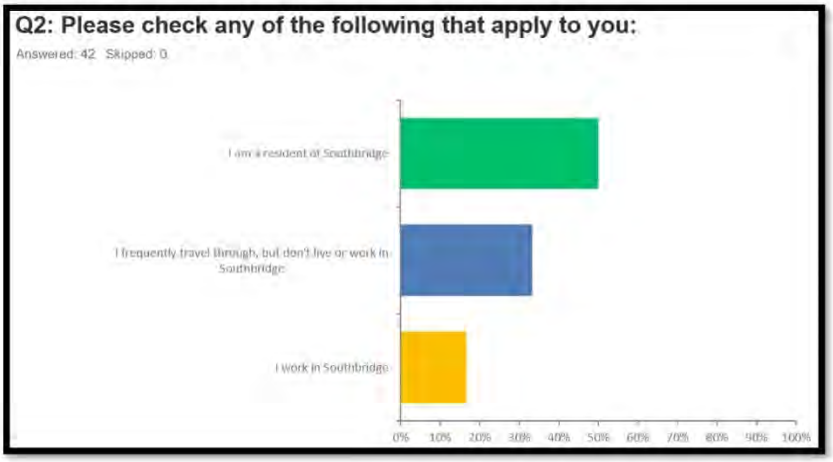
Several efforts were implemented to gather feedback from the community. A survey was developed and posted on the project website. Flyers were placed around the community including at the Henrietta Johnson Community Center and the Neighborhood House. Flyers included a QR Code for quick and easy access to the survey using a smart device such as a cell phone and hard copies surveys were available such as at the Neighborhood House. A total of 43 surveys were received from the community. An incentive of winning a $50 gift card for preparing the survey was provided. Surveys were collected online, at the Henrietta Johnson Medical Health Fair held on October 15, 2022, and at the STAP Workshop #1. The following are the survey results.

Most surveys were taken online and at the Health Fair ahead of the Public Workshop. More than half of the surveys were taken online leaving about 45% of surveys taken at the public workshop and health fair The successful advertisement of the survey meant that many community members had already completed the survey prior to the public workshop. During the workshop we were able to capture a few more respondents who had not seen the information previously.

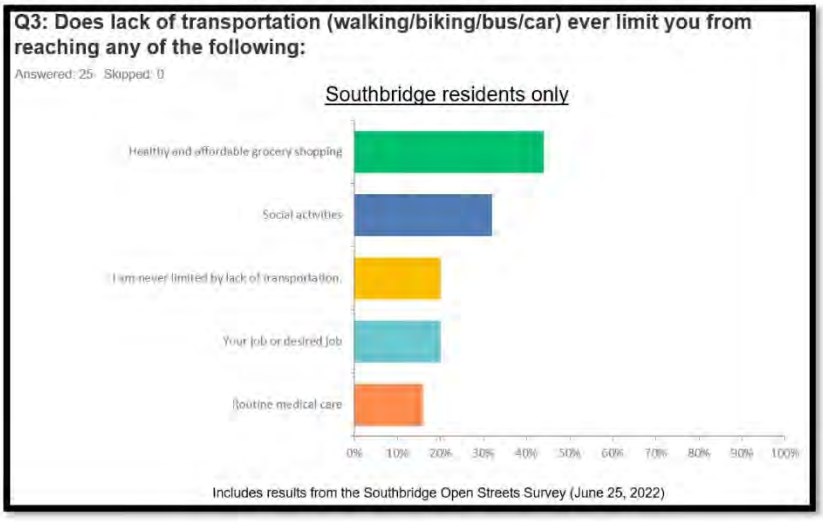
About half of surveys were taken during workshops and half were taken online.



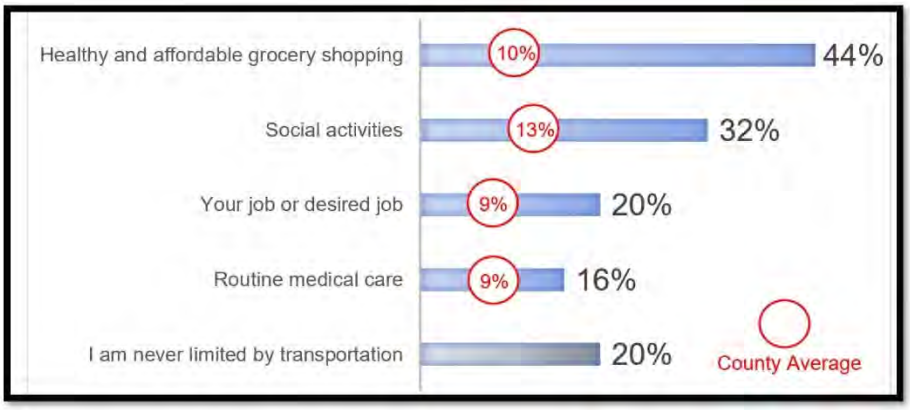
Most of the survey respondents reside in or travel through Southbridge frequently. Some respondents work in Southbridge.



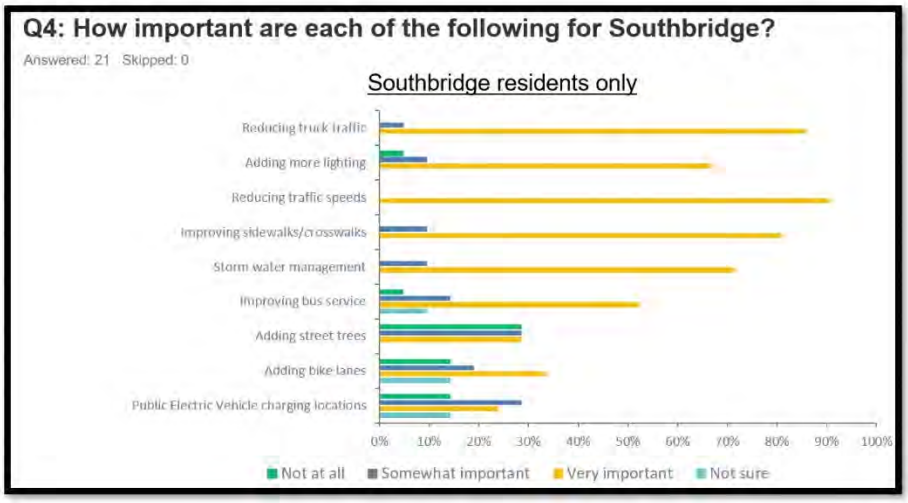
Southbridge residents feel significantly limited in their ability to grocery shop and gather socially due to lack of transportation. More research needs to be completed to determine which medical care facilities are problematic from a connectivity standpoint.



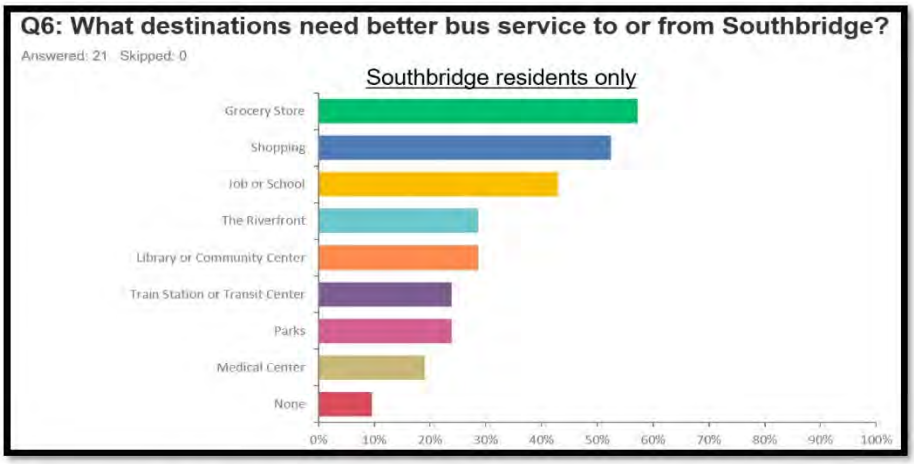
The survey results were compared to County Averages below:



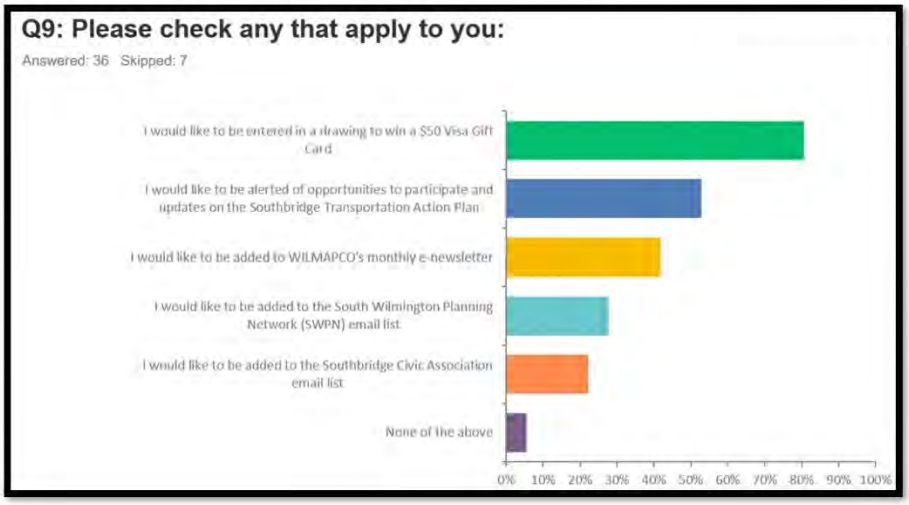
Reducing truck traffic, reducing traffic speeds, improved lighting, improved walking areas, improved stormwater management, and improving bus service, are priority requests of Southbridge residents. Adding street trees, bicycle lanes, and public electric vehicle charging stations were secondary priorities for the Southbridge residents who took the survey. They will be considered in conjunction with or after the main priorities.



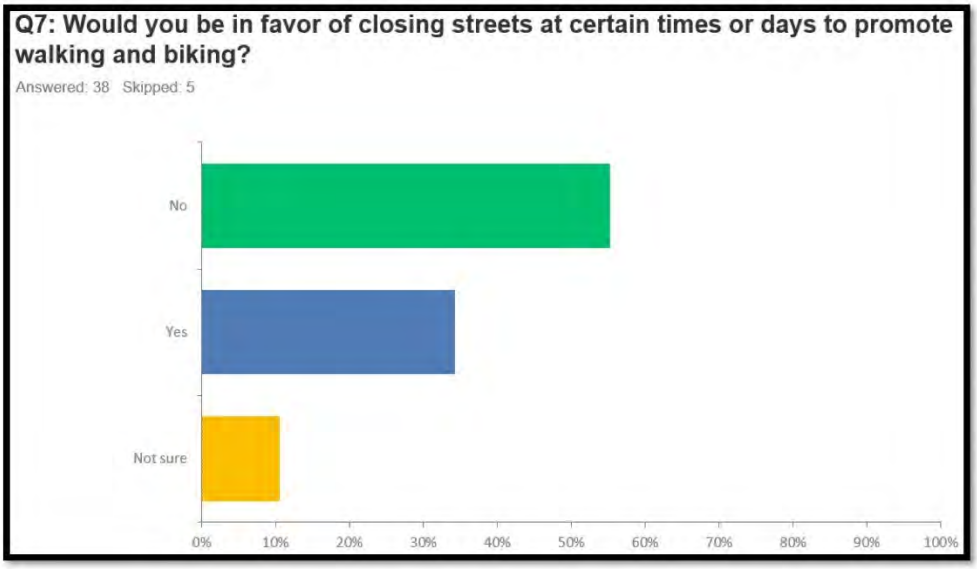
Respondents feel service improvements should be allocated towards transportation to/from grocery stores, shopping, workplaces, and schools.



Most respondents would like to be entered in a drawing for a gift card and to be alerted about future opportunities to participate in STAP. Most respondents would not like to be added to email lists.



Respondents aren't in favor of closing streets to promote biking.



