Forward Pinellas Board Members

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Townsend Tarapani,
Tarpon Springs, Safety Harbor and Oldsmar
Kenneth Welch, Pinellas County

*Beach Communities include the cities of Belleair Beach, Belleair Shore, Indian Rocks Beach, Indian Shores, Madeira Beach, North Redington Beach, Treasure Island, Redington Beach, Redington Shores, and St. Pete Beach.

**Inland Communities include the cities of Belleair, Belleair Bluffs, Gulfport, Kenneth City, Seminole, and South Pasadena.

MESSAGE FROM THE CHAIR
DAVE EGGERS

We’re lucky to live in Pinellas County.

From our white-sand beaches, parks, vibrant downtowns and hard-working residents, Pinellas County is a dream destination to live, work, and play. Over the next 25 years, we are expected to add 93,000 people countywide, basically the size of Largo, and then some. Forward Pinellas is responsible for the creation of Pinellas County’s Long Range Transportation Plan called Advantage Pinellas. This Plan lays out a vision for transportation projects, within the context of land use planning that directs growth to areas best equipped to grow.

It is always of utmost importance to me, as a public servant, that the actions of government agencies are based on input from our residents. Forward Pinellas created Advantage Pinellas with two years of community feedback, attending events big and small from the Dunedin Orange Festival to the Skyway Marina District Five-Year Anniversary. We received almost 5,000 responses through an on-line survey about transportation options.

As residents, you told us what you wanted. You want to see opportunities for bicyclists and pedestrians to safely use our roadways and trails. You called for premium, express transit options that are missing from our region. You recognize the increasing role that technology will play in helping us move around. While you value maintaining roads at an excellent level, you acknowledged the difficulty in finding additional land to widen the roads.

You will see these ideas, your ideas, throughout Advantage Pinellas. I look forward to realizing the future laid out in the following pages, as I hope you will too.

Commissioner Dave Eggers
Forward Pinellas Chair
As we envision the future of Pinellas County, we know we have to plan differently. Unlike our neighbors in the Tampa Bay region, we’re a fully urban County with little vacant land. With 588 miles of coastline, we’re also vulnerable to sea level rise, flooding and storms. To sustain our diverse economy and strengthen the livable community vibe that exists in our 24 cities and unincorporated places, we need to direct growth to the right places and support it with good transportation decisions.

Building more roads and wider highways is not in our long-term future. A better fit for our urban character: more walkable places, with housing near jobs, commercial areas, educational opportunities and choices for getting around our County and region. This Advantage Pinellas Plan envisions Pinellas County as a highly accessible County with many diverse communities and a variety of transportation choices. This is the first Long Range Transportation Plan developed since the 2014 merger of the Pinellas Planning Council and the Pinellas County Metropolitan Planning Organization into Forward Pinellas. The plan integrates our land use and transportation plans to respond to our challenges and long-term community goals.

Let’s build on our great assets. We’re an international destination for tourism, one of Florida’s leaders in manufacturing and technology jobs, and we have some of the most historic, interesting and walkable places. We’ve built and will continue to invest in strong roadway network connections, and our iconic Pinellas Trail will soon grow to 76 miles circling the County.

It’s imperative that we continue developing a transportation network with efficient transit options to have a fully functioning system, both locally and regionally. Let’s make our transportation system one of the key advantages of Pinellas County and greater Tampa Bay.

- Whit Blanton, F.A.I.C.P.
  Executive Director
  Forward Pinellas

If you need additional assistance with viewing the 2045 Long Range Transportation Plan and the additional appendices, please contact Forward Pinellas by phone: 727-464-8250 or by email: Info@forwardpinellas.org. You may also request assistance directly through Chelsea Favero, Planning Manager, by phone: 727-464-5644.
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Pinellas County is an international destination for tourism, one of Florida’s leaders in manufacturing and technology jobs, and we have some of the most historic and walkable places. We are proud of our eight unique downtown areas and the Pinellas Trail (soon to be 76 miles). With over 35 miles of sandy white beaches, the annual economic impact of tourism in Pinellas is more than $10 billion.

One of the greatest advantages of living in Pinellas is access to our pristine natural lands and beaches. Protecting these vulnerable areas is also our greatest challenge. Resiliency for our communities is a priority for the County.

Interestingly, Pinellas is also the most densely populated county in Florida. As we grow, we view our responsibility to plan differently as an opportunity to guide growth to areas that support regional connectivity and provide opportunities for housing, employment and land use redevelopment.

Forward Pinellas is the land use and transportation planning agency for Pinellas County. We guide land use decisions and program transportation improvements as one dynamic system to improve Pinellas County’s quality of life and economic competitiveness. Development of plans and programs are based on a continuous citizen input process. We look to our residents to direct how the County will continue to grow.

As an agency that supports the County, we function as both the Pinellas Planning Council and the Pinellas County Metropolitan Planning Organization, using a cohesive planning process. We develop policy and implement plans that address needs for housing, transportation, employment and resiliency of our communities. We assist the County and our 24 local governments with technical support and provide funding for the planning and implementation of projects that address how we develop and how we get around.

Forward Pinellas is responsible for developing Pinellas County’s Long Range Transportation Plan (LRTP), referred to as Advantage Pinellas. A new LRTP must be developed every five years to receive state and federal funding. The LRTP must identify transportation needs for at least twenty years into the future and provide citizens the opportunity to comment on these needs during the process. The Plan must demonstrate the ability to fund the list of needed projects based on reasonably expected local, state and federal financial resources.

As Forward Pinellas develops Advantage Pinellas, we operate within federal and state guidelines to increase our County’s eligibility to receive funding for transportation. We use the most current socioeconomic data to project our growth patterns and to develop projects for the LRTP that support a growing population, a vibrant economy and our region’s tourist industry. We consider long range needs for both our residents and our visitors. Forward Pinellas coordinates with our adjacent counties to build strong regional partnerships, and we consider how to best address mobility as a local agency and a regional planning partner.
CHAPTER 1
INTRODUCTION

1.3

Figure 1.1 illustrates the location of Pinellas County, Florida and our regional planning partners. Pinellas County is part of the Florida Department of Transportation’s (FDOT) planning area referred to as FDOT District Seven, and includes five counties: Pinellas, Hillsborough, Pasco, Hernando and Citrus. Forward Pinellas coordinates with these counties and the FDOT when considering regional transportation needs, potential projects and financial resources.

Forward Pinellas coordinates technical input for both the County and the 24 municipalities as we develop land use and transportation plans. Figure 1.2 represents the general boundaries of the 24 municipalities in Pinellas County. Advantage Pinellas represents countywide input from our residents and policy direction from County and municipal staff. The Forward Pinellas Board (which includes representatives from cities, the County and the local transit agency), adopts the LRTP every five years and must approve amendments, when necessary. Non-voting Board support is also provided by our planning partners including the FDOT.

Figure 1.1: Pinellas County, Florida Location Map

Figure 1.2: General Boundaries of the 24 Municipalities in Pinellas County. Source: Forward Pinellas
Advantage Pinellas is a transportation plan for everyone. It recognizes the diversity of our distinct communities, numerous industries, jobs, natural lands and waterways that serve as both transportation corridors and play grounds for recreation.

Advantage Pinellas is unique as it is the first LRTP developed since the 2014 merger of the Pinellas Planning Council and the Pinellas County Metropolitan Planning Organization. As Pinellas County has little remaining vacant land, this LRTP aligns strategies for improved mobility based on land use redevelopment opportunities in areas of growth. It prioritizes the integration of land use and transportation policy as part of the project selection process.

Advantage Pinellas exemplifies the decision to plan differently by addressing the many advantages of living in Pinellas as identified by our residents. This LRTP promotes improvements to core transportation corridors and provides a clear mission for joint planning that increases resiliency and enhances connectivity to our many livable communities.

Our abundance of natural resources continues to draw new residents and tourists every day. Pinellas County is Florida’s most densely populated county, yet projections indicate an additional 93,000 people will reside here over the next 25 years, with limited land area available to accommodate this growth.
Figure 1.3 compares the current density of Pinellas County with our Transportation Management Area partner counties, shown as people per acre.

![Current People Per Acre: Pinellas, Hillsborough, and Pasco Counties](image)

Figure 1.3: Current People Per Acre: Pinellas, Hillsborough and Pasco Counties. Source: Forward Pinellas

Advantage Pinellas also considers the growth in the number of jobs available for our residents and the broader region. Over 60,000 new jobs are projected in Pinellas through 2045. The LRTP recognizes access to housing and jobs as priorities in developing a strategy that supports economic opportunity for all our residents. The Plan also considers environmental justice and environmental mitigation throughout the process to foster the equitable distribution of projects for use by all our citizens while protecting our natural assets.
One of the key actions conducted by Forward Pinellas in recent years was to identify strategies for building this LRTP based on connecting land use redevelopment opportunities and core transportation corridors. With the help of citizens, technical staff and our Board, Forward Pinellas selected three Strategic Planning Opportunity Topics (SPOTlight) to guide project identification. A description of the three initiatives are highlighted by Forward Pinellas Board members.

**Enhancing Beach Access**

“To me, enhancing beach access means making sure that our visitors, residents and workers can have a fantastic experience in our beach communities. We should be able to get to the beach, hotels, restaurants and our homes without being stuck in bumper-to-bumper traffic, and it should be easy to get there safely on bike, trolley, water taxi or foot.”

~ Mayor Joanne “Cookie” Kennedy
Gateway/Mid-County Area Master Plan

“With the development of the Gateway/Mid-County Area Master Plan, we are creating a destination, not just a corridor to somewhere else. Gateway residents deserve a distinctive place, with a variety of housing and recreational options. The opportunity for economic development, increasing property values, and creating a true destination is the long-term vision for the Gateway. A vision now within reach!” ~ Brandi Gabbard, Councilmember, District 2 City of St. Petersburg

Defining a Vision For U.S. 19 Corridor

“Defining a vision for U.S. 19 is about efficiently moving traffic north and south in our County. We have been working towards that goal for almost 20 years. It’s also about making U.S. 19 safer for all users, drivers, pedestrians and bicyclists. Using smart technology, removing unsafe conflicts and completing overpasses and side road improvements will ensure that our residents will travel quickly and connect to their local businesses and neighborhoods.” ~ Pinellas County Commissioner Karen Seel
Unlike neighboring counties in the Tampa Bay region, Pinellas is a fully urban county focused on redevelopment. With 588 miles of coastline, the County is vulnerable to sea level rise, flooding and storms. The need to sustain the County’s diverse economy, improve resiliency and strengthen the livable community vibe that is unique to this area was a key directive for the Plan.

Advantage Pinellas directs growth to areas supported by good transportation investments. As detailed in Appendix A: Performance Report, the LRTP incorporates performance targets for measures such as safety, transit asset management and system performance to help develop priorities for selecting projects. The performance measures adhere to Federal Highway Administration (FHWA) requirements for all MPOs.

The LRTP was developed based on four major phases starting in 2015. Phases 1-4 included data development (population and employment growth projections), scenario planning, financial resources development and visioning. Figure 1.4 summarizes the general technical and public engagement phases followed for Advantage Pinellas. Forward Pinellas coordinated with both local and regional partners to ensure regional connectivity was a priority.

![Figure 1.4: Development Phases for Advantage Pinellas from 2015 until present](image-url)
Forward Pinellas conducted public outreach using several strategies including a standing Citizens Advisory Committee (CAC), focus groups, in-person outreach events and online surveys. Forward Pinellas participated in the Tri-County It’s Time Tampa Bay online survey and conducted a local Advantage Pinellas online survey.

For citizen input consistency, a statistically-valid survey was conducted to ensure that we were hearing from all segments of our population. A focus group was also held over the course of the public outreach process. The same set of citizens engaged at different phases of Plan development to weigh in at critical stages in the identification of goals, and ultimately project selection. The consistency of outreach responses collected over four years resulted in the unanimous approval of Advantage Pinellas by the Forward Pinellas Board.

Staff was able to reach larger audiences by conducting outreach at pre-scheduled community events. An innovative technique was developed by staff to help simplify the LRTP process and engage our citizens. The ‘game’ we used in our outreach involved the use of a limited number of simple rubber balls to have people weigh in on how they desired to see transportation funding allocated by mode in their communities. This provided an easier way to explain what our agency does and to gather input into how limited resources should be spent in the Cost Feasible Plan.

Based on the outreach received, Forward Pinellas was able to document the advantages of living in Pinellas County and how these advantages represent what the residents want for their communities: more walkable places, housing near jobs, access to educational opportunities, and choices for getting around the county and region.

The staff used the six advantages to also guide the CAC, Technical Coordinating Committee (TCC) and Forward Pinellas Board as they finalized the goals, objectives and policies for Advantage Pinellas.
Six overall advantages, shown in Figure 1.5, were summarized into the basis for project development and review. These are advantages that Pinellas County currently enjoys, and that can also be strengthened by implementation of the Plan.

The development of our transportation needs and the Cost Feasible Plan are addressed by chapter as framed by our six advantages. The advantages mirror our citizens’ vision and goals for their communities. **Appendix B**: Forward Pinellas Goals, Objectives and Policies details the guiding policies used to prioritize and select projects. The goals represent a coordinated process with the goals for the Tampa Bay region, the state and federal requirements.

*Figure 1.5: Six Advantages Provide Framework for LRTP*
Funding Advantage Pinellas required working with local, state and federal agencies to identify revenue sources reasonably expected to be available through 2045, see Figure 1.6. Based on the needs identified during outreach and the public’s funding priorities, a Cost Feasible list of projects was developed for review by citizens, committees and the Forward Pinellas Board prior to adoption.

The ability to allocate funds to categories other than roadways was limited based on restrictions tied to state and federal funding requirements. Forward Pinellas dedicated close to 100 percent of available flexible funding sources to projects that address safety, accessibility, transit and technology. Advantage Pinellas includes more funding for building new bike and pedestrian facilities and investments in future technology than any other LRTP adopted in the past.

The Plan identifies investments that promote a highly accessible county with many diverse communities and a variety of transportation choices. The Active Transportation Plan is designed to improve health outcomes, expand economic opportunities and protect the environment by encouraging residents to walk and bicycle for their everyday transportation needs. The Roadway, Active and Transit portions of the Cost Feasible Plan were developed in coordination with environmental justice and environmental mitigation analysis and documented by percentage of funding to ensure equitable distribution of the recommended projects, to the maximum extent practicable.
Advantage Pinellas, adopted November 13, 2019, is the eighth edition of Pinellas County’s LRTP. The Hillsborough and Pasco MPOs also adopted new LRTPs in 2019, allowing for extensive coordination on priorities in the region and ensuring that Advantage Pinellas represents both a local and regional process.

The development of Advantage Pinellas has incorporated over four years of public input. The highlights of Advantage Pinellas are summarized by Whit Blanton, FAICP, Executive Director, Forward Pinellas:

```
Advantage Pinellas integrates our land use and transportation plans to respond to our challenges and long-term community goals. The Plan builds on our great assets. We’ve built and will continue to invest in strong roadway network connections, and our iconic Pinellas Trail will soon grow to 76 miles circling the County. It’s imperative that we continue developing a transportation network with efficient transit options to have a fully functioning system, both locally and regionally. Our transportation system is one of the key advantages of Pinellas County and greater Tampa Bay.
```

The following Chapters are organized to represent the six advantages as identified by Pinellas residents.

- **Chapter 1: Executive Summary**
- **Chapter 2: Accentuating Advantages and Regulatory Requirements**
- **Chapter 3: Attractive and Unique Destinations**
- **Chapter 4: A Resilient Community**
- **Chapter 5: Safety, Security, Health & Population Diversity**
- **Chapter 6: Strong Economic Opportunities**
- **Chapter 7: A Collaborative Vision for the Future**
- **Chapter 8: Mobility and Accessibility for Everyone**
- **Chapter 9: Moving Forward**

The chapters are framed in the context of these questions:

**Where are we now?** *(current conditions)*  
**Where do we want to be?** *(future needs)*  
**How do we get there?** *(priorities and actions)*

Chapter 8 includes details on how the ultimate 2045 Advantage Pinellas LRTP was developed and detailed as needs for Roadways, Active Transportation and Transit. The final Cost Feasible Plan with supporting financial resources and funding is provided in this chapter.
Advantage Pinellas is a Plan for everyone. It considers travel choices for all generations, economic backgrounds and abilities. This chapter summarizes consistency between the Plan and regional, state and federal planning requirements.

Forward Pinellas was created in 2014 to address both transportation and land use planning together. An insightful action by County leaders as mobility requires the flexibility to address the needs of an ever-changing urban environment, while maintaining the lifestyle choices for residents of all ages. Advantage Pinellas advances transportation projects that support the advantages of living in our County.

Pinellas County is a leader in unique ways to leverage existing infrastructure to enhance mobility in an urban context. Actions have included the installation of technologies to optimize traffic flow on the roadways, the implementation of enhanced transit services during peak tourist seasons, and the conversion of a freight corridor to the Pinellas Trail. The trail is a multiuse path which connects downtowns, neighborhoods and parks. The Trail is soon to grow to 76 miles, with connections to regional trails such as: Tri-County Multiuse Trail, Courtney Campbell Causeway Scenic Bicycle and Pedestrian Trail, and the bicycle and pedestrian lane to be built as part of the reconstruction of the Howard Frankland Bridge North Span.

Advantage Pinellas is working to continue this momentum by allocating state and federal funding resources to projects that do not strictly involve the widening of roadways. After years of extensive public involvement, we have heard loud and clear that our residents recognize the value of our existing assets and desire investments in transportation solutions that support the advantages of living in Pinellas County.

“Pinellas County residents want a safe, efficient transportation system.” ~Statistically-Valid Survey
Our residents understand active transportation options promote healthy and economically vibrant communities. Our visitors seek destinations that provide active transportation and choose to visit Pinellas County for this reason. This Plan builds upon existing advantages and implements an Active Transportation Plan that includes dedicated funding through 2045. The Plan is a safe, accessible network of bicycle and pedestrian trails that serves all residents, including disadvantaged populations that need access to employment and housing without use of a car.

**Figure 2.1** represents the Active Transportation Plan and illustrates the locations of disadvantaged populations by Census Tract with access to the projects:

- Orange is low-income households
- Blue is minority households
- Green is both minority and low-income households.

The Active Transportation Plan is designed to improve health outcomes, expand economic opportunities, and protect the environment by encouraging residents to walk and bicycle for their everyday transportation needs. Forward Pinellas has dedicated a portion ($61 million through 2045) of its flexible funding sources for ten Active Transportation corridors to implement bicycle and pedestrian improvements. The Plan also includes a set aside ($6 million through 2045) for trail overpasses at high conflict crossings.

Pinellas County is an international destination for tourism and one of Florida’s leaders in manufacturing and technology jobs. The Plan supports mobility options and reliable connections between our local and regional business centers education campuses and housing. To achieve this increase in efficiency, a portion ($1 million annually) of funding is set aside for enhanced technological solutions to improve mobility. Additionally, the Pinellas Suncoast Transit Authority (PSTA) now offers regional service (300X) to the Tampa International Airport and Downtown Tampa to improve connections for regional employment and tourism.
Advantage Pinellas includes a portion ($1.5 million annually for bus replacements) of its flexible funding sources for transit and a portion ($500,000 annually) for regional transit investments that could include vanpool services, waterborne transit, and regional transit vehicles. PSTA is also designing the first bus rapid transit system (BRT) on Central Avenue in St. Petersburg to connect the beaches, Downtown St. Petersburg and the Tampa Bay region, a project previously prioritized by Forward Pinellas and included in this Plan.

Recognizing that roadway capacity is still needed in certain areas, Pinellas County continues to invest in strong roadway network connections. The Gateway Express toll facility linking US 19 and I-275 is currently under construction and is scheduled to be completed in 2021. Additional major capacity projects are planned for the I-275 corridor and for US 19 in northern Pinellas County, to improve operations of our major regional transportation facilities and to support the movement of goods and services.
Advantages Guide LRTP

Over four years of public outreach set the course for investment strategies for Advantage Pinellas. Through surveys, focus groups and interactive outreach games, our citizens clearly articulated the numerous advantages of living in Pinellas County. These concepts were consolidated into six overall themes. The six advantages that guided us during the LRTP process are listed below:

• Attractive and Unique Destinations
• A Resilient Community
• Safety, Security, Health & Population Diversity
• Strong Economic Opportunities
• A Collaborative Vision for the Future
• Mobility and Accessibility for Everyone

Descriptions of the six advantages and how they guided development of the LRTP’s transportation Needs List of Projects and the adopted Cost Feasible Plan is included in Chapters 3-9 of this Plan.

These six advantages were also the framework for finalizing goals used to prioritize projects for the LRTP.

Appendix B includes a full listing of the Plan’s goals, objectives and policies. The goals were developed with extensive input from citizens, technical staff and the Forward Pinellas Board. Table 2.1 represents how they are connected and discussed in each chapter.

<table>
<thead>
<tr>
<th>Advantage Pinellas LRTP Goals</th>
<th>Key Advantages, Chapter Discussion</th>
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<tr>
<td>Create and Sustain Attractive and Unique Destinations</td>
<td>Attractive and Unique Destinations, Chapter 3</td>
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<td>Develop and Sustain a Resilient Community</td>
<td>A Resilient Community, Chapter 4</td>
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<td>Invest in Transportation Projects That Promote Safe and Healthy Communities</td>
<td>Safety, Security, Health &amp; Population Diversity, Chapter 5</td>
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<td>Support Projects That Provide for Strong Economic Opportunity</td>
<td>Strong Economic Opportunities, Chapter 6</td>
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<td>Achieve an Efficient, Effective, Equitable, Safe and Complementary Multimodal Transportation Network in Pinellas County and Throughout the Tampa Bay Region that Provides Viable Travel Options for all Transportation Users</td>
<td>Mobility and Accessibility for Everyone, Chapter 8, Includes maps and tables representing the adopted Cost Feasible Plan.</td>
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Table 2.1: Advantage Pinellas Goals, Six Advantages and Related Chapters
Consistency with Regional and Statewide Plans

Forward Pinellas conducts many functions, and one of its responsibilities is to develop an LRTP that looks 20 to 25 years into the future. A new LRTP must be developed every five years, with updated data and analysis, to receive state and federal funding.

Forward Pinellas conducts activities based on its responsibilities as the Pinellas Metropolitan Planning Organization (MPO), which is a federally-designated agency responsible for carrying out the continuing, cooperative, and coordinated (“3C”) multimodal transportation planning process for Pinellas County. Federal law requires that an urbanized area with a population greater than 50,000 people establish an MPO to ensure that the 3C process is carried out during decision making to expend federal funds for transportation projects and programs. An example of complying with the 3C process includes the numerous outreach events documented during LRTP development: Tri-County online It’sTimeTampaBay MetroQuest survey with Hillsborough and Pasco Counties, local Advantage Pinellas online MetroQuest survey, a statistically-valid mail survey, focus groups, and in-person outreach conducted in tandem with already scheduled community events.

Chapter 339.175, Florida Statutes, created the West Central Florida Metropolitan Planning Organization (MPO) Chair’s Coordinating Committee (CCC), which includes the MPOs of Hillsborough, Hernando/Citrus, Pasco, Pinellas, Polk and Sarasota/Manatee counties. The CCC provides a forum to coordinate transportation projects deemed to be regionally significant, review the impact of significant land use decisions and to review all proposed significant transportation projects which affect more than one MPO. The CCC has formal operating procedures and an interlocal agreement signed by all of the MPOs to formalize the roles and responsibilities for regional planning. Since urbanized areas greater than 200,000 residents are designated as a Transportation Management Area (TMA), the CCC also provides the vehicle for the MPOs of the Tampa Bay TMA (including Hillsborough, Pinellas and Pasco) to coordinate transportation planning for the urbanized area. Because of the unique characteristics of the Tampa Bay region, Forward Pinellas coordinates the development of the LRTP alongside the Hillsborough MPO and the Pasco MPO to ensure consistency among the three MPOs that plan for the entire TMA. The three are all on the same cycle of LRTP adoption, and each MPO has adopted a new LRTP as of end of 2019. The MPOs coordinated their Needs and Cost Feasible lists of projects with each other, as well as other agencies throughout the entire LRTP process.

The MPOs and many other local, regional and statewide planning and funding partners coordinate on behalf of the CCC and TMA to develop regional priorities and to maintain consistency among transportation plans. The CCC includes non-voting representation from the Tampa Bay Regional Transit Authority, the Florida Department of Transportation (FDOT), the Tampa Bay Regional Planning Council, PSTA and HART. Pinellas County is part of the FDOT’s boundary referred to as District Seven. As a major funding partner for Advantage Pinellas, the LRTP must be consistent with statewide policies and goals. Table 2.3 on the next page provides a summary of how the Florida Transportation Plan (FTP), adopted in 2015, and the Advantage Pinellas goals are integrated between Plans. Forward Pinellas coordinated with the FDOT to provide consistency among the two plans, and to promote local, regional and statewide projects that improve access to funding opportunities for both Pinellas County and the Tampa Bay region.
Consistency with Federal Plans

Advantage Pinellas 2045 addresses federal mandates for regional transportation planning that were first established in the Intermodal Surface Transportation Efficiency Act (ISTEA) of 1991. Reauthorized several times, the current transportation legislation Fixing America’s Surface Transportation Act (FAST) Act (Pub. L. No 114-94) was enacted on December 4, 2015. It continues to require more emphasis on addressing challenges such as improving safety, reducing traffic congestion, improving efficiency in freight movement, increasing intermodal connectivity, and protecting the environment and added two additional measures relating to resiliency and tourism.

The ten Federal Highway Administration (FHWA) planning factors as shown in Table 2.3 (on the next page) connects the correlation of federal requirements to the goals for Advantage Pinellas. The interrelationship of transportation, land use, and economic development is evident.

All of the goals, objectives and policies for Advantage Pinellas support the ten federal planning factor requirements. Table 2.3 provides a generalization summary of their relationships as described as either a direct or a supportive role in fostering the planning guidelines. Direct indicates a strong correlation between the federal factors and local goals; support indicates it helps to achieve correlation between federal factors and the local goals.

In addition to the ten FAST Act and FHWA planning factors, federal regulations require that Long Range Transportation Plans adhere to these guidelines:

- are updated at least once every five years;
- include a planning horizon of not less than 20 years;
- be developed through an open and inclusive process that ensures public input and seeks out and considers the needs of those traditionally underserved by existing transportation systems;
- reflect the most recent and valid assumptions for demographic, socio economic, travel, and land use data;
- be financially constrained and include reasonable assumptions for future revenue sources;
- conform to the Clean Air Act and its amendments and to applicable State Implementation Plans for regional air quality.

Consistency with HSIP and the Public Transportation

Having developed the Plan in concert with FDOT, the Plan integrates the priorities, goals, countermeasures, and strategies of the Highway Safety Improvement Program. As we developed Advantage Pinellas the PSTA was in the process of developing its Ten-Year Transit Development Plan. We worked closely together during all phases of Plan development, sharing technical
Performance Measures and Targets

The passage of federal legislation (MAP-21 (2012) and the FAST Act (2015)) has continued to prioritize eight emphasis areas to be considered and tracked as part of developing an LRTP. Based on this direction, FHWA requires MPOs to adopt performance targets for defined measures: safety, transit asset management, pavement and bridge condition performance, and system performance and freight. Appendix A details the measures adopted by Pinellas County, and reports performance from 2014 to 2019.

Safety

Safety performance targets are required to be adopted on an annual basis. FDOT, in August of each calendar year, reports the following year’s targets in the Highway Safety Improvement Program (HSIP) Annual Report. After the FDOT adopts the targets, Forward Pinellas is required by the following February to either adopt FDOT’s targets or establish its own targets. In January 2017, FDOT set a statewide target of zero traffic deaths and injuries. Although an aspirational goal that Forward Pinellas supported, the FHWA encouraged MPOs to set realistic, data-driven targets. On February 14, 2018, the Forward Pinellas Board adopted safety performance targets, targeting the percent difference between the trendline projection between the lowest annual average from the previous five years. On February 13, 2019, the Forward Pinellas Board reevaluated the performance targets and their progress and made slight adjustments based on most recent data, but the same general measures were approved. See Appendix A for description and reporting on each safety measure.

Transit Asset Management

Forward Pinellas coordinated with the Pinellas Suncoast Transit Authority in 2017 to develop targets for transit asset management measures addressing rolling stock; over the road bus; equipment; and facilities. See Appendix A. Advantage Pinellas includes funding for a variety of transit projects, including replacement of vehicles, facility repair and service development programs.

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*Table 2.3: Federal Highway Administration (FHWA) Planning Factors and Advantage Pinellas Goals*
**Pavement and Bridge Condition**

In January 2017, USDOT published the Pavement and Bridge Condition Performance Measures Final Rule, which is also referred to as the PM2 rule. Federal rules require state DOTs and MPOs to coordinate when setting pavement and bridge condition performance targets and monitor progress towards achieving the targets. MPOs must set four-year targets for all pavement and bridge measures. MPOs can either agree to program projects that will support the statewide targets or establish their own quantifiable targets for the MPO’s planning area. On May 20, 2018, FDOT set targets related to pavement and bridge condition. On November 14, 2018, the Forward Pinellas Board voted to support the statewide targets for pavement and bridge condition.

**System Performance and Freight**

In January 2017, USDOT published the System Performance/Freight/CMAQ Performance Measures Final Rule referred to as PM3. PM3 requires state DOTs and MPOs to establish targets for six system performance and freight measures. MPOs must establish four-year targets. See Appendix A for a detailed description of each measure. On May 20, 2018, FDOT set targets for the performance measures related to the performance of the transportation system. On November 14, 2018, the Forward Pinellas Board approved to support the statewide targets for system performance.

Pinellas County continues to promote safety and improve system performance for all users of our transportation system. Advantage Pinellas represents developing projects, such as the Active Transportation Plan, that enhance the many advantages of living in Pinellas County. Examples of users of our system are represented in this collage of photos.
CHAPTER 2

ACCENTUATING ADVANTAGES AND REGULATORY REQUIREMENTS

ENGAGE. ADAPT. CONNECT.

Advantage
2045 LONG RANGE TRANSPORTATION PLAN

SUMMARY REPORT

2.10
The framework for Advantage Pinellas is based on six major advantages of living in Pinellas County as identified by our citizens. Our residents value living in a County with so many attractive and unique destinations. We have developed over time around our 24 cities, numerous community focal points, and our beautiful beaches. Our steady population growth in recent years, along with projections to add 93,000 people by the year 2045, highlights the incredible assets we have to offer. Pinellas County is truly a hub where culture and community come together.

Our residents understand our dense urban form requires a redevelopment emphasis. We must plan differently than our neighboring counties to preserve our history and continue to improve upon our existing resources. Our residents have helped create a vision that builds upon the distinctive character of our many walkable communities. Forward Pinellas has developed the LRTP to address this advantage by identifying our important corridors and dedicating resources and project development to smart growth areas that improve Countywide mobility and access to our numerous natural features and communities throughout our County and the Tampa Bay region.

Commissioner Eggers’ statement truly captures the essence of Pinellas County.

“We’re lucky to live in Pinellas County. From our white-sand beaches, parks, and vibrant downtowns and hard-working residents, Pinellas County is a dream destination to live, work, and play.”

~ County Commissioner Dave Eggers
Forward Pinellas Chair
WHERE ARE WE NOW?

Natural Attractions and Unique Destinations

Pinellas County’s unique geography and history provide many different lifestyle opportunities. A diverse array of large and small communities offer a variety of urban downtowns, historic main streets, traditional neighborhoods and beach towns, knit together in a single metropolitan area. The many unique communities create a sense of diversity and charm that continues to appeal to residents and visitors. With year-round sunshine, we enjoy an abundance of recreational and leisure activities, including riding the Pinellas Trail. The Trail connects many of our unique towns from St. Petersburg to Tarpon Springs.

In addition, there are eight walkable downtown areas within the County’s mainland. The Advantage Pinellas Plan is designed to expand transportation options for people accessing these key focal points and to encourage land use patterns that make it easier for people to reach them by walking, bicycling or using transit. The Plan looks to enhance our advantage as a County with many attractive and unique destinations improving on the way we address the mobility needs of area residents, businesses, and visitors.

Tourist Industry

Our vibrant, attractive, and unique destinations spread throughout the County attract millions of visitors each year. In addition to our status as an international destination for tourism, we have quickly become a destination that many are choosing to call their seasonal home. In 2018, 15 million people visited the County and these numbers continue to grow. Between May
2018 and May 2019, Visit St. Petersburg Clearwater reported a seven percent increase in visitors and an eight percent increase in tourist revenue.

The annual economic impact of tourism in Pinellas County is estimated to be more than $10 billion. This reflects the lure of the many attractions the County has to offer its residents and visitors.

- **35 miles of white sand beaches**
- **20 thousand acres of county parks**
- **15 live performance theaters**
- **3 state parks**
- **2 professional sports teams**
- **2 spring training stadiums**
- **24 museums**
- **1 state university**
- **13 college campuses**

### A Growing Urban Environment

In the early 1960s, 60 percent of the land area in Pinellas County was undeveloped. Today, less than five percent of the County’s land area is undeveloped. **Figure 3.1** shows Pinellas County’s population growth from 1920 to 2015, with an estimated total of 937,325 person in year 2015.

Pinellas has also grown into the most densely populated county in the state of Florida due to its geography as a peninsula, surrounded by water on three sides. As our population has increased, population growth and
land development have continued in already populated areas. Figure 3.2 displays the density of Pinellas County in people per acre as compared to our adjacent counties:

- **Pinellas County**: 5.6 people per acre
- **Hillsborough County**: 2.2 people
- **Pasco County**: 1.1 people
- **Figures as of 2015.**

Pinellas County is a leader in Florida for manufacturing and technology jobs. Figure 3.3 shows current jobs by industry for Pinellas County.

As the most densely populated County in the state, and continuing to grow in population, employment and visitor, traffic continues to increase on our area roadways. Based on four years of public outreach, the message from our residents is clear: building more roads and wider highways is not in our long-term future given our geography and current development patterns. We must support transportation solutions that are a better fit for our urban environment, such as continuing to provide more options for local and regional transit, and a connected system of biking and walking facilities.

Our density and compact urban form also provides Forward Pinellas with the unique challenge and opportunity to plan for new development (on vacant land or as infill) and redevelopment of older structures based on transportation connectivity and resiliency. The Advantage Pinellas LRTP, Countywide Plan and our cities’ comprehensive plans recognize how our development patterns are changing based on increasing density.
Forward Pinellas conducts a transportation planning approach that leverages sound land use development and infrastructure decisions to ensure we provide a multimodal transportation system that is able to meet the needs of all transportation users as our population and industries grow. Figure 3.4 and Figure 3.5 show the projected population of Pinellas County by year 2045, with an estimated increase of 93,000 persons and projected employment of 60,000 jobs by the year 2045. The two figures also display our projected areas of potential growth as considered by Advantage Pinellas.

Pinellas is an urban county. As it continues to redevelop, it will become more dense in places where redevelopment occurs, such as in downtowns, employment districts and along commercial corridors. However, much of Pinellas County’s suburban, single use residential neighborhoods are unlikely to change. The Gateway area is very spread out and does not currently support productive transit in that it’s not walkable, not mixed enough in terms of uses and limited housing for workers. Pinellas supports opportunities to further increase density and directs future growth to activity centers that are best equipped to grow and support expanded transit service, biking, and walking.

**Figure 3.4:** Projected Population to 2045.
*Source: 2018 Forward Pinellas Projections to 2015*

**Figure 3.5: Employment Growth Projections to 2045.
*Source: Tampa Bay Regional Planning Model***
Travel Options

The relationship between transportation and land use is inextricable. Where people live and the transportation options available influence travel mode choices. The denser the land use, the more likely people are to use transit, walk, or bike. However, density alone does not determine mode choice. Convenience, comfort, and safety are a few other factors that go into trip planning. For example, if there are gaps in the sidewalk network, inadequate bicycle facilities, difficult streets to cross due to congestion or high travel speeds, then people will be less inclined to use these modes.

Reliance on the automobile as the primary mode of travel in a county and region with millions of visitors each year makes traffic congestion a significant challenge for people seeking access to the area’s attractive and unique destinations. This is particularly evident during tourist season when motorists face lengthy travel delays on the roads they to and through the Gulf beach communities. Relieving traffic demand in these areas requires better multimodal transportation solutions such as bus service with lower headway times and improved access for bicyclists and sidewalks.