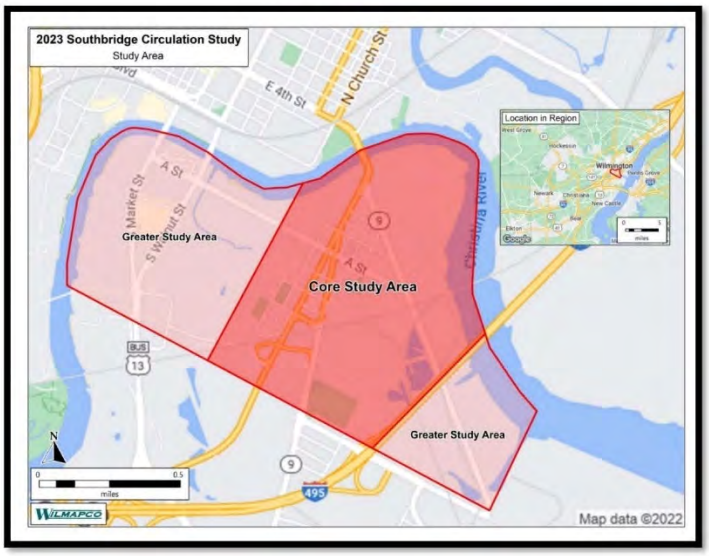
Study Schedule

The data gathering and community visioning events for this study are completed. Efforts are now turning toward the alternatives analysis which will continue through the winter as shown in the schedule below:

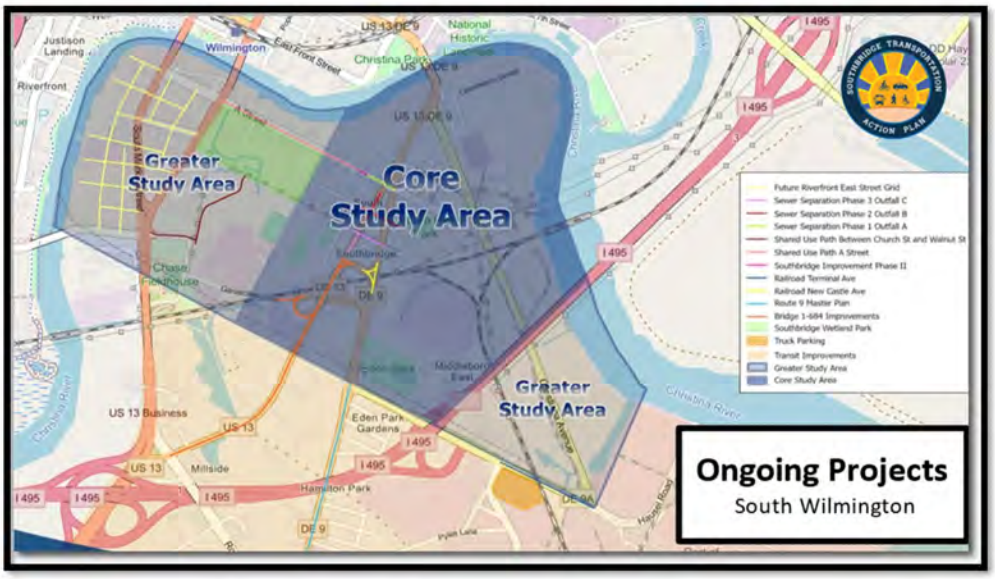
•Data Gathering	Summer 2022
•Community Visioning	Fall 2022
•Alternatives Analysis	Fall/Winter 2022/2023
•Second Public Workshop	March 2023
•Draft Report	Spring 2023
•Third Public Workshop	May 2023
•Final Public Workshop	June 2023

Workshop Boards

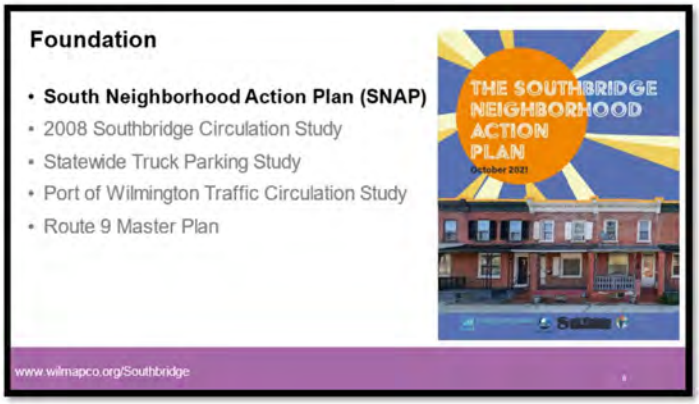
Study Area Map



Current Projects in Southbridge



Plan Foundation



Workshop 1 Photos

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Youth Outreach

Century Engineering prepared and attended a Youth Outreach event for the Southbridge Transportation Action Plan on December 6, 2023 from 4-5:30 at the Southbridge Neighborhood House. Children in grades ranging from first through tenth grade who attend after school programs at the Neighborhood House were invited to attend. The workshop welcomed 20 youth representatives from the Southbridge community. The children were very engaged in the event and provided interesting feedback from their perspective of living in and traveling within Southbridge.

The event was divided into three mini-sessions. The first session included a brief discussion on careers in

Transportation Planning, Urban Design, and Civil Engineering. Types of work within each of the career choice was discussed. The second session included a discussion on specifics about the Southbridge Transportation Action Plan to introduce the youth to the study and the types of information we collect. The project schedule and workflow were discussed as well. The final session was an interactive session to gather feedback spanning topics such as bicycle/pedestrian concerns, speeding, transit, connectivity, lighting, and safety.

The feedback received from the third session echoed the information received from the first public workshop. The children discussed how it takes a long time waiting for buses to arrive for trips to school, shopping, groceries, and doctors. The children discussed how different areas of Southbridge are not well lit and feel scary at night. Most of the children find it difficult to cross intersections because of the higher speeds of traveling cars. The children like the community parks but want a safer more direct route to some of them with better lighting. The children also would like more infrastructure to ride their bicycles around the community. The children also like the idea of more trees and grass areas.

Southbridge Transportation Action Plan

Workshop 2 Summary

Century Engineering prepared and attended the second public workshop for the Southbridge Transportation Action Plan. Members of the community who attended were given a presentation providing information on the Plan, including previous community feedback to reduce traffic speeds and truck volumes, as well as improving walking, biking, driving, and bus travel throughout Southbridge. The workshop was held from 4:30-6pm at the Southbridge Neighborhood House prior to the Southbridge Civic Association Meeting on March 21, 2023. The Plan's study area, main purpose, and schedule were reviewed. A summary of Workshop #1 was provided, as well as the survey results that were collected. Both of the Youth Workshops were discussed. Overall, the second workshop was a success as the community continues to be enthusiastic about STAP.

The workshop welcomed 25 community members and representatives.

Community Recommendations

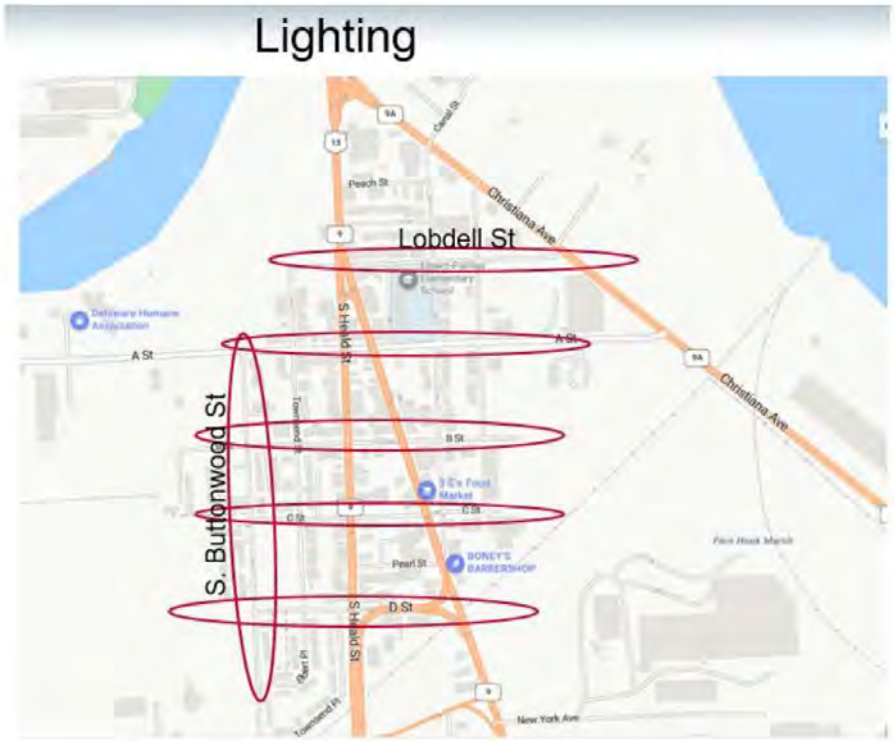
Recommendations will be implemented as funding becomes available. There are three categories of anticipated timeframes: short term (0-5 years), medium term (5-8 years), and long term (9+ years).

Quick Action Memo

A Quick Action Memo was submitted to the City of Wilmington on Friday, February 10, 2023. The memo mentioned numerous improvements to Southbridge that will be implemented as funding becomes available. The anticipated timeline for those improvements is 0-5 years. These specific improvements are; signing and striping recommendations, install and enforce "No Truck Parking" signs, wayfinding and truck routing signage, speed limit signing and regulatory signs, signing and pavement markings to deter speeding, signing for pedestrian/children awareness, and signal timing revisions.

Speeding and Lighting Recommendations

Many community members expressed concerns about speeding and the lack of lighting throughout Southbridge. The main recommendation to reduce speeding was the implementation of raised intersections. This will force drivers to slow down due to the height of the curb, therefore reducing speeding and making intersections safer for pedestrians and bikers. To address the lighting concerns, new lighting will be added in dark areas and decorative pedestrian lighting will be added as projects progress. Speeding and lighting is a major safety concern at local playgrounds and parks, so it was recommended that lighting be improved, speed limit signs be added, and add children at play signs.



Specific Street Recommendations

New Castle Ave and C Street

There were short term and long term recommendations for this due to the many issues community members discussed in the prior workshop and survey. For short term, pedestrian crosswalk marking and stop bars were suggested. Adding larger stop signs and stop ahead signs were also recommended. For long term, it was suggested that S. Claymont Street be removed between D Street and C Street. Also, reconfigure lanes on New Castle Ave to have one left turn lane and one shared through-right turn lane approaching C Street (shown below).

S. Heald Street and D Street

Due to the speeding and pedestrian safety concerns, it was recommended that the pedestrian crossing distance at D Street be shortened. Another suggestion was decreasing the curve radius for the right turn lane from S. Heald Street onto D Street, as well as only having one right turn lane (shown below).

D Street to C Street Circulation

The image below shows the proposed recommendations to improve the circulation from D Street to C Street. These would allow for opportunities to add green space, stormwater management, community art, and welcome/directional signage. These recommendations would also slow down traffic which improves pedestrian safety.

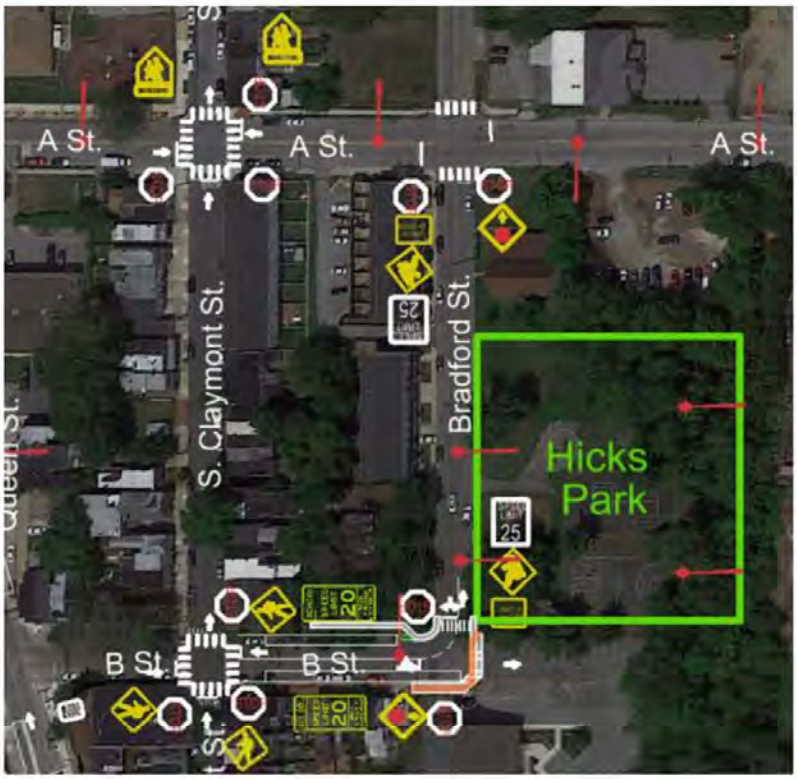
New Castle Ave and Heald Street Road Reconfiguration

New Castle Ave and Terminal Ave

The lack of signage and minimal change in landscape from the industrial area to residential area leads to trucks accidentally traveling into residential areas. To prevent this, it was recommended that "Trucks Must Turn Right" signs and new landscaping be added around Terminal Ave. These improvements will also slow traffic and provide a more efficient connection for trucks to leave Southbridge.

B Street and Bradford Street

For short term recommendations, it was suggested to add larger stop signs, stop ahead signs, speed limit signs, and children at play signs. It was also suggested to refresh stop bars and add additional lighting along the streets and intersections. As a medium/long term recommendation, the community would like a new pedestrian connection to Hicks Park and a sidewalk connection to the church entrance.



New Castle Ave at Eden Park

Community members feel like Eden Park is disconnected from the rest of Southbridge, so they recommended adding a shared use path behind the wall and upgrading the existing walking paths throughout the park. The also suggested improving lighting for safety.

Connectivity at Lobdell Street and S. Heald Street

A walking path adjacent to the Christina River was recommended as a part of the warehouse development. Lighting along the path was also suggested as well as some potential amenities.