The same is true with transit as the type of service. Service frequency and travel time are all important factors that go into deciding whether or not using transit is a viable travel option. Opportunities for residents to travel to work, and visitors to enjoy the popular destinations that Pinellas County has to offer, are limited when considering the lack of non-automobile travel options.

Pinellas County has the lowest travel time to work among our Tampa Bay regional partners, and this is directly related to our dense urban form and easy access to our many employment centers and unique destinations. Figure 3.6 shows how commuters in Pinellas currently travel to and from work. In 2018, approximately 87 percent of Pinellas County commuters traveled to work by driving (78.5 percent drove alone and 8.8 percent carpooled). The percentage of telecommuters has steadily increased over the decades to reach nearly 7 percent in 2018. Walking, biking and transit make-up approximately 4 percent of commuters.

![Figure 3.6: Commuting Patterns for Pinellas County. Source: Census Transportation Planning Products (CTPP); American Community Survey (ACS).](image-url)
Where do we want to be?

Much like the transportation system of today has been constructed in response to growth and changes within the County and region, the transportation system of 2045 and beyond will be developed in response to the ever-changing needs of the people and the community.

Building more roads and wider highways is not an effective or sustainable approach to addressing these needs. The County needs more walkable places where housing is located closer to where people work and shop and better mobility choices for getting around the County and region. It is imperative that modernized efficient transit services be one of these choices.

As shown previously in Figure 3.6, while the number of people using technology to work from home or other locations outside the office is increasing, the majority of commuting trips still occur in single occupant vehicles. This is also true of the numerous visitors who use rental vehicles to travel from the St. Pete-Clearwater and Tampa International Airports to area beaches and other destinations.

Supporting Goal and Objectives

**Goal 1** - Create and sustain attractive and unique destinations

**Objective 1.1** - Create 20-minute neighborhoods that support walking and bicycling as a realistic travel choice for daily activities.

**Objective 1.2** - Consider facilities for, and the connectivity between, all modes in the planning, design and construction of transportation projects.

**Objective 1.3** - Align transportation investments with local community and cultural development initiatives, including public art installations and roadway treatments that improve visibility and destination accessibility.

Consistency with Federal and State Planning Requirements

Our focus on attractive and unique destinations recognizes the importance that tourism has on our local and regional economy. Advantage Pinellas looks to enhance this advantage by promoting sustainable development that helps preserve and enhance our local and regional attractions and provides residents, businesses, and visitors with enhanced travel options beyond driving.

Advantage Pinellas supports the FAST Act planning requirements by enhancing travel and tourism, supporting the economy, preserving and enhancing the efficiency of our existing transportation system, and increasing accessibility and mobility for all transportation users. It further supports FDOT’s policy to identify transportation solutions that support quality places to live, learn, work, and play.

Attractive and unique destinations advantage and identify where we want to be as a County. Examples of these actions and briefly discussed.

**20-Minute Neighborhoods**

The networks of travel within and between communities are critically important. Forward Pinellas has adopted a Vision Map based on the concept of 20-minute travel sheds and the idea that people should be able to accomplish many daily activities within a short distance. These travel sheds are shown in Figure 3.7.
as a Vision Map and help identify connectivity, safety and accessibility needs.

The 20-minute concept is reflective of how Forward Pinellas considers the function of the Countywide Plan. Forward Pinellas uses the Plan to promote growth while maintaining the individual characteristics of each community. The Plan is also used to look comprehensively at the entire County for consistency of the transportation network and land use patterns.

Central to the 20-minute neighborhood concept, are places that present the opportunity for convenient, safe, non-automobile access to the places people need to go to as part of their daily routine (e.g., transit stops or stations, grocery stores, schools, parks, and social activities). However, there are often barriers that discourage people from walking, biking or taking transit as part of their daily routines. Wide roads with fast-moving traffic, crossings that are separated by long distances, lack of shade, and infrequent bus service all conspire to force people into driving unless they are physically or financially unable to own or operate a car. By focusing on planning for 20-minute neighborhoods, we have overcome barriers with smart investments in connectivity and accessibility for many types of trips, while still retaining mobility for longer distance travel.

**Investment Corridors**

Our citizens want transit connectivity as part of their mobility options. To further support and enhance our attractive and unique destinations, Forward Pinellas and its partner agencies conducted an analysis to

The 20-minute travel shed graphic highlights employment hubs and walkable centers within Pinellas County. The travel sheds were developed based on 10 and 20-minute travel zones which focus on the idea that the travel sheds promote other travel modes (such as walking, biking, and transit). The graphic also highlights the importance of regional travel connections which connect to the centers, but not necessarily via the current roadway walkable network.

![20-Minute Neighborhood Concept Vision Map](image)
determine the locations best suited for enhanced transit service, based on population, employment/workforce development, redevelopment, and affordable and workforce housing factors. The individual components within these factors were selected based on the availability of data and linkage to transit propensity, at a small geographic level. For example, neighborhoods with low density housing or jobs received low scores for those components, given the challenges to connect those locations to transit. Areas with work force development opportunities, higher than average zero car households and affordable housing generally scored higher for those components, which support transit use.

A composite map of the scoring for all the factors was developed for each US Census Block in the County. After calculating the scoring, Forward Pinellas studied the best routes to connect the areas with a high propensity for transit. These routes were identified as priority corridors and were targeted for additional investment to establish limited stop, premium transit service (as funding is available). The priority corridors that scored among the top three connect to the Central Avenue Bus Rapid Transit (under design by PSTA), and the TBARTA Regional Bus Rapid Transit PD&E (initial planning phase) projects. Providing an initial grid system of premium transit service, the entire network of planned priority corridors would be supported by feeder route service and other connector services that provide access to people who do not live, work or attend school near the planned routes.

The priority corridors are designated as multimodal corridors on the Land Use Strategy Map, shown as Figure 3.8. The Land Use Strategy Map is part of the Forward Pinellas Countywide Plan. This designation allows for increased densities and intensities that would encourage transit supportive development. This approach to transportation investments and future growth will serve to protect our established neighborhoods and enhance the areas best suited for additional growth and redevelopment.
Advantage Pinellas lays out a vision for future transportation investments and supporting land use patterns that improves access to the attractive and unique destinations in the County. The following section discusses strategies Forward Pinellas has implemented to achieve our vision of mobility to our many unique and attractive destinations.

Additional Density/Intensity in Activity Centers to Incentivize Redevelopment

Long range transportation efforts are matched with additional density and activity centers to incentivize redevelopment are successful when land use patterns are supported by transportation options.

How do we get there?

One way to achieve the goal of improving access to our County’s attractions is by supporting local land use and community development initiatives. Recent examples are discussed.

Indian Rocks Beach Visioning Plan

Forward Pinellas partnered with the City of Indian Rocks Beach to develop a growth strategy. The City is a vibrant beach community located along the Gulf of Mexico in mid Pinellas County. To guide future growth, Forward Pinellas teamed with City staff throughout 2019 to develop a plan for the community that reflected the City’s goals and priorities with a focus on the Gulf Boulevard corridor. See Figure 3.9 on the next page for boundaries of visioning study.

This study built on the research and recommendations presented in the Indian Rocks Beach Special Area Plan: A Vision for Growth and Development, conducted in 2009 by the Florida Center for Community Design and Research at the University of South Florida. Three workshops were held to gather input and data from the public, and an extensive existing conditions and indicators analysis was conducted. The indicators analysis was created in an online platform that featured key data on the City’s existing land use conditions in an interactive format. Additional stakeholder interviews were also conducted throughout the visioning process to ensure understanding of the community’s position on key elements presented in the report. Based on the input the study team received and the data gathered, four key overarching themes were identified: Economic Vitality, Community Character, Transportation and Mobility, and Quality of Life and Environmental...
Protection. The City will use these guiding principles to implement its Visioning Plan.

Alternate U.S. 19 Cultural Corridor

The Alternate U.S. 19 Cultural Corridor was a public engagement initiative led by Forward Pinellas, in partnership with Creative Pinellas, to elevate Alternate U.S. 19 and the surrounding areas as a destination for arts and culture. Art is fundamentally important to the health of a community being on both individual and societal levels. It improves health outcomes and academic performances, and boosts economies. Figure 3.10 provides a sampling of information about the study. The study sought to reinforce community identity, history, and commerce from Largo to Tarpon Springs, an area that includes connections to and overlaps with the Pinellas Trail, one of the County’s premier cultural assets. The project identified opportunities to incorporate the arts and culture into transportation infrastructure, shared public spaces, and the built environment.

These areas of Pinellas County are significantly different from other parts of Tampa Bay. They include maritime culture, numerous arts/cultural advocacy organizations, a number of Greek, Scottish, African-American and other ethnic enclaves, a growing number of diverse culinary offerings, historic districts and reasonably-priced commercial space. Phase 1 of the Alternate U.S. 19 Cultural Corridor was completed in 2019 and additional phases of the project are still pending.
Forward Pinellas Complete Streets Grant Program

Forward Pinellas has developed an incentive program to assist local governments in planning and constructing complete streets projects, particularly those with the potential to serve as a catalyst for transformative redevelopment within a corridor or activity center. Complete streets are roadways designed and operated to enable safe access for everyone, including pedestrians, bicyclists, public transportation users and motorists. The program awards up to $100,000 annually to develop complete streets concept plans, and up to $1,000,000 annually to construct them. The grant program criteria incentivize applicants to address land use policy that support proposed complete street improvements. The program is in its fourth year of funding, with more than $4 million already awarded for nine projects Countywide, including cities and unincorporated areas.

Forward Pinellas believes that every public right-of-way should be planned, designed, constructed, reconstructed, operated and maintained for people of all ages and abilities. In addition to providing funding assistance, Forward Pinellas provides technical assistance to encourage local governments to adopt complete streets policies and action plans.

An example of a 2019 complete streets project for the City of Dunedin is the Skinner Boulevard Complete Streets Project, which builds upon economic development in the Artisan District of the City. The complete streets study addressed safe transportation options for adjacent land use and connections to businesses, high-density residential and the Pinellas Trail. A sample rendering shown in Figure 3.11. The Complete Streets Grants Program allows Forward Pinellas to leverage its funds to local governments for projects that

![Conceptual Streetscape](Figure 3.11: City of Dunedin, Skinner Boulevard Complete Streets Concept. Source: Forward Pinellas)
create safer and more accessible and economically vibrant streets while furthering its LRTP objectives. Further, as the Countywide Plan and transportation planning agency, we are able to incorporate a land use/redevelopment angle into the funding of projects. We request governments to demonstrate how their complete streets project will serve as a catalyst for private sector redevelopment that is consistent with and supportive of the Countywide Plan.

Enhancing Connectivity to Our Beaches

Investing in our Bridges is an important local and regional priority. Pinellas County is home to ten bridges connecting the mainland of Pinellas County to our various beach communities. These crossings each handle anywhere from 10,000 to 40,000 vehicles on an average day, with many more in our peak tourist seasons. Maintaining the reliability of these crossings is of critical importance to ensure that access to our beach communities is maintained and not a deterrent to our residents and visitors.

With coordination support from Forward Pinellas, Pinellas County and the state have invested significantly in the maintenance of these bridge crossings and the construction of replacement structures, as needed. Given the high level of boating activity in the waters near these bridge crossings, older, drawbridge style bridges must open often to allow taller boats to pass through, creating significant delays to vehicles, bicyclists and pedestrians seeking to cross above. As these bridges are in need of replacement, consideration is given to constructing new fixed-span structures with enough clearance space below to accommodate tall watercraft. These new structures help to maintain dependable access to our beaches, further enhancing each of these unique communities.

Corridor Connectivity

S.R. 60 is a state highway in Pinellas County, and is one of the County’s most important regional transportation corridors, serving a number of destinations, communities, and mobility needs. This corridor is also a vital gateway for residents and tourists traveling between Pinellas and Hillsborough Counties. S.R. 60 has many local names, such as Courtney Campbell Causeway, as it crosses the Upper Tampa Bay. S.R. 60 is also called Gulf-to-Bay Boulevard once it crossed into Pinellas County. SR 60 provides access to many residential and commercial uses and serves as the primary connection to activity centers such as Downtown Clearwater and Clearwater Beach.

S.R. 60 is also popular for its vistas of Tampa Bay and a very popular location for bicycle and pedestrian activity. The Causeway provides a continuous separated trail (National Courtney Campbell Scenic Bicycle and Pedestrian Trail) that connects Pinellas
and Hillsborough Counties. Pinellas County has funded an overpass at the west end of the Causeway to increase safety for all uses crossing S.R.60, and will provide a connection to the Pinellas County trail system.

Forward Pinellas is studying ways to improve multimodal connectivity by developing an express bus route for the SR 60 corridor linking Clearwater Beach, Downtown Clearwater, and Tampa International Airport. A recent addition is the express bus route 300, which service the airport and downtown Tampa.

Forward Pinellas is working with the City of Clearwater, Pinellas Suncoast Transit Authority (PSTA), Pinellas County and FDOT to explore a range of transit options that could enhance access to Clearwater Beach from downtown Clearwater and beyond. These options include aerial transit and a busway, which would allow for people to travel to the beach without increasing congestion on the Clearwater Bridge span of S.R. 60.

West Bay Drive

West Bay Drive is an important east-west corridor in Pinellas County, leading to the Belleair Causeway Bridge and the Largo Medical Arts District. Lined with a variety of commercial businesses, the corridor provides a linkage between the Pinellas Trail and our beach communities and lacks safe accommodations for non-motorists.

In 2017, Forward Pinellas developed a pilot complete streets concept plan for the corridor to address the needs of all users, while maintaining four vehicle travel lanes. To enhance safety and connectivity, it is recommended that a wide sidewalk be provided along the corridor and that access management strategies be considered to better manage vehicle travel speeds and reduce conflict points. The recommendations of that plan are being further evaluated by Pinellas County and Forward Pinellas will remain engaged in the process to improve safety and access for all users on corridors that connect to our beach communities.

Curlew Road Corridor

At the west end of the Curlew Road Corridor are two State of Florida beach parks: Honeymoon Island State Park and Caladesi Island State Park (accessed by ferry from Honeymoon). These parks welcome more than 1 million visitors each year. The Honeymoon Park area is the most popular state park destination in Florida. Maintaining dependable access to this destination is critical for the local economy, both at the park and for the businesses located nearby. Honeymoon Island is accessible from the Pinellas Trail system.

The City of Oldsmar is located at the east end of the corridor, one of the major employment centers for Pinellas County and the region, and where a significant portion of our future employment growth is expected to be located. The Curlew Road corridor is serving a variety of functions and maintaining the dependability of it is of vital importance. Forward Pinellas has worked with FDOT to prioritize funding for a corridor study for Curlew Road, with the goal to identify operational and safety improvements to enhance access to our beaches and maintain accessibility for employers and residents that depend on this corridor to get to their destinations.

With Clearwater Beach being one of the region’s top tourist destinations, and no existing direct transit connection to beaches from the airport, improving connections along this key corridor would help to provide additional options for the millions of tourists visiting Clearwater Beach and other unique destinations around SR 60.

Enhanced Beach Transit

There are several transit and trolley routes in Pinellas County that connect beach communities and destinations. These services allow residents, visitors and workers to travel to and along the beach without requiring a car and additional parking spaces, a limited commodity.

Forward Pinellas is working with partner agencies to explore a busway that would connect downtown Clearwater to Clearwater Beach, which would expedite
travel from Tampa International Airport through an express transit service and potential dedicated lanes for transit across the Clearwater Bridge. The same busway would be used by the Jolley Trolley, connecting Tarpon Springs, Palm Harbor and Dunedin to Clearwater Beach. Further enhancing the services provided by the trolleys that run along the beaches, such as adding more vehicles to increase headways, would provide even more options for people to get around our beach communities without having to use personal vehicles.

Central Avenue Bus Rapid Transit

Forward Pinellas works with PSTA and its regional partners to study, plan for, and implement the public transportation options in and around Pinellas County. This includes enhanced and alternative forms of public transportation, such as the Central Avenue Bus Rapid Transit (BRT) project.

The preferred alignment for the Central Avenue BRT runs 11 miles from downtown St. Petersburg to Gulf Boulevard in St. Pete Beach. This alignment meets the Central Avenue BRT primary project goals of strong ridership, high population density, number of hotel rooms and potential to reduce traffic congestion. Forward Pinellas will also be a partner in an upcoming study of transit-oriented development and pedestrian improvements along the corridor. The BRT is currently under design and in the federal process for funding. PSTA projects the BRT will begin operations within the next few years, but the schedule is based on the provision of federal funding.

Other Local Government Efforts

Linking Lealman

A distinct, unincorporated community, the Lealman area was identified as Pinellas County’s first Community Redevelopment Area (CRA) in the unincorporated area in 2016 following a finding of distressed physical conditions and persistent indicators of economic distress. The CRA Plan found that substandard and inadequate transportation facilities contribute to disinvestment in the community and quality of life concerns. The award of a Complete Streets Grant from Forward Pinellas helped the County develop the Linking Lealman Action Plan, a community-based complete streets and mobility plan to improve transportation, economic opportunity, and quality of life.

Many people walk, bike and take the bus in Lealman, and many have limited or no access to personal cars. Unfortunately, only about 30 percent of the streets in Lealman have sidewalks, and there are very few bicycle lanes and trails. Pinellas County has been working to improve transportation in the Lealman area and has recently completed some needed improvements, such as the rehabilitation of a large portion of Haines Road. However, there is still a lot of work to be done, and Linking Lealman lays out a strategy to implement projects over time. A few “quick win” projects have already been completed, and additional projects are identified in the Pinellas County Capital Improvements Program for design and implementation. The County is also pursuing alternative implementation strategies to continue to increase mobility for all Lealman residents, regardless of their age, ability, or mode of transportation. Forward Pinellas will continue to work with the County to implement the recommendations of Linking Lealman to improve and enhance this community.
StPete2050

In 2019, the City of St. Petersburg initiated StPete2050, a citywide conversation about where the City is going and what it can become over the next 30 years. Following up on the Vision 2020 Plan developed in 2002, StPete2050 seeks to engage residents throughout the city so that the process is driven by the citizens of the city. Focus areas for consideration include, but are not limited to: sustainability, health and wellness, energy, mobility, housing, education, equity, diversity, community character and the economy. St. Petersburg is the County’s largest city and includes a variety of unique communities and destinations within its own boundaries. StPete2050 will seek to build upon that foundation to develop a blueprint for St. Petersburg’s long term success. Forward Pinellas will remain engaged in this citywide conversation and assist the City in the implementation of their planning efforts, as applicable.

Imagine Clearwater

The City of Clearwater includes a number of educational, cultural and recreational attractions. Among its most unique assets is the downtown waterfront. A waterfront bluff is unique to Florida’s coastline, providing unparalleled views of the Intercoastal Waterway and Clearwater Beach, which has been named the #1 beach in America. Home to Coachman Park and the Main Library, the waterfront is an important community gathering place and civic asset but is also underutilized. Building on the strength of the site, the City of Clearwater undertook the Imagine Clearwater effort to develop a transformative vision for its waterfront. Imagine Clearwater will greatly expand and transform the area into a diverse, active, engaging park intended to be a work of artful design in its own right. It will serve as a destination for the community and region and provide a strong connection to downtown Clearwater.

Downtown Palm Harbor Master Plan

Palm Harbor is an unincorporated community located in northern Pinellas County. In 1994, community members recognized the need to create an attractive downtown that would maintain the character and heritage of the area, and the Downtown Palm Harbor Master Plan was created in 2001. The County staff revisited the community in 2018 to identify the latest issues and opportunities within the downtown area. The County worked with the community through a series of focus group meetings and open houses and resulted in a parking study, a retail study, an up-to-date historic survey, a petition to determine the community’s desire to become a golf cart community and several other in-depth considerations for the downtown. This research and analysis framed the current version of the Downtown Master Plan. One of the major outcomes of the Plan is the development of Form Based Code for the community. Partially funded by a Forward Pinellas grant, the new code will allow for a more holistic approach to planning actions in the area, by providing a more predictable approach to zoning in areas with traditional, historic development patterns and street networks, like in Palm Harbor.
This resilient advantage includes identifying infrastructure and areas that are vulnerable to climate hazards. Forward Pinellas is coordinating with our local and regional partners to strengthen our existing assets and develop adaptation and mitigation solutions using the most current and available data. Infrastructure built today is expected to last a long time. However, we do not know for certain the extent of vulnerability in the future. According to the National Oceanic Atmospheric Administration (NOAA), between 2008 and 2019, the number and frequency of billion-dollar (adjusted for inflation) disasters in the U.S. has far exceeded the historic average (APA PAS Report 596).

Today’s infrastructure must withstand over its lifespan changes to our climate patterns such as less frequent, but more intense storms, increasing rates of inland and coastal flooding and rising sea levels. For Pinellas County, sea level rise is likely to compound the impacts of smaller, more common storm events causing flooding that temporarily closes streets, prevents access to our homes, and impacts our economy. The most pressing need for resiliency planning is to maintain roadway operations and limit response times for public services such as police, fire, public transit and access to medical facilities during and after an event.

Forward Pinellas understands a resilient community faces many challenges. Fortunately, our County and 24 cities are already investing time and resources to prepare for future conditions. We know that facing the more difficult issues now equates to preserving our advantage as a resilient, coastal county.

Advantage Pinellas was developed with a focus on future preservation, with extensive technical and community input. The Plan represents projects and investments that move us locally and regionally towards a more resilient community.

Based on comments from surveys, community events, SPOTLight Initiatives, the Gateway/Mid-County Master Plan and focus groups, Forward Pinellas has documented the concerns of our citizens related to our future resiliency. Our citizens are keenly aware of the climate hazards that are driving the need to plan differently. They look to the County and Forward Pinellas to direct growth and redevelopment to areas in Pinellas that are less vulnerable. Planning
A resilient community is where our residents want to live. They feel fortunate to live in a county with an abundance of beaches, parks, natural lands and waterways. They value their unique communities and access to all forms of recreation, but they understand our County is vulnerable and the safety and protection of existing assets must be considered as we grow. They want their families to continue enjoying the benefits of

“Transportation investments need to be made with future sea level rise and surge risk and higher temperatures in mind.” [we] are attracted to live by natural edges, and real estate and economic development recognizes this...managing population and employment in vulnerable areas is a more realistic solution.

~ Pinellas County Residents (responses to the 2018 Regional MetroQuest Survey)

differently requires we focus redevelopment to areas with access to roadways that can provide consistent and reliable public transportation and private mobility options during our normal routines and during times of hazardous events and unsafe conditions.
Pinellas far into the future and they want their homes, businesses and quality of life protected, to the fullest extent possible.

Aging and deteriorating coastal protection barriers and water infrastructure are especially notable climate hazard concerns for Pinellas County with potential impacts in the billions of dollars for reconstruction and maintenance costs of infrastructure for wastewater, sewer, public facilities and services supporting our 24 cities and County.

Table 4.1 lists the infrastructure sectors and facilities that are considered by government in determining infrastructure sectors and infrastructure types that could be impacted by more intense, frequent storm and flood events or other climate hazards.

<table>
<thead>
<tr>
<th>Infrastructure Sectors and Types</th>
<th>Infrastructure Type</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water, wastewater and stormwater</td>
<td>Water and wastewater treatment plants, distribution systems, drainage, retention</td>
</tr>
<tr>
<td>Transportation</td>
<td>Roads, bridges, public transit, airports, ports</td>
</tr>
<tr>
<td>Public facilities</td>
<td>Community Centers, schools</td>
</tr>
<tr>
<td>Energy</td>
<td>Electric grid of municipal utility</td>
</tr>
<tr>
<td>Parks and open space</td>
<td>Public Parks, bike trails</td>
</tr>
<tr>
<td>Health and emergency management services</td>
<td>Fire and police stations, emergency operations centers</td>
</tr>
<tr>
<td>Coastal protection</td>
<td>Groins, jetties, seawalls, dams</td>
</tr>
</tbody>
</table>

Forward Pinellas fosters responsible stewardship of our resources by implementing policies that direct how and where we grow based on our County’s ability to withstand changes to our climate patterns. Pinellas County has coastline, low-lying areas and natural lands that are extremely vulnerable to changes in the natural environment and intense storm events. Yet, Pinellas County’s vulnerable areas are one of our greatest natural assets, economic drivers and benefits of living in this beautiful region.

This resilient advantage includes identifying infrastructure and land use areas that are less vulnerable to climate hazards and able to support additional growth. Pinellas County has experienced significant growth since the 1920s, and where and how land was developed was not based on the environmental conditions of today. As we continue to build housing and new commercial/industrial space, and redevelop underutilized properties, Forward Pinellas is using these opportunities to address resiliency and redevelop, for example, higher density housing along our existing infrastructure such as on US 19 and SR 688 in the Gateway/Mid-Town area. The decisions that we make today on how, and where, to accommodate development will significantly impact our future transportation infrastructure, and the delivery of mobility services through the year 2045.
due to sinking land and a slowing Gulf Stream, as tracked for Pinellas County by the Tampa Bay Regional Resiliency Coalition.

But this challenge is not unique to Pinellas County. In fall 2019, the City of Venice, Italy experienced the worst flood due to sea level rise the City has endured in 50 years with extensive damage to homes, historic structures and archives totaling in the millions of dollars. Venice’s “acqua alta” (high water) has happened much more often in recent years, from less than 10 times per year in the early 1900s to more than 60 times per year during the past 10 years.

In Florida, Miami-Dade County formed a Sea Level Rise Task Force in 2013 and is developing a multi-faceted project approach to identifying mitigation and adaptation strategies. This includes analyzing multiple “adaptation pathways” and quantifying the economic cost of inaction.

Forward Pinellas is an active collaborator with the Tampa Bay Regional Resiliency Coalition. The Coalition is supported by the Tampa Bay Regional Planning Council and includes 29 governments and more than 80 partners all working together to address the impacts of changes to our climate patterns. The Coalition defines common vulnerability assessment methods, shares data, defines priorities, and engages members on how to communicate issues to elected officials and the public.

Planning for our County’s resiliency and developing adaptation and mitigation solutions is a common concern both locally and globally. Fortunately, Pinellas County has many partners in our quest to achieve our resilient community advantage.

“Living in the Tampa Bay region, we truly live in paradise, but living in paradise comes with great responsibility.”

~Pinellas County Commissioner Janet C. Long

Transportation Infrastructure

Protecting our natural resources from changes in climate patterns and providing reliable transportation to our residents, tourists, businesses and goods movement industries for both normal routines, as well as during emergency situations, are critical to our region’s economic vitality. Forward Pinellas coordinates with numerous agencies to plan for continued investments to enhance our advantage as a resilient community.

Tampa Bay’s economic drivers, such as our industries, community focal points and our beaches, support millions of tourists each year. Our transportation system is a critical link in our robust economy as it must connect us locally and regionally to goods and services. Tampa Bay provides more than 80 miles of deep-water shipping channels that keep the Tampa Bay area competitive for industries such as shipping and travel by cruise ship. Three seaports are located along the bay’s borders: Port of St. Petersburg, Port Tampa Bay and Port Manatee. The largest of these, Port Tampa Bay, consistently ranks among one of the busiest ports in the nation. Reliable transportation infrastructure to these ports is critical to maintaining the flow of goods for the trucking and rail industries and for tourism.

Planning for resiliency and transportation connectivity is also critical to air transportation, with St. Pete-Clearwater International Airport (PIE) located on Upper Tampa Bay in the Gateway/Mid-County area. PIE is a key hub for Pinellas County’s ability to prepare and respond to natural disasters bringing in supplies before events occur. PIE, located in a low-lying area on the shoreline of Upper Tampa Bay, is required to close if storm events escalate to dangerous and unsafe conditions for the staff at PIE.

Maintaining access to PIE for event preparation and response is extremely important. Forward Pinellas, Pinellas County Emergency Management and PIE work together continuously on resiliency planning and required investments in infrastructure in the Gateway area. Forward Pinellas recently completed a Gateway/
Mid-County Master Plan in late 2019 that addresses infrastructure required to maintain operations as PIE, such as the elevated Gateway Express Toll Facility (scheduled to open in 2021). The Master Plan also addressed surrounding land uses in relation to directing growth to infrastructure that is less vulnerable to changes in climate patterns and climate hazards such as flooding.

Forward Pinellas considered impacts to our vulnerable roadways, public transportation system and priority transit corridors as part of the Needs and Cost Feasible Plan priority process. Early engagement and coordination improved the resiliency planning process. Forward Pinellas hosted the LRTP Environmental Consultation Workshop with our regional MPOs and consulted with local, state and federal agencies as part of identifying vulnerable transportation assets. Forward Pinellas participated in the Resilient Tampa Bay: Transportation Pilot Program, see Appendix N, which included mapping of vulnerable transportation infrastructure for use with the regional and local LRTPs.

Pinellas County has infrastructure and access to our natural lands and waterways dating back to the early 1900s. Many roads, bridges and local parks and piers in the Tampa Bay region are older and susceptible to flooding due to low elevation within flood zones or are near the coast. Advantage Pinellas recognizes that design plans associated with transportation projects should account for rising sea levels as projected over the lifespan of the infrastructure.

Advantage Pinellas considered the reduction of greenhouse gas emissions during development of projects for the Plan including the Active Transportation Plan and the Transit Plan. The Plan dedicates close to 100 percent of our flexible funding sources to projects that address safety, accessibility, transit and technology to develop a more sustainable transportation system that is less reliant on single occupant motor vehicle travel.

### Natural Lands and Parks

Our County protects our residents’ ability to pursue recreation activities and leisure time. This includes preservation of 35 miles of beaches, 20,000 acres of county parks, numerous piers and municipal parks, three State of Florida parks and two County preserves (Weedon Island and Brooker Creek). This is no small task and our residents are keenly aware of how important these assets are to our local economy.

Another important consideration as we plan for increased mobility is the potential environmental impacts to our natural lands. Surrounded by water and
containing numerous environmentally significant lands, Pinellas County faces the challenge of addressing new growth while maintaining and enhancing the quality of our natural habitats.

Forward Pinellas conducted a review of impacts to our existing recreation, natural lands and parks for capacity and complete streets projects considered during the Needs and Cost Feasible Plans. Forward Pinellas consulted with the cities, Pinellas County Parks and Recreation and Public Works, and many other sources to evaluate the environmental protection priorities for these agencies and to identify any conflicts with proposed design or locations of the projects. In addition, Forward Pinellas hosted an Environmental Consultation Workshop, see Appendix M, to address regional concerns to natural lands and wetlands.

Figure 4.1 shows an inventory of recreation, natural lands and parks. The analysis considered both the potential impacts, as well as opportunities for connectivity and improved mobility. Extensive coordination was conducted with natural resource and permitting agencies to ensure that any potential environmental impacts of Advantage Pinellas were considered at the earliest possible stage of project development.

**Resiliency Challenges and Opportunities**

The following sections summarize environmental issues that Forward Pinellas considered when developing Advantage Pinellas. The benefits and impacts of transportation improvements relative to resiliency were analyzed based on equitable distributed throughout all communities in Pinellas County.
Rising Sea Levels

Tampa Bay’s geographic location and topography lends itself to rapid changes with slight variation in sea levels. The combination of low slopes and low elevation add up to an increased vulnerability with sea surface level changes. Based on elevation alone, a considerable area of the Tampa Bay region is under 6-foot elevation. Low-lying coastal areas with higher density development in Pinellas County are most at risk to the physical effects of rising sea levels and tend to have population concentrations and development intensity at or near the coast.

Pinellas County is preparing for climate change impacts and incorporating new data into our analysis as it is released by the scientific experts. Forward Pinellas is a supporter of the Tampa Bay Regional Resiliency Coalition, and together we are addressing potential impacts regionally. The Coalition partners with the Tampa Bay Climate Science Advisory Panel (CSAP), an ad hoc network of scientists and resource managers working in the Tampa Bay region to develop science-based recommendations for local governments and regional agencies as they respond to climate hazards. See Appendix M for a summary of the environmental mitigation and resiliency workshop hosted by Forward Pinellas at Brooker Creek for the most recent projection on sea level rise in the Tampa Bay region as of April 2019.

The timeframe for when our coastal areas will be permanently impacted can only be speculative based on a hybrid of information and projections. Project development for Advantage Pinellas considered multiple resources and studies. The United States Army Corp of Engineers (USACE) has three rates of sea level rise: low/historical, Intermediate, and high, as described in the USACE Engineering Circular EC 1165-2-212 (2012). All three sea level rise rates were integrated into the Florida Sea Level Scenario Sketch Planning Tool, Phase 1, which was completed by the University of Florida GeoPlan Center in 2012 with funding from the FDOT’s Office of Policy Planning.

The purpose of the Sketch Planning Tool was to facilitate the identification of transportation infrastructure potentially at risk from projected sea level changes. The tool visualizes various sea level scenarios at future time periods in an effort to inform transportation planners by identifying infrastructure for potential avoidance, minimization or mitigation.
The Sketch Planning Tool was run for Pinellas County using the “worst-case scenario” input values of (1) USACE “high rate” of sea-level rise, and (2) “higher” high tide for 2020, 2040, and 2100, as shown on Figure 4.2. The resulting three surfaces show the maximum potential areas of Pinellas County that would be affected by sea level rise by 2100. Areas to note by 2040 (dark blue and turquoise on Figure 4.2) include the east side of Honeymoon Island, the area just north of the west end of the Courtney Campbell Causeway, the east side of the County near the Howard Frankland and Gandy bridges, and parts of the Fort DeSoto islands. The 2040 potentially-affected areas represent 3.2 percent of Pinellas County.

Potential areas of high-tide inundation to note by 2100 (light green) include the low-lying sections surrounding the Anclote River in Tarpon Springs, expanded areas on the east side of the County near the west ends of the Howard Frankland and Gandy bridges, land adjacent to St. Joe’s Creek and Lake Seminole, land adjacent to Lake Maggiore, significant sections of Fort DeSoto, and much of the barrier island system on the west side of the County. The 2100 potentially affected areas represent 16 percent of Pinellas County.

Since this map is a potential “worst case scenario” by 2100 and shows the “high” high tide in the “high” USACE sea level rise rate, it is also possible to identify areas where sea level rise is not likely to have an impact within the next 100 years, which includes a majority (83 percent) of Pinellas. This is important for considering where to direct growth in the future.

Forward Pinellas also considered potential impacts to the water supply distribution system, sewer system, and solid waste systems maintenance as part of the LRTP prioritization process. Rising sea levels increase the likelihood of saltwater intrusion to groundwater aquifers. It may be of benefit to change land use designations in affected areas, relocating critical infrastructure or engineering retrofits to non-critical buildings to accommodate potential intermittent inundation.
Future land use conflicts were also addressed in relation to transportation projects such that the location of new critical buildings or infrastructure could avoid future growth or at least redirect redevelopment away from the County’s coastal high hazard areas.

Despite varying projections regarding the impacts from sea level rise to coastal communities, Pinellas County is vulnerable to even short-term, direct effects of sea level rise with temporary inundation during high tides is already occurring in low lying areas of Pinellas. Local community infrastructure preservation is a priority as Forward Pinellas works with our small coastal communities to address land use and transportation planning actions that promote resiliency on local roads and existing infrastructure.

Pinellas County photos taken in fall 2019 illustrate an example of impacts of a storm occurrence at high tide for a coastal community and the potential for greater impacts during high tide to many roads and developed areas. Safety Harbor is a small coastal community in Pinellas, located on the banks of Upper Tampa Bay. Safety Harbor’s Veteran Memorial Plaza and Municipal Marina is adjacent to the Safety Harbor Resort and Spa, an international tourist destination, and provides recreation for both residents and tourists. Occasionally, a storm event will occur at the same time as high tide and low-lying portions of the public park and access to the boat ramp will experience temporary flooding, but fortunately no major damage. The parking area and public walkways are higher and do not experience any significant impacts.

Sea level rise has the potential to dramatically affect Pinellas County’s transportation system in the next 50-100 years. Forward Pinellas coordinated with local and national expertise as projects were considered and selected for Advantage Pinellas. The benefits...
and potential for resiliency of each transportation improvement was a key factor, as well as the equitable distribution throughout all communities in Pinellas County. See Appendix L for the environmental justice analysis considered in relation to resiliency concerns as the Needs and Cost Feasible projects were prioritized.