Name	Address	Email	How did you hear about this event?
Laretta Wilson	[redacted]		
Betty Anderson			
Rep Cooke			…or
Chuck Fleming			
Paul Will			SBCA
Jen Adkins			email
Pam Salazar			
Diana Dixon			
Tim "DJ Timdog" Bayard			
Sauntra Kanu			

Name	Address	Email	How did you hear about this event?
Hanif Salaam	[redacted]		SBCA
Harujan Jukazz			SBCDC
Ronelle Delorde			
Tim "DJ Timdog" Bayard			
Paul Will			SBCA
Marion Brown			SBCA
Destiny Brown			SBCA
Mark & Ayodele Johnson			…c.org SBCA
James K. Fauntr…			

Name	Address	Email	How did you hear about this event?
Chuck Fleming			flyer
IRENE Butts			EMAIL
Osha Hudson			Email/mail
JUAN. + A JACKSO			EMAIL
Tony Mattuloa			Email
Earl Cooper			
ROSLYN Perkins			
Stephen Ottinger			FLYER + WPN
Anitra Johnson			
Pamela Salas			email

Name	Address	Email	How did you hear about this event?
Cindy Evans			I was near here

CENTURY ENGINEERING
A Kleinfelder Company

Southbridge Transportation Action Plan

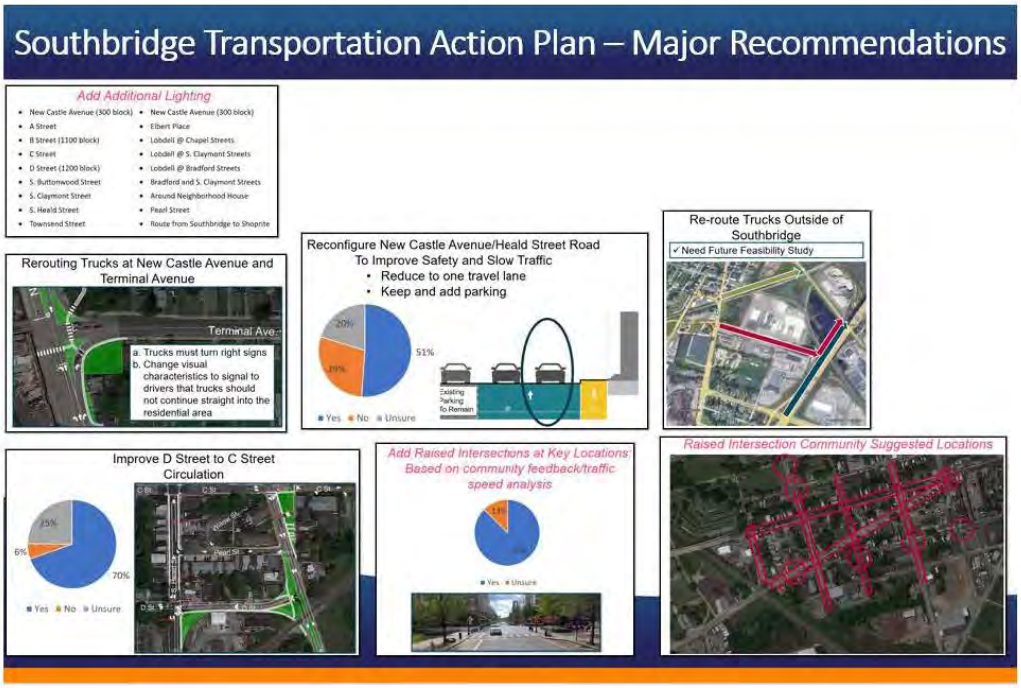
Workshop 3 Summary

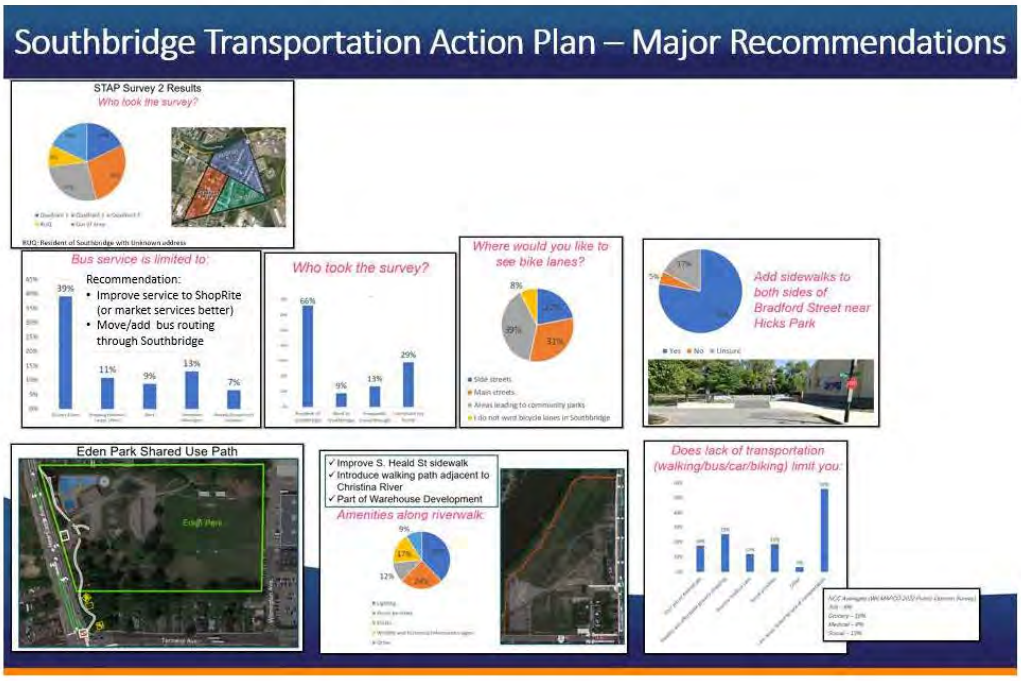
Century Engineering prepared and attended the second public workshop for the Southbridge Transportation Action Plan. Members of the community who attended were shown boards providing information on the Plan, reviewing specific improvements that were recommended by fellow community members, and the results of the second survey. The workshop was held from 12pm-1pm at Hicks Park (B & Bradford Streets) on June 10, 2023.

There was a total of 8 attendees.

Community Feedback

Several visuals on the boards displayed showed specific survey results. The questions for the results displayed varied from potential road configurations to adding beautification amenities along paths. The overwhelming majority favored the addition of raised intersections in key areas, sidewalks near Hicks Park, and the improvement of connectivity and circulation between streets. Community members were shown specific locations of additional lighting, potential raised intersections, and shared use paths. Everyone is in favor of improving all existing transportation methods, whether that is walking, biking, driving, or bus transit. Overall, the takeaway from this workshop was extremely positive as the community members were appreciative of the in-depth review of the recommendations.





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Name	Address/Organization	Email	Check to sign up for WILMAPCO's newsletter
Kendra Thomas			✓
Joshua Payne			
Robert Perkins			
Dora Williams			
Pamela Salaam			–
Hanifa Shabazz			✓
HAROLD DAVIS			✓

Name	Check to sign up for WILMAPCO's newsletter
Charles Fleming	
CHARLAYNE R. THOMAS	

CENTURY ENGINEERING
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Appendix C: Quick Action Item Memo

KLEINFELDER
Bright People. Right Solutions.

MEMORANDUM

TO:	Bill Swiatek, WILMAPCO
FROM:	Sonia Marichic-Goudy, PE
	Century Engineering, a Kleinfelder Company
DATE :	January 30, 2023
SUBJECT:	Southbridge Transportation Action Plan (STAP) Quick Action Items
CC:	Drew Boyce, Century
	Bill Carver, Century

Century Engineer, A Kleinfelder Company is taking part in preparing the Southbridge Transportation Action Plan (STAP). The plan is a continuation of the Southbridge Neighborhood Action Plan (SNAP) and takes a more detailed review of the recommendations that pertain to transportation. In addition, Century gathered information from the community of Southbridge to provide additional clarity to the needs and wants of the community. While completing our analysis for the STAP several recommendations fit the criteria for low cost, short-term recommendations, meaning there is little to stop them from being implemented today. Our goal for this memo is to identify Quick Action implementation recommendations that could potentially be implemented within the next few months while our overall Transportation Plan is under development. Theses improvement recommendations are consistent with the Southbridge Neighborhood Action Plan SNAP and are focused on the Southbridge Core Study Area.

Quick Action Item recommendations focus on the installation of signing and marking and related law enforcement as a first step to accomplish the Southbridge Transportation Action Plan's objectives.

Signing and Marking Recommendations:

- Install and enforce "No Truck Parking" signs along:
  - Bradford Street
  - Garasches Lane
  - D Street
  - S. Claymont Avenue
  - Townsend Street
  - A Street from Walnut Street to Christina Avenue

- Way finding and truck routing signing:
  - Install truck wayfinding signs outside study area directing trucks to 95 or 495
  - Install truck route wayfinding signs on northbound New Castle Avenue, south of Terminal Avenue, directing trucks to Terminal Avenue toward Christina Ave, Rte. 9 northbound

KLEINFELDER Plaza 273. 56 West Main Street, Suite 100-A, Newark, DE 19702 p | 302.525.6022

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Appendix D: City of Wilmington Parking Ordinance

Sec. 37-233. - Parking commercial vehicles, recreational vehicles and boats.

No person shall park an oversized commercial or recreational vehicle, classified as an 11,000 pound registered vehicle weight or more or 20 feet in length or more, nor any boat, regardless of its weight or dimensions, at any time, on any day on any street in the city except during the time that such vehicle is actually loading or unloading or unless the driver has a lawful street storage permit issued by the department of licenses and inspections. This provision also pertains to all trailer coaches, semi-trailers and tractor trailers, regardless of size or purpose. Any person who violates the provisions of this section shall be subject to a civil penalty not less than the amount established at Level 18 for the first offense and not less than the amount established at level 20 for the second and each subsequent offense. Violators are subject to the immobilization and towing penalties and procedures as set forth in section 37-125, and the provisions of this section may be enforced by any parking enforcement officer or member of the city police department.

(Code 1968, § 37-50; Ord. No. 93-046, § 1(v), 7-8-93; Ord. No. 98-091(sub 2), § 1, 9-30-98; Ord. No. 01-044, § 1, 5-17-01; Ord. No. 01-056, § 1, 5-17-01; Ord. No. 06-055, § 2, 12-13-06; Ord. No. 09-011, § 1(Exh. A), 5-21-09; Ord. No. 10-048, § 28, 7-8-10; Ord. No. 15-008, § 1, 4-16-15)

Appendix E: Transit Access to Jobs and Services

		Within a quarter mile of bus stops (5 minute walkshed)			Within a half mile of bus stops (10 minute walkshed)		
		Supermarkets	**Entry Level Job Clusters**	**Entry Level Jobs**	**Supermarkets**	**Entry Level Job Clusters**	**Entry Level Jobs**
	Core Routes	8	37	46,500	14	48	55,800
	Greater Routes	35	90	92,700	39	116	116,850
	Greater Without Core	23	54	48,300	26	76	68,600
	All Routes	31	91	94,800	40	124	124,400
Routes Serving Core Study Area	Route 8	0	10	16,750	4	15	24,050
	Route 14	1	17	24,300	3	19	24,900
	Route 15	3	19	21,750	3	24	37,450
	Route 51	6	14	20,450	7	21	32,050
Routes Serving Greater Study Area	Route 10	7	20	31,050	8	29	41,300
	Route 13	8	22	25,100	9	30	28,700
	Route 18	10	22	25,300	13	36	41,150
	Route 25	6	20	29,300	7	26	31,700
	Route 28	6	15	28,000	7	25	38,300
	Route 33	5	19	35,500	7	29	54,300
	Route 37	4	12	21,900	7	23	28,400
	Route 40	7	30	28,850	11	37	31,250
	Route 42	3	16	23,650	4	20	24,950
			Sources				
			DART routes and stops from May 2023 service change				
			Destinations identified by CADSR in 2022				

Appendix F: Cost Estimates

Cost Estimate Summary

Southbridge Transportation Action Plan D Street Sweep

	Funded Amount (CTP):	Current Estimate	% Difference
Preliminary Engineering		$178,470.00	
Right-of-Way		$20,000.00	
Total Construction		$1,315,822.58	

Contractor Items*	$713,888.15		* From TrnsPort
Const. Contingency	$178,472.04	@	25.00%
CE**	$257,472.04	@	36.07%
Traffic	$35,000.00		
Utilities	$75,000.00		
Planting	$50,000.00		
Env. Performance	$0.00		
QA/QC for HMA	$341.95		
Asphalt Cost Adj	$5,648.40		
Total Need:	$1,315,822.58		

** CE costs consist of the following:

Advertisement	$1,000.00
Construction inspection services	$107,083.22
Construction engineering services	$71,388.82
E&S Inspection services	$63,000.00
Pipe Video Inspection Services	$0.00
Materials and Research Insp. Services	$15,000.00
Misc. Construction Items	$0.00

Primavera Estimate Data

Preliminary Engineering	$178,470.00
Right-of-Way	$20,000.00
Construction	$1,315,822.58
Contingency	$184,462.39
CE	$257,472.04
Traffic	$35,000.00
Utilities	$75,000.00