**Inland Flooding**

Another area of concern is inland flooding due to extreme weather events, including intense downpours, tropical storms, and hurricanes. Shown previously, Figure 4.3 illustrates the potential damage from inland flooding. Pinellas County also considered the location of new development, or redevelopment, in relation to the ability of an area to drain properly during normal and high impact storm events. The County maintains an updated drainage basin map that is consulted as one of the factors in approving permits for development. Figure 4.4 is the current Pinellas Drainage Basin map with capacity projects and complete streets projects identified as an overlay. Forward Pinellas considered the potential for inland flooding as part of the project development process.

Inland flooding has the potential to have significant impacts on our local and regional transportation system. The vulnerability of Tampa Bay regional transportation facilities is categorized (high, moderate and low) based on the maximum inundation depth under various model scenarios. For a Category 3 Storm plus a high sea level rise projection, nearly 40 percent of the transportation facilities within Pinellas County would likely be impacted. For a precipitation event of 9 inches of rain over 24 hours, just over 10 percent of the County’s transportation facilities would be impacted.

To put the concern of inland flooding into perspective, Figure 4.5 on the following page shows that an estimated over 500 centerline miles of roadways would be impacted by inland flooding for a Category 3 storm hitting Pinellas County. In comparison to our Tampa Bay neighbors, the centerline miles in Pinellas County equate to half the centerline roadway miles in Hillsborough County. Pinellas County has about 100 more centerline miles in jeopardy of inland flooding compared to Pasco County.

In 2017, the Tampa Bay region experienced Hurricane Irma. Projected to be a category 4 hurricane that fortunately was downgraded to a 2 when it made landfall, Hurricane Irma’s impact to Pinellas County was more from wind and cross tidal flow. Inland flooding was not a major issue after the storm had passed, but the wind damage was significant. As of January 2020, local Tampa Bay newspapers (Tampa Bay Beacon, Leader and Bee) reported the Department of Homeland Security’s Federal Emergency Management...
Agency awarded Pinellas County two grants totaling $9.6 million to reimburse the cost of debris removal following Hurricane Irma.

### Air Quality

The Federal Clean Air Act requires areas designed as nonattainment or maintenance by the Environmental Protection Agency to comply with certain regulations to determine the conformity of transportation plans with statewide plans to improve air quality. Pinellas County is not currently designated as a maintenance or nonattainment area, so a conformity determination is not required, but air quality was still an important consideration in developing Advantage Pinellas.

The Pinellas County Air Quality Division participates on the Forward Pinellas Technical Coordinating Committee and reviews all transportation projects for potential air quality impacts.

The Active Transportation and Transit portions of the Cost Feasible Plan were developed with air quality as a consideration during project prioritization. In addition, using technology to better optimize the flow of traffic on our roadways is another tool utilized in Pinellas to mitigate air quality impacts of the transportation sector. Advantage Pinellas has dedicated 100 percent of the flexible funding sources to projects that improve mobility and access, without adding physical capacity to the roadway network thus helping to minimize air quality impacts.

### Wetlands

Wetland impacts are one of many regulated activities in the Environmental Resource Permitting (ERP) Program managed by one or more of three governmental regulatory bodies: the Florida Department of Environmental Protection, five statewide Water Management Districts or the USACE.

Pinellas County annually updates the Wetlands Map, shown as Figure 4.6. Based on the locations of wetlands throughout the County, Forward Pinellas works with the Pinellas County Public Works Department and the
FDOT to review transportation and land use projects to determine the impacts to these natural areas.

Permits for residential and commercial impacts to wetlands, including transportation facilities in Florida, are generally issued by one of the five Water Management Districts. The Water Management District in FDOT District 7 is the Southwest Florida Water Management District (SWFWMD).

Permits for transportation projects are tracked by the SWFWMD in an FDOT-specific mitigation plan that outlines impacts and their permitting status. Forward Pinellas coordinated with SWFWMD and FDOT D7 as projects were considered and designed for Advantage Pinellas.

To help preserve wetlands and protect them from larger scale development or transportation impacts, agencies often combine resources to construct passive parks or multiuse trails in areas that can be used for passive enjoyment. The Tri-County Trail is an example of providing an active transportation facility that traverses wetland and water recharge areas in both Pinellas and Pasco Counties and connects to the Brooker Creek Preserve. Forward Pinellas participated in the funding for design and construction (2014 to 2019) of the Trail with Pasco County.
Seagrasses

In addition to land-based wetlands, seagrass beds in Tampa Bay, Boca Ciega Bay, and the Gulf of Mexico surround Pinellas County and are a vital part of keeping the bay healthy. Seagrass beds are a very specific habitat (usually located in less than six feet of clean water) for a host of sea creatures, including providing a source of food for manatees. Impacts to seagrass beds are highly regulated due to the difficulty in establishing them elsewhere.

An example of consideration to seagrasses identified during a transportation project was the Northbound Howard Frankland Bridge Structure PD&E study conducted by the FDOT D7. Potential impacts to seagrass beds were considered when choosing the preferred alignment. To mitigate the impacts identified during the study, the FDOT D7 programmed the addition of a new tidal flow bridge on SR 60 (Courtney Campbell Causeway), which parallels the Howard Frankland. The Causeway is north of the Howard Frankland, but in the vicinity of the bridge project and tides flow underneath both transportation structures. The new tidal flow bridge (not functional for boats) was completed in early 2019 to both mitigate impacts to seagrasses during construction of the northbound span of the Howard Frankland bridge and to improve overall seagrass growth based on additional tidal flow and flushing of the Upper Tampa Bay estuary. This mitigation was completed prior to the construction of the northbound Howard Frankland Bridge (scheduled for 2021) confirming a commitment by the FDOT and the Tampa Bay region to maintain good water quality.

According to the Tampa Bay Estuary Program, Tampa Bay’s seagrass coverage recovery goal of 40,000 acres has been a goal since the 1950s. The Tampa Bay communities continue work towards this goal, and the Program reported in 2018 that seagrass...
acreage was estimated to be 40,618 acres. Much of this improvement is due to collective adherence to policies set by the Tampa Bay Nitrogen Management Consortium, which has invested more than $500 million in projects to reduce nitrogen pollution since the 1990s. In response to many nutrient reduction actions implemented by the Consortium, Tampa Bay has met and maintained numeric water quality (chlorophyll-a) thresholds to support seagrass growth. The SWFWMD aerial assessment is anticipated to be completed by late 2019.

**Stormwater**

Pavement and concrete are impervious to the infiltration of water. Stormwater runoff is the water that flows into our County’s drainage systems off roofs, driveways, parking lots and roads during storms or other activities such as watering our lawns and washing our cars. As development generally creates more impervious surfaces, water does not have time to be absorbed and flows into ditches, culverts, drainage pipes and directly into our waterways and the bay. Oil and grease from motor vehicles, litter and vegetation clippings from our yards and other debris are carried from our roads and bridges into our waters, leading to pollution and algae blooms. Reducing the impacts of stormwater runoff, including contamination, erosion and pollution, results in healthier waterways.

Pinellas County has a MS4 system, treating much of the stormwater runoff before it enters our surrounding water bodies. Other examples of actions that decrease impacts include designing bridges to collect run off such as the innovative design of the Bayside Bridge, and local actions such as bans on fertilizer during summer months, limiting nitrogen in fertilizers, and providing stations for picking up after pets.

Addressing stormwater runoff is critical as demonstrated by the significant negative impact of algae blooms and red tide as recent as 2018. According to projections from the US Fish & Wildlife Service, the 2018 red tide bloom spanned along every coast of Florida, killing 850,000 pounds of fish and sea life, at a cost of more than $130 million in clean-up and damages. Pinellas County had nearly $2 million in claims as recorded by Pinellas County Economic Development.

Large-scale projects may add design costs for stormwater mitigation such as with the I-275 express lanes project. Forward Pinellas and other partners considered options such as reconstructing existing roadway ponds to increase time for percolation and containments removal. FDOT maintains a mitigation bank and Forward Pinellas and other environmental agencies work together to consider the most efficient and feasible design options to mitigate stormwater runoff. The rewards of improving the health of Tampa Bay estuaries are numerous. As mitigating impacts is a priority for Pinellas County, consideration for the treatment of stormwater runoff to avoid polluting our surrounding Outstanding Florida Waters was reviewed by several cooperating agencies as projects were considered for Advantage Pinellas.
WHERE DO WE WANT TO BE?

Our residents understand that we must act today to protect and harden (reconstruct existing infrastructure) our existing systems and critical public sites such as treatment plants, parks, public buildings and schools. Planning for growth that is directed to areas that offer improved safety and prosperity of our communities is a key directive to our advantage as a resilient community.

Significant and sustained effort in the areas of planning, funding commitment, collaboration and community engagement are necessary to meet our resiliency challenges.Forward Pinellas has adopted a goal and supporting objectives and policies to address planning for resiliency as part of Advantage Pinellas.

Supporting Goal and Objectives

**Goal 2** - Develop and sustain a resilient community

**Objective 2.1** - Improve the performance of the transportation system through more efficient use of existing facilities and investments in technology.

**Objective 2.2** - Maintain transportation infrastructure in a state of good repair.

**Objective 2.3** - Facilitate the timely implementation of projects.

**Objective 2.4** - Assess the environmental impacts of every project in the LRTP and mitigate as appropriate.

**Objective 2.5** - Plan for, and adapt to, the potential impacts of climate change, including rising sea levels, on the transportation system.

See **Appendix B** for a full listing of the six goals and supporting objectives and policies for Advantage Pinellas. As we look to the future, Advantage Pinellas envisions a transportation system that is better equipped to accommodate and respond to impacts associated with weather related events and changing climate patterns. Forward Pinellas, through Advantage

CONSISTENCY WITH FEDERAL AND STATE PLANNING REQUIREMENTS

Our focus on developing a resilient community acknowledges that the Tampa Bay region is extremely vulnerable to the changing climate patterns and climate hazards such as rising sea levels and inland flooding. At the same time, our geography and natural assets, which in part make us vulnerable, attract residents and tourists alike to destinations throughout Pinellas County. Advantage Pinellas looks to enhance the resiliency of our transportation system while protecting our natural lands and existing communities and promoting redevelopment in areas that are less vulnerable.

Advantage Pinellas directly supports the FAST Act planning requirement to improve the resiliency and reliability of the transportation system. The Plan supports increased safety, accessibility, mobility, system management and preservation, and enhanced connectivity. It also directly enhances quality of life, environment, and promotes energy conservation. It further supports FDOT’s policies to identify transportation solutions that support Florida’s environment and conserve energy - resulting in the development of an agile, resilient and quality infrastructure.
Pinellas and the Countywide Plan, addresses the needs of a growing county by directing growth to areas that are less vulnerable or have been constructed (hardened) to withstand more extreme events.

The FAST Act requires incorporating resiliency strategies as part of developing an LRTP. Advantage Pinellas is based on strategies that address the reliability of the system, stormwater mitigation, inland flooding, storm surge and sea level rise.

### Regional Resiliency Coalition

Forward Pinellas is a supporter of the Tampa Bay Regional Resiliency Coalition which is being led by the Tampa Bay Regional Planning Council. Local input and regional coordination helped Forward Pinellas define actions that, in combination, improve the safety and reliability of our transportation network.

### Reliable System Performance

Improving the performance of our existing transportation system can play a role in developing a more resilient community. Figure 4.7 illustrates a diagram of how changing climate patterns and vulnerability assessments were integrated in the transportation planning process. The Coalition provided assistance with incorporating resiliency factors (e.g. location, design and costing) as part of developing projects for Advantage Pinellas.

Based on current analysis and reporting by Forward Pinellas for the FAST Act PM3 performance measures, 80 percent of the Pinellas County system is considered reliable.

Advantage Pinellas invests in solutions that improve reliability through adaptation strategies such as the hardening of roadways. For example, the I-275 Express Lanes project listed in the Existing+Committed network (see Chapter 8, Figure 8.5 and Table 8.1, FPN #424501-2) is considered potentially vulnerable.
Additional hardening of the roadway for the project was recommended to protect against future erosion and climate hazard impacts such as inundation from rising sea levels. The Resilient Tampa Bay: Regional Transportation Plan, see Appendix N, identified roadways most at risk during rain and storm surge events. The Plan recommended a toolbox of strategies to help mitigate risks for cost development for Advantage Pinellas. As part of the continuous review of Advantage Pinellas projects that come forward for state and federal funding, Forward Pinellas has committed to reviewing transportation projects in coordination with recommendations from the Resilient Tampa Bay: Regional Transportation Plan.

Technology

Technology investments can improve travel flow, enhance safety, and provide real time information to travelers. Intelligent Transportation Systems (ITS) is the application of advanced technology to collect, process and distribute information about the movement of people and goods. ITS applications locally and regionally provide travelers with important real time information on congestion and incidents. ITS applications improve travel decisions and the overall safety and efficiency of the transportation system. Pinellas County employs many ITS solutions using electronics, computers, communications, and advanced sensors to manage traffic flow and incidents on a 24-hour basis.

Advantage Pinellas includes goals and objectives to support investments in technology to improve traffic management and system performance using ITS. With new technology advancements, it is likely that over the next 25 years we will be employing technologies that are only conceptual today. For this reason, funding has been set aside in Advantage Pinellas as a percentage for future ITS applications, and other technological solutions, that may be available in the coming years.

The County’s state-of-the-art Traffic Control Center is a great example of how the County has invested in technology as a way to improve the efficient and safe movement of people through Pinellas County. The County also has a dedicated funding source (9-cent fuel tax) for ITS investments and is committed to providing additional funding going forward to further enhance and update the system as future technologies are identified.

Travel demand management programs are another way to focus on improving the overall performance of our existing transportation system. The TBARTA vanpool program is one example of a regional program that is available to residents in several counties. The TBARTA program includes 190 vans in use regionally, with approximately 40 vans operating in Pinellas County as of 2019.

Waterborne

Our residents look to the advantage of a resilient community as a guide for investing in modes that are reliable and relieve congestion on our system. An example of a mode available to a coastal county is waterborne transportation. Pinellas County has two
A RESILIENT COMMUNITY

CHAPTER 4

4.19 ferry services operating as of 2019 that are located on opposite sides of the County. The Clearwater Ferry is on the west side of the county and used to access employment and entertainment. The waterborne routes connect our unique communities of Dunedin, Downtown Clearwater and Clearwater Beach, with stops situated along the water. The main roadway to Clearwater Beach can be heavily congested, particularly during peak tourist season, and accessing this regional asset can be a challenge. The Clearwater Ferry provides a reliable option to reach both employment and attractions destinations, uninhibited by roadway congestion.

The Cross-Bay Ferry is located on the east side of the County and started as a pilot project. This regional effort was designed to lay the foundation for permanent ferry service connecting the Vinoy Basin in downtown St. Petersburg and the Tampa Convention Center in downtown Tampa (with potentially additional future locations). As the ferry service provides access to our two largest downtowns in the region, it can be used for employment and to visit many community focal points on either side of the bay. The ferry service program is a collaboration between St. Petersburg, Tampa, Hillsborough County, Pinellas County and the FDOT7.

The Cross-Bay Ferry docking area is located along the waterfront and can be accessed by transit, cycling and walking. With only three bridges and limited land crossings between Hillsborough and Pinellas, the Cross-Bay Ferry offers a scenic and reliable mode for travelers to avoid sometimes very lengthy roadway bottlenecks in the region.

Advantage Pinellas recognizes the important role that waterborne transportation can play in our multimodal transportation system. Through this Plan, funding has been set aside to improve both local and regional transit services, that could include an expansion of the waterborne transportation network. Forward Pinellas has committed to working with local, regional and state partners to identify potential future ferry services and to develop funding programs to help advance the expansion of this transportation asset for our communities.

A State of Good Repair

Advantage Pinellas recognizes the importance of maintaining our transportation infrastructure in a state of good repair. By preserving our current infrastructure, we can provide a more reliable and efficient transportation network far into the future. Forward Pinellas works toward a state of good repair and coordinates with our local and regional partners to prioritize major bridge projects for reconstruction and to design bridges for pedestrian and bicycle connectivity. Forward Pinellas regularly coordinates with local implementing agencies on land use and transportation improvements on resurfacing projects to ensure that the needs of all users are considered. See Appendix A, the Advantage Pinellas Performance Report for pavement and bridge condition performance measures.
Forward Pinellas also tracks transportation measures related to safety and transit asset management, See Appendix A.

It is especially important to consider all users when investing in bridge reconstruction projects. Connectivity decreases our need to make more short trips, and bridges in Pinellas County provide multiple connection points between the mainland and our coastal communities. Bridges should be designed/constructed to help us respond to rising sea levels, and to potentially eliminate or mitigate negative impacts on the environment. Likewise, regular maintenance on our roads provides an opportunity to invest in stormwater infrastructure improvements or to implement other resiliency improvements to the corridor.

**Resiliency and Development Intensification**

Forward Pinellas is responsible for guiding both transportation and land use as one cohesive system. The Countywide Plan governs land use in Pinellas County and guides land use planning among the 24 cities and the County. The Plan was revised in 2019 to create a network of high-density, walkable activity centers and multimodal corridors that can support a variety of transportation modes, while preserving and enhancing the suburban character of established neighborhoods. It also protects land needed to support employment, helping to keep and attract high-wage jobs in our community.

The Countywide Plan sets the groundwork for an enhanced transit system designed to make Pinellas County more competitive for federal transit funding. The Land Use Strategy Map, shown as Figure 4.8, illustrates the revised framework to create incentives for local governments to approve high-quality transit-oriented development as part of their own land use strategies. The Plan promotes streamlined countywide review of minor local changes in centers and corridors meeting urban design criteria. Outside of the centers and corridors network, new density bonuses and a new medium density designation will encourage greater housing affordability and mixed-use development throughout the County. The Plan encourages more
housing units to be built on less land, and encourages walking, biking, and transit use without detracting from the character of surrounding established neighborhoods.

Forward Pinellas considers resiliency as part of land use development process. Context-sensitive design elements can provide a safer and more comfortable human environment while supporting larger and more sustained efforts for redevelopment. The Countywide Plan encourages the creation of high-density corridors with pedestrian and bicycle friendly design, and a mix of land uses allowing residents to meet their daily needs without personal automobiles. As our 24 cities create their own unique visions that include activity centers or multimodal corridors, the Countywide Plan provides a set of transit-oriented planning and urban design principles to be considered.

• Connectivity – The degree to which streets, roads, and pedestrian routes are joined together to provide a continuous, convenient system for travel. Connectivity shortens the travel distance between two points, increasing the ease of walking, biking, and transit use.

• Site orientation – How buildings are located on a site in relationship to the street or pathway. Buildings located closer to the street create shade and a sense of enclosure, resulting in a comfortable, human-scaled built environment.

• Public realm enhancements – Includes publicly accessible space that is typically owned and maintained by the public sector and includes landscaping, public art, open space, street furniture, wide sidewalks, enhanced crosswalks or traffic calming measures that contribute to pedestrian safety and comfort.
• Ground floor design and use – Regulating the design and use of the ground floor of buildings adjacent to pedestrian space and transit facilities can have a significant effect on the safety, comfort, and success of businesses along roadway corridors. These elements create a busy, active streetscape that increases the perception of public safety and attracts foot traffic.

• Transition to neighborhoods – In activity centers and multimodal corridors, the highest densities should be located in compact areas within walking distance (about ½ mile) from transit stops, with a gradual transition to lower densities moving outward toward surrounding lower-density areas. The Pinellas Trail and Active Transportation Plan provide long term mobility options for linking neighborhood
HOW DO WE GET THERE?

Advantage Pinellas focuses on identifying solutions by integrating land use and transportation decisions with growth directed to areas less vulnerable to changes in climate patterns. The Plan identifies actions and dedicates resources to projects that protect our natural resources and limits additional impacts to our communities, wherever possible. Advantage Pinellas addresses opportunities for technology applications that may improve mobility and limit the need to widen our roadways.

Resiliency Planning

The Resilient Tampa Bay: Transportation Pilot Program (FHWA 2018-2020) was a joint initiative with FHWA, TBRPC, Forward Pinellas, and the Hillsborough and Pasco MPOs to consider environmental impacts for the LRTPs. An example of data used for Advantage Pinellas was the analysis of critical transportation facilities that were rated for as high, moderate or low for vulnerability. This data was used for project review during the Needs Plan development phase of the LRTP. Figure 4.9 shows examples of critical transportation facilities. See Appendix N for a more detailed description of the Pilot program and the maps and data analyzed as part of the Resilient Tampa Bay Pilot Program.

Environmental Consultation

In June 2019, Forward Pinellas hosted an Environmental Consultation Workshop at Brooker Creek Preserve regarding potential impacts and mitigation strategies related to regional and local LRTP project development.

Instead of each MPO working individually with the various resource permitting agencies, some of which have authority across county lines, the Tampa Bay region made the decision to hold one large working session. See Appendix M for the Environmental Mitigation/Consultation Workshop documentation.

Numerous environmental agencies were invited to attend this meeting and give their feedback on planned projects, possible mitigation strategies, and identification of potentially untapped opportunities to enhance the

Figure 4.9: Resilient Tampa Bay Pilot Program Critical Transportation Facilities, 2018. Source: Resilient Tampa Bay
environment throughout the Tampa Bay area. The Environmental Consultation Workshop included nearly 40 representatives from the environmental community which prompted more detailed, broader discussions regarding environmental mitigation challenges and opportunities facing the Tampa Bay region. For agencies not able to attend, a website was created that hosted the workshop materials. Comments and suggested strategies were documented by email.

**Resiliency Actions Stormwater**

Formed in October 2016, the Pinellas County’s Wastewater / Stormwater Task Force is a joint initiative of the Pinellas County Board of County Commissioners, Pinellas County municipalities, and other agencies to identify wastewater and stormwater solutions for the County. An initial action plan analyzed the events that led to the overflow situation during Hurricane Hermine and recommended approaches to avoiding future sanitary sewer overflows, including:

- Increasing wastewater treatment capacity at appropriate levels
- Increasing wastewater storage capacity at appropriate levels
- Reducing inflow and infiltration of stormwater and groundwater into the separate sanitary sewer system

**Figure 4.10** is a general illustration that acknowledges the numerous water bodies (56 watersheds, 5 major bay areas, 3 major lakes, 1 major river and the Gulf of Mexico) that must be considered as part of the stormwater action plan. The recommendation merged the three solutions into a cohesive plan of action to be implemented in 2020 to reduce the greatest cause of inundation of the system—inf lo and infiltration of stormwater and groundwater into the sanitary sewer system. Additionally, the Technical Working Group recommended implementing a countywide public dialogue program to increase education outreach and citizen engagement.

**Resiliency Summit 2020**

Forward Pinellas attended the Resiliency Summit 2020 to identify sources of new data and to collect information and expertise on these topics:

- Financing Resilience
- Pre-Disaster Mitigation
- Disaster Recovery
- Adaption
- Risk Reduction
- Clean Energy

**Figure 4.10:** General Illustration Identifying Locations of Pinellas County Watersheds and Municipal Boundaries. Source: Pinellas County, FL
Technology Advancements

Forward Pinellas considered technology advancements throughout the development of the 2045 LRTP. A major goal of the LRTP is to limit impacts to our communities by increasing access to transportation through technology, not necessarily through the widening of our roadways.

Within Florida, the FDOT provides guidelines that MPOs use to address technology during project development and to provide education to their committees and the public. The Guidance for Assessing Planning Impacts and Opportunities of Automated, Connected, Electric and Shared-Use Vehicles (ACES), September 2018 is available through FDOT’s Office of Policy Planning.

Advantage Pinellas utilized these resources and best practices as part of the project development process. Forward Pinellas dedicated a portion of its flexible funding sources to technology integration and infrastructure design with the intent of supporting our livable communities over the next 25 years.

With the FHWA and FTA supporting technology integration, Individual states have recognized the need for statewide policy and have enacted a wide range of actions. Florida is one of the six areas in country that has enacted automated technology regulations.

Forward Pinellas consulted with the FDOT and the FDOT’s national experts throughout the LRTP process to identify how these various levels of automation will impact congestion in Pinellas County through 2045.

Travel Demand Modeling

FDOT District 7 provides travel demand modeling support and coordination for the MPOs in the region through a Technical Review Team (TRT) process. The TRT meets bi-weekly and members provide input and review for overall technical guidance in the forecasting process.

During the development of the LRTPs for each MPO, the TRT coordinated closely on how to evaluate the potential impacts of automated and connected vehicles on the transportation network. Significant discussions were held to ensure that consistent assumptions were made by each of the five MPOs in the region. Ultimately, it was decided to follow the guidance put forth by FDOT for ACES.

The MPOs opted to model the impacts of three different market saturation scenarios: a low-level, medium-level and a high-level of saturation. Each MPO agreed that given the uncertainty of the market penetration for automated and connected vehicles, it was not possible to select a single scenario to advance with the 2045 Plans. The final modeling methodology and results presented by the TRT were documented, see Appendix H. The MPOs will regularly reevaluate how the transportation network may be impacted by ACES as new projects are considered for future funding.

Coastal High Hazard Area Development Policy Direction

The updated Pinellas County Coastal High Hazard Area (CHHA) Report identifies the most vulnerable areas in Pinellas County prone to flooding even in (comparatively) weaker Category 1 storms. These are places with the highest risk from a combination of high-velocity wind and coastal storm surge flooding. Compared to 2008, the CHHA acreage has grown by nearly 21,000 acres in Pinellas County, an 86 percent increase. The updated report used new technology to model storm surge, which showed about 25 percent of the land area in the CHHA designation at higher risk. Roughly 25,000 more houses and 8,000 more buildings are located in the updated CHHA map.
The CHAA report discusses methods for allowing safe and reasonable increases in residential density within the CHHA. It addresses a higher standard of construction that is more resilient to storm surge, mitigation for service and infrastructure needs during and immediately following a major storm event, steps to enable safe re-occupation following an evacuation.

The policy for many years has been to discourage land use amendments that either increase density (residential) or intensity (nonresidential) in the CHHA, but it is permitted in some circumstances when a “balancing criteria” can be used to justify an increase. The following are examples of factors that might be considered:

- If the land use is water-dependent, or part of the tourism industry that depends on waterfront locations/scenic views, or in an established activity center
- If there is adequate shelter space and evacuation routes
- If the project is increasing density/intensity in one part of the CHHA, but decreasing it elsewhere
- If the project is redeveloping previously developed land

Certain vulnerable land uses, such as hospitals and nursing homes, are not permitted in a CHHA. There is a requirement that local governments adopt CHHA policies in their local plans/codes. Many of the communities in Pinellas County have already done so, but there are a few that are still working towards a CHHA policy. Some local governments historically have not allowed any density/intensity increases in the CHHA at all. However, in 2016 the CHHA was redrawn and expanded in size using new computer technology for modeling storms, and more potential redevelopment areas were included in the CHAA. St. Petersburg, for example, is addressing the increased land areas included in the revised CHHA and Forward Pinellas is coordinating with City staff and Pinellas County Emergency Management to develop an updated and acceptable land use strategy that considers safety as well as opportunities for (re)development.
**Engineering and Infrastructure Solutions**

The options available to designers and planners for adapting to changes in climate patterns in the transportation sector include enhanced drainage and pavement improvements using more nature-based strategies. The options selected for individual cases are dependent on factors including available budget, topography, and exposure to the specific types of climate hazard impacts. The Resilient Tampa Bay: Transportation Pilot Program Project outlined adaptation toolkit strategies designed to support design and costing considerations. The study includes help with the decision-making process by providing the general circumstance under which a nature-based option may be appropriate and the vulnerabilities that a specific option may seek to mitigate. Figure 4.11 provides potential examples of engineering and infrastructure solutions.

Pinellas County is incorporating sea level rise into bridge project development as one of the environmental factors to consider when selecting design options that will be resilient over the life of the bridge structure. The Dunedin Causeway Bridge is located near the entrance to Honeymoon State Park and provide access to a multiuse trail and many water sport activities. The bridge has reached its useful life and must be reconstructed. The facility provides transportation to an estimated 1.1 million visitors annually and an economic impact of $113 million to the local economy. This bridge is also the only way off this coastal island with 792 dwelling units located near the entrance to the park. The County is considering all possible environmental data that may help in choosing a new bridge design including projections for a rise in sea levels presented by the Tampa Bay Climate Science Advisory Council in 2018.

**Enhanced Drainage**

Forward Pinellas is working with several agencies on sharing resources to create community stormwater areas as a strategy to reduce burdens on individual properties to mitigate or manage stormwater as redevelopment occurs. The strategy is part of the County’s new stormwater objective to develop larger stormwater areas, perhaps in conjunction with parks, trails and amenities.

**Green Stormwater Infrastructure**

A second approach to addressing drainage concerns is green infrastructure, such as with a bioswale. This is a design concept is receiving increased attention by engineers as it provides both a natural approach to stormwater protection and enhances the aesthetic quality of the location where it is used. In most cases, green infrastructure can generally be considered wherever more traditional engineered approaches are considered and can replace or complement more traditional approaches to stormwater design and help a community become more resilient.

**How to Create a Resilient Transportation Network**

Example methods:
- Create barriers such as wetlands and sea walls to protect against storm surge
- Elevate roads above flood levels to increase durability, such as hardening shoulders and improving bases of roads to resist erosion
- Strengthen infrastructure to help roads shed water more quickly

*Figure 4.11: Creating a Resilient Transportation Network. Source: Resilient Tampa Bay: Transportation Pilot Program Project*
**Green Streets**

Another green infrastructure option, and a tool for stormwater management, is to include green areas into the design of the street or adjoining frontage or sidewalk areas. Rather than limiting the green area to an adjacent area such as in a bioswale, a green street concept incorporates the green elements directly into the streetscape. As with bioswales, the green street elements serve to filter and reduce stormwater. In addition, green streets can be designed in accordance with the local requirements for the street design. The challenges include using streetscape that can withstand changes in rainfall and larger or more intense storm events to ensure that the vegetation can survive the seasonal changes.
One of our advantages is a growing and diverse population that greatly contributes to our efforts to strengthen our status as a healthy community. It is important to our residents to have the opportunity to access employment, receive a quality education, access health care services, and participate in social and physical activities. It is equally important to our residents to pursue these opportunities with the support of a local and regional transportation system that facilitates safe and secure travel for all users.

Safety has been, and always will be, a top priority for Pinellas County and our region. Forward Pinellas has developed goals that support transportation investments to continuously improve the safety, security and efficiency of the transportation system. The County’s Intelligent Transportation System (ITS) is a significant investment in safety and part of the solution to limiting future road widening through improved congestion management. The Traffic Control Center monitors the system daily to improve operations and respond to emergencies. Using ITS and incorporating advancements for intelligent infrastructure and intelligent vehicles helps our motorist make better decisions as they travel local and regionally.

With the 2015 FAST Act, federal transportation legislation emphasizes monitoring crash data and trends with the goal of reducing fatalities and serious injuries for all transportation users. Providing a secure transportation system which is prepared for, and able to quickly recover from, natural or manmade disasters is another point of emphasis. Advantage Pinellas fully embraces these principles and is implementing policies and dedicating funding to projects that improve our safety and security, and strengthen our advantage as a growing, diverse, and healthy community.

Investing in the health of our residents is a priority for Pinellas County. Access to parks and recreation is increased through dedicated funding to improving the Pinellas Trail, soon to be a 76-mile loop with regional connections to adjacent counties. Advantage Pinellas clearly shows the commitment to health with adoption of an Active Transportation Plan. This Plan provides funding over the next 25 years for 10 major corridors supporting bicycle and pedestrian projects and elevated bicycle and pedestrian overpass facilities at high conflict areas. Forward Pinellas continues to interact with our citizens to address health issues that are of importance. Advantage Pinellas addresses these concerns as the projects selected for the Cost Feasible Plan were reviewed and prioritized based on safety, health and security goals.
WHERE ARE WE NOW?

The statistically-valid Citizen Survey on the Value of Living in Pinellas (2019 Telephonic Results) confirmed the County’s excellent reputation. Trust in the County was at 97 percent, significantly above the national average (Gallup Poll rated at 72 percent national average).

A Growing, Diverse Population

Figure 5.1 summarizes the results of the quality of life questions from the County’s Citizen Survey in 2019. Citizens ranked their perceptions of “current” quality of life in Pinellas County as better or just as good based on five years ago. They ranked their perceptions of “future” quality of life five years from now as better or just as good. Over the four years (2016 to 2019) the survey has been conducted, 69 percent of the citizens reported their current quality of life as the same or better than five years ago. The trend rises when asked about future quality of life, 79 percent of the citizens reported a future perception of just as good or better over the next five years. Fantastic confirmation that Forward Pinellas is a partner in addressing the needs of our residents.

Mirroring national trends, Pinellas County is becoming more diverse. In the next few decades, the majority of the County’s residents will be people of color from a rich variety of racial and ethnic backgrounds. As a result, the success and prosperity of our County relies on dismantling unjust barriers and ensuring that everyone can participate in and enjoy the benefits of a thriving economy. This information is important for transportation planning purposes because certain ethnic groups have different cultural norms, and therefore can have different impacts on

| Current Quality of Life: Perceptions of “Better” or “Just as Good” as Five Years Ago |
|--------------------------|--------------------------|--------------------------|--------------------------|
|                         | 2016 69%                | 2017 71%                | 2018 74%                | 2019 69%                |
| Rate quality of life compared to 5 years ago. | Better 27% | Better 40% | Better 42% | Better 38% |
| Predict quality of life 5 years from now. | 2016 84% | 2017 85% | 2018 88% | 2019 79% |

| Future Quality of Life: Perceptions of “Better” or “Just as Good” in Five Years |
|--------------------------|--------------------------|--------------------------|--------------------------|
|                         | 2016 84%                | 2017 85%                | 2018 88%                | 2019 79%                |

Figure 5.1: Quality of Life in Pinellas County: Trending Results for Better, Worse or Same. Source: 2019 Pinellas County Citizen Survey by Telephone, Statistically Valid Results
Table 5.1 provides a summary of population and a breakout of race for Pinellas County from 2000 to 2018. The U.S. Census provides data for Pinellas County’s responses to race, either alone or in combination for White, Black or African American, American Indian and Alaska Native, Asian and Native Hawaiian or Other Pacific Islander. Of the 50,000 residents who located to Pinellas over last 18 years, virtually all added to a minority reporting category for the US. Census. In order of the highest increases, the table shows a 36 percent increase in the Asian population, a 24 percent increase in 2 or more races, a 19 percent increase in Black or African American, an 8 percent increase in Island Pacific, and no increase or decrease in those reporting White. The Advantage Pinellas 2045 Plan is based on goals that stress the importance of providing transportation that promotes health equity as we respond to the needs of our population demographic.

The Plan responds to all ages, striving to overcome social isolation and maintaining a healthy lifestyle as people age. The Plan addresses equity, with active transportation projects for all residents, including poor and minority residents who statistically have higher incidences of adverse health and disease due to physical inactivity and weight issues.

Advantage Pinellas responds to the needs of all users, but also incorporates the statistical data showing that race is a factor when planning for our residents.
Crashes involving vulnerable road users tend to skew disproportionately to minorities and lower income residents.

The make up of the household was also considered with Advantage Pinellas. Families with multigenerational persons living in one home is becoming more of a necessity as the price of housing and auto ownership, combined, can inhibit opportunities for living alone. Families, particularly our younger and older residents, can no longer afford to live alone. Advantage Pinellas considers the larger picture of an expanding population base and creating a need for access to new housing types and amenities for young families, as well as the growing number of older residents.

By the year 2045, the population is expected to increase to 1,030,000, or approximately an additional 93,000 people, see Figure 5.2.

As the population continues to increase so too has the median age, and it has been for quite some time. Figure 5.3 displays the increase in median age from 42.1 in 1990 to 46.9 in 2018. It should also be noted that while the average age is increasing overall in Pinellas County, some communities within the County are seeing a decrease in their median age, particularly in St. Petersburg and northern unincorporated communities, which have been popular places for younger families to locate. The most recent estimate in 2018 for St. Petersburg was 25 percent of the population, or 241,641 persons, was 65 years old or older. As a comparison, 19 percent of the population in the State of Florida was 65 years or older.

Figure 5.2 and 5.3 provide U.S. Census summary statistics on Pinellas County for age, education and workforce by age as a percentage of total population. More than half (54 percent) of Pinellas County’s population is between the age of 18 and 64, which is similar to the breakdown of age groups for the state of Florida and nationally. Pinellas County has an educated population. Our education level for a high school degree and bachelor’s degree attainment is slightly higher (within two percentage points) than the state of Florida and the national average. Pinellas
County is competitive for industries seeking to locate in Florida. More than half (53 percent) of the population employed in Pinellas county is between the age of 30 to 54. Twenty percent is 29 or younger and over 25 percent is 55 and over.