Southbridge Transportation Action Plan
D Street Sweep
TBD
Conceptual Cost Estimate 06/02/2023

ITEM #	TITLE	UNIT	ESTIMATE COST	UNIT QUANTITY	TOTAL
201000	CLEARING AND GRUBBING	LS	$15,000.00	1.00	$15,000.00
202000	EXCAVATION AND EMBANKMENT	CY	$40.00	1873.00	$74,920.00
202003	UNDERCUT EXCAVATION	CY	$60.00	90.00	$5,400.00
204000	TEST HOLE	CY	$60.00	11.00	$660.00
209001	BORROW, TYPE A	CY	$30.00	220.00	$6,600.00
209006	BORROW, TYPE F	CY	$25.00	1081.00	$27,025.00
211001	REMOVAL OF PORTLAND CEMENT CONCRETE PAVEMENT, CURB AND SIDEWALK	SY	$35.00	220.00	$7,700.00
301001	GABC	CY	$85.00	414.00	$35,190.00
401006	SUPERPAVE TYPE C, PG 70-22 (CARBONATE STONE)	TON	$140.00	593.00	$83,020.00
401015	SUPERPAVE TYPE B, PG 70-22	TON	$125.00	155.00	$19,375.00
401021	SUPERPAVE TYPE BCBC, PG 64-22	TON	$100.00	229.00	$22,900.00
401030	SUPERPAVE TYPE B, PG 64-22, PATCHING	TON	$200.00	105.00	$21,000.00
401031	SUPERPAVE TYPE BCBC, PG 64-22, PATCHING	TON	$200.00	155.00	$31,000.00
601032	REINFORCED CONCRETE PIPE, 15", CLASS IV	LF	$70.00	100.00	$7,000.00
601033	REINFORCED CONCRETE PIPE, 18", CLASS IV	LF	$85.00	0.00	$0.00
602003	DRAINAGE INLET, 34" X 24"	EACH	$4,500.00	4.00	$18,000.00
701013	PCC CURB, TYPE 1-8	LF	$36.00	2032.00	$73,152.00
705001	PCC SIDEWALK, 4"	SF	$11.00	0.00	$0.00
705002	PCC SIDEWALK, 6"	SF	$15.00	6479.00	$97,185.00
705007	DETECTABLE WARNING SURFACE	SF	$50.00	101.00	$5,050.00
762000	SAW CUTTING, BITUMINOUS CONCRETE	LF	$2.50	0.00	$0.00
762001	SAW CUTTING, CONCRETE, FULL DEPTH	LF	$5.00	2129.00	$10,645.00
817002	PERMANENT PAVEMENT STRIPING, SYMBOL/LEGEND, ALKYD-THERMOPLASTIC	SF	$15.00	936.00	$14,040.00
817013	PERMANENT PAVEMENT STRIPING, EPOXY RESIN PAINT, WHITE/YELLOW, 5"	LF	$0.80	3200.00	$2,560.00
905004	INLET SEDIMENT CONTROL, DRAINAGE INLET	EACH	$150.00	4.00	$600.00
908004	TOPSOIL, 6" DEPTH	SY	$15.00	720.00	$10,800.00
908014	PERMANENT GRASS SEEDING, DRY GROUND	SY	$1.00	80.00	$80.00
908017	TEMPORARY GRASS SEEDING	SY	$0.75	240.00	$180.00
850003	LUMINAIRE (HPS), 150 WATTS	EACH	$13,000.00	0.00	$0.00
999999	MAINTENANCE OF TRAFFIC	LS	$75,000.00	1.00	$75,000.00
999999	SIGNALS	EACH	$300,000.00	0.00	$0.00
	Subtotal				**$664,082.00**
763000	Initial Expense (5%)	L.S.	$33,204.10	1	$33,204.10
763501	Construction Engineering (2.5%)	L.S.	$16,602.05	1	$16,602.05
	TOTAL BASE FOR PROJECT				**$713,888.15**
	CONSTRUCTION CONTINGENCY	25%	$178,472.04	1	$178,472.04
	TRAFFIC (FROM TRAFFIC STATEMENT)	L.S.	$35,000.00	1	$35,000.00
	UTILITY	L.S.	$75,000.00	1	$75,000.00
	PLANTING	L.S.	$50,000.00	1	$50,000.00
	QA/QC for HMA	L.S.	$341.95	1	$341.95
	Asphalt Cost Adj	L.S.	$5,648.40	1	$5,648.40
	CONSTRUCTION ENGINEERING - (INSPECTION, CE, ETC)	L.S.	$257,472.04	1	$257,472.04
	TOTAL CONSTRUCTION COST				**$1,315,822.58**
	PROJECT DEVELOPMENT	L.S.	$71,390.00	1	$71,390.00
	PRELIMINARY ENGINEERING (DESIGN)	L.S.	$107,080.00	1	$107,080.00
	ROW COSTS	SF	$300,000.00	1	$20,000.00
				TOTAL BASE CONSTRUCTION COST	**$1,514,292.58**

CENTURY ENGINEERING
A Kleinfelder Company

Cost Estimate Summary

Southbridge Transportation Action Plan Road Diet Heald Street

	Funded Amount (CTP):	Current Estimate	% Difference
Preliminary Engineering		$818,550.00	
Right-of-Way		$300,000.00	
Total Construction		$6,045,474.99	

Contractor Items*	$3,274,221.56		* From TrnsPort
Const. Contingency	$818,555.39	@	25.00%
CE**	$897,555.39	@	27.41%
Traffic	$150,000.00		
Utilities	$400,000.00		
Planting	$500,000.00		
Env. Performance	$0.00		
QA/QC for HMA	$220.85		
Asphalt Cost Adj	$4,921.80		
Total Need:	$6,045,474.99		

** CE costs consist of the following:

Advertisement	$1,000.00
Construction inspection services	$491,133.23
Construction engineering services	$327,422.16
E&S Inspection services	$63,000.00
Pipe Video Inspection Services	$0.00
Materials and Research Insp. Services	$15,000.00
Misc. Construction Items	$0.00

Primavera Estimate Data

Preliminary Engineering	$818,550.00
Right-of-Way	$300,000.00
Construction	$6,045,474.99
Contingency	$823,698.04
CE	$897,555.39
Traffic	$150,000.00
Utilities	$400,000.00

Southbridge Transportation Action Plan
Road Diet Heald Street

TBD

Conceptual Cost Estimate 4/18/2023

ITEM #	TITLE	UNIT	ESTIMATE COST	UNIT QUANTITY	TOTAL
201000	CLEARING AND GRUBBING	LS	$75,000.00	1.00	$75,000.00
202000	EXCAVATION AND EMBANKMENT	CY	$40.00	1177.00	$47,080.00
202003	UNDERCUT EXCAVATION	CY	$60.00	57.00	$3,420.00
204000	TEST HOLE	CY	$60.00	11.00	$660.00
209001	BORROW, TYPE A	CY	$30.00	220.00	$6,600.00
211001	REMOVAL OF PORTLAND CEMENT CONCRETE PAVEMENT, CURB AND SIDEWALK	SY	$35.00	220.00	$7,700.00
301001	GABC	CY	$85.00	1234.00	$104,890.00
401006	SUPERPAVE TYPE C, PG 70-22 (CARBONATE STONE)	TON	$140.00	631.00	$88,340.00
401015	SUPERPAVE TYPE B, PG 70-22	TON	$125.00	0.00	$0.00
401021	SUPERPAVE TYPE BCBC, PG 64-22	TON	$100.00	0.00	$0.00
401030	SUPERPAVE TYPE B, PG 64-22, PATCHING	TON	$200.00	138.00	$27,600.00
401031	SUPERPAVE TYPE BCBC, PG 64-22, PATCHING	TON	$200.00	271.00	$54,200.00
601032	REINFORCED CONCRETE PIPE, 15", CLASS IV	LF	$70.00	200.00	$14,000.00
601033	REINFORCED CONCRETE PIPE, 18", CLASS IV	LF	$85.00	500.00	$42,500.00
602003	DRAINAGE INLET, 34" X 24"	EACH	$4,500.00	20.00	$90,000.00
701013	PCC CURB, TYPE 1-8	LF	$36.00	3360.00	$120,960.00
705001	PCC SIDEWALK, 4"	SF	$11.00	0.00	$0.00
705002	PCC SIDEWALK, 6"	SF	$15.00	53760.00	$806,400.00
705007	DETECTABLE WARNING SURFACE	SF	$50.00	404.00	$20,200.00
762000	SAW CUTTING, BITUMINOUS CONCRETE	LF	$2.50	0.00	$0.00
762001	SAW CUTTING, CONCRETE, FULL DEPTH	LF	$5.00	3740.00	$18,700.00
817002	PERMANENT PAVEMENT STRIPING, SYMBOL/LEGEND, ALKYD-THERMOPLASTIC	SF	$15.00	3744.00	$56,160.00
817013	PERMANENT PAVEMENT STRIPING, EPOXY RESIN PAINT, WHITE/YELLOW, 5"	LF	$0.80	5100.00	$4,080.00
905004	INLET SEDIMENT CONTROL, DRAINAGE INLET	EACH	$150.00	20.00	$3,000.00
908004	TOPSOIL, 6" DEPTH	SY	$15.00	234.00	$3,510.00
908014	PERMANENT GRASS SEEDING, DRY GROUND	SY	$1.00	234.00	$234.00
908017	TEMPORARY GRASS SEEDING	SY	$0.75	738.00	$553.50
850003	LUMINAIRE (HPS), 150 WATTS	EACH	$13,000.00	0.00	$0.00
999999	MAINTENANCE OF TRAFFIC	LS	$250,000.00	1.00	$250,000.00
999999	SIGNALS	EACH	$300,000.00	4.00	$1,200,000.00
	Subtotal				**$3,045,787.50**
763000	Initial Expense (5%)	L.S.	$152,289.38	1	$152,289.38
763501	Construction Engineering (2.5%)	L.S.	$76,144.69	1	$76,144.69
	TOTAL BASE FOR PROJECT				**$3,274,221.56**
	CONSTRUCTION CONTINGENCY	25%	$818,555.39	1	$818,555.39
	TRAFFIC (FROM TRAFFIC STATEMENT)	L.S.	$150,000.00	1	$150,000.00
	UTILITY	L.S.	$400,000.00	1	$400,000.00
	PLANTING	L.S.	$500,000.00	1	$500,000.00
	QA/QC for HMA	L.S.	$220.85	1	$220.85
	Asphalt Cost Adj	L.S.	$4,921.80	1	$4,921.80
	CONSTRUCTION ENGINEERING - (INSPECTION, CE, ETC)	L.S.	$897,555.39	1	$897,555.39
	TOTAL CONSTRUCTION COST				**$6,045,474.99**
	PROJECT DEVELOPMENT	L.S.	$327,420.00	1	$327,420.00
	PRELIMINARY ENGINEERING (DESIGN)	L.S.	$491,130.00	1	$491,130.00
	ROW COSTS	SF	$300,000.00	1	$300,000.00
	TOTAL BASE CONSTRUCTION COST				**$7,164,024.99**

Cost Estimate Summary

Southbridge Transportation Action Plan Road Diet New Castle Ave

	Funded Amount (CTP):	Current Estimate	% Difference
Preliminary Engineering		$692,750.00	
Right-of-Way		$300,000.00	
Total Construction		$5,290,291.24	

Contractor Items*	$2,770,966.76		* From TrnsPort
Const. Contingency	$692,741.69	@	25.00%
CE**	$771,741.69	@	27.85%
Traffic	$150,000.00		
Utilities	$400,000.00		
Planting	$500,000.00		
Env. Performance	$0.00		
QA/QC for HMA	$207.90		
Asphalt Cost Adj	$4,633.20		
Total Need:	$5,290,291.24		

** CE costs consist of the following:

Advertisement	$1,000.00
Construction inspection services	$415,645.01
Construction engineering services	$277,096.68
E&S Inspection services	$63,000.00
Pipe Video Inspection Services	$0.00
Materials and Research Insp. Services	$15,000.00
Misc. Construction Items	$0.00

Primavera Estimate Data

Preliminary Engineering	$692,750.00
Right-of-Way	$300,000.00
Construction	$5,290,291.24
Contingency	$697,582.79
CE	$771,741.69
Traffic	$150,000.00
Utilities	$400,000.00