Pinellas County is attracting new residents and businesses because we are competitive and balanced with opportunities for education and employment for all age groups. An added value to our advantage as a safe and healthy community, is our beautiful weather all year round. Weather is an important factor in the economic equation as access to daily activities and healthy choices for exercise and leisure are economic necessities and a major reason for our booming tourist industry. The weather is consistent in Pinellas and our trails, parks, water activities and walkable communities are available year-round.

Employers have access to a variety of skilled labor and citizens that are trained for careers that require a higher education. Pinellas County has over 13 campuses and state schools including St. Pete College, University of South Florida and Nova Southeastern University. Nova just located its Medical and Nursing campus to Pinellas County in 2019. Forward Pinellas coordinates land use and transportation policy and project development with assistance from all local governments. As an urbanized county that is focusing on redevelopment and intensification, Forward Pinellas seeks continuous citizen input on developing transportation projects that promote health and safety for all residents.

### Addressing Equity

About 38 percent of Pinellas County residents live in Environmental Justice (EJ) areas, see Figure 5.4. EJ refers to analyzing the transportation benefits and burdens in relation to low income and minority communities. Investment decisions for transportation improvements should not adversely affect EJ areas, and in fact one of the objectives of Advantage Pinellas is a targeted effort to specifically invest in transportation improvements that have a positive impact on EJ areas.

An example of the importance of analyzing EJ areas can be seen by in the fact that about 54 percent of crashes involving bicyclists and pedestrians (2011-2015), occurred within EJ areas compared to 46 percent that occurred outside EJ areas. Given that individuals living in EJ areas are more likely to rely on walking, biking and transit, Forward Pinellas supports efforts to continue to invest in safe, accessible transportation alternatives in these important areas.
CHAPTER 5
SAFETY, SECURITY, HEALTH & POPULATION DIVERSITY

Active Transportation Projects

Safety Challenges

Providing a safe transportation network is an important component to maintaining a healthy community. Serious injuries and fatalities affect everyone, regardless of age, race, or economic status. Within Pinellas County, the rate of motor vehicle accidents per 100,000 people in the past two decades has for the most part been slightly higher than the statewide rate. Figure 5.5 shows the most current crash data between 2012 and 2016.

Pinellas County was developing steadily between 1920 and 1980. This building out of the roadway network to accommodate this growth was desired by our residents. This primary goal increased auto capacity, but roadway design did not address multimodal needs. For this reason, much of the County is crisscrossed with high speed six-lane roadways that are difficult for bicyclists to traverse, pedestrians and transit users to cross and for automobiles to safely travel without incident, given high rates of speed. Now the mostly densely populated County in Florida, Forward Pinellas and other transportation agencies are committed to improving safety through projects and programs for all modes.

<table>
<thead>
<tr>
<th>Year</th>
<th>Pinellas</th>
<th>Florida</th>
<th>Pinellas Rate</th>
<th>Florida Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>2016</td>
<td>19,096</td>
<td>395,521</td>
<td>1,996</td>
<td>1,955</td>
</tr>
<tr>
<td>2015</td>
<td>19,062</td>
<td>374,511</td>
<td>2,011</td>
<td>1,882</td>
</tr>
<tr>
<td>2014</td>
<td>17,378</td>
<td>344,240</td>
<td>1,857</td>
<td>1,758</td>
</tr>
<tr>
<td>2013</td>
<td>16,069</td>
<td>316,943</td>
<td>1,731</td>
<td>1,641</td>
</tr>
<tr>
<td>2012</td>
<td>13,601</td>
<td>281,549</td>
<td>1,475</td>
<td>1,472</td>
</tr>
<tr>
<td>2011</td>
<td>10,878</td>
<td>228,471</td>
<td>1,183</td>
<td>1,206</td>
</tr>
</tbody>
</table>

The Strategic Highway Safety Plan

As our regional and countywide population has increased in recent years, and is projected to continue to grow, it places an increased demand on our transportation system and infrastructure. The FDOT, in partnership with the Federal Highway Administration (FHWA) and representatives from all segments of Florida’s traffic safety community, developed the Strategic Highway Safety Plan (SHSP), which is a statewide, data-driven plan that addresses the “4 E’s” of safety: engineering, enforcement, education and emergency response.

The SHSP is a major component and requirement of the Highway Safety Improvement Program as a core Federal-aid process that identifies and analyzes highway safety problems and opportunities on all public roads.
The SHSP has identified the following eight emphasis areas to help address safety concerns within Florida:

- Aggressive Driving;
- Intersection Crashes;
- Vulnerable Road Users (pedestrians, bicyclists, and motorcyclists);
- Lane Departure Crashes;
- Impaired Driving;
- At-Risk Drivers (aging road users and teens);
- Distracted Driving; and
- Traffic Data and Decision Support.

Forward Pinellas monitors and tracks crashes associated with these emphasis areas on an annual basis to evaluate safety concerns and identify strategies to help address them. Traffic data and decision support is important for the analysis of the other emphasis areas, and while it does not include any actual crashes, the importance of having accurate data for transportation planning cannot be understated.

According to the 2018 countywide Trends & Conditions Report, 64 percent of all traffic fatalities involved vulnerable road users, which include pedestrians, bicyclists and motorcyclists. In 2019, 66 percent of crashes involved vulnerable users. This percentage is twice the national average and roughly one out of every three fatal crashes (36 percent) involves a pedestrian. As a result, Smart Growth America ranked Tampa-St. Petersburg-Clearwater as the ninth most dangerous metro area for walking in the United States. Figure 5.6 summarizes crash data from 2012 to 2017 for Pinellas County. Additional detailed analysis of crash data can be found in the countywide Trends & Conditions Report produced by Pinellas County and included in Appendix F.

Notes: The five year rolling average percent change on this page for crash data is the rounded percent increase or decrease between the five-year rolling average for 2013 through 2017 and the five-year average for 2014 through 2018 in Pinellas County, Florida as reported in the Forward Pinellas Traffic Trends and Conditions Report, October 2018, and the Forward Pinellas Crash Data Management System, 2017 and 2018. Crash data includes parking lot crashes. Serious injury crashes in the Forward Pinellas CDMS are “incapacitating injuries” and do not include “non-incapacitating injuries” or “possible injuries.”

![Figure 5.6: Summarizes Crash Data from 2013 to 2018 for Pinellas County. Source: Forward Pinellas Trends and Conditions Report, 2018](image-url)
The vast majority (62 percent) of fatal crashes in Pinellas County involved impairment (alcohol and/or drugs) or aggressive driving. Impaired driving accounts for at least 30 percent of all fatal crashes in our County. Aggressive driving requires at least two of the following contributing causes: speeding, unsafe or improper lane change, following too closely, failure to obey yield right-of-way, improper passing, and failure to obey traffic control devices. Aggressive driving accounts for the additional 32 percent of all fatal crashes.

An updated Trends and Conditions Report was released after the adoption of Advantage Pinellas in November 2018. Appendix F includes the list of crashes by location, mode, date, sex and age of driver. In 2019, 90 total fatalities (89 fatal crashes 90 fatalities; 1 double fatality) and percentages were reported as follows: 32 pedestrian (36 percent), 8 bicycle (9 percent), 19 motorcycle (21 percent), 27 auto (30 percent), 4 other (4 percent). Vulnerable road users accounted for 66 percent of total roadway fatalities. In November 2018, Pinellas reported 120 fatal crashes. Fortunately a trend that decreased by 30 crashes over one year.

It is important to draw attention to the unfortunate fact that fatal crashes involving distracted driving has been increasing at an alarming rate nationwide. For instance, in 2016, Florida had nearly 50,000 crashes caused by distracted driving, resulting in 233 deaths. Florida is addressing this problem in part by issuing a ban on texting and driving or use a handheld device in a school zone. As of January 1, 2020, law enforcement started issuing traffic citations for this offense (prior to this date law enforcement would only issue a warning).

To assist residents with safe driving information, the County and FDOT provide traffic advisories on construction for municipal, County and state roadway construction locations. Figure 5.8 is a screen shot of the roadside advisory website. The Traffic Control Center monitors daily operations and performance of

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**Figure 5.7:** Locations of Reported Traffic Fatalities Through December 31, 2019 Source: Pinellas County 9 map

**Figure 5.8:** Pinellas County Roadside Advisory Website
the transportation network. Staff is able to change signal
timing and preempt control devises to improve response
times for emergencies and traffic accidents.

In May 2019, Forward Pinellas published the Active
Transportation Plan: Technical Memorandum I: Existing
Conditions, which provides a thorough review of existing
bicycle and pedestrian conditions, including potentially
dangerous traffic and roadway conditions for vulnerable
users. Appendix G provides this technical memorandum.
The technical memorandum includes existing plans,
studies and approaches used by Forward Pinellas and
its partners to improve bicycle and pedestrian safety
conditions. The document also includes a section on
health impacts of the transportation infrastructure and
an equity analysis, overlaying key demographic patterns
with existing facilities to identify areas of low bicycle
and pedestrian service.

The County’s logo and theme to promote safety for
all children is in coordination with the Pinellas County
School Board’s policies.

**Move Safe, Pinellas!**

Promoting safety for the children of Pinellas County
is one of the highest priorities for Forward Pinellas
and its partners. Figure 5.9 shows where to find the
Move Safe, Pinellas website as a resource for school
safety activities. Staff works with and assists several
organizations with child safety education programs.
These programs provide the opportunity to be directly
involved with and educate the public on the benefits of
safe behaviors while on a street, sidewalk, trail, or bus.

Pinellas County is an advocate to ensure all kids own a
well-fitted helmet that meets federal safety standards.
Through a partnership with the FDOT, the University of
Florida and John Hopkins All Children’s Hospital, kids
whose families are unable to purchase a helmet can
receive one for free. Helmets must be properly fitted
by County staff who are certified through the University
of Florida’s Bicycle/Pedestrian Safety Resource Center.
Helmet distribution and fittings are completed at schools,
aftercare programs, or summer camps. For additional
information, email MoveSafe@PinellasCounty.org.

Forward Pinellas reviews all projects that receive state
and federal funding to ensure the safety of all users
are being considered during project development.
Safety programs available for community education and
speaking engagements include WalkWise Tampa Bay
and BikeSmart Tampa Bay. Videos from these groups
are also included on the website covering these topics:

- **Holiday Safety Tips**
- **School Crossing**
- **How to Use RRFBs**
- **Halloween Safety Awareness**
- **Parking Lot Safety**
Other Programs

Safe Routes to School (SRTS) Program - Established at the national level, this initiative was designed to encourage children, including those with disabilities, to walk or ride their bicycles to school. The program provides funding to increase pedestrian and bicycle safety through infrastructure improvement and educational initiatives (www.fhwa.dot.gov/environment/saferoutestoschool).

Walking School Bus - This is a group of children walking to and from school accompanied by one or more adults, usually a parent or caregiver. The primary benefit is a consistent, supervised system in which children can learn transportation safety and exercise together. Reduced traffic congestion near schools is the result, particularly during drop-off and pick-up times.

Health Concerns

Several factors affect the health and well-being of a community. Social and economic status, physical environment, and transportation/access to health care are just a few. Advantage Pinellas acknowledges that our multimodal transportation system plays a significant role in supporting the development of a healthy community and can contribute to breaking down inequities that prevent some people from living long and healthy lives.

The 2018 Pinellas County Community Health Assessment (Pinellas CHA) is a compilation of community input and survey data that measures the health of Pinellas County. The CHA identifies a shared vision for partnerships between the health department and the community to address key needs and issues. Improved access to care, mental health and substance abuse, and the built environment are related to improving health concerns, and are Pinellas County’s main health priorities. Access to care was identified as the top priority, see Figure 5.10.

The following graphic highlights the key health related findings from the CHA report:

PINELLAS CHA FACTORS

- Stable housing provides a foundation upon which to build a healthy and happy life. Without a safe place to live, it is difficult to achieve one’s full potential. The total number of homeless individuals reported to HUD in 2016 was 2,777. A majority of these were adults over the age of 24 (85.7%), male (73%), non-Hispanic (93.4%), and either White (63.2%) or Black (31.7%).
- Chronic disease refers to a collection of long-term conditions - such as heart disease, stroke, cancer, asthma, type 2 diabetes, and arthritis. These are among the most common, costly, and preventable of all health problems. Many chronic diseases are preventable through behavior modification.
- Just 34.7% of Pinellas County adults are at a healthy weight, while 28.1% are considered obese.
- The health benefits of regular exercise and physical activity influence the overall health of a community. According to the Robert Wood Johnson County Health Rankings and Roadmaps, 96% of Pinellas County residents have access to exercise opportunities including local paths or trails for walking, running, or biking local parks, community centers, and recreational facilities. However, results from the latest Community Health...
Assessment survey show that more than 33% of the population did not walk or bicycle for at least 10 minutes continuously to get to and from places in a typical week, and 39% were physically active fewer than 4 days a week.

### Security of the Transportation Network

The transportation planning process includes security-related considerations to protect the transportation network. This includes an awareness of the threat of natural or manmade disasters such as terrorist attacks, flooding, civil disturbance, critical infrastructure disruption, pandemics, hazardous materials spills, wildfires and/or other incidents that could affect or disrupt the transportation system. Forward Pinellas coordinates on security matters with a growing number of local and regional and countywide agencies. Opportunities to participate and/or provide direct services for information varies, but includes:

- Ensure protection of the transportation system infrastructure;
- Coordinate with various local governments and agencies, including law enforcement, transit agencies, airports and ports;
- Identify vulnerable transportation facilities;
- Identify critical transportation facilities;
- Provide GIS information and data for roadways and bridges;
- Disseminate best practices in incident-specific engineering design and emergency responses to agencies involved;
- Encourage regional emergency operations preparedness and response workshops;
- Develop an Emergency Preparedness Guide for elected officials;
- Engage non-traditional stakeholders in the planning processes;
- Coordinate with Emergency Management and local officials on road construction projects that may impact evacuation routes;
- Provide project safety checklists to be used as an assessment tool by local jurisdictions and transportation agencies to consider safety and security early in the process of developing transportation projects; and

- Annually update the Continuation of Operations Plan (COOP) to ensure that essential functions can be maintained in the event of a natural or manmade disaster.

With the evolving threats of terrorism, climate and weather-related events, or catastrophic disasters, it’s more important than ever to provide security for the transportation system. By working closely with local, state and national stakeholders, Forward Pinellas continues to prioritize security in our transportation planning process.

Storm surge is the greatest threat to people and infrastructure during hurricanes. Storm surge zones for Pinellas County shown on Figure 5.11 on the following page is based on data compiled by the Florida Division of Emergency Management. Designated by individual counties, the storm surge zones are generally categorized into five zones, with Zone 1 being the most vulnerable.

Maximum surge height during a hurricane can be higher or lower depending on the timing of tide levels during the hurricane. Additional threats inside storm surge zones include high winds and increased precipitation causing excessive runoff from impervious roadways, parking lots, roofs, and other paved surfaces. Reducing or mitigating stormwater runoff is a point of emphasis within the FAST Act planning requirements and as such is an area of focus as we identify, evaluate and prioritize transportation improvements throughout the County.

Our topography affects how much of the land surface is vulnerable to storm surge. Compared to places like California and Oregon, where the land immediately adjacent to the coast quickly rises hundreds of feet, very few areas of Pinellas County rise more than 40 feet above sea level making large areas of Pinellas County vulnerable to storm surge. In order to safely
evacuate the public during a storm event, when directed by emergency management officials, hurricane evacuation routes have been designated as shown in Figure 5.12.

Projected Storm Surge

Vulnerability of transportation assets to extreme events is a function of (1) exposure, the nature and degree to which an asset is exposed to a climatic hazard; (2) sensitivity, the degree to which an asset is damaged or service is interrupted by the climatic hazard; and (3) adaptive capacity, the degree to which a system (or asset) can adjust or moderate potential damages or service interruption from the climatic hazard. (Source: Highways in the Coastal Environment: Assessing Extreme Events; USDOT FHWA Engineering Circular no 25 - Volume 2, Publication Number FHWA-NHI-14-006. October 2014)

Vulnerable transportation facilities within identified storm surge areas in Pinellas County include the CSX railroad, school maintenance facilities, school bus compounds, PSTA bus compounds, and airports.

A strong hurricane that directly hits Pinellas County could result in the following damage:

- Low-lying roads and bridges can be flooded, damaged, or washed away;
- The stormwater system can be backed up from heavy rains;
- Utility lines can be severed;
- Sand, mud, and other debris can be deposited on roadways;
- Damage can occur to the St. Pete-Clearwater Airport; or port operations.

**Figure 5.11:** Storm Surge Zones in Pinellas County, Source: Florida Division of Emergency Management Map

**Figure 5.12:** Hurricane Evacuation Routes—Pinellas County Hurricane Evacuation Routes in Relation to the Emergency Operations Center (red star). Source: Pinellas County Emergency Management and Florida Division of Emergency Management Map
Minimizing storm impact on hurricane evacuation routes is particularly critical to move traffic during an evacuation and during a storm event.

**Sea Level Rise Concerns**

Advantage Pinellas is the culmination of four years of active public outreach to document input on resiliency, health, safety, economic opportunity and technology. Safety is a primary concern for our residents. As part of the resiliency discussion, Figure 5.13 illustrates the results from the recent Citizen Survey on the Value of Living in Pinellas (2019 Telephonic Results). The results show that citizens are concerned on how much sea level rise will impact their quality of life. The percentage breakdown for 2019 was 68 percent are concerned a great deal or generally concerned, and 32 percent have not thought about it or are not concerned. In 2018, 42 percent of our citizens were very concerned or generally concerned.

Advantage Pinellas envisions a future that includes a safe, secure and healthy transportation system that is accessible by all users. As such, one of the primary objectives of Advantage Pinellas focuses on equity as a primary measure to prioritize future transportation investments. Along the same line, Advantage Pinellas calls for better transit access to increase mobility options in particular for the transit dependent population.

Achieving this vision also means we must enhance safety for the traveling public. This includes all modes of transportation. We must prioritize improvements that protect the wellbeing of our most vulnerable residents - the young, older adults, and individuals located within EJ areas. As previously discussed, a large percentage of this population is more likely to walk or bike and as such are more likely to be involved in a traffic incident that involves a pedestrian.

Our local and regional transportation system must provide area residents with a reliable, efficient, and safe means to evacuate the area when so directed by emergency management officials.
CONSISTENCY WITH FEDERAL AND STATE PLANNING REQUIREMENTS

Our focus on safety and security acknowledges our top priority, keeping all transportation users safe while traveling in Pinellas County. Ensuring the security of our transportation system is also critical to the safety and wellbeing of our residents and visitors. The investments we make to address safety and security directly contribute to a healthy community that allows everyone the opportunity to be satisfied, connected, and able to reach one’s full potential.

Advantage Pinellas addresses the FAST Act planning requirements by prioritizing transportation policies and infrastructure investments that increase the safety and security of the transportation system for motorized and non-motorized users. In doing so, our efforts increase accessibility and mobility; improve quality of life; enhance connectivity; It further supports FDOT’s policy to provide a safe and secure transportation system for all users - residents, visitors, and businesses.

Supporting Goal and Objectives

**Goal 3** - Invest in transportation projects that promote safe and healthy communities

**Objective 3.1** - Incorporate a Health in All Policies framework in the evaluation of planned transportation projects.

**Objective 3.2** - Equity will be recognized as a primary consideration in all plans and programs of Forward Pinellas.

**Objective 3.3** - Provide better transit access for those who are transit dependent, including low income elderly, and/or disabled people who do not have access to a vehicle.

**Objective 3.4** - Make the transportation network safer for all users through community and engineering design, public policy, law enforcement, education and funding.

**Objective 3.5** - Provide for efficient emergency evacuation that responds to threats to Pinellas County and the Tampa Bay area.

**Objective 3.6** - Facilitate safe travel to and from school.

A Safer Transportation System for All Users

As we strive for a secure and healthy transportation system for all users, Advantage Pinellas builds on the County’s transportation success. **Figure 5.14** shows the 2018 existing and planned bicycle and pedestrian trail...
network for Pinellas County and how it complements our existing road network. Pinellas County has spent $880 million in Penny for Pinellas money for roadway capacity improvements from 1990 to 2018 to provide safe and secure transportation. Pinellas County is committed to ITS and ATMS investments with dedicated, recurring funding. The Pinellas Trail is nearing completion of 76 miles.

As our needs continue to grow, our understanding on what is needed is compounded by fluctuations in age, workforce and challenges to accessing our system.

OFFICIAL MISSION STATEMENT
Forward Pinellas provides leadership to align our resources and plans to achieve a compelling vision for Pinellas County, individual communities and our region, by engaging the public in the development of sound transportation plans and investments.

During the development of the Advantage Pinellas plan, Forward Pinellas conducted surveys and engaged in numerous public involvement activities. The input provided by the public was used to guide the transportation planning process and understand “where we want to be.” Building upon past and present community survey results, workshops and input received from public outreach activities, one of the priorities is safety.

Federal legislation places increased emphasis on measuring the safety performance of metropolitan planning areas and requires state DOTs to consult with MPOs to establish performance targets. As part of this process, Forward Pinellas annually establishes safety performance measures and targets in its Transportation Improvement Program (TIP) as part of the performance-driven and outcome-based transportation planning process required by the FAST Act. On February 14, 2019, the Forward Pinellas Board adopted the safety performance targets summarized in Figure 5.15. These targets are provided in Appendix A.

<table>
<thead>
<tr>
<th>Safety Performance Targets by Percent and Total as of February 2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>NUMBER OF FATALITIES                                      10.8% decrease 97.4</td>
</tr>
<tr>
<td>NUMBER OF SERIOUS INJURIES                                17.7% decrease 895.14</td>
</tr>
<tr>
<td>RATE OF FATALITIES                                        10.7% decrease 1.18</td>
</tr>
<tr>
<td>RATE OF SERIOUS INJURIES                                  19.8% decrease 10.55</td>
</tr>
<tr>
<td>NUMBER OF NON-MOTORIZED FATALITIES AND SERIOUS INJURIES    1.7% decrease 206.6</td>
</tr>
</tbody>
</table>

Figure 5.15: Forward Pinellas Safety Performance Targets for 2019

A More Secure Transportation Network
Advantage Pinellas envisions a more secure transportation system that limits our vulnerability to natural or manmade threats such as hurricanes or terrorist attacks. We also envision a transportation system that is prepared to help facilitate with effective emergency response and support of recovery efforts. Forward Pinellas has been, and will continue, facilitating, coordinating and assisting other agencies on security-related matters. Part of this process involves continuing to seek opportunities to participate and/or provide direct services and information as needed.

In terms of natural disasters, major hurricanes pose a significant threat to our region. While major hurricanes have directly hit the State of Florida on numerous occasions, including Hurricane Ivan in 2004, Hurricane
Andrew in 1992, Hurricane Donna in 1960, and the Labor Day Hurricane of 1935, no major hurricanes have made landfall on the Pinellas peninsula during the past 75 years. While more than 20 tropical storms during that time period have crossed the county, their strength was low, causing relatively minor damage. Hurricane Irma (2017) was the most recent storm to impact our area causing primarily wind damage and flooding. This storm knocked out power to thousands of Pinellas County residents, including some homes that went without power for a week or longer.

This close call signals the urgency that we must be prepared for the next major event that impacts our region. We must continue to assess and strengthen our resiliency and reliability of the transportation network to respond to a future storm, including a potential direct hit to Pinellas County. Of most concern is our infrastructure located in the lowest lying areas of the county, and as described in Chapter 3 these impacts can potentially be even greater when you factor in a rising sea level which could increase storm related damage.

A System for All Users

As we grow in population, and add new jobs to our economy, we also see an increase in future year traffic volumes. While positive in terms of economic benefits, the negative aspects of this growth include increasing local and regional traffic congestion which left unaddressed could potentially place our most vulnerable residents (pedestrians and bicyclists) at greater risk.

Like many urbanized areas, the construction and widening of highways has reached a point of diminishing returns. We simply cannot build our way out of congestion. Pinellas County is planning for the integration and utilization of all possible mobility solutions to help reduce congestion and provide real options other than privately-owned, single occupant vehicles.

A 2018 statistically-valid survey conducted for Advantage Pinellas indicated that 57 percent of the public favors transit improvements over the construction of additional and/or wider roads and highways.

Our traffic analysis shows that our area roadways will continue to be congested through the year 2045. With little opportunity to add capacity, we need to focus on alternative transportation investments. In particular, Advantage Pinellas envisions a future that provides expanded transit options along with a more walkable environment to support use of transit. We also envision a network of safe, connected sidewalks and bicycle facilities that provide for seamless transitions to local
and regional transit services. Investing in these types of facilities/services will significantly benefit individuals living in EJ areas and while at the same time promoting a healthy life-style through increased physical activity and access to the transit system.

In 2018, Forward Pinellas conducted a statistically valid survey. The survey results indicated strong support for transit service. Because the vision is a safe, secure and healthy transportation system for all users, equity is an important consideration. Transit access increases equity. Research conducted by the USF Muma College of Business in collaboration with the Tampa Bay Partnership recently found that a lack of transit availability is a primary driver of the poverty rate in Tampa Bay.

As such, an improved transit system has the potential to increase equity for the 38 percent of Pinellas County residents living in EJ areas. Furthermore, according to a forecast model from the Transportation Disadvantage Service Plan (TDSP), 372,068, or 39.8 percent of the total Pinellas County population could be considered transportation disadvantaged due to age, poverty status and/or disability. This percentage is expected to exceed 40 percent by the year 2022 and will likely continue to increase toward the plan horizon year 2045. Enhanced transit service, including expanded geographical coverage, would benefit the transportation disadvantaged and all area transportation users.

### Transportation Disadvantaged Partners

Transportation disadvantaged populations are defined as those who cannot obtain their own transportation due to a disability, age or income. The Pinellas County Transportation Disadvantaged (TD) Program is a state-funded program that provides reduced cost transportation throughout the County to individuals who qualify as transportation disadvantaged.

The Pinellas Suncoast Transit Authority (PSTA) is the Community Transportation Coordinator (CTC) for Pinellas County. As the CTC, PSTA is responsible for managing the TD Program, with Forward Pinellas as the Designated Official Planning Agency for the TD Program. Forward Pinellas has been involved with the TD Program since its establishment in 1979. The system continued under the MPO until 2012, when the PSTA took over as the CTC. This allowed the TD Program to become better integrated with PSTA’s other services, such as paratransit service.

Forward Pinellas maintains a Local Coordinating Board (LCB) that is responsible for overseeing PSTA in its role as the CTC for Pinellas County. The LCB is composed of diverse members, including agencies providing supporting services for the transportation disadvantaged and transportation disadvantaged representatives. The Florida Commission for the Transportation Disadvantaged (Commission) provides guidance as to who should serve on the LCB. The Pinellas LCB meets once a quarter. Forward Pinellas appoints and staffs the LCB and provides recommendations to the Commission on who should serve as the CTC. Forward Pinellas assists the Commission at the local level in accomplishing the coordination of transportation services to the transportation disadvantaged.
The Transportation Disadvantaged (TD) Program in Pinellas County consists of three main elements for providing transportation services: a bus pass program, door-to-door trips and agency trips. PSTA coordinates with Forward Pinellas and other agencies in the transportation system, including those receiving Transportation Disadvantaged funds and those receiving Federal Transit Administration (FTA) Section 5310 funds. PSTA not only runs and coordinates the TD Program, but is continuously exploring ways to improve transportation services and funding for the transportation disadvantaged.

PSTA continues to utilize the bus pass system along with agency group trips and door-to-door services. PSTA maintains operator and coordination contracts. Operator contractors receive funds through the TD Program and include Neighborly Care Network, PARC, ARC Tampa Bay and The Lighthouse. Agencies with coordination contracts generally provide transportation services in Pinellas County and receive funding through other sources, such as the Federal Transit Administration (FTA) Section 5310 Program.

**School Safety Coordination**

Forward Pinellas has goals that promote continued coordination with local groups that focus on safety. The School Transportation Safety Committee (STSC) is an advisory committee that supports coordination with local agencies and the school system to improve school-related transportation. Composed of 15 local elected officials and school board members, STSC addresses school-related transportation access and safety issues and improvement of communication and coordination among transportation agencies and the Pinellas County School Board.

**HOW DO WE GET THERE?**

We achieve our vision for a safe, secure and healthy transportation system for all users by understanding who our residents are and identifying overall needs for our diverse population. Advantage Pinellas includes investments in all modes including transit and active transportation projects, regardless of economic status and race.

**Advantage Pinellas represents the first allocation of resources for active transportation and technology for a Pinellas County LRTP.**

As part of the 2045 Advantage Pinellas Plan, Forward Pinellas and other regional planning agencies and MPOs developed socioeconomic (SE) data to assist with forecasting needs based upon the estimated future demands of our transportation system. This included the development of three transportation alternatives and their anticipated impact on future growth using a GIS-based tool called Communityviz. The tool (used regionally by our neighbor MPOs) looked at regional changes in land use and transportation and was used by Forward Pinellas as a starting point for local land use allocation for existing conditions and future needs. One of the benefits of the tool was the ability to allocate growth based on a software input factor of vulnerability. The program looked at access to land use and vulnerability when projecting potential areas for growth. The system downplayed placing new growth in vulnerable areas. Forward Pinellas assigned levels of attractiveness, avoiding assigning growth to less attractive low lying areas.
Forward Pinellas used this program and the allocation maps for a regional discussion, and locally involved each city for manual adjustments to account for local plans and priorities.

Advantage Pinellas was developed based on a Five Point Plan, as shown in Figure 5.16. Forward Pinellas worked with our partners to define premium transit corridors, refine corridor redevelopment plans, identify financial resources, prioritize corridors eligible for state and federal funding, and ensure clarity of needs for our residents and funding and implementation roles.

Much of our projected future growth was allocated to these premium transit corridors. Much of Pinellas County does not currently have the densities and intensities to support high capacity, frequent transit. As we direct future transit investments into these corridors, we need to make sure that the surrounding land uses are such that the transit investment will be worth the investment. This serves to protect our established single family neighborhoods and provide for quality, mixed use development in those areas that can be support and sustain transit service into the future.

Collaboration with Partners

An example of transit, bicycle and pedestrian visioning to support the Forward Pinellas 20-minute neighborhood concept was recently completed by the City of South Pasadena. A sample concept plan is provided as Figure 5.17. Forward Pinellas and the City worked together on this concept.

Safe Streets Pinellas

Given the number and rate of crashes with injuries within Pinellas County, mostly involving vulnerable users, Forward Pinellas has initiated a vision zero effort to address the number of fatal and serious injury crashes in the County starting in 2020. For this effort to be successful, it will require a high level of coordination and involvement from agency partners. Branded as ‘Safe Streets Pinellas’, Forward Pinellas will create a community outreach and messaging strategy, engage partners and stakeholders to develop specific Vision Zero goals, objectives and strategies and coordinate a Forward Pinellas Safe streets Summit during 2020.

Crash Data Monitoring

Forward Pinellas maintains the countywide crash database to monitor crash occurrences and work with local governments, FDOT and law enforcement agencies to identify high crash locations. Forward Pinellas presents safety and crash information to our committees and the Forward Pinellas Board for review and action on concerns for addressing unsafe conditions. Forward Pinellas initiates the necessary improvements on the affected roadways and/or intersections and assists the FDOT and our safety partners in their goal as stated in the Statewide Florida Strategic Highway Safety Plan to improve the safety on Florida’s surface transportation system.
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**Complete Streets Grants**

Forward Pinellas has developed a Complete Streets Grant Incentive program to assist local governments in planning, designing and constructing complete streets projects. The Grants Program provides competitive funding of up to $100,000 for the development of concept plans and up to $1,000,000 for the construction of complete streets projects. Over the last four years, Forward Pinellas has funded eleven complete streets projects both in the unincorporated and municipal boundaries. Funding for safety improvements is another critical component to enhancing safety. An example of a safety project funded through the Complete Streets Grant Incentive program is the 34th Street Complete Streets Concept in south St. Petersburg shown in Figure 5.18.

**Active Transportation**

Advantage Pinellas includes dedicating $62 million for active transportation projects and $24 million for trail overpasses to be constructed countywide. Figure 5.19 is an example of an active transportation project that will increase safety and is funded in the Advantage Pinellas Active Transportation Plan. The overpass at S.R. 60 is a regional trail connection overpass to be constructed in the next five years, that connects the S.R. 60 Causeway Trail to the City of Clearwater’s Ream Wilson Trail at the intersection of S.R. 60, a 4-lane, divided highway, and Bayshore Boulevard, a two lane, undivided local roadway.

**Transportation Security Stakeholders**

Transportation security involves a variety of stakeholders including Forward Pinellas. In accordance with the Continuity of Government Executive Order 12656 (1988) and Homeland Security Continuity of Operation Guidance (2004), Forward Pinellas initiated and continuously approves the Continuation of Operations Plan (COOP). The COOP ensure that essential Forward Pinellas functions are maintained in the event of a natural disaster or manmade disaster.
A general list of local, regional and state transportation authorities, agencies, organizations and teams that coordinate emergency management activities is provided.

**SECURITY STAKEHOLDERS**
- Pinellas County Board of County Commissioners (BCC; all County Administration departments)
- Pinellas County Sheriff’s Office (PCSO)
- Florida Highway Patrol (FHP)
- Municipal Law Enforcement
- Florida Department of Transportation (FDOT)
- Pinellas County Emergency Medical Services/Fire Administration
- Pinellas County School Board
- Pinellas Suncoast Transit Authority
- Pinellas County Hazardous Material Response Team
- Duke Energy Corporation
- Florida Department of Law Enforcement (FDLE)
- National Guard & Coast Guard
- Florida Division of Emergency Management
- Municipal Governments
- Tampa Bay Regional Planning Council (TBRPC)
- Federal Emergency Management Agency (FEMA)
- CSX Transportation Inc. (operation of 21,000 route-mile rail network)

Disruption of the transportation system undermines the safe and efficient movement of people and goods for all modes of travel. Emergencies of any type can have a devastating impact on our residents, jeopardizing their ability to get to work or have access to their homes.

A recent global pandemic emergency occurred (March 2020 to May 2020) since the adoption of Advantage Pinellas. The pandemic (disease called COVID-19 resulting from a new strain of coronavirus) required our security stakeholders to work as a unified team to address a difficult and unique situation. Social distancing (minimum of 6 feet apart) and shelter at home orders were issued by the State of Florida and local authorities. These measures were taken to minimize the spread of the virus until medical facilities and response teams could mobilize locally and nationally. Travel by air was restricted internationally and travel by auto was restricted, in some case, across state lines. State parks that permitted larger gatherings were closed. County parks remained opened if they promoted opportunities for social distancing. The pandemic changed travel patterns significantly as citizens were required to work from home if able and only essential services remained open to the public, such as hospitals, grocery stores and gas stations.

Shelter in place orders permitted outdoor activity, providing residents followed the social distancing requirements. The availability of sidewalks, bicycle paths and multiuse trails provided safe options for residents to be outside and exercise to maintain...
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healthy activities. Families were able to recreate together during this difficult time and the usage of our active transportation facilities increased notably across Pinellas County.

Forward Pinellas will be addressing the changing travel patterns and impacts to our county’s resiliency planning over the next several months as our security stakeholders review the measures that were successful and actions that will be further refined to promote resiliency to medical emergencies of this magnitude.

An extremely positive outcome of this emergency was the increase use of our active transportation network by our residents.

Goods Movement

Most of the goods transported into and throughout Pinellas County are delivered by trucks and transferred to intermodal facilities located outside of the County. The Pinellas County Major Road Network Truck Route Plan identifies countywide truck routes. Recent 2045 measures of effectiveness (MOEs) developed for Advantage Pinellas show a 4,058 hours of goods movement delay in 2045. The MOEs show an increase of only 15 percent delay in 2045, which relates directly to congestion and safety on the roadway system. The projection of only a 15 percent increase is extremely low compared to our regional neighbors. The MOEs for Hillsborough and Pasco Counties project over 200 percent increase in delay for goods movement on their local systems. Forward Pinellas recognizes that the security of roadways and other transportation infrastructure needs to accommodate the movement of goods as critical to the economic vitality of the County as well as the region.

Countywide ITS

Pinellas County has three agencies that operate the traffic signal systems, Pinellas County, the City of Clearwater, and the City of St. Petersburg. Pinellas County operates the countywide ITS Corridors, regardless of jurisdiction from its Traffic Management Center/Primary Control Center (TCCC/PCC). The TCC/PCC also coordinates with the FDOT’s Traffic Management Center, or SunGuide. The SunGuide system is operated for District 7 headquarters in Tampa, and is closely coordinated with local Pinellas County ITS systems. The TMC/PCC provides closed-circuit television (CCTV) camera images to law enforcement, the County Emergency Management, and 9-1-1 Dispatch, for system monitoring.

Project Safety Checklist

During the LRTP update process, Forward Pinellas coordinates with FDOT on the Project Safety Checklist, which is an assessment tool that can be utilized in project review stages to assist local jurisdictions and transportation agencies to seriously consider safety and security during those early processes of development. The checklist includes three stages overall: preview considerations, implementation and post construction review of traffic plans and performance measures. FDOT modifies the checklist to facilitate its use throughout District 7. The resulting D7 Design Safety Prompt List is now used to ensure the consideration of all travel modes during design review.
Dynamic Message Signs (DMS)

Dynamic Message Signs (DMS) provide routine roadway condition information to users of the transportation system. In an emergency, DMS’s will be used to display any evacuation messages, roadway conditions, including evacuation information and other pertinent information.

Florida Governor and Pinellas County BCC

The Governor has legal authority to order an evacuation of residents and visitors in any stricken or threatened area, if necessary, for the preservation of life or other emergency mitigation, response, or recovery. The Board of County Commissioners (BCC) may declare a State of Local Emergency with the Issuance of an Evacuation Order. In addition, during the annual budget review process, the BCC approves a reserve fund amount that may be used to facilitate a disaster response.

Coordination with Land Use

Pinellas is particularly vulnerable to hurricane events. A major consideration is maintaining capacity to affect a hurricane evacuation. Forward Pinellas coordinates evacuation plans in conjunction with Pinellas County Emergency Management and regional planning is coordinated by the Tampa Bay Regional Planning Council. Forward Pinellas recently updated the countywide Land Use Plan with consideration to safety and evacuation needs, locating future growth areas aligned with premium transit corridors, and promoting significant density increases in areas that are considered less vulnerable.

At the local level, many jurisdictions within Pinellas County have policies in place to prohibit the construction of hospitals, nursing homes, and assisted living facilities within hurricane evacuation zones. Many also limit densities within the County’s coastal high hazard area to control the growth of residential populations within these vulnerable areas.

Coordination with Law Enforcement

The Pinellas County Sheriff’s Office (PCSO) serves as the primary liaison for countywide security events. PCSO closely coordinates with local, state and federal agencies, including municipal law enforcement agencies in order to maintain the security of the transportation system as well as the public. PCSO also coordinates with the County Emergency Operations Center (EOC) and PSTA for security measures and staging of buses for events where transit may be needed.

A Public Safety Complex opened in July 2014 to centralize safety services. Designed to withstand a Category 5 hurricane event, the complex houses the PCSO Administration, Pinellas County’s 9-1-1 Dispatch Center and the EOC. Critical public safety resources and services are coordinated at this structure during an emergency.

The Pinellas Police Standards Council conducts research, coordinates agency policies, and provides a centralized screening process to ensure exceptional quality public safety officers. Created by the Florida Legislature in 1972, the Council routinely assists with the coordination on homeland security issues, and the adoption and furtherance of Mutual Aid Agreements between the local law enforcement agencies. The Council is also directly involved in a number of countywide coordination efforts related to law enforcement.
Pinellas Suncoast Transit Authority (PSTA)

PSTA maintains a System Safety Program Plan that provides policies for operational and maintenance procedures designed to protect property and maximize the safety of passengers, employees, and all those who come in contact with the public transit system. PSTA buses are equipped with safety recording equipment to ensure both a safe and secure environment for the passengers of the system, as well as assisting PSTA in incident investigations.

During disaster preparedness and recovery, PSTA supports evacuation transportation through an agreement with Pinellas County Emergency Management. PSTA also has agreements in place with both the District School Board and St. Pete/Clearwater International Airport to serve as alternative sites to relocate its vehicles in the event of an emergency. The U.S. Department of Homeland Security’s Transportation Security Administration (TSA) recognized PSTA as one of the nation’s best transit systems in terms of safety and security. TSA awarded its “Gold Standard” designation to PSTA for its dedication to building a strong safety and security program in accordance with the TSA’s Baseline Assessment for Security Enhancement (BASE) criteria. TSA has developed a special matrix to measure a transit agency’s threat level, vulnerabilities, and preparedness for emergencies or disasters. The Safety, Security and Training Division of PSTA works closely with the Pinellas Emergency Management to be prepared for emergencies or disasters. It also coordinates drills and activities with the Department of Homeland Security, the FDLE, and other local emergency-response agencies.

Site-Specific Focus Areas

St. Pete/Clearwater International Airport (PIE)

St. Pete/Clearwater International Airport (PIE) is the only international, commercial service airport in Pinellas County. Located on approximately 2,000 acres, just north of St. Petersburg, it serves commercial, freight, military, and general aviation operations. PIE is also home to the U.S. Coast Guard Air Station and is designated as a foreign trade zone. PIE is owned and under the control of the BCC and County Administrator and operated under the direction of the Airport Director. By FAA Standards, PIE is required to maintain an Airport Emergency Plan (AEP) to identify policies and procedures necessary during an emergency located on or in the vicinity of the airport. In emergency situations, a special unit of PCSO is activated immediately. PIE is located in a low-lying area and as a vulnerable transportation asset continues to coordinate with Forward Pinellas regarding resiliency.
Clearwater Executive Airpark

Clearwater Executive Airpark is Pinellas County’s highest elevated airport at 71-feet above sea level. Established in 1939 and reopened following WWII, the Airpark serves transient aircraft and locally based aviators. With one paved runway and about 47 acres, the Airpark is owned by the City of Clearwater and leased to a private operator for day-to-day activities. The Airpark hosts a squadron of the Civil Air Patrol, several businesses, aircraft sales/rentals, and a flight school, with airplane hangar, several tie-downs, and aircraft maintenance.

The Clearwater City Council assigns five members to the Airpark Advisory Board, with the City’s Director of Marine and Aviation Department serving as the Airport Manager. The Airpark maintains an emergency plan to address various emergencies and disasters, in addition to a separate Security Plan. In the case of an emergency, the command post may include the City of Clearwater EOC, and the County’s EOC operations.

Albert Whitted Municipal Airport

Albert Whitted Airport, owned and operated by the City of St. Petersburg, provides convenient access to the City’s downtown waterfront, business district, and urban communities by air. The 110-acre facility handles approximately 97,000 general aviation aircraft operations annually and is home to an estimated 185 aircrafts. Aviation services provided include fueling, storage and parking, flight training, charter and rental aircraft, maintenance, detailing, avionics, pilot supplies, banner towing and sightseeing tours. Civil Air Patrol, Bayfront Medevac, and various organ transplant flying services also use Albert Whitted Airport for aviation support functions for their life-saving missions, along with commercial and private general aviation ventures.

As a general aviation facility, rather than a commercial service airport, Albert Whitted is not required to meet specific federal security regulations. Due to the nature of aviation services they may provide, certain tenants may be required to comply with specific TSA and/or FAA security guidance. In addition, Albert Whitted has a specific security infrastructure in place, combined with physical barriers, surveillance systems and established personnel security procedures.

Port of St. Petersburg

Located on the western shore of Tampa Bay, the Port of St. Petersburg is owned and operated by the City, and provides access via water to the downtown waterfront, business district and urban communities. This international port provides access to Pinellas County for research vessels, mega-yachts, and small cruise vessels. On the north side of the harbor, the Port is bound by approximately 1,200 linear-feet of bulkhead wharf, with the University of South Florida (USF), U.S. Coast Guard (Sector St. Petersburg) and Albert Whitted Airport to the south.

Port personnel and its tenants are required to report any suspicious activity to the Port Administration Office, Port Security or the police department. All users of the Port are expected to furnish watchmen over cargo or other property with a high susceptibility to theft on its premises. Watchmen so employed must have prior clearance by the Port, and meet state and federal credentialing criteria. The Port property itself is patrolled by a credentialed Port Security officer around the clock.

The Port follows all security requirements as outlined in Florida Statutes, and Federal Code Title 33 of the Code of Federal Regulations (CFR), which governs navigable waters within the United States. The Port has a Facility Security Plan that includes security elements and contains security sensitive information controlled under CFR.
Transportation enables economic opportunity for our residents and visitors by overcoming distance or barriers to travel. Our economic opportunity advantage focuses on creating an efficient and effective transportation system with accessibility and mobility for all our users. Our residents rely on the County to provide infrastructure and public transportation that connects us to our daily living activities.

Transportation helps people and goods to reach destinations safely and reliably. Travel that can occur with few impediments creates an equitable and accessible means for people, businesses and communities to thrive. People can readily get to a variety of jobs and education opportunities, businesses can find a supply of talented workers and get products and goods to market more cheaply, and communities enjoy a higher quality of life as places with sustained investment.

Economic opportunity and increased tourism can also be tied directly to communities that support the arts and offer a variety of cultural venues. Reliable transportation is key to attracting new residents, businesses and visitors to Pinellas County.

Our economic opportunity advantage connects the monetary value of time to transportation. Time and cost increase with barriers to accessibility and mobility. These impediments can include traffic congestion, which introduces delays and unreliable outcomes that drive up costs through unproductive time. Impediments can also include safety, which limits transportation options for people and increases the cost of travel either directly to the individual or business, or to society at large through crashes involving medical care and higher insurance premiums.

“The arts are so important to attract people to Pinellas County. It used to be that you picked a company and moved where they wanted you to go. Now people do research and pick a community and then look for work. We must create an arts and cultural environment that attracts a workforce and business.”
~ Mike Meidel, CECd, Director of Pinellas County Economic Development.

A lack of transportation alternatives also hinders economic opportunity because it raises the cost of travel or the time it takes to travel. This diminishes access and removes viable choices, forcing people into more expensive options like owning a vehicle, or longer travel times by using poorly funded public transportation.
Pinellas County has enjoyed economic success because of improvements in transportation since its formation in the early 20th Century, from railroads to flights across Tampa Bay to paved roads and new bridges that opened the County to regional travel. As our first cities developed, a street grid ensured local access for those on foot, bicycle, horse or car between homes, commerce and the waterfront, much of which featured industry long before tourism became popular.

As Pinellas County grew, our population dispersed across the County, with the economy evolving from predominantly agriculture and industry to tourism and, increasingly, health care, advanced manufacturing and technology. Over 60,000 new jobs are projected in Pinellas through 2045. Figure 6.1 provides a breakout by percentage of existing jobs by industry.

Figure 6.2 provides commuter patterns for Pinellas County. Over 350,000 of our residents are employed in Pinellas. Based on the American Community Survey (ACS) data from 2011 to 2015, more than 66,000 workers commute daily into Pinellas from surrounding counties. Pasco County, our neighbor to the north, estimates over 22,000 workers travel to Pinellas. Hillsborough County, our neighbor to the east, estimates over 43,000 commuters travel to Pinellas.
Since the 1950s, the focus of transportation investments has been moving cars and trucks on roads. The County was focused on growing as a desirable place to live, conduct business and visit. The completion of the Gandy Bridge, Courtney Campbell Causeway and the Howard Frankland Bridge/Interstate 275 (I-275) connected Pinellas County to people and markets throughout Tampa Bay and Florida.

Headquartered in St. Petersburg, Jabil is an American worldwide manufacturing service company and one of the region’s largest employers. The complex is centrally located with access to Pinellas County’s regional highway system, increasing options for employees to live in Pinellas or commute from surrounding counties. Jabil is expanding its headquarters and is an example of a robust economy that is fostered by investments in a regional transportation system.

The Scenic Highway Courtney Campbell Causeway Multiuse Trail opened in 2013 and includes 12 miles of separated trail connecting Pinellas and Hillsborough, with one-mile as a separated structure over Upper Tampa Bay. The economic value of this regional trail connection is evident every day of the year as locals and tourists enjoy safe and healthy recreation in a beautiful setting. Pinellas County recognized the value of this active transportation facility and has dedicated funding in Advantage Pinellas for an overpass to connect the Causeway Trial to the Pinellas Trail system. An additional regional transportation investment that promotes economic value is the design of a dedicated bicycle and pedestrian lane as part of the reconstruction of the Howard Frankland Bridge North Span (construction to begin 2021).

In the 1980s, efforts began to bring a limited access express roadway network to north Pinellas County with the reconstruction of US 19 intersections as grade-separated interchanges. Those investments paralleled the construction of the Bayside Bridge and the widening of major roadways to handle traffic growth. Construction of the Gateway Expressway (scheduled for completion in 2021) reinforces the major highways built in the latter part of the 20th Century by connecting US 19 and the Bayside Bridge directly with I-275.

Located at the apex of the Courtney Campbell Causeway (SR60) and the Bayside Bridge (I-275) is evidence of recent economic development supported by transportation investments. The Nova Southeastern University’s Tampa Bay Regional Medical Campus (325,000 sq. ft) opened in 2019. The campus also has access to the Courtney Campbell Multiuse Trail, as
well as regional highway connectivity increasing the attractiveness of living in Pinellas or commuting from other counties.

Our regional highways are complemented by other forms of transportation and goods movement. Record growth in passenger travel at the St. Petersburg-Clearwater International Airport (PIE) and improved regional connectivity to Tampa International Airport (TPA), Port Tampa Bay and the I-4 Corridor continue to spur economic growth throughout Pinellas County and the Tampa Bay region.

TPA is consistently one of the best rated airports in the country and riding record volumes of passengers with expansion of international direct flights. TPA’s newly renovated site includes the addition of hotel space and the new rental car facility was designed to support future improvements in elevated transit.

Florida’s High-Tech Corridor runs from Pinellas County across Central Florida to Brevard County along Interstate 4 (I-4). Technology is bringing new forms of transportation options to Pinellas County that will further shape our community through access and mobility options, perhaps in significantly different ways than traditional forms. Florida is one of the few states with legislation supporting advancements of automated technology on our highways, and the Tampa Bay region is one of only three metropolitan areas chosen in the country for automated and connected testing of personal vehicles and trucks for goods movement. The University of South Florida has a lab

![Image of airport]

Source: Forward Pinellas
dedicated to connected and autonomous transportation advancements and is partnering with federal agencies to bring new technology opportunities to the Tampa Bay region.

Port Tampa Bay is Florida’s largest in terms of cargo tonnage. The economic activity contribution of Port Tampa Bay to the region is estimated to be over $15 billion. Goods movement in Pinellas County has continued to grow and spurred the addition of new industrial/commercial buildings throughout the County.

Public transportation became a Countywide endeavor in the mid-1980s with creation of the independent Pinellas Suncoast Transit Authority (PSTA) from a merger of the Central Pinellas Transit System and the St. Petersburg Municipal Transit System, linking people throughout the County to jobs, shopping, medical appointments and schools. PSTA implemented the regional express bus service (300X Express) from Pinellas County to Downtown Tampa and TPA that provides transit for employment in Tampa and at the airport and travel options for residents and tourists.

The building of the first leg of the Pinellas Trail in the late 1980s marked a new era in transportation for the County, helping to transform downtowns in Dunedin and Tarpon Springs and attracting people to the County seeking health, recreational and social benefits. The economic value of the trail is evident as businesses locate along the trial near downtowns and community focal points. The Pinellas Trail will soon grow to 76 miles forming a loop with regional connections to Hillsborough and Pasco Counties.

More than 15 million people visited Pinellas County in 2018, contributing some $8.4 billion to the local economy through more than 90,000 jobs in the tourism industry and by tourists purchasing various goods and services. Those visitors resulted in 6,680,092 hotel night stays, but the largest component of visitor volume was regional day trip visitors, comprising 4.5 million visitors or 29 percent of all visitors. More than 50 percent of all visitors to Pinellas County arrive by personal vehicle. Another 20 percent arrive by rental car.

Peak season, historically between October and April, brings the most visitors and swells the population of the beach communities and the entire County, creating
more delays from traffic congestion than other times during the year. But the off-peak months have seen steady growth in tourism, resulting in a more balanced volume of visitors year-round. A significant issue is that a thriving tourism market depends on a stable supply of workers, many of whom are unskilled laborers, such as restaurant and hotel employees.

Two professional baseball teams hold spring training at their local farm team stadiums in Pinellas County and baseball has continued to draw tourists since the 1920s. The Dunedin Blue Jays stadium in Dunedin is undergoing renovation in time for spring training in March 2020. The renovations provide short-term employment for the construction industry and will provide long-term employment for the area during baseball season. The Fenway Hotel is located within walking distance of the Pinellas Trail, Downtown Dunedin and the Blue Jays stadium. Built in the 1920s to attract spring training enthusiasts, the building has endured many functions and owners. Economic opportunity in Pinellas attracted the hotel industry and the site was renovated in 2018 to replicate the original building and is already a popular destination for locals and international tourism.

Economic Challenges

Despite our advantages, there are some serious challenges affecting Pinellas County’s economic prosperity tied to our transportation network. Smart investments in transportation can help overcome these challenges if paired with effective land use and redevelopment plans, good design, regulatory reform, and broad participation from the private sector, including businesses and landowners.

Housing stock and cost can be a strain on the economic health of our communities. Single-family homes are the dominant housing structures in the County (1-unit detached or attached). Only 16 percent of housing with 20 or more units is currently available. Mobile homes comprise the third largest (9.5 percent) component of housing within the County. About 70 percent of the County’s housing stock is owner occupied, which is high for a densely populated urban County. While the last several years have seen more multi-family apartments built in Pinellas, there remains the issue of housing stock that is affordable.

Furthermore, much of the housing in Pinellas County was developed in decades long past. According to a 2017 report on the Analysis of Impediments to Fair Housing Choice by the Pinellas County Office of Human Rights, the County’s housing stock is fairly old with only six percent of owner housing and seven percent of renter housing being built since 2000. Approximately 57 percent of owner housing and 58 percent of renter housing is over 35 years old. The housing stock, as a result of age, is becoming functionally obsolete in terms of layout, size, insulation, energy efficiency and electrical connectivity with limited room outlets that may require updating or replacement.
The combination of increasing housing demand in a fast-growing region and low housing production due to physical and policy constraints has resulted in higher housing prices. As of 2019, the median home value in Pinellas County is $244,145, up from about $150,000 in 2009. Pinellas County home values have gone up 4.1 percent over the past year and that rise is expected to continue. The median list price per square foot in Pinellas County is $192, which is substantially higher than the Tampa-St. Petersburg-Clearwater metro average of $147.

As a result, many Pinellas County residents are considered cost-burdened, meaning they are paying more than 30 percent of their income on housing costs. According to data by the Shimberg Center at the University of Florida, there are 143,062 households that are considered cost-burdened based on earnings of up to 120 percent of the area median income, or 35 percent of all households in Pinellas County. Of that total, more than half are paying over 50 percent of their income on housing.

The age of our workforce in relation to our population can be a factor in our economic vitality. Pinellas County has an older population, at a median age of 47.9 years old, than most of the Tampa Bay counties and other large population counties in the state, and it has a higher proportion of individuals of or above retirement age. While that provides for a more experienced workforce, it means there is a continuing challenge of replacing older and retiring workers. As documented in the Comprehensive Regional Workforce Assessment for Pinellas County Economic Development in 2017, Pinellas employers cite workforce quality across most key occupational sectors as a strong attribute of the labor market. However, the age and educational structure may not compare as favorably.

Employers report that finding skilled, experienced workers for their hiring requirements is becoming increasingly challenging, with traffic congestion and lack of public transportation cited as reasons it is difficult to attract workers from outside the County. Industry sectors like technology, engineering, health sciences and other fields depend on a well-educated workforce that attracts college graduates and experienced workers. A “skills gap” of trained, qualified workers is one of the principal challenges facing Pinellas County. The University of South Florida has a campus located near Downtown St. Petersburg and St. Petersburg College has several campuses located throughout the County.

Highly clustered poverty can be a deterrent to economic growth in Pinellas County. Historical laws, zoning and land use policies, lending practices and related socio-cultural issues have left large areas of Pinellas County lagging behind their counterparts in terms of economic success. As a result, areas such as South St. Petersburg, much of Lealman, Highpoint, North Greenwood and neighborhoods south of downtown in Clearwater,
and portions of Safety Harbor, Tarpon Springs, Largo, Pinellas Park and Gulfport have high unemployment rates between 15 and 28 percent. The Countywide average is 13.7 percent of the population living below the poverty level, but in these neighborhoods the poverty level is more than double the Countywide rate and ranges up to 52 percent of households in some of those areas. People who live in high-poverty neighborhoods have less access to jobs, services, high-quality education, parks, safe streets, and other essential ingredients of economic and social success that are the backbone of strong economies. People of color particularly African Americans, Latino, and Native Americans, are significantly more likely to live in high-poverty neighborhoods, even if they themselves are not poor.

WHERE DO WE WANT TO BE?

As we look to the future, Advantage Pinellas envisions transportation projects and initiatives that help revitalize, connect and create workforce opportunities.

**CONSISTENCY WITH FEDERAL AND STATE PLANNING REQUIREMENTS**

Our focus on economic opportunity recognizes that transportation is more than moving cars and trucks. The investments we make in our transportation system plays a critical role in connecting our residents to jobs, enhancing tourism which is a major part of our local and regional economy, and facilitating the efficient movement of freight and goods throughout the region. Advantage Pinellas looks to strengthen this advantage by supporting projects that increase economic opportunity.

Advantage Pinellas addresses the FAST Act planning requirements by supporting the economy, increasing accessibility and mobility for all transportation users, enhancing connectivity, and supporting travel and tourism. It further supports FDOT’s policies to provide efficient and reliable mobility for people and freight, ultimately identifying transportation solutions that enhance Florida’s global economic competitiveness.

**Supporting Goal and Objectives**

**Goal 4** - Support projects that provide for strong economic opportunity

**Objective 4.1** - Identify the impacts of tourism on Pinellas county’s transportation needs and work with partners to develop and fund specific plans, programs and projects to address those needs.

**Objective 4.2** - Ensure activity centers and multimodal corridors provide a diversity of jobs, transportation and housing options.

**Objective 4.3** - Develop and sustain activity centers and multimodal corridors as the primary focus of redevelopment efforts in Pinellas county.

**Objective 4.4** - Leverage private sector investment in the development and operation of transportation services.

**Objective 4.5** - Improve roadway and intermodal operations for the efficient movement of goods.

The transportation infrastructure choices that we make, and mobility solutions we implement, should help strengthen communities, create pathways to jobs, improve the quality of life and create a more equitable and efficient transportation system that benefits all of Pinellas County.
A Focus on Equity

Equity can be defined as “just and fair inclusion into a society in which all can participate, prosper, and reach their full potential.” That means unlocking the promise of Pinellas County by unleashing the prosperity of all its residents. The inclusive, holistic nature of this definition provides the foundation for considering and applying equity in all facets of planning, all levels of planning, all means of planning, and in all planning policies. Planning for equity is intended to challenge those planning practices that result in policies, programs, and funding preferences that disproportionately affect and stymie the progress of certain segments of the population more than others.

For purposes of Advantage Pinellas, equity considerations require an examination of the development and operation of our Countywide and regional transportation network. Examining how investments in transportation, housing and supportive infrastructure enable opportunity for success by those in less advantaged neighborhoods.

Sustainable Activity Centers and Multimodal Corridors

Transportation is integral to building and sustaining economic growth and expanding opportunity for more people. Forward Pinellas looks at the needs of both transportation and land use as we plan for where we want to be over the next several years. It is essential for any workforce development strategy to consider where our population will reside and how we can get them to work, school and daily activities.

A good education is central to labor market competitiveness in today’s knowledge- and technology-driven economy. A growing segment of Pinellas County’s workforce lacks the education needed for the jobs of the future. More than 40 percent all jobs in Florida today require at least an associate degree, and that trend is increasing. The alternative for higher paying jobs, skilled trades, also requires access to education and training. Yet today, only 32 percent of working-age Latino people and 28 percent of African Americans in Pinellas County have the required level of education to succeed economically. There are many factors for that disparity, but lack of good transportation options is a key consideration.

The combined effects of sprawling land development patterns, widely dispersed education and job centers due to the region’s geography, and a lack of affordable housing options near employment destinations makes it almost imperative that people rely on personal automobiles to meet their travel needs. That is an expensive cost for many households, upwards of $10,000 in annual costs per car, according to AAA. That is a burden on many households in Pinellas County, where high housing costs already create a barrier to
economic opportunity. In Figure 6.3, The Center for Neighborhood Technology Housing and Transportation Affordability Index shows the average Pinellas County household spends 57 percent of its total annual income on housing and transportation costs, nearly 15 percent above what is considered affordable. Oldsmar, Safety Harbor and Palm Harbor/East Lake are higher than the Countywide average, with Largo, Kenneth City and Gulfport below the average.

Young people aged 16-24 are particularly vulnerable. In Pinellas, just over 14 percent of youth age 16-24 are either unemployed or not in school, a figure that’s higher than the regional average of 12 percent. See Figure 6.4. National research has shown that an increase in public transportation service (buses, rail, etc.) leads to a 19 percent increase in central city employment density, as well as higher wages that can be measured in the millions or billions overall for metropolitan areas. Cities and regions become more productive when they expand their public transportation networks because public transportation investments typically lead to larger employment clusters and encourage metropolitan population growth. The benefits of such changes caused by transit improvements may consist of several different aspects, such as increasing the effective size of the labor force, making better matches between worker skills and employer needs in hiring, and increasing informal information sharing among skilled workers and innovating firms.

Lack of transportation is one of the chief reasons low income households are unable to participate more fully in the growing economy of the last several years. Jobs are relatively dispersed across much of the County. Most higher wage manufacturing, technology and industry jobs are located in mid-county employment areas like Gateway, along Bryan Dairy Road and Ulmerton Road, which are not walkable and hard to serve by transit. Even lower wage hospitality jobs tend to be on the beaches, where housing is limited, expensive and impossible to redevelop, making for long commutes by workers from other parts of the county or region.
How do we get there?

Our unique geography and prior transportation investments has played, and continues to play, a key role in shaping Pinellas County’s unique economic advantages. In order to sustain and grow our employment base we need to plan for economic vitality through improved mobility options that connect our residents to employment throughout the region. Advantage Pinellas incorporates our economic goals through the Active Transportation Plan, matching economically disadvantaged areas with access to mobility options through the Pinellas Trail.

Transportation plays a key role in sustaining our economic advantages and overcoming the economic challenges facing Pinellas County. Providing better choices for people to get around the County as seen in Figure 6.5 can address some of the barriers people face to fully participating in the economy and fulfilling their opportunities. Transit will continue to play a critical role in Pinellas County, and PSTA is evolving the bus system to meet the opportunities provided by improved vehicles such as autonomous and electrical.

Reducing or managing traffic congestion through technology and smart highway investments can improve travel time reliability, particularly in the shoulder of peak periods. Targeted investments in multimodal transportation facilities and services can raise the economic profile of neighborhoods suffering from poverty and unemployment by providing better means of accessing jobs and training opportunities. Locating housing near commercial and employment land use activities, with design that enables walking, bicycling and using transit is another key factor in reducing commuting times, relieving congestion and improving public health. Creating the workforce of the future in Pinellas County requires making wise investments in transportation that attracts and retains a skilled workforce.

Figure 6.5: Transportation Spending by Mode (2025 to 2045)

A redevelopment focus creates opportunities for resiliency improvements. This is both a challenge and an opportunity. As a largely developed County, Pinellas County has little remaining land left that is relatively inexpensive or easy to develop. For instance, the Coastal High Hazard Area now covers about 25 percent of the land area in the County. Development in the Coastal High Hazard Area is limited by both the Florida Statutes and the Countywide Plan. Established residential neighborhoods comprise another large...
segment of land area in the County, and along with roads, utilities and major public institutions, that leaves relatively few areas left where development can occur. Redevelopment of a developed parcel is expensive, particularly when an existing structure must be demolished or reconstructed to meet current codes and preferences. It can be difficult and time-consuming to assemble several land parcels to make redevelopment worthwhile from an investor’s standpoint.

While Pinellas County remains attractive from a business growth standpoint, its lack of available land is a prime constraint on our economy. According to Pinellas County’s Target Employment & Industrial Lands Study, it would take about 8,000 acres of land at the current average land development rate to accommodate the jobs needed to maintain our economic vitality. But Pinellas County has fewer than 4,000 vacant acres with designations that can accommodate businesses. Some portions of this land are only partially vacant, containing retention ponds, borrow pits, utilities, rights-of-way, or other features that make it unusable for development.

Industrial land is a particularly a vital resource. One-third of existing target industry businesses, including many offices, are located on industrial land. Nearly 60 percent of target industries surveyed said that protecting industrial land from conversion to other uses was important to their businesses. This means redevelopment, such as for housing, must find a proper balance with preserving existing employment-based land uses that provide the jobs needed for our population.

The opportunity of having a redevelopment focus is in creating more location-efficient places that use proximity and accessibility to their advantage. Encouraging redevelopment to occur in a mixed-use manner, with a combination of housing, commercial spaces and community facilities in a compact, walkable area can reduce transportation barriers and cost, support public transportation and reduce social isolation among the elderly and youth. Established downtowns and employment centers provide much of this opportunity. Pinellas County has an abundance of retail commercial land uses, many of which are underutilized or with high vacancies and tenant turnover, abundant and unused surface parking, and are located along high traffic volume principal arterial roadways already served by transit. The Pinellas Countywide Plan establishes Activity Centers, Multimodal Corridors and Planned Redevelopment Districts in locations that are suitable for mixed use redevelopment, with incentives through greater land intensity and higher density development to encourage private investment.

Clustering of high wage jobs promotes improved transportation access. Pinellas County is home to major technology, financial services, hospitals and manufacturing companies, including Jabil, Tech Data, Honeywell, Raymond James and The Penny Hoarder, among others. Of the 58,206 manufacturing
employees in Tampa Bay, more than 30,000, 53 percent, are employed in Pinellas County. Pinellas has the largest manufacturing employee base among eight Tampa Bay counties, and has the second largest manufacturing employee base in the State of Florida. Manufacturing encompasses a range of professional and skilled trades workers in jobs offering substantial wages. While the jobs are distributed throughout the County, many of them are located in the Gateway/Mid-County area, where there are significant clusters of office and industrial jobs near the St. Petersburg-Clearwater International Airport and along connecting corridors like Ulmerton Road, Bryan Dairy Road, Gandy Boulevard and US 19. Sustaining those jobs depends on attracting educated workers and developing the skills needed for today’s industry.

An educated and higher income population provides diversity to the workforce. As an attractive and desirable place to live, Pinellas County has been successful over the decades to draw people from other places, whether to work or retire. In 2018, Pinellas County ranked in the top 10 in Florida in median household income at $51,512. More than 31 percent of the County’s 504,000 workers earned a bachelor’s degree and 11.2 percent earned an advanced degree, both ahead of the state average. However, the developed nature of the County means the supply of housing is growing slowly, causing home prices to rise and putting pressure on affordable neighborhoods to sell to people willing to pay more for homes or benefit from redevelopment in the area. While there is not a major university presence in Pinellas County, the University of South Florida St. Petersburg campus, St. Petersburg College, Pinellas Technical College, and the new Nova Southeastern University Tampa Bay Regional Campus in Clearwater all provide advance education and skills at locations across the County to educate the County’s future workforce.

Our walkable communities create vibrant 20-minute neighborhoods and will become attractors for residents and tourists. Thanks to its geography and development form, Pinellas County has the advantage of many walkable downtowns, districts and neighborhoods that serve as places for people to gather, recreate and shop. They are also places to spend money. Investing in walkable communities, whether through allocating funds to create safe pedestrian walkways or building...
affordable housing close to downtowns, also attracts diverse populations and creates jobs. According to the Chicago Metropolitan Agency for Planning, 63 percent of millennials and 42 percent of boomers would like to live in a place where they do not need a car.

According to the National Association of Realtors, 62 percent of millennials prefer to live in a walkable community where a car is optional. If cities seem less automobile-dependent, chances are they are more appealing to a range of ages.

Good walkability is also important to economic mobility across generations. Children who live in walkable neighborhoods have higher levels of upward economic mobility. That is the key finding from a new study published in the American Psychologist. The study, “The Socio-ecological Psychology of Upward Social Mobility,” by psychologists at Columbia University, the University of Virginia, and the University of Illinois at Urbana-Champaign, looks at the effect of growing up in a walkable community on the economic mobility of children. “The more walkable an area is (as indexed by Walkscore.com), the more likely Americans whose parents were in the lowest income quintile are to have reached the highest income quintile by their 30s. This relationship holds above and beyond factors previously used to explain upward mobility, factors such as income inequality and social capital, and is robust to various political, economic, and demographic controls.”

Short commute times promote living and working in Pinellas County. Related to its many walkable neighborhoods and its geography, Pinellas County enjoys a significantly shorter average travel time to work than its peer counties in the Tampa Bay region. The average journey to work of 24.4 minutes is lower than Hillsborough County at 27.3 minutes and much less than Pasco County’s commute of 31.6 minutes. See Chapter 3, Figure 3.6 for commuting patterns.
Our collaborative vision calls for us to share in the planning and funding responsibilities for Pinellas County and the Tampa Bay region. Our regional participation helps Pinellas County as we use consider the many strategies implemented by our neighbors. We value the progress our partners have made to address growth and resiliency and we bring their successes and lessons learned home to our local needs.

Regionally, our directive to focus on both land use and transportation has given us a unique perspective in conversations about topics of regional significance. Perhaps most importantly, we have strengthened our communication with our local residents and businesses. We look to our regional partners for ideas and lessons learned, but it is our own residents who have the biggest vested interest in the work conducted by Forward Pinellas.

During the development of Advantage Pinellas, we conducted significant outreach and engagement to confirm the consistency of what our residents desire for their communities. We put their ideas into motion. Our actions and our plans are reflective of what the citizens tell us they need. We continue to engage everyone to improve our plans. We maintain and enhance local and regional partnerships by participating in local and regional coalitions and committees. Our engagement...
with our regional partners helps us to be flexible and adapt to both a local and regional vision for the future. Advantage Pinellas is the culmination of over four years of local and regional outreach and engagement and the projects advanced through this plan reflect how Pinellas County is planning differently.

## WHERE ARE WE NOW?

### Local Partnerships And Support

Forward Pinellas provides several different types of technical assistance to our local governments. In addition to providing help navigating the countywide land use and transportation planning process, we track state and federal legislation that affects land development regulation. We host educational workshops and planning discussion forums, and present at local government meetings.

We provide hands-on technical assistance to local governments in need of maps, property data, policy and regulatory interpretations and geographic information. Past projects have included assistance with comprehensive plan updates, special area plans, parking and annexation studies, and grant writing. We add value to our local agencies by providing resources and working towards our shared vision.

### Technical Assistance

Forward Pinellas leverages our ability to offer two grant programs to our local government partners. The Complete Streets Grant program provides funding for the development of concept plans and for constructing transportation projects that make roadways safer and more accessible for all users.

Up to $100,000 is available for the development of concept plans, and up to $1 million for construction projects. The Planning and Place-Making Grant assists local governments in maintaining and strengthening the character of their communities, offering up to $100,000 for initiatives that help to establish or reinforce a sense of place. This Grant advances the planning and urban design principles of the countywide Plan.

Forward Pinellas manages the Transportation Alternatives funding program, providing federal funds to our local partners to construct bicycle and pedestrian projects, as well as those supporting non-driver access to transit within their communities. We utilize a competitive scoring process: we issue a call for applications each year and advance the most competitive projects for funding on an annual basis.

### Grant Funding

### Coordination with Pinellas County

With 24 local municipalities and an unincorporated area, we coordinate with all our partners to increase collaboration for visioning, project design and implementation. Pinellas County is an important partner as it maintains the countywide Intelligent Transportation System/Advanced Traffic Management Systems (ITS/ATMS) program.

The ITS/ATMS program provides critical traffic data for project development, monitoring and reporting. The program has dedicated funding and monitors the use of our extensive roadway and trail network countywide. Forward Pinellas and Pinellas County coordinate on the maintenance and implementation of projects to support mobility requirements.
Coordination with Health Department

An example of a project that is successful due to partnerships with Pinellas County is Joe’s Creek Greenway Trail Alignment, conducted in 2017 and is now programmed for construction through Penny For Pinellas.