CENTURY ENGINEERING
A Kleinfelder Company

Southbridge Transportation Action Plan
Road Diet New Castle Ave

TBD

Conceptual Cost Estimate 4/18/2023

ITEM #	TITLE	UNIT	ESTIMATE COST	UNIT QUANTITY	TOTAL
201000	CLEARING AND GRUBBING	LS	$75,000.00	1.00	$75,000.00
202000	EXCAVATION AND EMBANKMENT	CY	$40.00	1206.00	$48,240.00
202003	UNDERCUT EXCAVATION	CY	$60.00	58.00	$3,480.00
204000	TEST HOLE	CY	$60.00	11.00	$660.00
209001	BORROW, TYPE A	CY	$30.00	220.00	$6,600.00
211001	REMOVAL OF PORTLAND CEMENT CONCRETE PAVEMENT, CURB AND SIDEWALK	SY	$35.00	220.00	$7,700.00
301001	GABC	CY	$85.00	1040.00	$88,400.00
401006	SUPERPAVE TYPE C, PG 70-22 (CARBONATE STONE)	TON	$140.00	594.00	$83,160.00
401015	SUPERPAVE TYPE B, PG 70-22	TON	$125.00	0.00	$0.00
401021	SUPERPAVE TYPE BCBC, PG 64-22	TON	$100.00	0.00	$0.00
401030	SUPERPAVE TYPE B, PG 64-22, PATCHING	TON	$200.00	129.00	$25,800.00
401031	SUPERPAVE TYPE BCBC, PG 64-22, PATCHING	TON	$200.00	255.00	$51,000.00
601032	REINFORCED CONCRETE PIPE, 15", CLASS IV	LF	$70.00	200.00	$14,000.00
601033	REINFORCED CONCRETE PIPE, 18", CLASS IV	LF	$85.00	500.00	$42,500.00
602003	DRAINAGE INLET, 34" X 24"	EACH	$4,500.00	20.00	$90,000.00
701013	PCC CURB, TYPE 1-8	LF	$36.00	2636.00	$94,896.00
705001	PCC SIDEWALK, 4"	SF	$11.00	0.00	$0.00
705002	PCC SIDEWALK, 6"	SF	$15.00	46074.00	$691,110.00
705007	DETECTABLE WARNING SURFACE	SF	$50.00	404.00	$20,200.00
762000	SAW CUTTING, BITUMINOUS CONCRETE	LF	$2.50	0.00	$0.00
762001	SAW CUTTING, CONCRETE, FULL DEPTH	LF	$5.00	3520.00	$17,600.00
817002	PERMANENT PAVEMENT STRIPING, SYMBOL/LEGEND, ALKYD-THERMOPLASTIC	SF	$15.00	3744.00	$56,160.00
817013	PERMANENT PAVEMENT STRIPING, EPOXY RESIN PAINT, WHITE/YELLOW, 5"	LF	$0.80	4800.00	$3,840.00
905004	INLET SEDIMENT CONTROL, DRAINAGE INLET	EACH	$150.00	20.00	$3,000.00
908004	TOPSOIL, 6" DEPTH	SY	$15.00	234.00	$3,510.00
908014	PERMANENT GRASS SEEDING, DRY GROUND	SY	$1.00	234.00	$234.00
908017	TEMPORARY GRASS SEEDING	SY	$0.75	738.00	$553.50
850003	LUMINAIRE (HPS), 150 WATTS	EACH	$13,000.00	0.00	$0.00
999999	MAINTENANCE OF TRAFFIC	LS	$250,000.00	1.00	$250,000.00
999999	SIGNALS	EACH	$300,000.00	3.00	$900,000.00
	Subtotal				**$2,577,643.50**
763000	Initial Expense (5%)	L.S.	$128,882.18	1	$128,882.18
763501	Construction Engineering (2.5%)	L.S.	$64,441.09	1	$64,441.09
	TOTAL BASE FOR PROJECT				**$2,770,966.76**
	CONSTRUCTION CONTINGENCY	25%	$692,741.69	1	$692,741.69
	TRAFFIC (FROM TRAFFIC STATEMENT)	L.S.	$150,000.00	1	$150,000.00
	UTILITY	L.S.	$400,000.00	1	$400,000.00
	PLANTING	L.S.	$500,000.00	1	$500,000.00
	QA/QC for HMA	L.S.	$207.90	1	$207.90
	Asphalt Cost Adj	L.S.	$4,633.20	1	$4,633.20
	CONSTRUCTION ENGINEERING - (INSPECTION, CE, ETC)	L.S.	$771,741.69	1	$771,741.69
	TOTAL CONSTRUCTION COST				**$5,290,291.24**
	PROJECT DEVELOPMENT	L.S.	$277,100.00	1	$277,100.00
	PRELIMINARY ENGINEERING (DESIGN)	L.S.	$415,650.00	1	$415,650.00
	ROW COSTS	SF	$300,000.00	1	$300,000.00
TOTAL BASE CONSTRUCTION COST					**$6,283,041.24**

Cost Estimate Summary

Southbridge Transportation Action Plan Raised Intersection - Average Price

	Funded Amount (CTP):	Current Estimate	% Difference
Preliminary Engineering		$87,770.00	
Right-of-Way		$30,000.00	
Total Construction		$600,966.96	

Contractor Items*	$351,070.28		* From TrnsPort
Const. Contingency	$87,767.57	@	25.00%
CE**	$135,267.57	@	38.53%
Traffic	$0.00		
Utilities	$25,000.00		
Planting	$0.00		
Env. Performance	$0.00		
QA/QC for HMA	$168.35		
Asphalt Cost Adj	$1,693.20		
Total Need:	$600,966.96		

** CE costs consist of the following:

Advertisement	$1,000.00
Construction inspection services	$52,660.54
Construction engineering services	$35,107.03
E&S Inspection services	$31,500.00
Pipe Video Inspection Services	$0.00
Materials and Research Insp. Services	$15,000.00
Misc. Construction Items	$0.00

Primavera Estimate Data

Preliminary Engineering	$87,770.00
Right-of-Way	$30,000.00
Construction	$600,966.96
Contingency	$89,629.12
CE	$135,267.57
Traffic	$0.00
Utilities	$25,000.00

CENTURY ENGINEERING
A Kleinfelder Company

Southbridge Transportation Action Plan
Raised Intersection - Average Price

TBD

Conceptual Cost Estimate 06/02/2023

ITEM #	TITLE	UNIT	ESTIMATE COST	UNIT QUANTITY	TOTAL
201000	CLEARING AND GRUBBING	LS	$5,000.00	1.00	$5,000.00
202000	EXCAVATION AND EMBANKMENT	CY	$40.00	513.00	$20,520.00
202003	UNDERCUT EXCAVATION	CY	$60.00	25.00	$1,500.00
204000	TEST HOLE	CY	$60.00	11.00	$660.00
209001	BORROW, TYPE A	CY	$30.00	318.00	$9,540.00
211001	REMOVAL OF PORTLAND CEMENT CONCRETE PAVEMENT, CURB AND SIDEWALK	SY	$35.00	318.00	$11,130.00
301001	GABC	CY	$85.00	453.00	$38,505.00
401006	SUPERPAVE TYPE C, PG 70-22 (CARBONATE STONE)	TON	$140.00	80.00	$11,200.00
401015	SUPERPAVE TYPE B, PG 70-22	TON	$125.00	162.00	$20,250.00
401021	SUPERPAVE TYPE BCBC, PG 64-22	TON	$100.00	239.00	$23,900.00
401030	SUPERPAVE TYPE B, PG 64-22, PATCHING	TON	$200.00	0.00	$0.00
401031	SUPERPAVE TYPE BCBC, PG 64-22, PATCHING	TON	$200.00	0.00	$0.00
601032	REINFORCED CONCRETE PIPE, 15", CLASS IV	LF	$70.00	20.00	$1,400.00
601033	REINFORCED CONCRETE PIPE, 18", CLASS IV	LF	$85.00	0.00	$0.00
602003	DRAINAGE INLET, 34" X 24"	EACH	$4,500.00	2.00	$9,000.00
701013	PCC CURB, TYPE 1-8	LF	$36.00	231.00	$8,316.00
705001	PCC SIDEWALK, 4"	SF	$11.00	0.00	$0.00
705002	PCC SIDEWALK, 6"	SF	$15.00	2310.00	$34,650.00
705007	DETECTABLE WARNING SURFACE	SF	$50.00	101.00	$5,050.00
705506	BRICK AND/OR BLOCK ROADWAY	SF	$40.00	1890.00	$75,600.00
762000	SAW CUTTING, BITUMINOUS CONCRETE	LF	$2.50	198.00	$495.00
762001	SAW CUTTING, CONCRETE, FULL DEPTH	LF	$5.00	0.00	$0.00
817002	PERMANENT PAVEMENT STRIPING, SYMBOL/LEGEND, ALKYD-THERMOPLASTIC	SF	$15.00	936.00	$14,040.00
817013	PERMANENT PAVEMENT STRIPING, EPOXY RESIN PAINT, WHITE/YELLOW, 5"	LF	$0.80	100.00	$80.00
905004	INLET SEDIMENT CONTROL, DRAINAGE INLET	EACH	$150.00	2.00	$300.00
908004	TOPSOIL, 6" DEPTH	SY	$15.00	24.00	$360.00
908014	PERMANENT GRASS SEEDING, DRY GROUND	SY	$1.00	24.00	$24.00
908017	TEMPORARY GRASS SEEDING	SY	$0.75	76.00	$57.00
850003	LUMINAIRE (HPS), 150 WATTS	EACH	$13,000.00	0.00	$0.00
999999	MAINTENANCE OF TRAFFIC	LS	$35,000.00	1.00	$35,000.00
999999	SIGNALS	EACH	$300,000.00	0.00	$0.00
	Subtotal				**$326,577.00**
763000	Initial Expense (5%)	L.S.	$16,328.85	1	$16,328.85
763501	Construction Engineering (2.5%)	L.S.	$8,164.43	1	$8,164.43
	TOTAL BASE FOR PROJECT				**$351,070.28**
	CONSTRUCTION CONTINGENCY	25%	$87,767.57	1	$87,767.57
	TRAFFIC (FROM TRAFFIC STATEMENT)	L.S.	$0.00	1	$0.00
	UTILITY	L.S.	$25,000.00	1	$25,000.00
	PLANTING	L.S.	$0.00	1	$0.00
	QA/QC for HMA	L.S.	$168.35	1	$168.35
	Asphalt Cost Adj	L.S.	$1,693.20	1	$1,693.20
	CONSTRUCTION ENGINEERING - (INSPECTION, CE, ETC)	L.S.	$135,267.57	1	$135,267.57
	TOTAL CONSTRUCTION COST				**$600,966.96**
	PROJECT DEVELOPMENT	L.S.	$35,110.00	1	$35,110.00
	PRELIMINARY ENGINEERING (DESIGN)	L.S.	$52,660.00	1	$52,660.00
	ROW COSTS	SF	$300,000.00	1	$30,000.00
TOTAL BASE CONSTRUCTION COST					**$718,736.96**

Cost Estimate Summary **Southbridge**
Transportation Action Plan Terminal Ave
Intersection Improvement

	Funded Amount (CTP):	Current Estimate	% Difference
Preliminary Engineering		$221,500.00	
Right-of-Way		$0.00	
Total Construction		$1,577,944.19	

Contractor Items*	$886,022.53		* From TrnsPort
Const. Contingency	$221,505.63	@	25.00%
CE**	$300,505.63	@	33.92%
Traffic	$35,000.00		
Utilities	$75,000.00		
Planting	$50,000.00		
Env. Performance	$0.00		
QA/QC for HMA	$425.60		
Asphalt Cost Adj	$9,484.80		
Total Need:	$1,577,944.19		

** CE costs consist of the following:

Advertisement	$1,000.00
Construction inspection services	$132,903.38
Construction engineering services	$88,602.25
E&S Inspection services	$63,000.00
Pipe Video Inspection Services	$0.00
Materials and Research Insp. Services	$15,000.00
Misc. Construction Items	$0.00

Primavera Estimate Data

Preliminary Engineering	$221,500.00
Right-of-Way	$0.00
Construction	$1,577,944.19
Contingency	$231,416.03
CE	$300,505.63
Traffic	$35,000.00
Utilities	$75,000.00

Southbridge Transportation Action Plan
Terminal Ave Intersection Improvement
TBD
Conceptual Cost Estimate 4/18/2023