Joe’s Creek Study Stakeholders
Forward Pinellas
City of St. Petersburg
Kenneth City
Lealman Representation
Florida Health Department of Pinellas County
Florida Department of Environmental Protection
Pinellas County Parks and Recreation
Pinellas County Planning and the FDOT D7

Joe’s Creek was conducted to identify challenges and provide solutions to linking several environmental justice communities living along a winding creek that flows to the Gulf. Water quality, stormwater runoff, stabilization of the banks of the creek and safety were top priorities for the Public Works Department.

Forward Pinellas teamed with the County and Florida Health to strategize on revitalization of these communities by constructing a new multiuse path at the same time many of the public works efforts were conducted. Programmed for construction, the multiuse trail will provide better connectivity to schools, the Pinellas Trail, community centers and other important community destinations. Joe’s Creek is an exciting example of several agencies working together for the common goal of a healthier community.

Data analyzed as part of the study included identifying transportation needs for communities traditionally underserved in this area Pinellas County. The study area includes approximately 8.9 percent of households with no access to a vehicle, which is in the highest range of the County’s average for the percentage of households with no vehicle available.
Coordination with PSTA

PSTA is the local public transit provider in Pinellas County. This agency is a partner with Forward Pinellas and leads long range transit planning for our communities. Forward Pinellas and PSTA coordinate the development of the Ten-Year Transit Development Plan, Advantage Pinellas 2045 and the Transportation Improvement Program (TIP). This coordination is critical to ensure that our transit system continues to operate efficiently and receives the funding that it needs to serve our residents. PSTA staff serves on a variety of Forward Pinellas technical committees and participate in the review of all major transportation projects that are advanced for state and federal funding. In addition, the staff of our two agencies have informal monthly meetings, along with the Florida Department of Transportation (FDOT), to discuss items of joint significance and to ensure that we each remain informed of the activities that the other is undertaking. This has resulted in strengthened coordination in the planning and implementation of transportation projects that benefit our residents, businesses and visitors.

Partnering on Multijurisdictional Projects

As a combined joint land use and transportation agency, we have shown success in developing partnerships to bring together a variety of partners to fund big undertakings that have moved us closer towards our shared vision for the future. Our ability to collaborate with our local partners has been instrumental in advancing planning and construction projects that benefit us all. By focusing our planning efforts on the SPOTLight emphasis areas, we have been able to leverage our partnerships to undertake a variety of joint planning efforts with a high degree of success. A few examples of these collaborations are highlighted below.

Collaboration on US 19

In advancing our shared vision for US 19, we have worked closely with FDOT and our local government partners to advance a number of studies and projects along the corridor to ensure that the future of this key transportation corridor are contextually sensitive to both the local and regional needs for travel while also protecting the surrounding land uses.

The construction of interchanges along the middle and northern parts of the County have been instrumental in moving traffic more efficiently, but have impacted...
the success of some businesses along the corridor. Forward Pinellas has partnered with FDOT and the surrounding communities to evaluate options that would improve mobility while limiting the decreased exposure of surrounding businesses to pass-by traffic. Alongside this effort, we have worked with FDOT and our municipal partners to evaluate the design of the existing frontage roads along US 19 to improve safety and ensure the design supports the businesses and residential developments that are located here. The evaluation of these options continues beyond the adoption of Advantage Pinellas and demonstrates the shared commitment of all of us to improve mobility while ensuring that the transportation network is supportive of the surrounding development patterns.

In South St. Petersburg, lower traffic volume, underutilized land and concerns about the safety of our most vulnerable users of the transportation system led to us awarding a complete streets grant to evaluate options along 34th St. South (US 19). Forward Pinellas has partnered with the City and FDOT to conduct a full analysis of the US 19 roadway, including the feasibility of reducing vehicle travel lanes on a designated US highway. The study will also provide bicycle and pedestrian designated facilities, designated transit lanes and other measures to improve the viability of the existing and planned future development along the corridor. This effort continues and is expected to result in a solution to benefit all users of the transportation network in this area.

**Gateway/Mid-County Area Master Plan**

Outside of the US 19 area, Forward Pinellas has partnered with Pinellas County, FDOT, and the cities of Largo, Pinellas Park and St. Petersburg to develop a master plan for the Gateway/Mid-County area. Securing funding commitments from all partners, Forward Pinellas led the effort to identify transportation investments and land use opportunities to make this critical portion of the County more resilient to future growth while also addressing the environmental and infrastructure impacts that this growth may have. By building on our established partnerships, the recommendations from this planning effort are more likely to come to fruition.
Enhancing Beach Access

We have led a number of multijurisdictional planning efforts that have focused on enhancing access to our beaches. Having led the development of a complete streets concept plan for the West Bay Drive corridor, we worked with Pinellas County and the cities of Largo and Belleair Beach to identify multimodal improvements to link the Pinellas Trail and the Belleair Beach Bridge while also improving safety and access to the Largo Medical Arts District and the commercial hub of Belleair Beach. This concept plan was then utilized by Pinellas County to identify opportunities to implement some of the plan recommendations in an upcoming resurfacing project along the corridor, improving safety and connectivity for all users.

Pinellas County is home to Honeymoon Island, a state park with the highest number of visitors each year. During peak times, the large number of visitors to the park causes traffic congestion and mobility challenges into the park and the surrounding areas. Forward Pinellas has been working with the City of Dunedin, FDOT and the Florida Department of Environmental Protection to identify solutions to this traffic congestion and ensure efficient access to our beach communities. By serving as a convener of partners, we can bring multiple partners together to advance priorities that benefit all users.

Regional Coordination

Coordinating with our partners throughout the Tampa Bay region is instrumental to regional mobility. Transportation does not stop at our County border and land use decisions have the potential for substantial impacts on our neighboring communities. Regional connections in Pinellas serve a vital role for business, tourism and the mobility of the County’s residents. By coordinating across the region, Forward Pinellas has the opportunity to ensure a consistent approach to achieving the vision or our region and also to leverage our relationships to advance solutions that can help us meet our local needs.

MPOs Chairs Coordinating Committee (CCC)

The MPOs Chairs Coordinating Committee (CCC) is designated in state statute to formalize coordination amongst the MPOs in the greater Tampa Bay region. Comprised of representation from the Hernando/Citrus, Pasco, Pinellas, Hillsborough, Polk and Sarasota/Manatee MPOs, the CCC meets regularly to establish a joint list of regional priorities and to discuss other issues of regional significance. Through the work of the CCC, the region has a designated network of regional roads and multiuse trails. The CCC speaks in a single voice when it comes to advancing priority projects for funding, such as through the Transportation Regional Incentive Program (TRIP), or the Strategic Intermodal System (SIS).

Each MPO has signed an interlocal agreement to formalize roles and responsibilities of each member agency and provides a forum for regional decision making. While the CCC has an adopted conflict resolution process, this formal process has never been engaged, reflecting the long-standing success of the partnerships forged by this relationship. Participation in the CCC has allowed Forward Pinellas to advance a number of high priority projects throughout the County. The County’s ITS/ATMS system has been largely...
funded by having the individual projects that make up the system prioritized by the CCC Board. In addition, when SUNTRail funding was made available by the FDOT to advance multiuse trail projects throughout the state, having the remaining unconstructed segments of the Pinellas Trail Loop on the CCC priority list made it possible to receive a significant portion of this funding source for Pinellas projects.

A staff directors team meets monthly to coordinate on projects of regional significance and to ensure a consistent approach to the activities of the CCC Board. A multiuse trails team meets regularly to identify regional trail connections and coordinate on advancing regional multiuse trail projects. Another team meets on an annual basis to prioritize projects for TRIP funding. Combined, all of these teams, in collaboration with the CCC, provide a forum for regional collaboration and decision-making that helps us all achieve our vision for the future.

**Transportation Management Area Leadership Group**

While the CCC exists for the broader Tampa Bay region, a forum for coordination for the more urban portions of the region is the Transportation Management Area (TMA) Leadership Group. The TMA (formed in 2014) focuses on transportation issues and defines priorities significant to the single urbanized area including Pinellas and large portions of Pasco and Hillsborough counties.

The TMA Leadership Group meets regularly to coordinate on the major priorities for the 3-County area and to discuss other issues of importance to the region. In 2019, the group identified the reconstruction of the Interchange at I-275 and SR 60 in the Westshore area of Tampa as the number one priority in the region. Because of the TMA’s efforts, full construction funding for the project was announced by the Governor’s Office in late 2019, years ahead of the schedule that was previously identified. This project is significant for Pinellas as this interchange is one of the biggest bottlenecks in the entire region and a main commuter route for many Pinellas residents traveling into Hillsborough for employment each day. In 2020, the TMA Leadership Group moved under the CCC umbrella, formalizing the entity and allowing the Group to utilize the CCC conflict resolution process, should that need ever arise.

**Florida Department of Transportation District 7**

FDOT District 7 is a partner to Forward Pinellas and has played an integral role in the development of the Advantage Pinellas Plan, particularly regarding the planning of state and federally funded transportation improvements. Forward Pinellas also works with FDOT on an ongoing basis to plan, scope and program roadway projects on the State Highway System (SIS). Forward Pinellas has maintained, and in recent years enhanced, our partnership with FDOT in many ways. Forward Pinellas is included in the review of the design of all projects advanced by FDOT in Pinellas County and provides comments. Staff holds monthly meetings with FDOT to coordinate on ongoing projects and identify challenges and opportunities early in the planning stages. FDOT provides projections of state and federal transportation revenues that were critical in the development of our Cost Feasible Plan.

FDOT involves our staff early in the annual process to develop the FDOT’s Five-Year Work Program to ensure our priority projects are advanced. FDOT seeks input in the advancement of projects that are outside of the Work Program, including safety enhancement projects, projects advanced through the design-build-push-button process, and planning studies. FDOT is an excellent partner in addressing transportation concerns voiced by our agency such as working with us to advance a preliminary engineering study.
in the Drew Street corridor, identifying solutions to congestion along the Dunedin Causeway and also conducting additional traffic analyses in the US 19 corridor to consider improvements that are different in scope to what has been planned for in the past.

FDOT District 7 has long maintained a regional travel demand model for the five counties in the District developed in close coordination with the MPOs, through the Tampa Bay Regional Transportation Analysis (TB-RTA). The TB-RTA is comprised of FDOT, MPOs and consultant technical experts who meet regularly to coordinate on regional transportation projects and data needs to support future travel demand modeling. All of these efforts and examples of coordination help to advance FDOT’s mission to accommodate for dependable regional travel needs.

**Goods Movement Advisory Committee**

Hosted by FDOT District 7, the Goods Movement Advisory Committee (GMAC) has worked with its partners to create the Tampa Bay Regional Strategic Freight Plan in response to a steadily-increasing emphasis on freight mobility concerns and economic development. The Plan covers a region that includes 8 counties and more than 50 municipalities. Investments in roadway improvements that enhance the movement of goods are strategically coordinated throughout the region, and Forward Pinellas participates on the GMAC routinely. The Regional Freight Plan identifies critical freight corridors and hot spots that can be addressed through planned roadway projects. Forward Pinellas reviews all projects that receive state and federal funding against the recommendations of the Freight Plan. In Pinellas County, congestion impacts to freight traffic is projected to increase by 15 percent by 2045. While that number does not seem like a significant increase, Pasco and Hillsborough counties are projected to see an increase of 200 percent in congestion that impacts freight traffic. This regional congestion will have an impact on the ability of freight vehicles to access Pinellas County on a timely schedule. This loss of efficiency could negatively impact our businesses and economic development prospects. Coordinating on improvements to critical freight corridors and projects in the region benefits us all, including all of the communities in Pinellas County.

**Tampa Bay Area Regional Transit Authority**

The Tampa Bay Area Regional Transit Authority (TBARTA) was established by the Florida Legislature to coordinate regional transit planning in the Tampa Bay region. Forward Pinellas actively participates in the planning activities undertaken by TBARTA and provides input into how regional services can complement, and even enhance, local transit services.

TBARTA is currently developing a Regional Transit Development Plan (RTDP), a first for the region. The RTDP will identify ways to connect people regionally and lay out a plan to implement those services in the coming years. As Forward Pinellas maintains the long range transit vision for Pinellas County, close coordination with TBARTA is essential in ensuring that any planned regional services also support the vision we have for our own communities in Pinellas.
One of the projects being advanced by TBARTA is Regional Rapid Transit (RRT) in the I-275 corridor. Still in the PD&E phase, the RRT project includes proposed station areas in Pinellas County and the City of St. Petersburg. These station areas will have an impact on the surrounding land uses and transportation network in Pinellas County, if implemented. TBARTA is also working on an Innovative Transit Technologies Feasibility Study to examine the technical, financial and regulatory issues of various new transportation systems, including hyperloop, air taxis and aerial gondolas. This Innovative Transit study will examine the current state of each technology, future potential, route types, corridor profiles, travel demand and other considerations for each type of technology. Forward Pinellas is working to ensure that any proposed regional transit services are complemented by our local transit services, and are consistent with our Investment Corridors land use strategy, and will not have a disproportionate and negative impact on our communities, particularly those that are traditionally underserved. TBARTA also continues to play a role in the activities of the CCC to ensure consistency amongst regional transportation planning for all modes.

WHERE DO WE WANT TO BE?

As the countywide entity responsible for both transportation and land use planning, we provide a forum for leadership on local and regional issues.

Supporting Goal and Objectives

**Goal 5** - Achieve the land use and economic development vision of the pinellas countywide plan and the vision of other regional plans related to economic development, climate/environment and land use through strategic, collaborative, and sustainable investments in the transportation network.

**Objective 5.1** - Coordinate and collaborate with transportation partners to provide for multimodal options for local and regional travel.

**Objective 5.2** - Provide opportunities to engage citizens, particularly the traditionally underserved populations, in the development of Forward Pinellas’s plans and programs.

**Objective 5.3** - Develop and sustain activity centers and multimodal corridors as the primary focus of redevelopment efforts in Pinellas County.
7.11 OUTREACH TO THE PUBLIC

During the development of Advantage Pinellas, Forward Pinellas conducted extensive outreach to the community, through speaking engagements with business leaders, maintaining a presence at community events, conducting a statistically-valid survey of the public and using other online tools to gauge the public’s opinions on land use and transportation and to ultimately frame the content of Advantage Pinellas.

During all phases of outreach, regardless of the method, we heard very consistent feedback on how the public would like our community to evolve in the future. People want more mobility options. They want our transportation dollars invested in improvements that don’t just widen and build more roads. There is a strong interest in more public transit service. People value the presence of a wide variety of land uses and distinct communities. They truly see our diversity as an advantage of being in Pinellas County. This collaboration with the public helped us to determine how best to invest our transportation funding and shaped the selection of projects for Advantage Pinellas.

Statistically-Valid Survey for Pinellas County Households (844 responses)

- 57% - willing to exchange lower speeds for safer streets
- 69% - ideal neighborhood has shops and destinations nearby
- 70% - (Countywide) indicated better timed traffic signals are top priority
- 85% - believe that frequent, reliable transit improves the area’s economic value
- 90% - in favor of using technology to improve traffic

Most people said it was “very important” to live within 20-30 minutes of their jobs

Early on in the development of Advantage Pinellas, Forward Pinellas conducted a statistically-valid survey to confirm the consistency of public opinion on matters related to transportation and land use. Since this survey was statistically-valid, all outreach that happened during the rest of the Plan development was cross-checked against these responses for common themes. More than 800 people participated in the survey with responses from all socioeconomic and racial backgrounds. A large majority of respondents indicated that they would be interested in remaining engaged in the development of the Plan. This pool of people were invited back to participate in focus groups, and also provided a diverse array of contacts for other phases of outreach.

It’s TIME Tampa Bay

With the three MPOs of the Tampa Bay TMA developing long range transportation plans at the same time, an opportunity was realized to conduct a joint outreach effort to the public. Branded as ‘It’s TIME Tampa Bay’ (Transportation, Innovation, Mobility for Everyone), an online survey was developed to simultaneously solicit feedback from the residents of the region on issues related to land use and transportation. Recognizing that each of our counties has unique challenges and opportunities, the 3 MPOs coordinated extensively on the development of questions to be posed in the survey.
so that each could be of value, regardless of the home zip code of the respondent. This approach also allowed for a consistent evaluation of survey results, including the consideration of major regional projects that could impact each of the MPOs.

The It’s Time survey was utilized by each MPO to help identify County-specific, and cross-county, projects that supported and enhanced regional mobility. More than 9,000 residents of the tri-county area took part in the survey effort providing more than 25,000 data points for the MPOs to consider during development of their long range plans.

Focus Group Events

During the development of the Plan, Forward Pinellas engaged about 20 residents from throughout Pinellas County to participate in a series of three focus group events. We kept the same group of citizens engaged through all phases of Plan development so that we could have a consistent forum for feedback. The focus groups gave insight into the overall themes of the Plan, helped us identify our advantages, and then weighed in on how the ultimate selection of projects aligned with their priorities for the future vision of the County. The participants of the focus group remained committed to the project over the course of nearly two years and expressed an appreciation at the end of the project to having been able to educate themselves on the transportation planning process and provide meaningful feedback into the process.

Outreach in the Communities

Heading into the development of Advantage Pinellas, Forward Pinellas staff recognized that while holding traditional public meetings has value, most of our residents lead busy lives and don’t usually prioritize attendance at a government meeting to give feedback on items that they may not recognize as important. Recognizing this, we made it a priority to have a presence at existing community events to engage all segments of the public. Staff created an interactive ‘game’ using colorful balls and canisters to have the...
public weigh in on the prioritization of transportation funding. The ‘game’ proved to be very successful, with the set up being eye catching enough to draw people to participate in a way that they could easily understand and quickly see how their opinions lined up with the opinions of others in the community. Community events were sought after throughout Pinellas County, including in areas with traditionally underserved populations. As a thank you, participants were offered lights for their bicycles, to further encourage participation in our surveying efforts while also working to improve the safety of our community members while biking.

In addition to community events, Forward Pinellas staff proactively sought out opportunities to present to various community groups at their regularly-held meetings. Chambers of commerce, realtor organizations, Rotary Clubs, Kiwanis Clubs and neighborhood associations were all provided with presentations by Forward Pinellas.

**Advantage Pinellas Needs Plan Online Survey**

During the final phase of outreach for Advantage Pinellas, Forward Pinellas created an interactive online survey to seek input on the Draft Needs Plan. Staff recognized that many members of our public do not typically interact with large maps and can sometimes struggle to orient themselves when presented with a complex map of projects. Realizing that we needed a better way to communicate with the public, staff created a survey that focused heavily on visual images of various transportation improvement treatments that were easy to quickly understand and provide feedback. This allowed for people to weigh in on the types of treatments they would like to see in their communities, irrespective of where that treatment may be located. Due to this format, the Needs Plan Online Survey received an overwhelming response from the public, at a fraction of the budget normally spent on other online outreach efforts.

**The Countywide Plan**

The Countywide Plan sets up the framework for how our communities will develop into the future. While each of our local jurisdictions has ideas for how they desire to grow and evolve, the Countywide Plan creates the vision for how we ultimately function as a County. Historically viewed as more of a top-down governing document, the Countywide Plan has changed in recent years to allow local governments significantly more autonomy to increase densities and intensify development of areas that make the most sense. Forward Pinellas is committed to being a partner with our local government in land use decision making, providing the forum and framework for redevelopment, but letting communities work within a framework to achieve their own portion of our shared vision. With Advantage Pinellas, Forward Pinellas has created the Investment Corridor Strategy, aligning future transit investments with areas that will have the densities and intensities to support that transit service and make it successful into the future.

The Countywide Plan supports this approach as well, allowing for substantial increases in densities and intensities along corridors that have been designated as recipients for increased transit service funding. The close collaboration with our local government agencies in this effort is critical in ensuring that the investment of our transportation funding is supported by the land
use decisions of the communities surrounding that investment, and vice versa. By working together, we can all succeed in achieving our livability and mobility goals into the future.

**HOW DO WE GET THERE?**

Conversations with our residents, businesses and communities have made our vision for our County clear. Pinellas County residents wants to be mobile, but not always with a personal automobile. We want to invest in solutions that improve safety and livability and don’t just make it easier to drive as fast as we can from Point A to Point B. We like our established and diverse communities and want to invest in a transportation network that supports and enhances them. Getting there will require a significant amount of coordination and collaboration with our local, regional and statewide partners. But by working together, our vision for the future can be realized.

Thankfully, the partnerships that we have forged at the local and regional level will help us to achieve this vision for our communities. In Pinellas County we have a coordinated set of policy expectations that helps our 24 cities and the County work as one in partnership with countywide goals and objectives. It gives us a better ability to work with our regional partners too. We don’t generally have factions at odds with each other over fundamental development, transportation issues and economic opportunity goals when we work together.
Countywide Funding Workshop

To strengthen the consistency of our local transportation needs and challenges, Forward Pinellas conducted a countywide funding workshop in January 2019. This workshop was co-hosted by Pinellas County and PSTA and included the participation of more than 100 people representing communities from throughout the County, including many elected officials.

This workshop was held to inform participants about the funding challenges we face in maintaining our multimodal transportation system that is critical to everyone in our County. Information on the costs of maintaining our existing system and barriers to funding any improvements were identified.

A real-time voting transportation survey was conducted at the beginning of the workshop prior to any discussion. Pinellas County Public Works and PSTA then presented on funding and transportation needs and potential ways to pay for these needs. After the presentations and discussion time, the participants took the same real-time survey as to preferences on what improvements are needed and how to fund transportation and transit needs.

Coming out of the workshop, there was a shared understanding of the challenges facing our transportation network and some consensus on how to move forward. The ability of our agency to host these types of activities are critical in moving us forward together as a County. By serving as a convener, we are able to bring people together from diverse communities to identify a common future and then work together to secure funding and implement projects.

This coordination serves us well at the regional level, as well. With all of our local communities working together towards a shared vision for the future, we are able to speak with one, consistent voice and advance priorities. Our regional coordination efforts serve to advance our major regional priority projects at the state and federal levels as well. This close collaboration at the regional levels also allows us to learn from our peer agencies and bring best practices back home where applicable.

Advantage Pinellas Funding Strategy

Building off of our partnerships and local and regional collaboration, a shared vision has been identified and will be implemented through Advantage Pinellas. Through the implementation of this Plan, Forward Pinellas is able to allocate resources to advance projects that help us all recognize this shared vision.

This Plan commits almost 100 percent of flexible funding resources to projects that do not involve widening our roadways. Based on our significant outreach to the public, it is clear to us that our public wants investments in bicycle and pedestrian infrastructure. Our businesses want dependable travel times and easy access to their properties. The business community also needs to be able to have a labor pool suitable to fit their needs, and the surrounding community needs to be desirable enough to attract and retain these employees. There are clearly many advantages to living and working in Pinellas County. Listening to the public and our local and regional partners has allowed us to develop a Plan that responds to our current and future needs and invest in projects that will truly highlight what an advantage it is to be here.
Our mobility and accessibility for everyone advantage represents Pinellas by design. A strong transportation and land use framework that purposefully increases economic opportunities by directing growth to areas with reliable transportation. Our quality of life and economic future depend on planned redevelopment. Advantage Pinellas identifies key corridors that, combined with targeted investments, channel growth to higher-density activity districts and limit additional impacts to our existing neighborhoods. Our advantage promotes healthy mobility options for a population that is becoming more diverse as we grow. Our mobility for everyone advantage envisions equitable distribution of projects for all ages, abilities and income levels.

Advantage Pinellas is a community-driven vision. Our citizens identified the elements that best represent their future and through common themes and messaging, our six advantages were formed to direct project development.

Mobility and accessibility for everyone is a clear mission to focus on the implementation of projects that enhance mobility and the efficient movement of people and goods throughout Pinellas County and greater Tampa Bay. Forward Pinellas is committed to identifying opportunities to increase accessibility to better connect individuals to local and regional jobs, tourist attractions, and other major destinations and events. As we move toward 2045, Advantage Pinellas prioritizes the integration of transportation and land use planning by investing in an active transportation that connects our many unique communities and walkable downtowns. The Plan implements our goals and policies that foster future growth, address our mobility needs, and ultimately meet our long-term community goals and collaborative vision.

“… building more roads is not the ideal solution to our traffic challenges. We need to invest in new and innovative technologies to move more people more efficiently, while also offering other multimodal improvements that attract employers and a young and energetic workforce.”
~ Pinellas County Resident, Tri-County MetroQuest Survey Participant
WHERE ARE WE NOW?

The transportation system in Pinellas County is comprised of a multimodal network that includes roadways, transit service, bicycle facilities and sidewalks. To ensure that all people in Pinellas County, residents, commuters and visitors alike, have equitable accessibility, it is essential to provide options for everyone. The following summarizes the current state of our transportation system.

Roadways

Driving has been, and continues to be, the predominant mode of travel in Pinellas County. US Census data shows that approximately 80 percent of work trips are made by people driving alone, which has remained consistent over the past several decades. When individuals who carpool are included, approximately 87 percent of current Pinellas County residents travel by car to work. This percentage has declined slightly since 1990 when 91 percent of residents either drove alone or carpooled. The number of commuters using public transportation, walking or biking has remained consistent over the years totaling approximately 4 percent.

One of the biggest changes observed from 1990 to 2018 has been an increase in telecommuters. In 1990, approximately 2.5 percent of Pinellas County residents telecommuted and today it is 6.9 percent.

As previously discussed as part of our advantages, Pinellas County is a fully urban County with relatively little vacant land remaining for new development. The creation of Forward Pinellas in 2014 as an agency that addresses both transportation and land use represents an aligned strategy to improve mobility and support redevelopment. Our County and 24 cities are creating opportunities for redevelopment and walkable communities with higher density housing and access to active transportation. The Forward Pinellas countywide Plan updated in 2019, provides more flexibility to integrate land use and transportation by guiding new population and job growth into activity centers such as historic downtowns, areas that can support higher densities, and corridors where walking, biking and transit are supported. We are growing, adding full-time residents and setting new records for the number of tourists that visit each year.

Tourism increased an additional 4 percent between 2016 and 2018, with 6.6 million overnight visitors in 2018 as reported by Visit St. Pete/Clearwater Visitor’s Bureau.

Our advantage of being a unique and attractive destination is what draws people to our area; however, along with the economic benefits come the challenges of accommodating new development, more congestion and maintaining the high quality of life our residents currently enjoy.

Generally speaking, traffic congestion on Pinellas County area roadways has been increasing over the years. This is best reflected in our growth over the past decade as we have added over 35,000 jobs and 58,000 new residents since 2010. Future population and employment projections, prepared as part of the Advantage Pinellas LRTP process, indicate that our traffic volumes and congestion levels will continue to increase through the year 2045. Our socioeconomic projections anticipate that we will add an additional 93,000 in population and 60,000 in new jobs by the year 2045.

Roadways are congested if the peak rush hour traffic volume is 90 percent or more of the road’s adopted level of service standard. Development of Advantage Pinellas considers traffic volumes on today’s existing system and factors in improvements that are already funded. Figure 8.1 displays existing roadways within Pinellas County that are currently operating at or over capacity during rush hour and are projected to remain over capacity even with the construction of new projects that have committed funding. Figure 8.1 also illustrates volume to capacity conditions during rush hour ranging from a volume to capacity ratio of less than
Figure 8.1: Existing and Committed Volume to Capacity, Source: Forward Pinellas December 2019
1 (minimal congestion) to over 2 (heavy congestion). As reported in the 2019 Trends and Conditions Report for Pinellas County, more than 77 percent of all lane miles monitored by Forward Pinellas were uncongested, with the remaining 23 percent being congested during morning and evening rush hour.

Advantage Pinellas includes a future conditions analysis as part of the project development process. Futures conditions considers projected population and employment growth to 2045 with a variety of project scenarios to evaluate the projects that best address congestion out 25 years.

**Figure 8.2** represents congestion during rush hour with projected growth to 2045 and the assumed construction of projects considered cost feasible out to 2045. **Figure 8.2** also shows a range of volume to capacity ratios from less than 1 (minimal congestion) to over 2 (heavy congestion). Projected volume to capacity ratios on our area roadways in 2045 suggests there will be increasing congestion as a result of our increasing population, employment and attractiveness as a tourist destination.

A comparison of **Figure 8.1** and **Figure 8.2** highlights areas of future traffic congestion. Given this scenario, the jurisdictions responsible for funding transportation improvements in Pinellas County are coordinating regarding the best way to address traffic congestion and future growth to ensure Pinellas County remains a desirable place to live, work and play.

Adding physical capacity to our area roadways is one approach to mitigate congestion and maximize the speed at which vehicles move throughout the network. However, our ability to widen roadways is becoming more difficult and costly as most of Pinellas County has an established development pattern. Roadway widening projects are costly and likely to impact surrounding homes and businesses. In addition, continuing to add capacity only compounds safety concerns that favor the movement of vehicles over other travel modes.

Realistically, building more roads and wider highways in Pinellas County is not feasible and not part of a long-term solution. The 2019 Advantage Pinellas online survey asked residents to rank by priority types of roadway improvements that were acceptable to
Legend

E+C VC Ratios
VC Ratios

- 0.90 - 1.01
- 1.02 - 1.14
- 1.15 - 1.31
- 1.32 - 1.69
- 1.70 - 2.22

Figure 8.2: 2045 Cost Feasible Volume to Capacity, Source: Forward Pinellas December 2019
improve congestion such as new interchanges, toll roads, widening roads, maintaining existing roads, or intersection improvements. A summary of the responses showed maintaining existing roads received the highest ranking more often than any of the other choices for improving congestion. See Appendix O for a summary of the Advantage Pinellas on-line survey.

Figure 8.3 provides examples of new capacity projects completed in the last five years for Keystone Road and Jasmine Avenue. Targeted capacity improvements are an important element of a comprehensive multimodal plan. However, building more roads and wider highways in Pinellas County cannot be the only approach to accommodate future congestion due to costs and continued impacts to our existing neighborhoods. Improvements to Keystone and Jasmine have improved safety and added capacity to congested areas for travel today. Shown previously, Figure 8.2 illustrates that while adding capacity in key corridors is a mobility solution, our population will continue to grow and congestion will remain a traffic problem for our residents through 2045.

A number of our major thoroughfares are already constrained and have reached the maximum number of through travel lanes that can be constructed within the corridor right-of-way. Generally speaking, as roadway capacity is added it attracts additional vehicles and increases vehicle miles of travel (VMT). It also encourages a more suburban, auto-centric development pattern which negatively impacts other travel modes. Ultimately while adding capacity may provide short-term congestion relief today, eventually these roadways will again reach capacity as the population grows or travel patterns change.

Recognizing that widening roadways impacts our existing neighborhoods and can be only a short-term solution, Pinellas County has designated certain roadways as constrained. Figure 8.4 displays constrained roadways which operate at deficient levels of service but cannot be improved to alleviate the congested conditions. Pinellas County took formal action to state an identified roadway will not be widened beyond the existing configuration because of environmental and policy concerns. This ultimately limits future investments within these corridors to operational and technological improvements aimed at enhancing/maximizing vehicular flow and safety.
Figure 8.4: Constrained Roadways Map January 2020, Source: Forward Pinellas.
For example, a decision was made by the Pinellas County Board of County Commissioners to identify East Lake Road (northern Pinellas County) as constrained prevents widening beyond a four-lane typical section as recognized in Advantage Pinellas. Surrounding communities were concerned about the impacts of further widening on the character of their East Lake communities, as well as concerns of environmental degradation given the presence of significant wetland areas along the corridor. Another example is the Ulmerton Road corridor (mid County), which had future designs in previous LRTPs to construct grade separated interchanges along the corridor, similar to treatments applied to US 19 in mid-Pinellas County. Due to opposition from communities along Ulmerton, and concerns about the cost of the construction, widening to six-lanes was permitted, but a current policy prohibits any other through lanes to be added in the future. The potential land use impacts of removing a significant portion of the through traffic from an at-grade roadway and constructing interchanges was the driving factor behind the decision to constrain this portion Ulmerton Road.

Existing and Committed Projects

Forward Pinellas maintains the Transportation Improvement Program (TIP) which incorporates the FDOT’s Five-Year Work Program (updated annually) and local government projects scheduled over a five-year period. Figure 8.5 and Table 8.1 show projects that appear in the TIP and have previously been prioritized through the long range planning process and include dedicated funding from the various implementing agencies, including FDOT, Pinellas County and cities throughout the County.

As a policy planning board, Forward Pinellas must prioritize transportation projects for federal and state funding. With an annual update and adoption of the TIP, scheduled and proposed new projects are reviewed based on the priorities established in the LRTP and available funding. In order for a project to be included in the TIP, it must be fiscally constrained. Figure 8.5 displays the 2045 Advantage Pinellas Existing and Committed Projects, and Table 8.1 on the following pages lists the committed projects, included in the 2018/19-2022/23 TIP. Appendix D includes a link to the TIP.

Pedestrian/Bicycle Facilities

It is widely recognized that walking and bicycling are beneficial alternatives to private automobile travel. In addition to providing enhanced mobility for residents, encouraging the use of these modes has several benefits including improved air quality (fewer automobiles, and fewer vehicle miles of travel) and improved public health (encouraging residents to engage in physical activity). These modes of travel are encouraged through the development of distinct, yet complementary and interdependent networks.
Figure 8.5: Advantage Pinellas 2045 Existing and Committed Projects as Included in 2018/19-2022/23 TIP, Advantage Pinellas Plan Adopted November 13, 2019, Source: Forward Pinellas
<table>
<thead>
<tr>
<th></th>
<th>FPN</th>
<th>Project Sponsor</th>
<th>Type</th>
<th>Project</th>
<th>From</th>
<th>To</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>43380-1</td>
<td>FDOT</td>
<td>Capacity</td>
<td>SR 686/Roosevelt Boulevard (CR 296 Connector)</td>
<td>49th Street North</td>
<td>I-275/SR 93</td>
<td>Construction of grade separated toll facility linking US 19 and the Bayside Bridge with I-275</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>CR 296 (Future SR 690)/East-West 118th Avenue Expressway/ Gateway Express</td>
<td>US 19 SR55</td>
<td>East of 40th Street</td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>N/A</td>
<td>FDOT</td>
<td>Capacity</td>
<td>US 19/SR 55 (including Republic Dr Overpass and Curlew Road Interchanges)</td>
<td>North of SR 580</td>
<td>Northside Drive</td>
<td>Construction of grade separated roadway improvements</td>
</tr>
<tr>
<td></td>
<td>256774-2</td>
<td>FDOT</td>
<td>Capacity</td>
<td>Phase I - Boy Scout Overpass</td>
<td>Northside Drive</td>
<td>North of CR 95</td>
<td></td>
</tr>
<tr>
<td></td>
<td>256774-3</td>
<td>FDOT</td>
<td>Capacity</td>
<td>Phase II - Curlew Road Interchange</td>
<td>Northside Drive</td>
<td>North of CR 95</td>
<td>Bridge Replacement, addition of express lanes, and a multi-use trail.</td>
</tr>
<tr>
<td>3</td>
<td>422904-2</td>
<td>FDOT</td>
<td>Capacity</td>
<td>I-275/SR 93/Howard Frankland Bridge Replacement</td>
<td>North of SR 687</td>
<td>North of Howard Frankland Bridge</td>
<td>Construction of one managed lane in each direction providing interregional connectivity from Gateway Expwy and south of Gandy Blvd to Howard Frankland Bridge</td>
</tr>
<tr>
<td>4</td>
<td>424501-2</td>
<td>FDOT</td>
<td>Capacity</td>
<td>I-275 Express Lanes</td>
<td>South of SR 694/</td>
<td>North of 4th Street North</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Gandy Boulevard</td>
<td>Ulmerton Road</td>
<td>East Bay Drive</td>
<td>Construction of continuous sidewalks along both sides of corridor</td>
</tr>
<tr>
<td>5</td>
<td>4377362</td>
<td>Pinellas County</td>
<td>Capacity</td>
<td>Phase II - Park/Starkey Sidewalks</td>
<td>Ulmerton Road</td>
<td>East Bay Drive</td>
<td></td>
</tr>
<tr>
<td></td>
<td>(5-6)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6</td>
<td>437710-1</td>
<td>FDOT</td>
<td>Capacity</td>
<td>Alt US 19</td>
<td>South of Curlew Place</td>
<td>North of Country Club</td>
<td>Add SB left turn lane</td>
</tr>
<tr>
<td>7</td>
<td>424501-5</td>
<td>FDOT</td>
<td>Capacity</td>
<td>I-275</td>
<td>South of 54th Avenue South</td>
<td>South of Roosevelt Boulevard</td>
<td>Lane continuity improvements throughout the corridor. And a hardened shoulder for transit operations from I375 to Gandy Boulevard.</td>
</tr>
<tr>
<td>8</td>
<td>437807-2</td>
<td>FDOT</td>
<td>Capacity</td>
<td>4th Street North and South</td>
<td>5th Avenue S</td>
<td>5th Avenue N</td>
<td>Urban corridor improvements including sidewalks, pedestrian signal modifications and high emphasis crosswalks</td>
</tr>
<tr>
<td>9</td>
<td>N/A</td>
<td>Pinellas County</td>
<td>Capacity</td>
<td>Forest Lakes Blvd</td>
<td>Pine Ave N</td>
<td>Race Track Rd</td>
<td>Widen roadway to 4 lanes divided</td>
</tr>
<tr>
<td>10</td>
<td>N/A</td>
<td>Oldsmar</td>
<td>Capacity</td>
<td>Douglas</td>
<td>Commerce Blvd</td>
<td>Race Track Rd</td>
<td>Roadway enhancement projects</td>
</tr>
<tr>
<td>11</td>
<td>Oldsmar</td>
<td></td>
<td></td>
<td>Burbank</td>
<td>Douglas Rd</td>
<td>Tampa Rd</td>
<td>New road connection</td>
</tr>
<tr>
<td>12</td>
<td>N/A</td>
<td>Tarpon Springs</td>
<td>Capacity</td>
<td>Meres Blvd</td>
<td>Alt US 19</td>
<td>US 19</td>
<td>New road connection</td>
</tr>
<tr>
<td>13</td>
<td>N/A</td>
<td>Tarpon Springs</td>
<td>Capacity</td>
<td>Disston Ave Ext</td>
<td>Woodhill Dr</td>
<td>Meres Blvd</td>
<td>New road connection</td>
</tr>
<tr>
<td>14</td>
<td>N/A</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>15</td>
<td>4530500-1</td>
<td>FDOT</td>
<td>Capacity</td>
<td>SR 687/4th St N</td>
<td>Big Island Gap</td>
<td>S. of I 275/ SR 93</td>
<td>Bridge replacement</td>
</tr>
<tr>
<td>16</td>
<td>4400931</td>
<td>Pinellas County</td>
<td>Bike/Pedestrian</td>
<td>Pinellas Trail Loop, Phase 2 North Gap (partially on Duke Energy ROW)</td>
<td>Enterprise Road</td>
<td>Chesnut Park</td>
<td>Construction of Phase 2 of the Pinellas Trail Loop</td>
</tr>
<tr>
<td>17</td>
<td>437498-1</td>
<td>FDOT</td>
<td>Bike/Pedestrian</td>
<td>Courtney Campbell Causeway Trail Overpass</td>
<td>SR 60/Gulf-to-Bay Boulevard at Bayshore Boulevard</td>
<td>N/A</td>
<td>Construction of a bicycle/pedestrian overpass over SR 60 near Bayshore.</td>
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<tr>
<td>18</td>
<td>2568815</td>
<td>FDOT</td>
<td>Bike/Pedestrian</td>
<td>Harn Boulevard Overpass</td>
<td>Harn Boulevard</td>
<td>North of 1st Street</td>
<td>Construction of a pedestrian overpass across US 19</td>
</tr>
</tbody>
</table>

*Table 8.1: 2045 Advantage Pinellas Existing and Committed Projects Included in 2018/19-2022/23 TIP (as Shown in 2045 Adopted Advantage Pinellas Plan Summary)*
## Existing Plus Committed Transportation Projects 2020 - 2024

<table>
<thead>
<tr>
<th>FPN</th>
<th>Project Sponsor</th>
<th>TYPE</th>
<th>Project</th>
<th>From</th>
<th>To</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>18</td>
<td>Pinellas County</td>
<td>Bike/Pedestrian</td>
<td>Pinellas Trail Loop</td>
<td>Ulmerton Road</td>
<td>Belleair Road</td>
<td>South Gap - Phase 2, 3, 4</td>
</tr>
<tr>
<td>19</td>
<td>Pinellas County</td>
<td>Bike/Pedestrian</td>
<td>Pinellas Trail Loop</td>
<td>126th Ave N</td>
<td>Ulmerton Road</td>
<td>South Gap - Phase 1</td>
</tr>
<tr>
<td>20</td>
<td>FDOT</td>
<td>Complete Streets</td>
<td>U.S. 19</td>
<td>54th Avenue South</td>
<td>22nd Avenue South</td>
<td>$1 million Complete Streets upgrade to FDOT resurfacing project to construct a wide sidewalk on west side of roadway</td>
</tr>
<tr>
<td>21</td>
<td>Oldsmar</td>
<td>Complete Streets</td>
<td>St. Petersburg Drive</td>
<td>Dartmouth Avenue</td>
<td>Bayview Boulevard</td>
<td>$1 million to supplement a City of Oldsmar Complete Streets project.</td>
</tr>
<tr>
<td>22</td>
<td>Largo</td>
<td>Complete Streets</td>
<td>Rosery Road</td>
<td>Missouri Avenue</td>
<td>Eagle Lake Park</td>
<td>$1 million to supplement a City of Largo Complete Streets project.</td>
</tr>
<tr>
<td>23</td>
<td>Pinellas County</td>
<td>Complete Streets</td>
<td>Haines Rd</td>
<td>60th Ave N</td>
<td>US 19</td>
<td>Roadway enhancement projects</td>
</tr>
</tbody>
</table>

Note: Table does not include transit or technology projects.

Note: N/A indicates project not able to be shown on this high-level, generalized map.

Table 8.1: 2045 Advantage Pinellas Existing and Committed Projects Included in 2018/19-2022/23 TIP (as Shown in 2045 Adopted Advantage Pinellas Plan Summary)
of sidewalks, bike lanes, and trails. According to the 2017 American Community Survey, approximately 1.7 percent of Pinellas workers walk to work and 1.2 percent bike to work.

Many roadways were developed prior to the 1970s, before sidewalks were routinely required to be installed as part of the land development process. Forward Pinellas advocates for the expansion of our sidewalk network to fill in gaps on the major road network and encourages local governments to identify and fill gaps on local streets. Based on centerline miles, 49 percent of all roads and streets, or 1,739 roadway miles, had sidewalk coverage in 2018. Major roads had 88 percent sidewalk coverage in 2018, up from 80 percent as documented by Pinellas County in the 2016 State of the System Report.

Pinellas County has an extensive network of bicycle facilities that serves local and regional travel, including the award-winning Pinellas Trail. Bicycle lanes are on-road facilities designated for use by cyclists only and can be added during routine resurfacing or restriping projects if sufficient lane width is available. Twenty-four percent of major roadways, or about 227 miles, currently have bike lane coverage, up from 20 percent in 2016.

Trails are standalone, paved corridors that provide a “roadway” for the exclusive use of non-motorized transportation. Where dedicated off-road facilities cannot be accommodated, opportunities to dedicate space on the roadway for bicycle travel are considered. For example, in 2018, the City of St. Petersburg introduced a complete streets project along MLK Street North. The complete streets project eliminated one of existing four through lanes and repurposed the fourth lane as an on-road bicycle lane from 30th Avenue North to 4th Avenue North near downtown.

An Advantage Pinellas statistically-valid survey conducted by Forward Pinellas (ETC Institute - 844 random samples collected) identified preferences for roadway improvements and examples of the responses are provided.

- 57 percent of respondents were willing to exchange lower travel speeds for safer streets countywide
- 77 percent of participants indicated better timed traffic signals are their top priority
- Pinellas County residents want a safe, efficient transportation system

Figure 8.6: Pinellas Trail Loop Existing, Funded and Gaps October 2019, Source: 2019 Trends and Conditions Report
See Appendix O for a summary of the three surveys Forward Pinellas conducted to gather citizen input.

Pinellas Trail Loop

The backbone of our trail system is the popular Pinellas Trail. Forward Pinellas is working with local governments and our funding partners such as the FDOT to complete a loop that runs for 76 miles throughout Pinellas County. Forward Pinellas has prioritized the project for funding and advocates for its construction at the local, regional and state levels. As of October 2019, a majority of the Pinellas Trail Loop, 60 miles, or nearly 79 percent, has been constructed. Unconstructed gaps still exist, as shown in Figure 8.6. The Loop connects low-income and minority areas, major employers, institutions of higher education and vocational training, schools and many other community activity centers.

In addition, the Pinellas Trail Loop is part of the Florida Coast-to-Coast Trail, an uninterrupted trail path, when complete, will span the entire width of the State of Florida from St. Petersburg to Titusville.

198,000 residents and 132,000 jobs are within 1/2 mile of the Pinellas Trail. The Pinellas Trail Loop will provide:

• Economic opportunities by connecting residents, workers and tourists with employment, commercial and recreational destinations.
• Low-income and minority neighborhoods with enhanced connections to transit, schools, commercial centers, employment and recreational facilities.
• Decrease adverse environmental impacts on air quality by providing non-motorized transportation options.
• Foster a safe, connected and accessible transportation system throughout Pinellas County.

Advantage Pinellas recognizes the importance of active transportation facilities for our residents. Approximately 198,000 residents and 132,000 jobs are within 1/2 mile of the Pinellas Trail Loop.
With the Loop nearing completion, the focus is shifting to providing east-west connectivity. Pinellas County constructed five miles of trails between 2017 and 2019, after adding 38 miles of trails between 2013 and 2017.

Funding active and healthy mobility options continues to be a priority for Pinellas County. The countywide trail network also includes all of the community trails constructed collectively by our 24 local governments.

Data collected by automated trail counters in 2018 shows a total of 1,223,114 trail users at eight locations on the Pinellas Trail Loop. Currently, automated trail counters are only in use on the Pinellas Trail Loop and are not used on other parts of the trail network.

### Active Transportation Plan

During development of Advantage Pinellas, Forward Pinellas completed a comprehensive update to our existing bicycle and pedestrian master plan elements, which led to the identification of ten strategic corridors that will benefit from active transportation projects. **Figure 8.7** illustrates priorities considered during Plan development for these trail types: bike lane, community trail, connecting bike lane, Pinellas Trail and extensions, Duke Energy Florida Trail and sharrows. Forward Pinellas will continue to prioritize, program and fund these types of projects.

The Plan considered community and local agency input, Level of Traffic Stress (LTS), equity, safety, accessibility, and other factors in order to identify strategic bicycle and pedestrian investments. The Active Transportation Plan identifies ten major corridors for investments over the next 25 years including high conflict areas for overpass consideration.

Projects that were not able to be funded at the time of adoption of Advantage Pinellas in November 2019, remain...
on the needs list as critical connections to improve the overall transportation network. Forward Pinellas remains committed to working with our local government partners to advance these programs through other funding sources. The types of projects considered as needs are varied including multiuse trails, bike boulevards, trail overpasses at high conflict crossings and other types of bicycle and pedestrian infrastructure. When complete, these routes will substantially further efforts to develop a countywide network of safe and accessible bicycle and pedestrian facilities that connect people to the places they want to go.

**Transit Operations**

Pinellas Suncoast Transit Authority (PSTA) is an independent special district created by special act of the Legislature in 1984, merging the St. Petersburg Municipal Transit System and the Central Pinellas Transit Authority. Figure 8.8 graphs local transit ridership from 1997/98 to 2014/15 as reported by PSTA.

A fleet of over 200 buses and over 16 trolleys serve 39 fixed routes in Pinellas County and 2 express routes to Hillsborough County, with stops at Marion Street in Downtown Tampa and the Tampa International Airport. PSTA is investing in future technology and has procured six electric buses.
A general trend of rising ridership occurred over the past two decades, notably during the most recent recession, which began in FY 07/08 and ended in FY 09/10.

Figure 8.9 on the previous page displays the type of transit service that is supported by current residential densities. The geographic coverage of the public transportation network in Pinellas County is fairly comprehensive. Pinellas County in large part benefits from a roadway network that is primarily a grid system, especially in the St. Petersburg area. The PSTA serves most of unincorporated Pinellas County and a majority of the 19 of the County’s 24 municipalities. This accounts for 98 percent of the County’s population and 97 percent of its land area. The 2017 Transit Accessibility Report indicates that Pinellas County has the fourth highest percentage in the state in terms of the number of jobs located within 20-minute transit commutes.

While the overall geographic coverage is strong, current transit services are limited in service frequency (headways) and hours of operation. With the exception of a few pockets that support frequent or premium transit (14 percent of the County), the majority of the County consists of low-density segregated land use patterns that present a challenge for efficient transit service. Recent strains on the PSTA budget have also resulted in a reduction in service levels which negatively impact frequency and hours of operations. However, even with these challenges, the PSTA operations are very efficient and they provide a valuable mobility service to area residents.

Figure 8.9 shows that 14 percent of the Pinellas population lives in Census block groups with average residential densities that could, with appropriate urban design, support frequent bus service or better. This average residential density has increased from 13 percent in 2015.

With the implementation of Advantage Pinellas, Forward Pinellas is working to ensure that transit services are sustained and enhanced in the next 20 years. Transit Investment Corridors have been identified. Future premium transit services will be directed to these corridors and Forward Pinellas will make sure that future additional transit revenues will be directed to these areas. In addition, recent amendments to the countywide Plan increase the densities and intensities of the land surrounding the corridors identified for future premium transit services. This will help to provide the densities and intensities that will support the future transit services and make them successful.

PSTA has also implemented a first mile and last mile service to help get riders to and from the fixed route network, as well as an overnight program for transportation disadvantaged customers who need to get to and from work when fixed route service is not running. PSTA serves as a leader in the development and implementation in innovative mobility management programs and currently operates multiple programs that use Transportation Network Companies and local taxi services to provide riders with on demand connections. These include:
• **Mobility on Demand** - Same day, on-demand service to improve mobility for existing Demand Response Transportation customers who otherwise have to schedule trips at least a day in advance.

• **TD Late Shift** - A complement to the Transportation Disadvantaged discounted bus pass program, **TD Late Shift** provides on-demand rides to low income riders from 10 P.M. to 6 A.M. (outside PSTA’s core network span of service). This increases access to employment opportunities and other life sustaining trips for those who lack access to transportation outside PSTA’s service hours to or from jobs.

• **Direct Connect** - Discounted first and last mile transportation to 26 designated locations in Pinellas County that provide access to PSTA’s core and frequent route network.

• **Healthy Hop** - Transportation to medical appointments and life sustaining destinations for Tarpon Springs residents traveling within the city limits. This service is provided through a partnership with the City of Tarpon Springs and AdventHealth North Pinellas.

### Additional Transit Services

The Tampa Bay Area Regional Transit Authority (TBARTA) operates a vanpool program that operates in Pinellas County. TBARTA is considering other services the agency can provide beyond the vanpool program. This includes participating in a Project Development & Environment (PD&E) Study for Regional Bus Rapid Transit on the I-275 corridor from St. Petersburg in Pinellas to Wesley Chapel in Pasco. PSTA continues to explore and seek grant funding for innovative transit solutions and other projects that may assist in the development of a regional transit network in the Tampa Bay region.

Over the past several years, waterborne transportation has grown in popularity. Private water ferry services operate along the intercoastal waterway on the west side of the County. In addition, the City of St. Petersburg, City of Tampa, Pinellas County and Hillsborough County jointly fund a seasonal ferry service, supported in part by FDOT grant funds, that runs between St. Petersburg and Tampa.

### Automated Vehicle Technologies

FDOT is working to create a framework for deployment of automated vehicle technologies on public roadways through the Florida Automated Vehicles (FAV) Initiative. According to the FAV, automated vehicles include both autonomous and connected vehicle technologies. An autonomous vehicle (AV) is any vehicle equipped with advanced sensors (radar, LIDAR, cameras, etc.) and computing abilities to perceive its surroundings and activate steering, braking, and acceleration without operator input.

Connected vehicles (CV) employ vehicle-to-vehicle (V2V) and vehicle-to-infrastructure (V2I) communication to provide real-time warnings to a human driver to help them avoid crashes.

Public transportation agencies throughout Florida, including PSTA, have been partnering with FDOT to test various technologies. In addition, transit agencies outside of Florida are conducting automated vehicle technology demonstration projects to evaluate driver assist systems for shoulder running buses, automated docking of bus rapid transit vehicles, and crash warning and avoidance systems.
PSTA, in partnership with the City of St. Petersburg, plans to implement an autonomous shuttle demonstration project to understand how the technology could benefit and impact commuters in St. Petersburg. The total demonstration will include infrastructure improvements and the operation of two autonomous shuttles to be deployed in downtown St. Petersburg. PSTA is working with a third-party operator to assess the route for this demonstration and prepare documentation to submit to NHTSA (National Highway Traffic Safety Administration) in order for these shuttles to be approved for operation on a public roadway. PSTA is currently finalizing an operations agreement with the vendor.

PSTA worked with Stantec to develop an AV feasibility study and concept plan for autonomous shuttle services in Clearwater and Dunedin. The purpose of the feasibility study and concept plan was to examine the potential for a self-driving shuttle service implementation, and to define the potential infrastructure, capital and operating requirements necessary to support additional pilot projects. The feasibility study was completed at the end of 2019. A third-party operator has since performed additional analysis of the routing options to prepare application packages to submit to NHTSA in order for these shuttles to be approved for operation on public roadways.

PSTA is also a member of an Automated Bus Consortium (ABC) with more than twelve other transit agencies and state DOTs throughout the country, which is being led by AECOM. PSTA and the other consortium agencies submitted a grant proposal to the FTA’s Integrated Mobility Innovation to receive funding to plan potential use cases for fully autonomous fixed-route buses.

**Transportation Funding**

Forward Pinellas is funded through federal, state, and local sources. For FY 2020, the existing revenues available to Pinellas County total $936 million. Over 2020-2045, nearly $3.8 billion is available for roadway, bike, and pedestrian projects (based on the Cost Feasible Plan, which separates transit. The Cost Feasible Plan does not include all available funding sources). The funding sources are described briefly in this section, as well as the estimated FY 2020 revenues available to Pinellas County in year of expenditure (YOE) dollars as estimated in the Financial Resources document, see Appendix K.

**Federal Funding Sources Available**

**Transportation Management Area** - These are funds distributed to an urban area that has a population greater than 200,000, as designated by the U.S. Department of Transportation (U.S. DOT). They are the same as Surface Transportation Program (SU) funds in the five-year work program. TMA funds are estimated at $13.5 million for FY 2020.

**Federal Transit Administration Section 5307** - Federal funds are made available for urbanized areas and to Governors for transit capital and operating assistance and for transportation-related planning. The term “urbanized area” refers to an incorporated area with a population of 50,000 or more that is designated as such by the U.S. Bureau of the Census. Recipients must be eligible public bodies. PSTA uses the funds to support the sustainability plan, including hybrid and electric buses, and providing rapid transit in areas of the County that would benefit from its availability. The majority of funds are used for capital projects, but also for preventative maintenance, tire leasing, administrative, and short-range planning costs. The FTA apportionment for Section 5307 Urbanized Area funds is distributed to Hillsborough Area Regional Transit (HART), PSTA, Pasco County Public Transit (PCPT), and the Tampa Bay Regional Transit Authority (TBARTA) as part of the Tampa-St. Petersburg UZA. The split formula is based on an agreement between the agencies, and is based on the number of miles reported annually. A 20 percent non-federal match is required. In FY 2020, Section 5307 funding is estimated at $9.6 million.

**Federal Transit Administration Section 5337** - The State of Good Repair grants are capital assistance funds for maintenance, replacement, and rehabilitation projects of high-intensity fixed guideway and bus systems. The
funds help agencies maintain a state of good repair. Funds are eligible to be spent on rolling stock, track, line equipment and structures, signals and communication, power equipment, security systems, passenger stations, maintenance facilities and equipment, and operational support equipment. Funds are apportioned by statutory formulas and a 20 percent non-federal match is required. In FY 2020, Section 5307 funding for PSTA is estimated at $6,000.

Federal Transit Administration Section 5339 - The Bus and Bus Facilities program provides capital assistance for new and replacement buses and related equipment and facilities. Eligible capital projects include the purchasing of buses for fleet and service expansion, bus maintenance and administrative facilities, transfer facilities, bus malls, transportation centers, intermodal terminals, park-and-ride stations, acquisition of replacement vehicles, bus rebuilds, bus preventive maintenance, passenger amenities such as passenger shelters and bus stop signs, accessory and miscellaneous equipment such as mobile radio units, supervisory vehicles, fare boxes, computers and shop and garage equipment. Funds are allocated on a discretionary basis and through competitive grants, and a minimum 20 percent non-federal match is required. The estimated revenues from Section 5339 in FY 2020 is $1.8 million.

State Funding Sources Available to Pinellas County

Strategic Intermodal System (SIS) - This is a capacity program providing funds for construction, improvements, and associated right-of-way (ROW) on the State Highway System roadways designated as part of the SIS or Florida Interstate Highway System (FIHS). The SIS First Five Year Plan (FY 2018/2019-FY 2022/2023), Second Five Year Plan (FY 2023/2024-FY 2027/2028), and the Long-Range Cost-Feasible Plan (FY 2029-2045) are available on FDOT websites. SIS projects within Pinellas County can be identified from these plans and their costs are assumed to be available program funds. For FY 2020, SIS funding totals $811.1 million.

Other Arterial & Construction (OA) - This is a capacity program providing funds for construction, improvements, and associated ROW on the State Highway System roadways not designated as part of the SIS or FIHS. OA revenues are estimated at $20.4 million in FY 2020. These revenues can be used on non-state roadways that can provide capacity on a corridor parallel to a state roadway. In this situation a 50 percent local match is required.

Transportation Regional Incentive Program (TRIP) - This program was established as part of the State’s major growth management legislation enacted with Senate Bill 360. The TRIP program is intended to encourage regional planning by providing matching funds for improvements to regionally significant transportation facilities identified and prioritized by regional partners. Forward Pinellas has partnered with other MPOs in the region through the MPOs Chairs Coordinating Committee interlocal agreement to identify regional facilities that could be eligible for TRIP funding. In the past, revenues have been shared based on population. TRIP funds can be used for up to a 50 percent match to local or regional funds. While TRIP funding is competitive and therefore uncertain, it is estimated to total $1.0 million in FY 2020.

Local Funding Sources Available to Pinellas County

Fuel taxes - Historically, fuel taxes have represented a major portion of Pinellas County’s local transportation revenues. Currently, Pinellas County charges seven cents of the possible 12 cents of LOFT - made up of the 6-Cent (6 cents) and 9th-Cent LOFTs (1 cent) - in addition to the Constitutional Fuel Tax (2 cents) and County Fuel Tax (1 cent). The majority of fuel tax revenue is dedicated to transportation infrastructure maintenance and ITS. Fuel tax revenues total $28.5 million for FY 2020.

Sales tax - Pinellas County charges a 1.0 percent Local Discretionary Sales Surtax, specifically the Local Government Infrastructure Sales Surtax, which is more commonly referred to as the “Penny for Pinellas.” This sales tax was first adopted in 1987 (collection began in 1990)
and is set to expire at the end of 2029. Transportation improvements that have been funded with the Penny for Pinellas include countywide resurfacing improvements, intersection capacity improvements, bridge rehabilitation, construction of new and widened roads, Pinellas Trail expansion, and roadway beautification. Revenues from the Penny sales tax that are eligible for roadway capacity and enhancement projects, based on historical spending in the County, are estimated at $12 million in FY 2020.

**PSTA fare revenues** - Fare revenues are collected from passengers by PSTA and are used towards operating expenses. Fare revenues are based on ridership projections as estimated by PSTA. PSTA estimates fare revenues of $10.4 million in FY 2020.

Through the year 2045, the existing funding sources are expected to provide $6.2 billion for transportation as shown in Table 8.2.

### Table 8.2: 2045 LRTP Revenue Projections for Existing Sources in Millions of Year of Expenditure Dollars

<table>
<thead>
<tr>
<th>Funding Source</th>
<th>2020-2024</th>
<th>2025-2029</th>
<th>2030-2034</th>
<th>2035-2039</th>
<th>2040-2045</th>
<th>Total 2020-2045</th>
</tr>
</thead>
<tbody>
<tr>
<td>Strategic Intermodal System</td>
<td>$2,181.30</td>
<td>$216.40</td>
<td>$27.90</td>
<td>$12.50</td>
<td>$406.10</td>
<td>$1,644.20</td>
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<tr>
<td>Other Arterial &amp; Construction</td>
<td>$171.40</td>
<td>$235.60</td>
<td>$268.20</td>
<td>$285.00</td>
<td>$345.40</td>
<td>$1,305.60</td>
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<tr>
<td>Transportation Regional Incentive Program</td>
<td>$6.70</td>
<td>$9.90</td>
<td>$11.60</td>
<td>$12.10</td>
<td>$14.50</td>
<td>$54.80</td>
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<td>$67.30</td>
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<td>$67.30</td>
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<td>$350.00</td>
</tr>
<tr>
<td>Transit: 5307</td>
<td>$45.40</td>
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<td>$53.20</td>
<td>$63.90</td>
<td>$269.00</td>
<td></td>
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<tr>
<td>Transit: 5337</td>
<td>$0.00</td>
<td>$0.00</td>
<td>$0.00</td>
<td>$0.00</td>
<td>$0.20</td>
<td>$0.20</td>
</tr>
<tr>
<td>Transit: 5339</td>
<td>$8.60</td>
<td>$8.50</td>
<td>$8.50</td>
<td>$8.50</td>
<td>$10.20</td>
<td>$44.30</td>
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<tr>
<td>Constitutional Fuel Tax</td>
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<td>$36.20</td>
<td>$35.80</td>
<td>$35.50</td>
<td>$42.10</td>
<td>$186.20</td>
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<tr>
<td>County Fuel Tax</td>
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<td>$16.50</td>
<td>$16.70</td>
<td>$16.80</td>
<td>$20.40</td>
<td>$86.80</td>
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<tr>
<td>6-Cent 1st Local Option Fuel Tax</td>
<td>$68.40</td>
<td>$66.90</td>
<td>$65.50</td>
<td>$64.00</td>
<td>$74.90</td>
<td>$339.70</td>
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<tr>
<td>9th-Cent Fuel Tax</td>
<td>$20.50</td>
<td>$19.80</td>
<td>$19.00</td>
<td>$18.30</td>
<td>$21.00</td>
<td>$98.60</td>
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<tr>
<td>Penny for Pinellas</td>
<td>$211.20</td>
<td>$246.30</td>
<td>$292.30</td>
<td>$346.40</td>
<td>$470.50</td>
<td>$1,566.60</td>
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<tr>
<td>Fare Revenues</td>
<td>$52.30</td>
<td>$52.90</td>
<td>$53.50</td>
<td>$54.00</td>
<td>$65.60</td>
<td>$278.40</td>
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<tr>
<td><strong>TOTAL REVENUES</strong></td>
<td><strong>$6,224.30</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Source: Forward Pinellas Financial Resources Technical Memorandum, February 2019

From a transit perspective, PSTA has always relied solely on ad valorem taxes and state and federal grant funding for their operations, along with farebox revenues and advertising revenues. PSTA is part of a national benchmarking group of similar sized agencies and consistently is on the lowest end of investment in transit. This includes both expense-vehicle revenue hours and per capital operations spending. Despite increases in the County’s population, the investment in transit has not increased at the same levels.

Throughout 2019, Forward Pinellas, Pinellas County and PSTA were engaged in numerous conversations about how best to address the funding challenges facing our integrated transportation network. Beginning in January 2019 with a joint workshop that also included the Mayor’s Council for Pinellas County, elected officials in Pinellas County have expressed that funding for transportation, including transit,
is a major need that continues to be voiced through citizen surveys, public comment, and by the business community.

This discussion continued with a July Pinellas County Board of County Commissioners Work Session focused on a balanced solution with three tenets - reducing traffic congestion, making transportation safer and enhancing transit services. Pinellas County, PSTA and Forward Pinellas staff worked together to develop these solutions based on needs not only in transportation, but with housing that is affordable and workforce development that rely on transportation to be effective. The conversation continued with public outreach after the work session and will be continuing throughout 2020, with the ultimate goal of identifying a more sustainable and predictable revenue source to improve the multimodal transportation network.

WHERE DO WE WANT TO BE?

In order to fully realize the Advantage of Mobility and Accessibility for Everyone, Forward Pinellas and our partners must invest our limited transportation funding dollars in appropriate transportation modes that make the most sense for a given area.

Supporting Goal and Objectives

Goal 6 - Achieve an efficient, effective, equitable, safe and complementary multimodal transportation network in Pinellas County and throughout the Tampa Bay region that provides viable travel options for all transportation users.

Objective 6.1 - Provide improved mobility and accessibility for everyone by better connecting people to places, eliminating transportation barriers to expanded economic opportunity and enhancing community quality of life.

Objective 6.2 - Increase transit mode share and overall ridership by providing frequent, fast and reliable service.

As we look to the future, our opportunities for adding capacity to roadways is severely limited due to a variety of factors including availability of land and funding; high right-of-way costs; concern about impacts on neighborhoods, including compatibility issues, property values and environmental concerns; and a commitment to seeking alternative solutions to congestion mitigation, such as transportation system and demand management, wherever possible and practical.

To meet the County’s mobility challenges, it has become increasingly important for Forward Pinellas and its partners to maximize the potential of all transportation...
modes. Expanding modal alternatives beyond roadways and improving the efficiency of vehicle traffic flow through technology is our best approach to improve mobility and accessibility for everyone. In doing so, we will connect people to places, eliminate transportation barriers to expanded economic opportunity, and enhance community quality of life. We can achieve our vision by concentrating on the following:

**Identifying and Addressing our Needs**

Identification of projects to meet the future travel demand beyond 2020 is accomplished through an iterative needs assessment based on analysis built upon the plan goals and objectives. Tools such as the regional travel demand model and geographic information system mapping were used to develop quantitative data for completing this evaluation. This needs assessment included the identification of future projects for all modes, unconstrained by cost.

Forward Pinellas followed a rigorous technical process throughout development of Advantage Pinellas for identifying the needed projects. As with previous LRTP updates, the technical process for forecasting future travel demand utilized the Regional Planning Model developed through the ongoing coordination with the MPOs in the Tampa Bay area with support from FDOT. MPO staff attended coordination meetings of a Technical Review Team (TRT) during the plan development to coordinate transportation projects within the region. The result of this work effort is the Tampa Bay Regional Planning Model (TBRPM). The roadway needs were determined by using the Tampa Bay Regional Planning Model to identify deficiencies in the roadway network based on future travel needs.

The first step in evaluating the future needs was to assign the 2045 population and job forecasts to the transportation network that has committed funding through FY2022/23. The results of this analysis helped guide decisions in identifying future project needs. These needs are identified as individual projects and their effectiveness at addressing the transportation deficiencies were evaluated.

**DEVELOPMENT OF FUTURE NEEDS**

**Growth Projection:**
93,000 more people by 2045

**Employment Projection:**
60,000 more jobs by 2045

The assessment of transit and active transportation needs are benefited by information from the model by identifying corridors that will continue to have congestion and reliability issues after completion of roadway capacity projects. The corridors can then be screened for alternative improvements, including enhanced transit services, active transportation improvements and technological solutions that can improve mobility. The transit needs assessment for the County is coordinated with PSTA. For the 2045 LRTP, the transit needs assessment included defining a vision for transit service along key corridors. Pinellas County also maintains an extensive list of future trail projects through the Active Transportation Plan, identifying countywide needs, while also highlighting those projects that can be funded through Advantage Pinellas. Once the assessment of the needs was completed, projects necessary to address those needs were identified and prioritized to determine those that would be included in the cost feasible portion of the plan.
**Investing in Transit in Key Corridors**

One of the objectives set forth in Advantage Pinellas is the desire to increase transit mode share and overall transit ridership. Several elements go into making this a reality, including frequent, fast and reliable service. Investing in transit in key corridors begins with recognizing the critical connection between land use and transportation.

Land use and transportation have traditionally been treated as separate planning fields. But land use decisions affect the transportation system and can increase options for people to access destinations, goods, services, and other resources. In turn, transportation decisions affect land use development demand, choices, and patterns.

To maximize the number of people who live and work within convenient reach of transit, higher density residential, office, and retail development should be concentrated within easy walking distance (1/4 to 1/2 mile) of transit stops. Land use patterns that support walking, biking and transit use include an interconnected street network designed to make travel distances as short and direct as possible, with buildings oriented near the sidewalks and parking relegated to the rear of the property, to minimize conflicts between automobiles and other modes of travel.

Figure 8.10 illustrates the key investment corridors that are best suited to connect transportation (all mobility options) to existing and planned housing and our workforce to local and regional jobs. Recognizing that the ability to add substantial physical capacity to the roadway network is constrained by existing development, Advantage Pinellas strives to invest in projects that support these investment corridors and as they are best suited for housing, employment and regional connectivity. They promote travel options and economic redevelopment while protecting our established communities. Figure 8.10 represents...
the vision for a countywide housing strategy that is coordinated with redevelopment and planning policy that promotes improved access to regional transportation services.

The other priority corridors all have strong merit and would also be well-suited for enhanced transit service. Together, the full linkage of priority corridors would create a connected transit network. This network would be supported by feeder route service and other services that connect people who do not live, work or attend school near the routes providing premium transit options. Through the allocation of population and employment growth, proximity to one of these priority corridors was a strong factor in the ‘attractiveness’ of an area to receive that future growth through 2045.

The full priority network provides Pinellas County residents, visitors and workers with competitive choices for travel, including transit service that is reliable, fast and frequent. Connecting people to the employment, education and other services in our community provides opportunities for economic growth and development. Figure 8.13 displays the transit needs plan for Pinellas County.

**Bus Rapid Transit**

Several Bus Rapid Transit (BRT) plans are in place that will support our transit investments in key corridors. First, the Central Avenue BRT is under design. The first project in the region to successfully go through the federal Small Starts process, the Central Avenue BRT will run on business access and transit (BAT) lanes for the majority of the corridor see Figure 8.11. The Central Avenue BRT will run on business access and transit (BAT) lanes for the majority of the corridor. This will allow buses to achieve higher operating speeds with limited stops.

This will allow the bus to achieve higher operating speeds as compared to operating in mixed traffic. In addition, the service will have limited stops and will use transit signal priority (TSP), which will allow the bus operator to keep a traffic signal green when approaching an intersection. In doing so, this will help improve travel time and the reliability of service.

PSTA is also working with FDOT and the City of St. Petersburg on a Bus on Shoulder pilot project that will allow buses to bypass congestion on I-275 under certain conditions. The Bus on Shoulder pilot on I-275 in Pinellas County is part of a larger regional transit vision that would connect to Hillsborough and Pasco Counties. A design build contractor for the project has been selected and is currently working on the design plans. Construction is anticipated to begin in spring of 2020. The project is 5.3 miles and is estimated to be complete in the spring of 2021. This pilot project will allow transit vehicles to travel on the shoulder when congestion slows traffic to less than 35 miles per hour. Figure 8.12 is part of a larger regional transit vision that will connect to Hillsborough and Pasco Counties.
Figure 8.13: Transit Investment Framework

Transit Needs
- Regional Express Service
- Limited Stop/High Frequency Service
- CSX
- Transit Centers


H:\USERS\Information Resources\GIS\Maps & Data\Special Projects\2019 Priority Corridors\NeedsPlanSeptember.mxd
Increased Investment in Alternative Transportation Modes

Traditionally, Forward Pinellas has prioritized funding for highway projects, but increasingly has moved towards including set-asides for other modes. Consistent with the Cost Feasible Plan, Forward Pinellas aims to implement transportation projects for which there are available funds over the next 25 years. Currently, there is enough funding that Forward Pinellas will be able to fund our priority projects across highway, transit, bike, and pedestrian modes if the primary funding sources maintain at the projected revenue levels. It should be noted, however, that funding for federal sources may vary based on federal funding priorities, and local funding sources can be more sensitive to local economic conditions. For example, changes in the local economy can affect the availability and pricing of fuel and therefore the fuel tax revenues. Keeping this in mind our estimations should be used cautiously, especially forecasts farther into the future that can be more variable due to less certainty. Appendix C provides a detailed analysis of projected transportation revenues through the year 2045.