ITEM #	TITLE	UNIT	ESTIMATE COST	UNIT QUANTITY	TOTAL
201000	CLEARING AND GRUBBING	LS	$15,000.00	1.00	$15,000.00
202000	EXCAVATION AND EMBANKMENT	CY	$40.00	831.00	$33,240.00
202003	UNDERCUT EXCAVATION	CY	$60.00	40.00	$2,400.00
204000	TEST HOLE	CY	$60.00	11.00	$660.00
209001	BORROW, TYPE A	CY	$30.00	220.00	$6,600.00
209006	BORROW, TYPE F	CY	$25.00	355.00	$8,875.00
211001	REMOVAL OF PORTLAND CEMENT CONCRETE PAVEMENT, CURB AND SIDEWALK	SY	$35.00	220.00	$7,700.00
301001	GABC	CY	$85.00	157.00	$13,345.00
401006	SUPERPAVE TYPE C, PG 70-22 (CARBONATE STONE)	TON	$140.00	1216.00	$170,240.00
401015	SUPERPAVE TYPE B, PG 70-22	TON	$125.00	0.00	$0.00
401021	SUPERPAVE TYPE BCBC, PG 64-22	TON	$100.00	0.00	$0.00
401030	SUPERPAVE TYPE B, PG 64-22, PATCHING	TON	$200.00	80.00	$16,000.00
401031	SUPERPAVE TYPE BCBC, PG 64-22, PATCHING	TON	$200.00	118.00	$23,600.00
601032	REINFORCED CONCRETE PIPE, 15", CLASS IV	LF	$70.00	100.00	$7,000.00
601033	REINFORCED CONCRETE PIPE, 18", CLASS IV	LF	$85.00	0.00	$0.00
602003	DRAINAGE INLET, 34" X 24"	EACH	$4,500.00	2.00	$9,000.00
701013	PCC CURB, TYPE 1-8	LF	$36.00	1554.00	$55,944.00
705001	PCC SIDEWALK, 4"	SF	$11.00	0.00	$0.00
705002	PCC SIDEWALK, 6"	SF	$15.00	2515.00	$37,725.00
705007	DETECTABLE WARNING SURFACE	SF	$50.00	135.00	$6,750.00
762000	SAW CUTTING, BITUMINOUS CONCRETE	LF	$2.50	0.00	$0.00
762001	SAW CUTTING, CONCRETE, FULL DEPTH	LF	$5.00	1628.00	$8,140.00
817002	PERMANENT PAVEMENT STRIPING, SYMBOL/LEGEND, ALKYD-THERMOPLASTIC	SF	$15.00	824.00	$12,360.00
817013	PERMANENT PAVEMENT STRIPING, EPOXY RESIN PAINT, WHITE/YELLOW, 5"	LF	$0.80	3200.00	$2,560.00
905004	INLET SEDIMENT CONTROL, DRAINAGE INLET	EACH	$150.00	2.00	$300.00
908004	TOPSOIL, 6" DEPTH	SY	$15.00	766.00	$11,490.00
908014	PERMANENT GRASS SEEDING, DRY GROUND	SY	$1.00	86.00	$86.00
908017	TEMPORARY GRASS SEEDING	SY	$0.75	256.00	$192.00
850003	LUMINAIRE (HPS), 150 WATTS	EACH	$13,000.00	0.00	$0.00
999999	MAINTENANCE OF TRAFFIC	LS	$75,000.00	1.00	$75,000.00
999999	SIGNALS	EACH	$300,000.00	1.00	$300,000.00
	Subtotal				**$824,207.00**
763000	Initial Expense (5%)	L.S.	$41,210.35	1	$41,210.35
763501	Construction Engineering (2.5%)	L.S.	$20,605.18	1	$20,605.18
	TOTAL BASE FOR PROJECT				**$886,022.53**
	CONSTRUCTION CONTINGENCY	25%	$221,505.63	1	$221,505.63
	TRAFFIC (FROM TRAFFIC STATEMENT)	L.S.	$35,000.00	1	$35,000.00
	UTILITY	L.S.	$75,000.00	1	$75,000.00
	PLANTING	L.S.	$50,000.00	1	$50,000.00
	QA/QC for HMA	L.S.	$425.60	1	$425.60
	Asphalt Cost Adj	L.S.	$9,484.80	1	$9,484.80
	CONSTRUCTION ENGINEERING - (INSPECTION, CE, ETC)	L.S.	$300,505.63	1	$300,505.63
	TOTAL CONSTRUCTION COST				**$1,577,944.19**
	PROJECT DEVELOPMENT	L.S.	$88,600.00	1	$88,600.00
	PRELIMINARY ENGINEERING (DESIGN)	L.S.	$132,900.00	1	$132,900.00
	ROW COSTS	SF	$300,000.00	1	$0.00
TOTAL BASE CONSTRUCTION COST					**$1,799,444.19**

CENTURY ENGINEERING
A Kleinfelder Company

Cost Estimate Summary

Southbridge Transportation Action Plan Eden Park Path

	Funded Amount (CTP):	Current Estimate	% Difference
Preliminary Engineering		$51,360.00	
Right-of-Way		$0.00	
Total Construction		$321,672.94	

Contractor Items*	$205,448.63		* From TrnsPort
Const. Contingency	$51,362.16	@	25.00%
CE**	$64,862.16	@	31.57%
Traffic	$0.00		
Utilities	$0.00		
Planting	$0.00		
Env. Performance	$0.00		
QA/QC for HMA	$0.00		
Asphalt Cost Adj	$0.00		
Total Need:	$321,672.94		

** CE costs consist of the following:

Advertisement	$1,000.00
Construction inspection services	$30,817.29
Construction engineering services	$20,544.86
E&S Inspection services	$10,500.00
Pipe Video Inspection Services	$0.00
Materials and Research Insp. Services	$2,000.00
Misc. Construction Items	$0.00

Primavera Estimate Data

Preliminary Engineering	$51,360.00
Right-of-Way	$0.00
Construction	$321,672.94
Contingency	$51,362.16
CE	$64,862.16
Traffic	$0.00
Utilities	$0.00

CENTURY ENGINEERING
A Kleinfelder Company

Southbridge Transportation Action Plan
Eden Park Path
TBD
Conceptual Cost Estimate 4/18/2023

ITEM #	TITLE	UNIT	ESTIMATE COST	UNIT QUANTITY	TOTAL
201000	CLEARING AND GRUBBING	LS	$5,000.00	1.00	$5,000.00
202000	EXCAVATION AND EMBANKMENT	CY	$40.00	317.00	$12,680.00
202003	UNDERCUT EXCAVATION	CY	$60.00	16.00	$960.00
204000	TEST HOLE	CY	$60.00	0.00	$0.00
209001	BORROW, TYPE A	CY	$30.00	0.00	$0.00
209006	BORROW, TYPE F	CY	$25.00	0.00	$0.00
211001	REMOVAL OF PORTLAND CEMENT CONCRETE PAVEMENT, CURB AND SIDEWALK	SY	$35.00	0.00	$0.00
301001	GABC	CY	$85.00	136.00	$11,560.00
401006	SUPERPAVE TYPE C, PG 70-22 (CARBONATE STONE)	TON	$140.00	0.00	$0.00
401015	SUPERPAVE TYPE B, PG 70-22	TON	$125.00	0.00	$0.00
401021	SUPERPAVE TYPE BCBC, PG 64-22	TON	$100.00	0.00	$0.00
401030	SUPERPAVE TYPE B, PG 64-22, PATCHING	TON	$200.00	0.00	$0.00
401031	SUPERPAVE TYPE BCBC, PG 64-22, PATCHING	TON	$200.00	0.00	$0.00
601032	REINFORCED CONCRETE PIPE, 15", CLASS IV	LF	$70.00	0.00	$0.00
601033	REINFORCED CONCRETE PIPE, 18", CLASS IV	LF	$85.00	0.00	$0.00
602003	DRAINAGE INLET, 34" X 24"	EACH	$4,500.00	0.00	$0.00
701013	PCC CURB, TYPE 1-8	LF	$36.00	0.00	$0.00
705001	PCC SIDEWALK, 4"	SF	$11.00	0.00	$0.00
705002	PCC SIDEWALK, 6"	SF	$15.00	7324.00	$109,860.00
705007	DETECTABLE WARNING SURFACE	SF	$50.00	34.00	$1,700.00
762000	SAW CUTTING, BITUMINOUS CONCRETE	LF	$2.50	0.00	$0.00
762001	SAW CUTTING, CONCRETE, FULL DEPTH	LF	$5.00	0.00	$0.00
817002	PERMANENT PAVEMENT STRIPING, SYMBOL/LEGEND, ALKYD-THERMOPLASTIC	SF	$15.00	0.00	$0.00
817013	PERMANENT PAVEMENT STRIPING, EPOXY RESIN PAINT, WHITE/YELLOW, 5"	LF	$0.80	0.00	$0.00
905004	INLET SEDIMENT CONTROL, DRAINAGE INLET	EACH	$150.00	0.00	$0.00
908004	TOPSOIL, 6" DEPTH	SY	$15.00	1260.00	$18,900.00
908014	PERMANENT GRASS SEEDING, DRY GROUND	SY	$1.00	140.00	$140.00
908017	TEMPORARY GRASS SEEDING	SY	$0.75	420.00	$315.00
850003	LUMINAIRE (HPS), 150 WATTS	EACH	$0.00	0.00	$0.00
999999	MAINTENANCE OF TRAFFIC	LS	$0.00	0.00	$0.00
999999	RETAINING WALL	EACH	$30,000.00	1.00	$30,000.00
	Subtotal				**$191,115.00**
763000	Initial Expense (5%)	L.S.	$9,555.75	1	$9,555.75
763501	Construction Engineering (2.5%)	L.S.	$4,777.88	1	$4,777.88
	TOTAL BASE FOR PROJECT				**$205,448.63**
	CONSTRUCTION CONTINGENCY	25%	$51,362.16	1	$51,362.16
	TRAFFIC (FROM TRAFFIC STATEMENT)	L.S.	$0.00	1	$0.00
	UTILITY	L.S.	$0.00	1	$0.00
	PLANTING	L.S.	$0.00	1	$0.00
	QA/QC for HMA	L.S.	$0.00	1	$0.00
	Asphalt Cost Adj	L.S.	$0.00	1	$0.00
	CONSTRUCTION ENGINEERING - (INSPECTION, CE, ETC)	L.S.	$64,862.16	1	$64,862.16
	TOTAL CONSTRUCTION COST				**$321,672.94**
	PROJECT DEVELOPMENT	L.S.	$20,540.00	1	$20,540.00
	PRELIMINARY ENGINEERING (DESIGN)	L.S.	$30,820.00	1	$30,820.00
	ROW COSTS	SF	$300,000.00	1	$0.00
TOTAL BASE CONSTRUCTION COST					**$373,032.94**

Cost Estimate Summary

Southbridge Transportation Action Plan B Street Path

	Funded Amount (CTP):	Current Estimate	% Difference
Preliminary Engineering		$48,220.00	
Right-of-Way		$0.00	
Total Construction		$302,816.77	

Contractor Items*	$192,877.84		* From TrnsPort
Const. Contingency	$48,219.46	@	25.00%
CE**	$61,719.46	@	32.00%
Traffic	$0.00		
Utilities	$0.00		
Planting	$0.00		
Env. Performance	$0.00		
QA/QC for HMA	$0.00		
Asphalt Cost Adj	$0.00		
Total Need:	$302,816.77		

** CE costs consist of the following:

Advertisement	$1,000.00
Construction inspection services	$28,931.68
Construction engineering services	$19,287.78
E&S Inspection services	$10,500.00
Pipe Video Inspection Services	$0.00
Materials and Research Insp. Services	$2,000.00
Misc. Construction Items	$0.00

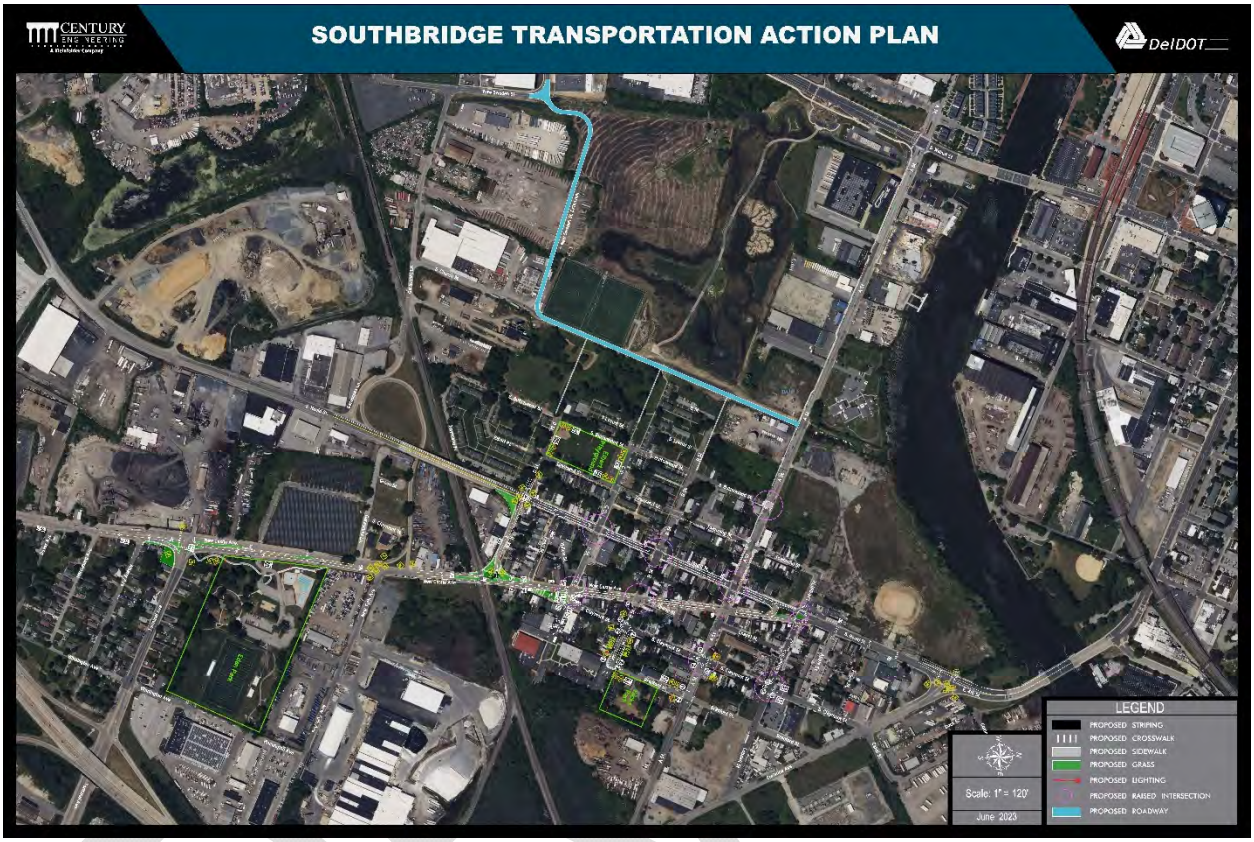
Primavera Estimate Data

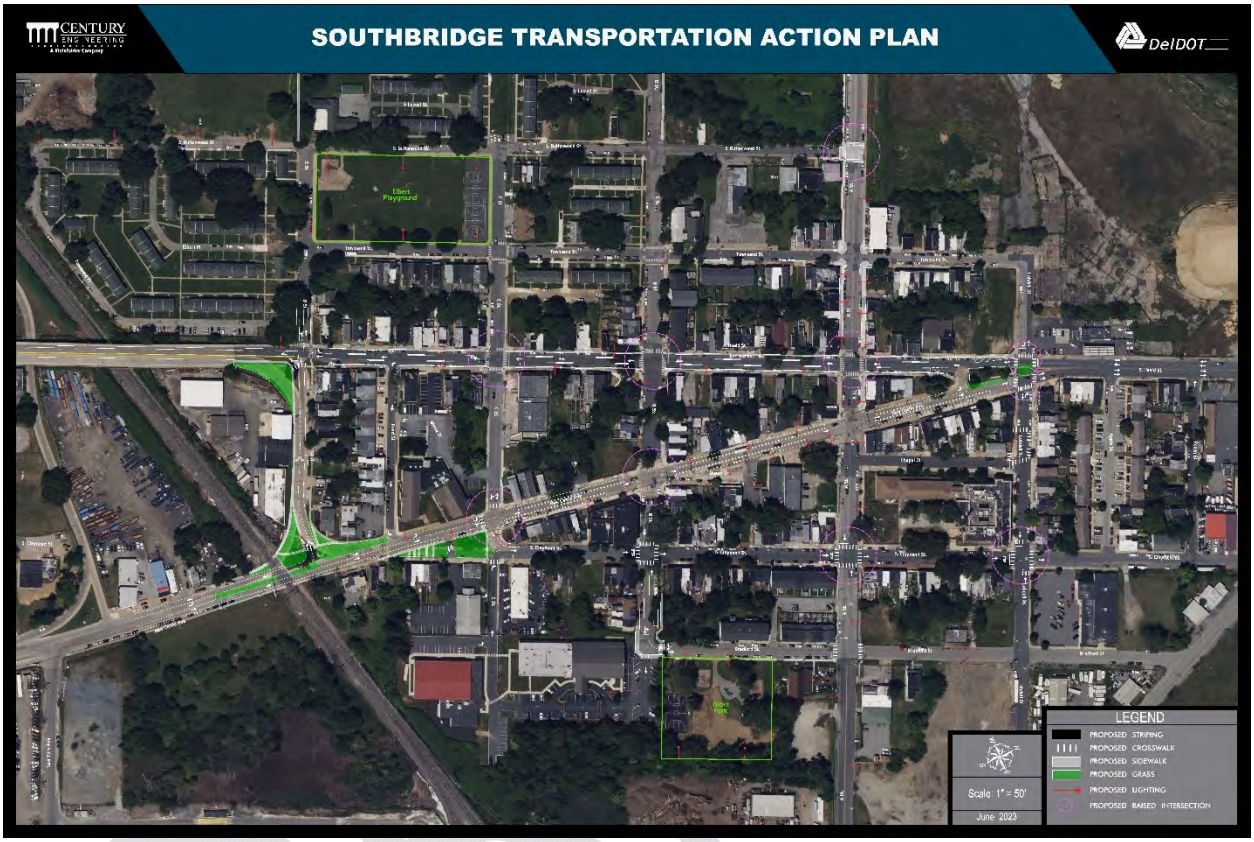
Preliminary Engineering	$48,220.00
Right-of-Way	$0.00
Construction	$302,816.77
Contingency	$48,219.46
CE	$61,719.46
Traffic	$0.00
Utilities	$0.00

Southbridge Transportation Action Plan
B Street Path
TBD
Conceptual Cost Estimate 4/18/2023

ITEM #	TITLE	UNIT	ESTIMATE COST	UNIT QUANTITY	TOTAL
201000	CLEARING AND GRUBBING	LS	$5,000.00	1.00	$5,000.00
202000	EXCAVATION AND EMBANKMENT	CY	$40.00	368.00	$14,720.00
202003	UNDERCUT EXCAVATION	CY	$60.00	18.00	$1,080.00
204000	TEST HOLE	CY	$60.00	0.00	$0.00
209001	BORROW, TYPE A	CY	$30.00	0.00	$0.00
209006	BORROW, TYPE F	CY	$25.00	0.00	$0.00
211001	REMOVAL OF PORTLAND CEMENT CONCRETE PAVEMENT, CURB AND SIDEWALK	SY	$35.00	0.00	$0.00
301001	GABC	CY	$85.00	158.00	$13,430.00
401006	SUPERPAVE TYPE C, PG 70-22 (CARBONATE STONE)	TON	$140.00	0.00	$0.00
401015	SUPERPAVE TYPE B, PG 70-22	TON	$125.00	0.00	$0.00
401021	SUPERPAVE TYPE BCBC, PG 64-22	TON	$100.00	0.00	$0.00
401030	SUPERPAVE TYPE B, PG 64-22, PATCHING	TON	$200.00	0.00	$0.00
401031	SUPERPAVE TYPE BCBC, PG 64-22, PATCHING	TON	$200.00	0.00	$0.00
601032	REINFORCED CONCRETE PIPE, 15", CLASS IV	LF	$70.00	0.00	$0.00
601033	REINFORCED CONCRETE PIPE, 18", CLASS IV	LF	$85.00	0.00	$0.00
602003	DRAINAGE INLET, 34" X 24"	EACH	$4,500.00	0.00	$0.00
701013	PCC CURB, TYPE 1-8	LF	$36.00	0.00	$0.00
705001	PCC SIDEWALK, 4"	SF	$11.00	0.00	$0.00
705002	PCC SIDEWALK, 6"	SF	$15.00	8516.00	$127,740.00
705007	DETECTABLE WARNING SURFACE	SF	$50.00	0.00	$0.00
762000	SAW CUTTING, BITUMINOUS CONCRETE	LF	$2.50	0.00	$0.00
762001	SAW CUTTING, CONCRETE, FULL DEPTH	LF	$5.00	0.00	$0.00
817002	PERMANENT PAVEMENT STRIPING, SYMBOL/LEGEND, ALKYD-THERMOPLASTIC	SF	$15.00	0.00	$0.00
817013	PERMANENT PAVEMENT STRIPING, EPOXY RESIN PAINT, WHITE/YELLOW, 5"	LF	$0.80	0.00	$0.00
905004	INLET SEDIMENT CONTROL, DRAINAGE INLET	EACH	$150.00	0.00	$0.00
908004	TOPSOIL, 6" DEPTH	SY	$15.00	1136.00	$17,040.00
908014	PERMANENT GRASS SEEDING, DRY GROUND	SY	$1.00	127.00	$127.00
908017	TEMPORARY GRASS SEEDING	SY	$0.75	379.00	$284.25
850003	LUMINAIRE (HPS), 150 WATTS	EACH	$0.00	0.00	$0.00
999999	MAINTENANCE OF TRAFFIC	LS	$0.00	0.00	$0.00
999999	RETAINING WALL	EACH	$0.00	0.00	$0.00
	Subtotal				**$179,421.25**
763000	Initial Expense (5%)	L.S.	$8,971.06	1	$8,971.06
763501	Construction Engineering (2.5%)	L.S.	$4,485.53	1	$4,485.53
	TOTAL BASE FOR PROJECT				**$192,877.84**
	CONSTRUCTION CONTINGENCY	25%	$48,219.46	1	$48,219.46
	TRAFFIC (FROM TRAFFIC STATEMENT)	L.S.	$0.00	1	$0.00
	UTILITY	L.S.	$0.00	1	$0.00
	PLANTING	L.S.	$0.00	1	$0.00
	QA/QC for HMA	L.S.	$0.00	1	$0.00
	Asphalt Cost Adj	L.S.	$0.00	1	$0.00
	CONSTRUCTION ENGINEERING - (INSPECTION, CE, ETC)	L.S.	$61,719.46	1	$61,719.46
	TOTAL CONSTRUCTION COST				**$302,816.77**
	PROJECT DEVELOPMENT	L.S.	$19,290.00	1	$19,290.00
	PRELIMINARY ENGINEERING (DESIGN)	L.S.	$28,930.00	1	$28,930.00
	ROW COSTS	SF	$300,000.00	1	$0.00
TOTAL BASE CONSTRUCTION COST					**$351,036.77**

Appendix G: Concept Plans




SOUTHBRIDGE TRANSPORTATION ACTION PLAN
CENTURY ENGINEERING
DelDOT
Elbert Playground
LEGEND
PROPOSED STRIPING
PROPOSED CROSSWALK
PROPOSED SIDEWALK
PROPOSED GRASS
PROPOSED LIGHTING
PROPOSED RAISED INTERSECTION
Scale: 1" = 50'
June 2023

Southbridge Road Diet Traffic Analysis

Synchro / SimTraffic 11 was used for the Road Diet Traffic Analysis. Under exiting 2022 traffic conditions, all intersections within the Road Diet Study Limits would operate at level of service (LOS) D or better under the proposed Road Diet conditions. However, the northbound S Heald Street approach at the intersection with Christiana Avenue would be over capacity and operate at LOS F. This would lead to queuing that could potentially backup onto New Castle Avenue and cause a breakdown in traffic operations during the A.M. peak hour.

Sensitivity analysis was conducted to determine how much future traffic growth could potentially be accommodated by the study roadways and intersections under the proposed road diet conditions while maintaining satisfactory LOS (D or better) throughout the system. It was determined that while the intersections could accommodate up to 65% traffic growth on all the roadways within the study limits, there would be unacceptable queues and delays along some of the roadway segments leading to gridlock conditions. A 45% growth in traffic on all study roadways alleviates the latter problem. This is equivalent to 1.5% annual growth for 30 years. For roadways immediately north of this study area that have been analyzed recently, DelDOT Planning provided an annual growth factor of 0.50% from 2022 to 2032, and thereafter, 0.65% annually to 2050. The study roadways accommodating growth equivalent to 1.5% annually therefore indicates that some of the traffic from nearby proposed developments can be accommodated under the future road diet conditions.

With 45% growth in traffic, the southbound S Heald Street approach at the intersection with Christiana Avenue would however be over capacity and operate at LOS F, with the potential for queue backup onto the drawbridge and beyond under single lane conditions.

As a result, the limit of the proposed road diet at the S Heald Street northern end should be modified as follows:

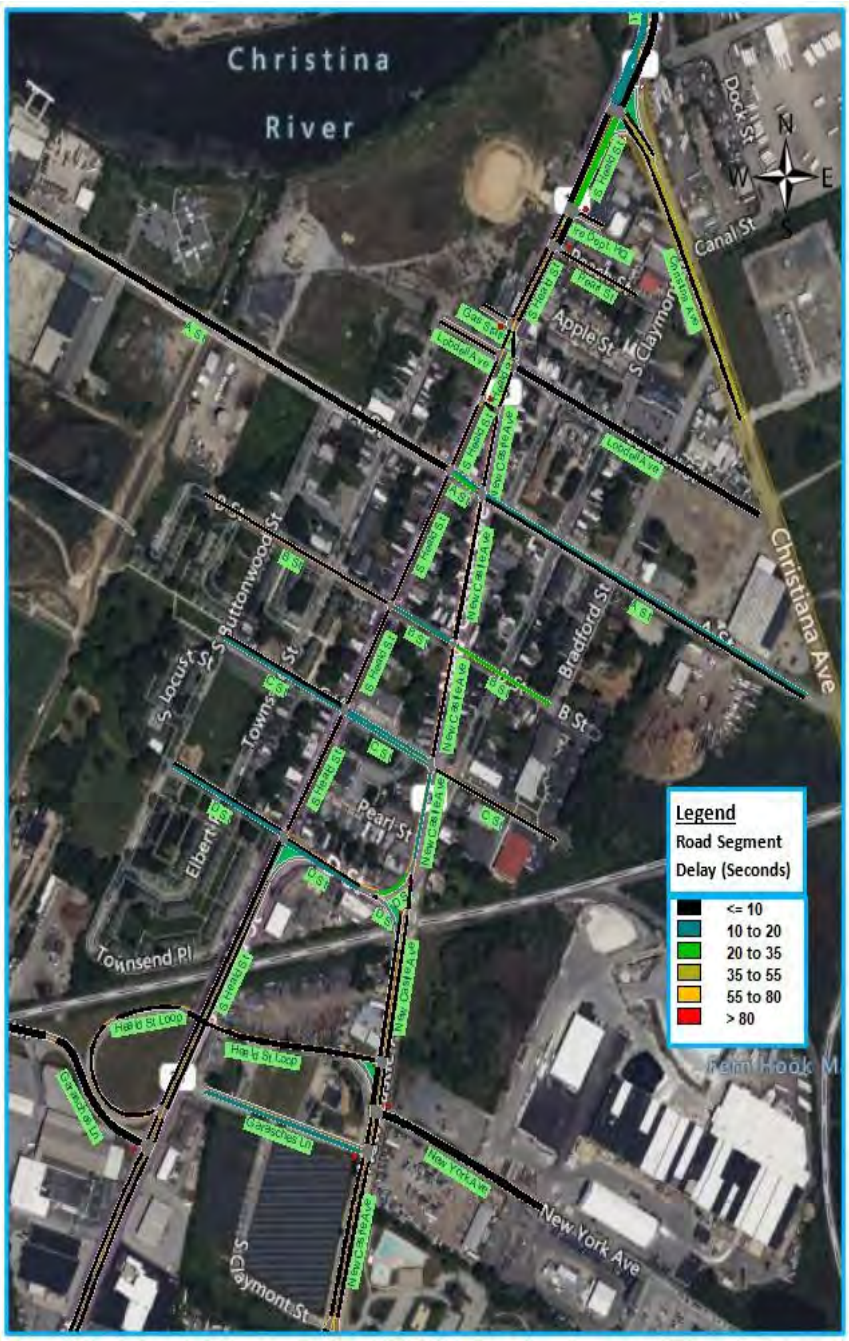
1. The one lane in each direction with continuous center left-turn lane / two-way left-turn (TWLT) lane should be terminated at Apple Street.
2. Two northbound lanes should be maintained from Apple Street to Christiana Avenue.
3. Two southbound lanes south of Christiana Avenue should be maintained and if feasible, the outside lane dropped as a right-turn lane into the northern end of the existing Exxon Gas Station. The lane drop can be implemented prior to the gas station.

With these modifications to the limits, all the study intersections would operate at LOS D or better for both the A.M. and P.M. peak hours. All road segments between the intersections would operate with satisfactory delay. The worst average delay for the road segments on which the road diet was implemented in the analysis is 10 to 20 seconds per vehicle on New

Castle Avenue between D Street and C Street. A.M. Peak hour presented the worst-case scenario. **Figure 1** shows the intersections LOS for that scenario. Figure 2 presents the Average delay ranges in seconds per vehicle for the study area road segments.

Figure 1: A.M. Build Intersection LOS (45% Increase in Traffic Volumes)

Figure 2: A.M. Build Road Segments Average Delay Ranges (45% Increase in Traffic Volumes)



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Southbridge Road Diet Traffic Analysis:
Travel Time & Speed Summary

The estimated effect on travel time and speed that would result from the implementation the Road Diet within the New Castle Avenue limits was assessed. The variables from a New Castle Avenue traffic model with current roadway lane configurations and future traffic, was compared to a New Castle Avenue traffic model with Road Diet Lane configurations and future traffic. The analyses indicate that within the New Castle Avenue Road Diet limits:

- **travel time** would **increase** by approximately **one (1) minute** (58.2 seconds) and,
- **average speed** would **decrease** by approximately **5 MPH** (4.9 mph).

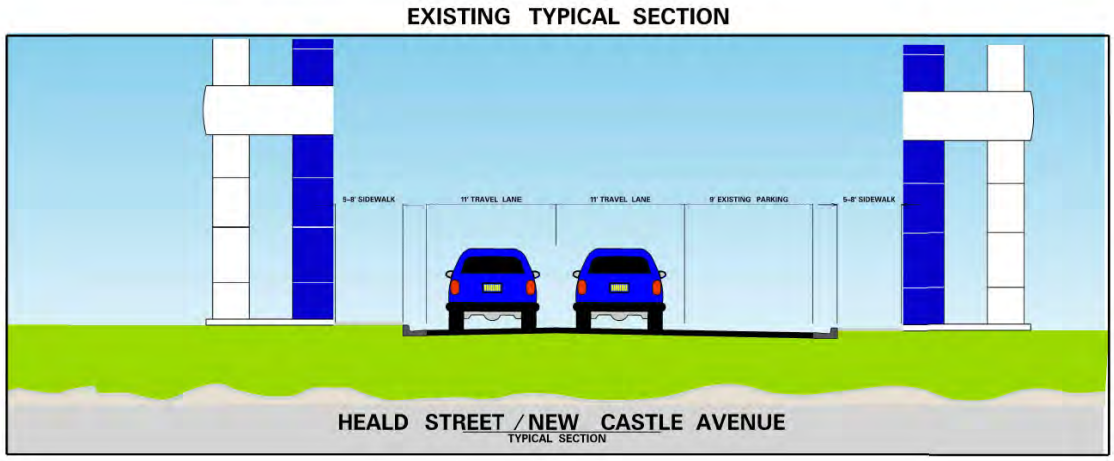
To ascertain the reasonableness of the reduction in speed derived from the traffic models, it was compared to available Road Diet research / case studies results. A case study and simulation results of operational analyses cited in the FHWA Safety Program's Road Diet Informational Guide is "*Converting Four Lane Undivided Roadways to a Three-Lane Cross Section - Factors to Consider*." This study is reported as showing that that 85th percentile and average speed along Road Diet conversions are likely to decrease by 3 MPH to 5 mph.

This confirms that the 5 MPH average speed reduction derived from the New Castle Avenue Road Diet traffic analyses would be a reasonable expected result from the Road Diet implementation.

Appendix I: Existing and Proposed Typical Sections: New Castle Ave. and Heald St.

Existing Typical Section

New Castle Ave, B Street to C Street



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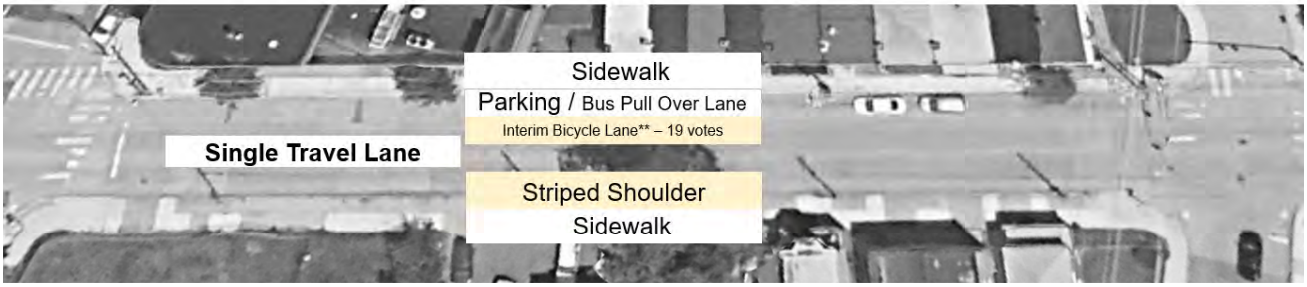
Example Concept Typical Section, Interim Build*

New Castle Ave, B Street to C Street

Example: not to scale



Important Notes

Each block along New Castle Ave. and Heald St. must be evaluated and designed independently, given differing local conditions. However, this is a guiding concept for the Southbridge Transportation Action Plan's (STAP) interim and full build alternatives. The votes listed here, along with the support for the raised intersection concept, were collected during the STAP's Survey 2.

***The "Interim Build"** is an inexpensive a "paint only" design that can be implemented quickly.

****An **Interim Bicycle Lane** can be painted with the interim build. Besides better accommodating bicyclists, a need noted through youth engagement, this lane would better delineate the travel lane and help further reduce speeds. However, for the full build, the community's preference is to reuse saved space for wider sidewalks and not a bicycle lane. The wider sidewalks can also be utilized by bicyclists and would separate them from motor traffic.

Example Concept Typical Section, Full Build, *Preferred Alternative*

New Castle Ave, B Street to C Street

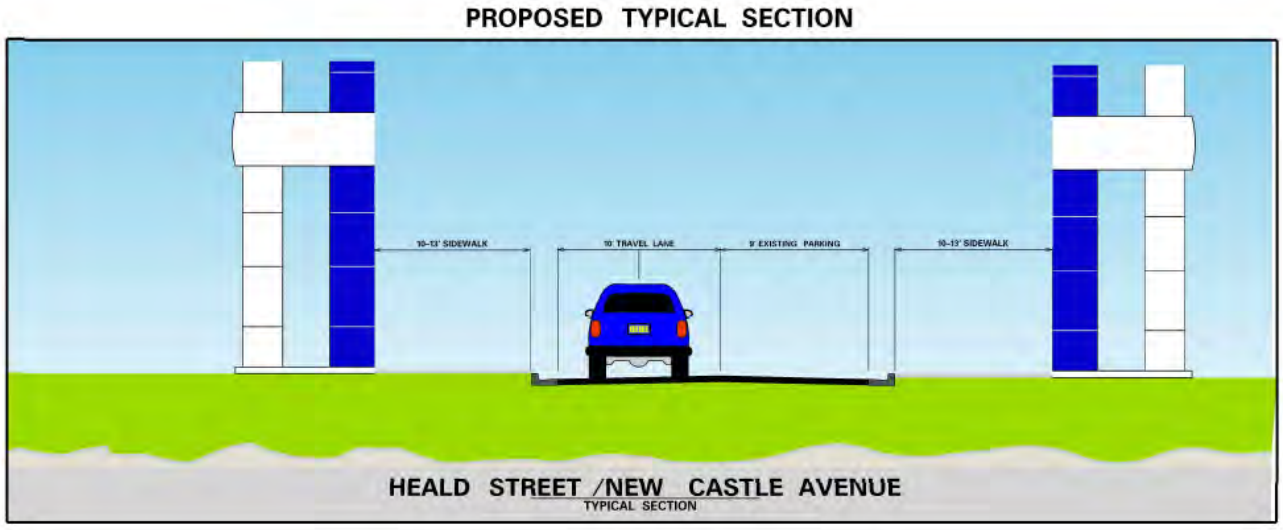
Example: not to scale

Important Notes

Each block along New Castle Ave. and Heald St. must be evaluated and designed independently, given differing local conditions. However, this is a guiding concept for the Southbridge Transportation Action Plan's (STAP) interim and full build alternatives. The votes listed here, along with the support for the raised intersection concept, were collected during the STAP's Survey 2.

*__Beautification__ can include decorative lighting, art, historic markers, as well as landscaping. Landscaping amassed 21 votes in the second survey and more grass and trees were needs voiced during community youth engagement.

**__Wider sidewalks__ could also accommodate bicycle travel, independent of a separate bicycle lane, which only received 19 votes in the survey.



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Example Concept Typical Section, Full Build, *Optional Alternative*

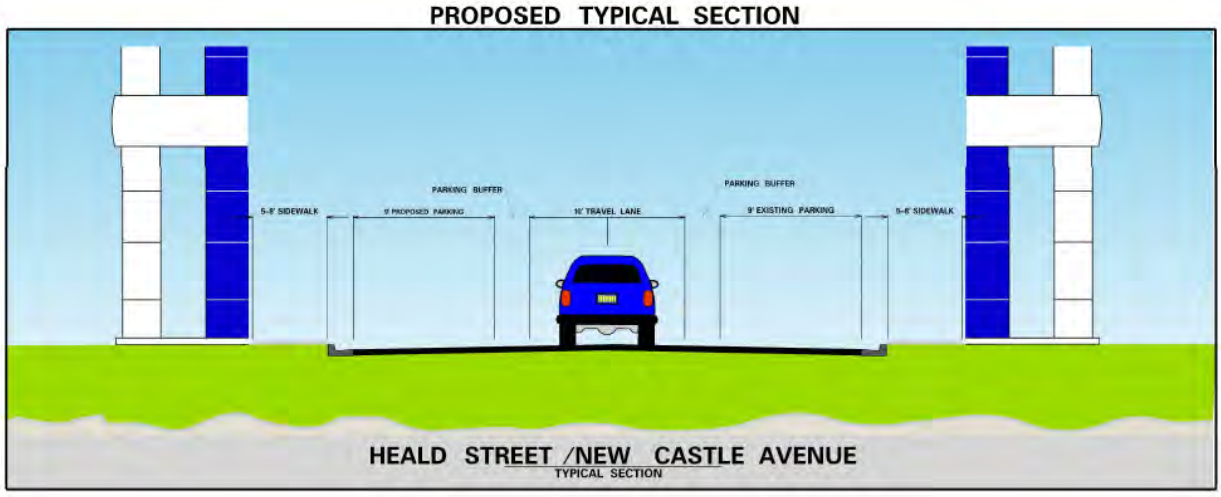
New Castle Ave, B Street to C Street

Example: not to scale

Important Notes

Each block along New Castle Ave. and Heald St. must be evaluated and designed independently, given differing local conditions. However, this is a guiding concept for the Southbridge Transportation Action Plan's (STAP) interim and full build alternatives. The votes listed here, along with the support for the raised intersection concept, were collected during the STAP's Survey 2.

*A **2nd Parking Lane or Striped Shoulder** may be preferred or necessary on some blocks. For example, on New Castle Ave. between A Street and B Street, a wide striped shoulder would allow fire trucks to continue to turn southbound on the firehouse for faster responses in some emergencies.



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