Funding Advantage Pinellas requires working with local, state and federal agencies to identify revenue sources reasonably expected to be available through 2045. Funding needs are based on prioritized transportation investments that were identified in part through surveys and focus groups to develop a list of the County’s critical transportation issues. Feedback from the public made it clear that widening roadways to solve traffic congestion is not the best option. There was also clear support for strategic investments in areas of growth and mobility options that serve the needs of all road users, including drivers, bicyclists, pedestrians and transit users, while maintaining our existing infrastructure.

Advantage Pinellas includes increased funding for building new bike and pedestrian facilities and investing in technology. Our ability to allocate funds to categories other than roadways is limited based on restrictions tied to state and federal funding requirements; however, we have dedicated close to 100 percent of our flexible funding sources to projects that address safety, accessibility, transit and technology. Figure 8.14 on the next page shows the breakdown of spending by mode which includes 10 percent to bicycle, pedestrian and technology improvements; 15 percent to transit; and 75 percent to roadway construction and expansion.

Funding was set aside for the following programs before the cost feasibility of roadway projects was determined.

- Future Technology Needs: $1,000,000 Annually
- Complete Streets Construction Grants: $1,000,000 Annually
- Capital Transit (Bus Replacements): $1,500,000 Annually
- Regional Transit Capital Investments (Vanpool, Waterborne, Regional vehicles, Other): $500,000 Annually
- Active Transportation Plan Recommendations: $61,259,000 Distributed through 2045
- Trail Overpasses at High Conflict Crossings: $6,000,000 (each) four total (one in each time period)

Technology/ITS

Pinellas County’s Intelligent Transportation System (ITS) is one of the most advanced traffic management systems in the state of Florida. ITS involves the use and coordination of traffic signal control device operations and transportation system user information from motorist, transit, pedestrians and bicyclists. Smart cities concepts are also incorporated to even further enhance the transportation system and improve safety. By integrating smart cities communication technology with various physical devices connected to the ITS network,
such as Bluetooth sensors, closed circuit television (CCTV) cameras, and electronic safety devices, real-time data is collected and used to monitor and manage the transportation system, optimize signal patterns and control traffic flow. Through the use of ITS, travel time has been documented to be reduced by 13 percent and drivers experience a faster and safer commute. The County continues to implement ITS throughout the region to enhance safety, mobility and connectivity. Figure 8.15 on the following page shows corridors where ITS improvements have been completed or are planned. Continued investment in ITS and other emerging technology will play a critical role in helping us realize our future vision. Forward Pinellas will continue to work with Pinellas County to secure state and federal funding to move these projects forward. The County continues to implement ITS to enhance safety, mobility and connectivity.

Almost all major roadways in Pinellas County will have some form of ITS treatment operational within the next few years. The County continues to implement ITS to enhance safety, mobility and connectivity. This map highlights corridors where ITS improvements have been completed or are planned. Almost all major roadways in Pinellas County will have some form of ITS treatment operational within the next few years.

Figure 8.14: Advantage Pinellas Increases Spending on Alternative Transportation Modes.
Figure 8.15: Intelligent Transportation System Corridors, Source: Forward Pinellas, 2019
**HOW DO WE GET THERE?**

The implementation of Advantage Pinellas requires close coordination with local, state, and federal agencies. Achieving our vision is centered around building upon committed projects and identifying, prioritizing, and funding future multimodal transportation projects for Pinellas County through the year 2045. The following highlights the key elements.

**Implement Cost Feasible Plan**

As with many financial decisions, the projects selected for inclusion in the Cost Feasible Plan are the result of prioritizing the identified needs and balancing those needs against the revenue projected to be available between now and 2045. On the following page Figure 8.16 displays the cost feasible roadway projects, and Table 8.3 lists the costs of the roadway projects.

**Active Transportation**

Forward Pinellas has committed to prioritizing ten corridors for bicycle and pedestrian treatments over the life of Advantage Pinellas, as shown in Figure 8.17 on the following page. A minimum of four trail overpasses at high conflict areas high conflict areas has also been programmed. Table 8.4 (see page 8.35) includes costs for the Active Transportation Plan using federal and state funding that Forward Pinellas has discretion over. Forward Pinellas has relied upon our local partners to fund the majority of this infrastructure in years past. Extensive outreach efforts have demonstrated that bicycle and pedestrian improvements are one of the highest priorities for our citizens. Future funding should be shared by everyone, not just our local agencies.

In order to ensure that bicycle and pedestrian projects are prioritized, funding is being set-aside before dedicating to highway projects. During the Cost Feasible analysis, for example, funds from TMA were set aside for a number of non-highway-specific needs including (in 2019 dollars): future technology ($1 million per year), Complete Streets ($1 million per year), transit ($2 million per year), bicycle and pedestrian ($58.6 million over 20 years), and overpass construction ($6 million each).

**Continue Investing in Operations and Maintenance**

As part of the revenue analysis for the LRTP, FDOT maintains a reserve of funding for resurfacing State highways and maintaining State bridges. Appendix C documents the State of Florida’s commitment to maintaining the transportation system.

The need to fund operations and maintenance activities was considered by Forward Pinellas in developing the Cost Feasible Plan. By not allocating all of the available revenues to capacity projects, future revenues are available to local governments for addressing major operational and maintenance projects. Revenues such as fuel taxes are applied to maintenance needs, and the 9th Cent Fuel Tax has been dedicated to fund ITS projects. In addition to designated funding for...
Figure 8.16: Cost Feasible Roadway Projects, 2045 Advantage Pinellas Adopted November 2019, Source: Forward Pinellas.
## 2045 COST FEASIBLE ROADWAY PROJECTS

<table>
<thead>
<tr>
<th>Map #</th>
<th>Project Name and Limits</th>
<th>Project Sponsor</th>
<th>2019 Cost Estimate</th>
<th>Cost in Year of Expenditure</th>
<th>2045 Lane Configurations</th>
</tr>
</thead>
<tbody>
<tr>
<td>11</td>
<td>I-275 from S of Roosevelt to N of 4th Street N</td>
<td>State</td>
<td>$141,779,260</td>
<td>$141,779,260</td>
<td>Add 1 additional express lane in each direction</td>
</tr>
<tr>
<td>43</td>
<td>46th Ave N from 49th St N. to 38th St N.</td>
<td>County</td>
<td>$2,525,000</td>
<td>$3,045,616</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>16</td>
<td>54th Ave. N. from 49th St. N to 34th St. N</td>
<td>County</td>
<td>$5,450,000</td>
<td>$6,573,705</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>44</td>
<td>Fisher Rd from Curlew Rd to CR 39</td>
<td>County</td>
<td>$2,525,000</td>
<td>$3,045,616</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>4</td>
<td>Forest Lakes Blvd. from SR 580 to SR 584</td>
<td>County</td>
<td>$6,900,000</td>
<td>$9,137,219</td>
<td>Widen to 4 lanes divided</td>
</tr>
<tr>
<td>2026-2030</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>10</td>
<td>US 19 (SR 55) from N of CR 95 to S. of Pine Ridge Way S (Tampa Rd. Interchange)</td>
<td>State</td>
<td>$111,936,674</td>
<td>$111,936,674</td>
<td>Capacity, operational and safety improvements with pedestrian crossings every 1/4 mile</td>
</tr>
<tr>
<td>1</td>
<td>Starkey Rd. from Flamevine Ave to Bryan Dairy Rd</td>
<td>County</td>
<td>$16,560,000</td>
<td>$21,929,326</td>
<td>Widen to 6 lanes divided</td>
</tr>
<tr>
<td>3</td>
<td>Starkey Rd. from Ulmerton Rd to Bryan Dairy Rd</td>
<td>County</td>
<td>$10,380,000</td>
<td>$13,745,556</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>23</td>
<td>Belcher Rd. at SR 60</td>
<td>County</td>
<td>$13,050,000</td>
<td>$17,281,262</td>
<td>Intersection improvement at SR 60</td>
</tr>
<tr>
<td>6</td>
<td>Belleair Rd. from US 19 to Keene Rd</td>
<td>County</td>
<td>$5,379,076</td>
<td>$7,123,159</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>12</td>
<td>126th Ave. N. from 34th St to US 19</td>
<td>County</td>
<td>$3,588,468</td>
<td>$4,751,974</td>
<td>New connection/widening to 2 lanes divided + trail</td>
</tr>
<tr>
<td>21</td>
<td>US 19 (SR 55) from N of Nebraska Ave to S of Timberlane Rd (Alderman Interchange)</td>
<td>State</td>
<td>$157,003,697</td>
<td>$157,003,697</td>
<td>Capacity, operational and safety improvements with pedestrian crossings every 1/4 mile</td>
</tr>
<tr>
<td>20</td>
<td>Gandy Blvd. from 4th St to W of Gandy Bridge</td>
<td>State</td>
<td>$131,214,743</td>
<td>$173,759,111</td>
<td>New interchange/ frontage roads + trail</td>
</tr>
<tr>
<td>28</td>
<td>22nd Ave. S. from 58th St to 34th St</td>
<td>County</td>
<td>$22,615,728</td>
<td>$35,201,339</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>13</td>
<td>62nd Ave. N. from US 19 to 49th St</td>
<td>County</td>
<td>$16,764,000</td>
<td>$26,093,135</td>
<td>Widen to 3 lanes divided</td>
</tr>
<tr>
<td>46</td>
<td>East Lake Rd. from Tampa Rd. to Pasco County Line</td>
<td>County</td>
<td>$32,500,000</td>
<td>TBD</td>
<td>widen to 6 lanes divided</td>
</tr>
<tr>
<td>2031-2035</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>17</td>
<td>Park St from Tyrone Blvd to 54th Ave</td>
<td>County</td>
<td>$2,475,000</td>
<td>$3,277,481</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>18</td>
<td>102nd Ave from 137th St to 113th St</td>
<td>County</td>
<td>$4,625,000</td>
<td>$6,124,585</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>2</td>
<td>Starkey Rd. from East Bay Dr to Ulmerton Rd</td>
<td>County</td>
<td>$13,350,000</td>
<td>$17,678,533</td>
<td>Widen to 5 lanes divided</td>
</tr>
<tr>
<td>22</td>
<td>Park St. from 54th Ave N to 84th Ave N</td>
<td>County</td>
<td>$8,939,560</td>
<td>$13,914,408</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>5</td>
<td>Highland Ave from East Bay Dr to Belleair Rd</td>
<td>County</td>
<td>$11,285,456</td>
<td>$17,565,792</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>7</td>
<td>28th St. from 38th Ave N to 54th Ave N</td>
<td>County</td>
<td>$8,735,728</td>
<td>$13,597,145</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>33</td>
<td>16th Ave. SE from Lake Ave to Starkey Rd</td>
<td>County</td>
<td>$1,688,617</td>
<td>$2,628,329</td>
<td>New roadway connection</td>
</tr>
<tr>
<td>29</td>
<td>16th Ave. SE from Donegan Rd to Lake Ave</td>
<td>County</td>
<td>$1,351,680</td>
<td>$2,103,887</td>
<td>New roadway connection</td>
</tr>
<tr>
<td>31</td>
<td>16th Ave. SE from Seminole Blvd to Donegan Rd</td>
<td>County</td>
<td>$2,085,983</td>
<td>$3,246,829</td>
<td>New roadway connection</td>
</tr>
<tr>
<td>24</td>
<td>142nd Ave. N. from 66th St N to Belcher Rd</td>
<td>County</td>
<td>$4,254,685</td>
<td>$6,622,409</td>
<td>New roadway connection</td>
</tr>
</tbody>
</table>

*Table 8.3: Cost Feasible Roadway Projects, 2045 Advantage Pinellas Adopted November 2019, Source: Forward Pinellas*
## 2045 Cost Feasible Roadway Projects

<table>
<thead>
<tr>
<th>Map #</th>
<th>Project Name and Limits</th>
<th>Project Sponsor</th>
<th>2019 Cost Estimate</th>
<th>Cost in Year of Expenditure</th>
<th>2045 Lane Configurations</th>
</tr>
</thead>
<tbody>
<tr>
<td>27</td>
<td>US 19 (SR 55) from S of Timberlane Rd to S. of Lake St (Klosterman Interchange)</td>
<td>State</td>
<td>$145,601,179</td>
<td>$145,601,179</td>
<td>Capacity, operational and safety improvements with pedestrian crossings every 1/4 mile</td>
</tr>
<tr>
<td>26</td>
<td>US 19 from 66th Ave N to 118th Ave N</td>
<td>State</td>
<td>$26,636,296</td>
<td>$41,459,345</td>
<td>Add turn lanes and intersection improvements</td>
</tr>
</tbody>
</table>

### 2036-2045

<table>
<thead>
<tr>
<th>Map #</th>
<th>Project Name and Limits</th>
<th>Project Sponsor</th>
<th>2019 Cost Estimate</th>
<th>Cost in Year of Expenditure</th>
<th>2045 Lane Configurations</th>
</tr>
</thead>
<tbody>
<tr>
<td>47</td>
<td>Belcher Rd. from 38th Ave N to 54th Ave N</td>
<td>County</td>
<td>$10,105,904</td>
<td>$20,132,849</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>9</td>
<td>102nd Ave. from 113th St to Seminole Blvd</td>
<td>County</td>
<td>$4,600,000</td>
<td>$9,164,059</td>
<td>Widen to 4 lanes divided</td>
</tr>
<tr>
<td>30</td>
<td>142nd Ave. N. from Belcher Rd to Starkey Rd</td>
<td>County</td>
<td>$16,099,467</td>
<td>$32,073,145</td>
<td>New roadway connection</td>
</tr>
<tr>
<td>14</td>
<td>62nd Ave. N. from 49th St to 66th St</td>
<td>County</td>
<td>$9,300,000</td>
<td>$18,527,338</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>15</td>
<td>28th St. from 58th Ave N to 62nd Ave N</td>
<td>County</td>
<td>$2,899,292</td>
<td>$5,775,931</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>32</td>
<td>Nursery Rd. from Highland Ave to Belcher Rd</td>
<td>County</td>
<td>$9,932,936</td>
<td>$19,788,264</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>34</td>
<td>Nursery Rd. from Belcher Rd to US 19</td>
<td>County</td>
<td>$4,556,821</td>
<td>$9,078,040</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>35</td>
<td>102nd Ave. N. from 18th St. N to Hallkey Roberts Pl N.</td>
<td>County</td>
<td>$60,000,000</td>
<td>$119,531,210</td>
<td>New roadway connection + trail</td>
</tr>
<tr>
<td>36</td>
<td>SR 686 / Roosevelt Boulevard from I-275/SR 93 to W of 9th St N/MLK St N</td>
<td>State</td>
<td>$199,497,000</td>
<td>$199,497,000</td>
<td>New roadway connection</td>
</tr>
<tr>
<td>37</td>
<td>Tyrone Blvd. at Pinellas Trail</td>
<td>State</td>
<td>$18,934,080</td>
<td>$37,720,225</td>
<td>Overpass Removal/Trail Overpass Construction</td>
</tr>
<tr>
<td>38</td>
<td>SR 694 (Gandy Blvd) US 19 (SR 55) to W of I-275</td>
<td>State</td>
<td>$25,740,000</td>
<td>$49,882,188</td>
<td>Add frontage roads and intersection improvements</td>
</tr>
<tr>
<td>39</td>
<td>SR 590/NE Coachman Rd from Drew St to McMullen-Booth Rd</td>
<td>State</td>
<td>$9,298,234</td>
<td>$18,523,819</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>25</td>
<td>Sunset Point Rd. from Kings Hwy to Keene Rd Roadway</td>
<td>County</td>
<td>$8,625,000</td>
<td>$17,182,612</td>
<td>Roadway enhancement</td>
</tr>
<tr>
<td>40</td>
<td>Indian Rocks Rd. from Walsingham Rd. to West Bay Dr.</td>
<td>County</td>
<td>$26,992,404</td>
<td>$53,773,913</td>
<td>Roadway enhancement</td>
</tr>
</tbody>
</table>

### Unfunded Roadway Projects

<table>
<thead>
<tr>
<th>Map #</th>
<th>Project Name and Limits</th>
<th>Project Sponsor</th>
<th>2019 Cost Estimate</th>
<th>Cost in Year of Expenditure</th>
<th>2045 Lane Configurations</th>
</tr>
</thead>
<tbody>
<tr>
<td>45</td>
<td>I-275 at Ulmerton Rd.</td>
<td>State</td>
<td>$115,641,429</td>
<td>N/A</td>
<td>New ramp from northbound I-275 to Ulmerton Rd</td>
</tr>
<tr>
<td>41</td>
<td>McMullen Booth Rd. from SR 60 to Tampa Rd.</td>
<td>County</td>
<td>TBD</td>
<td>N/A</td>
<td>TBD</td>
</tr>
</tbody>
</table>

Note: Table includes roadway projects only. Transit and bicycle pedestrian cost feasible and unfunded projects are reflected on separate tables.

Note: For more detailed phasing information, see Appendix C.

TBD: Scope of project to be provided once a Pinellas County corridor study is completed.

Table 8.3: Cost Feasible Roadway Projects, 2045 Advantage Pinellas Adopted November 2019, Source: Forward Pinellas
Legend

Top 10 Active Transportation Corridors

1. Oldsmar Canal Park Connection
2. Nebraska Avenue Loop
3. Sunset Point Corridor
4. 142nd Avenue Corridor
5. 70th Avenue Corridor
6. 28th Street Corridor
7. San Martin Boulevard
8. Joe’s Creek Greenway Trail
9. 9th Avenue N Corridor
10. 18th Avenue S Corridor & Salt Creek Trail Extension

Figure 8.17: Active Transportation Cost Feasible Plan, 2045 Advantage Pinellas Adopted November 2019, Source: Forward Pinellas.
maintenance projects, Forward Pinellas has committed to setting aside $1 to $5 million annually to fund management and operational improvements. These management and operations projects could include intersection or turn-lane projects as well as future technology projects that will ease congestion.

As a coastal community, bridges provide a critical connection for residents and visitors between the beach communities and the mainland of Pinellas County. As part of Advantage Pinellas, Forward Pinellas has identified replacement for the following major bridges by 2045:

- Beckett Bridge
- Dunedin Causeway Bridge
- San Martin Bridge

Ultimately, the timing for replacing these bridges will be based on the safety and replacement need.

**Advance Congestion Management Process**

Congestion management is the use of strategies to improve transportation system performance and reliability by reducing the adverse impacts of congestion on the movement of people and goods. The congestion management process (CMP) is a systematic approach for providing safe and effective integrated management and operation of the multimodal transportation system.

The overall CMP goal is to ensure the safe and efficient movement of people and goods by successfully addressing areas of recurring and non-recurring congestion with low cost and cost effective operational and multi-modal improvements before considering any capital-intensive capacity improvements.
Forward Pinellas’ congestion management process for Pinellas County follows the policies and procedures in the currently-adopted Congestion Management Process Policies and Procedures Manual (available on our website at forwardpinellas.org). This manual describes the process used to respond to federal and state CMP requirements and closely follows the recommended eight step process identified in Congestion Management Process: A Guidebook, published by the U.S. Department of Transportation/Federal Highway Administration.

Through the CMP, Forward Pinellas annually screens all major roadways in Pinellas County to identify those that have challenges associated with congestion and do not have planned capacity improvements. This screening includes an assessment of overall congestion and also crash related concerns, recognizing that the non-recurring congestion that can be experienced from vehicular crashes is a major contributor to the reliability of mobility on a corridor. Each year, Forward Pinellas analyzes crash and traffic data to identify these corridors and seeks out lower cost strategies to help improve them. Through the process to annually prioritize projects, Forward Pinellas advances those that meet the stated goals of the CMP and improve the overall performance of the transportation network.

**Prioritize Equitable Transportation Investments**

Advantage Pinellas is committed to making equitable transportation investments. As such, Forward Pinellas conducted and environmental justice (EJ) analysis to determine the impacts that our plan projects have on defined EJ areas. Figure 8.18 displays the designated EJ area within Pinellas County as meeting the requirements of Executive Order 12898, signed into law on February 11, 1994. An analysis of the projects included in the LRTP was conducted to ensure that the cost feasible projects do not disproportionately or adversely impact human health or the environment in the areas identified.

This analysis shows that although nearly 60 percent of the County’s population is located in areas not designated as meeting EJ criteria, nearly 60 percent of roadway spending is in EJ areas, see Figure 8.19 on the next page. Priority corridors being advanced for future transit investment in Advantage Pinellas were carefully screened to ensure that the needs of the traditionally underserved were prioritized when identifying where future funding should be directed. Furthermore, generally speaking any investment in our transit system benefits residents in EJ areas as the transit service area coverage includes the defined EJ areas.

### Roadways

<table>
<thead>
<tr>
<th>% of Total Budget</th>
</tr>
</thead>
<tbody>
<tr>
<td>59.3% EJ AREAS</td>
</tr>
</tbody>
</table>

**Figure 8.18: Percent of Advantage Pinellas Funding Spent in Environmental Justice Areas.**

As future projects advance into construction, continued review of community and environmental impacts should be closely watched and measured to ensure that minority and low-income communities are not disproportionately impacted by transportation investments. Furthermore, spending in and of itself is not an indicator of negative impacts on a community. Providing roadway, transit, and active transportation investment is an indicator that the mobility and accessibility needs of the community are being considered by the MPO in developing the 2045 LRTP.

In conclusion, these figures present the distribution of future spending on roadway and active transportations projects in areas designated as meeting the criteria for environmental justice and the remainder of the County. Detailed results from the EJ analysis can be found in Appendix L.
Figure 8.19: Environmental Justice Areas in Pinellas County,
Toll Analysis

During the early stages in the development of Advantage Pinellas, the Pinellas County Board of County Commissioners invited the Tampa Hillsborough County Expressway Authority (THEA) to explore potential options for tolling as a means of providing additional highway capacity to meet the County’s mobility goals. That request was the result of changes in state statutes enabling THEA to undertake projects in surrounding counties at the invitation of the Board of County Commissioners.

As part of this initial conversation, THEA conducted a preliminary tolling and revenue analysis for the CR 611 corridor (McMullen Booth and East Lake Roads) to assess the potential feasibility of a tolling project in that corridor. The corridor was chosen because it exhibits high levels of congestion during the morning and afternoon peak periods, there appears to be right-of-way available in the median for construction of additional capacity and tolling equipment, and because it is not a state road, there are no restrictions on THEA’s ability to install tolling facilities. Pinellas County staff expressed interest in the proposal but stressed that any tolling options be examined as “one tool in the toolbox” that requires a much larger discussion that will need to be vetted by all stakeholders (PSTA, Forward Pinellas, Pinellas County and other local governments) and presented to the Board of County Commissioners with a recommendation at a future time.

Following the preliminary analysis on CR 611 from the Bayside Bridge to SR 580, THEA provided a briefing to County and Forward Pinellas staff and the individual members of the County Commission, indicating that a toll project was potentially feasible. However, the costs identified by THEA for constructing and operating the new facility were viewed as prohibitive by staff and commission members. Concerns were also expressed about the impact on adjacent neighborhoods to a road that is designated as a Scenic Non-Commercial Corridor in the countywide Plan. The overwhelming response to the preliminary analysis was that this might be a conceivable option in the future, but the cost would have to come down significantly.

Although the initial analysis of CR 611 corridor did not lead to advancing a specific project concept, Pinellas County approved an interlocal agreement with THEA in 2018 as a basis for future consideration of toll road concepts. This gives the County the foundation for moving forward if a mutually agreeable project were to emerge through screening of transportation alternatives. In approving the interlocal agreement, the Board of County Commissioners
directed staff to examine east-west toll road alternatives and identify opportunities where a more in-depth analysis by THEA (or a different entity if along a state road) would be warranted.

As part of developing the Advantage Pinellas Needs Plan network, Forward Pinellas tested several potential east-west toll road options. All concepts included a four-lane toll facility (two lanes in each direction) using the center median and a static toll price of $0.15/mile in the peak hour and $0.05/mile in the off peak hour, with the existing + committed transportation network as background. These three concepts included Curlew Road from Alt US 19 to the Veterans Expressway, Ulmerton Road from Indian Rocks Road to the Howard Frankland Bridge, and the Gandy/Park Boulevard Corridor from 137th Street to the Gandy Bridge. These three initial corridors were seen as good indicators of how a toll facility might improve traffic flow and reduce congestion in the northern, central and southern parts of the County.

The analysis showed the most potential in the Ulmerton Road corridor, where the toll facility had the highest traffic number of vehicles per day with 20,525 on the tolled lanes and created reductions in traffic volume on several parallel roadways, including East Bay Drive, Bryan Dairy Road, and Park Blvd. Z. The Curlew Road corridor also provided some positive results in terms of moving traffic volumes, but with the most impact between US 19 and the Veterans Expressway. There was very little value from adding a toll facility west of US 19. This result showed that Hillsborough and Pasco County traffic would divert from US 19 and CR 611 to use the new toll facility as a means of getting to employment and other destinations in Westshore and other areas near the Tampa International Airport. Finally, the Gandy/Park Boulevard corridor toll analysis did not generate the traffic volumes on the toll facility or reduce traffic volumes on adjacent roadways sufficiently. This may be because there is no large employment destination or enough roadway congestion to make the toll option more viable.

Although no toll facilities were added to the Advantage Pinellas Cost Feasible Plan, the results indicate that the potential for an east-west toll facility could help moderate demand and provide an expedited option for people to reach their destinations. The next step in 2020 is for Forward Pinellas to conduct additional screening of toll facility options, looking at other corridors such as Gulf to Bay Blvd. or 118th Avenue/CR 296, and refine the analysis to develop a recommendation for the Board of County Commissioners to consider pursuing an initial tolling project in a single corridor. Once that analysis is complete, Forward Pinellas will share the initial screening results with THEA and FDOT to develop a scope of work and cost estimate for a more detailed toll and revenue analysis as the next phase.

Explore Untapped Revenue Sources

In addition to the set-asides, there is potential for raising transportation funding through new revenue sources. Potential new funding sources that were assessed as part of the Financial Resources Technical Memorandum (February 2019) and include the following options:

5-Cent 2nd LOFT

Currently, the 5-Cent 2nd LOFT has not been adopted by Pinellas County. Like the other fuel taxes, it would apply to every net gallon of motor fuel sold within the County; diesel is not subject to this tax. If adopted, the revenue would be distributed to the County and its municipalities according to a mutually-agreed-upon distribution ratio or by using a formula contained in the Florida Statutes. If adopted, this revenue source may not be used for the routine maintenance of roadways, but may be used for reconstruction and capacity expansion improvements (2018 Local Government Financial Information Handbook, page 226). Total estimated revenues 2020-2045 $52.7 million (assumes 1 cent per gallon tax and 60 percent of revenues go to the County) to $439.6 million. (assumes 5 cents per gallon tax and 100 percent of revenues go to the County).

Indexing Fuel Taxes

The state indexes the state gas taxes to the Consumer Price Index (CPI) every January, meaning that prices motorists pay rise in proportion to inflation, but local fuel taxes are not indexed to inflation. Indexing local fuel taxes to the CPI requires an act of the Florida Legislature. Indexing fuel taxes is important to local governments because it
allows revenues to be adjusted as costs for materials and services rise with inflation. Total estimated revenues 2020-2045 (in addition to existing fuel taxes) would be $382.7 million.

**Charter County and Regional Transportation System Surtax**

Commonly referred to as the “Transit Surtax,” this tax may be levied at the rate of up to 1 percent pursuant to approval by a majority vote of the County’s electorate. Generally, the proceeds are for the development, construction, operation, and maintenance of fixed guideway rapid transit systems, bus systems, on-demand transportation services, and roads and bridges. Neighboring Hillsborough County adopted this surtax in 2018 and began to collect revenues in 2019. Total estimated revenues for 2020-2045 will be $6.7 billion.

**Other Existing and Potential Sources of Revenues**

Developer Fees are fees charged to new development within pre-defined geographic areas and can be collected based on metrics such as value, square footage, frontage length, and others. The revenues could be dedicated to specific uses including transportation or utilities. Impact fees and mobility fees are developer fees historically used in Pinellas County. They are one-time fees helping to pay for local transportation improvements that serve the new development.

Tax Increment Financing is a value capture tool used to encourage redevelopment in blighted areas. Transportation investments are paid for with the incremental property tax revenues resulting from new development.

Special Assessment Districts are created to impose a fee on properties within the assessment area to fund improvements in that area. The County uses special assessment districts to fund local street paving, drainage, and lighting projects.

Millage Property taxes (ad valorem taxes) are made up of a number of local tax rates assessed on real property. Property taxes are a major source of funding for general government. A portion of the countywide millage rate (in dollars per thousand) and the transit district rate (currently at the statutory maximum) are eligible for transportation uses.

Public Private Partnership (PPP or P3) is an organizational structure or agreement between public and private entity(ies). P3s can provide a source of funding to pay the return on investment to the private sector. The benefits of the arrangement include better allocation of risk, faster implementation, and lower costs through private sector innovation.

Commercial Off-Street Parking Fee is an additional tax or fee on parking in public and/or commercial spaces could be collected by the County for transportation uses.

Airport Car Rental Fees are an additional tax or fee on rental car transactions at the St. Pete-Clearwater International Airport that could be dedicated to transportation uses. However, Section 159 of FAA Reauthorization, which was signed into law in October 2018, prohibits levying any tax on a business at an airport “that is not generally imposed on sales or services by that State, political subdivision, or authority unless wholly utilized for airport or aeronautical purposes.” As such, an amendment to the FAA law would be needed to make the funds available to the County.

U.S. DOT Competitive Grants The U.S. DOT has two discretionary grant programs that support transportation projects. The Better Utilizing Investments to Leverage Development (BUILD) program, previously TIGER, awarded 55 projects in 35 states in late 2019. Eligible projects repair, rebuild, and revitalize infrastructure across the country, with an emphasis on rural areas. Similarly, the Infrastructure for Rebuilding America (INFRA) grant program awards grants to projects that improve transportation infrastructure, economic productivity, and quality of life. At least a quarter of INFRA funding must be for projects in rural areas. INFRA 2019 awarded nearly $856 million to 20 projects.
Residents of Pinellas County enjoy and experience the many advantages of living, working and playing in Pinellas County every day. Living in a coastal community with so many choices for active transportation and access to our beaches is truly paradise. However, our vulnerability is ever present as we experience large storm events on a more frequent basis. Our communities require we continue to be responsible stewards and plan for environmental changes. We must face these challenges together. With the implementation of Advantage Pinellas, we are closer to fully realizing the potential of our many advantages highlighted throughout the Plan.

Forward Pinellas takes the lead in working with our partners to achieve the vision outlined in Advantage Pinellas. We direct future growth into areas served by a robust multimodal transportation system that can accommodate the increased demand on the network. We identify funding for transportation projects that meet the needs for local and regional travel. We ensure that future development is resilient to safety, security, environmental changes and equity challenges.

One of the biggest challenges Forward Pinellas knows we will continue to face is funding. The needs of our County and region are greater than any one agency can address alone. As our needs continue to grow, allocating our resources to accomplish the Plan is critical.

Advantage Pinellas takes the first step in the right direction as it is the first long range plan in Pinellas to allocate close to 100 percent of our flexible funding sources to projects that improve transit, increase our bicycle and pedestrian network and invest in technological solutions to improve mobility and safety.

Moving forward, we commit to continuing partnerships at the local, regional, state and federal levels to make sure that the funding available to us is flexible enough to serve the ever-evolving transportation needs of our urbanized area. Further investment in widening our roadways will not create a sustainable, prosperous future for Pinellas County. Focusing on maintaining our existing resources and improving upon what we already have will create communities that include mobility options and are better prepared for the future.

Advantage Pinellas charts a course for how we move forward. Now, it’s up to us, as one united community of many, to follow the path to our healthy and resilient future.
GLOSSARY OF LAND USE AND TRANSPORTATION PLANNING TERMS AND ACRONYMS

ADVANCED TRAFFIC MANAGEMENT SYSTEMS (ATMS) - Intelligent Transportation System (ITS) technology that focuses on the coordination of traffic signal timing. It integrates hardware, equipment and technology, such as advanced vehicle detectors, closed circuit (CC) TV cameras and other electronic communication systems, to operate the traffic signals more efficiently.

AMERICANS WITH DISABILITIES ACT (ADA) - Prohibits discrimination against people with disabilities in employment, transportation, public accommodation, communications, and governmental activities. It applies to all publicly funded transportation facilities and transit vehicles and requires transit agencies to provide complementary para-transit service within the fixed-route service area to those persons unable to use fixed-route service because of a disability.

AVERAGE ANNUAL DAILY TRAFFIC (AADT) - The total volume of traffic on a highway segment for one year, divided by the number of days in the year.

BICYCLE PEDESTRIAN ADVISORY COMMITTEE (BPAC) - Forward Pinellas appointed committee comprised of representatives of various government agencies, law enforcement officials and private citizens interested in bicycle and pedestrian issues. The BPAC advises the MPO on matters concerning the planning and development of bicycle and pedestrian facilities and encourages bicycling and walking in Pinellas County and the region.

BICYCLE PEDESTRIAN MASTER PLAN - An element of the Long Range Transportation Plan, the Bicycle Pedestrian Master Plan identifies existing trails, bicycle lanes and sidewalks throughout Pinellas County. The Plan serves as a guide for the planning and development of a comprehensive bicycle and pedestrian facility network that seeks to make these travel modes viable alternatives to the personal automobile for commuting as well as recreational purposes.

BIKES ON BUSES - Allows Pinellas Suncoast Transit Authority (PSTA) riders to mount their bikes on racks installed at the front end of PSTA buses to continue their trip as a bus passenger. The racks accommodate up to two bikes. Bike on bus accommodations are also offered in Hillsborough County through Hillsborough Area Regional Transit (HART) and Pasco County through Pasco County Public Transportation (PCPT).

BUS RAPID TRANSIT - A flexible high performance form of premium transit that combines features of rail systems with those of on-road vehicles, and is characterized by being able to operate in special purpose lanes or on city streets. BRT stations are used as an intermodal hub and activity center for the community. Service is frequent enough that passengers do not need a schedule. Intelligent transportation system (ITS) technology keeps track of vehicles, provides passengers with updated travel information, and improves safety.

CITIZENS ADVISORY COMMITTEE (CAC) - Comprised of citizens representing municipal area and at-large membership appointed by Forward Pinellas to review transportation issues and topics before they are presented to the Board. They are the primary conduit for public input in the MPO planning process.

COASTAL HIGH HAZARD AREA (CHHA) - The area below the elevation of the Category 1 storm surge line as established by a Sea, Lake, and Overland Surges from Hurricanes (SLOSH) computerized storm surge model, pursuant to Section 163.3178(2)(h), Florida Statutes.
Glossary

COMMISSION FOR THE TRANSPORTATION DISADVANTAGED (CTD) - A State agency responsible for the coordination of transportation services for older adults, persons with disabilities and low income and children at-risk. The CTD is responsible for overseeing local Transportation Disadvantaged (TD) programs, designating local planning agencies, approving the appointment of and coordination with community transportation coordinators.

COMMUNITY TRANSPORTATION COORDINATOR (CTC) - Responsible for managing the operations of the Pinellas County Transportation Disadvantaged (TD) Program and for the delivery of trips to individuals qualified to receive services through the Program. The Pinellas Suncoast Transit Authority (PSTA) is the designated CTC for Pinellas County.

CONGESTION MANAGEMENT PROCESS (CMP) - A systematic process designed to address transportation problems through the implementation of small scale physical improvements and strategies designed to improve the operations, safety and efficiency of all travel modes.

COUNTYWIDE PLAN - The document that coordinates land use planning among all 25 local governments in Pinellas County, pursuant to Chapter 2012-245, Laws of Florida. The Countywide Plan is comprised of the Countywide Plan Strategies, the Countywide Plan Map, and the Countywide Rules. Local government comprehensive plans and land development regulations are required to be consistent with the Countywide Plan.

COUNTYWIDE PLANNING AUTHORITY (CPA) - The Board of County Commissioners of Pinellas County, acting in its capacity as the Countywide Planning Authority, through the exercise of its power under section 2.04(s) of the Pinellas County Charter and pursuant to Chapter 2012-245, Laws of Florida.

DENSITY - A measure of residential development expressed as the number of dwelling units per net acre of land area.

DEPARTMENT OF ECONOMIC OPPORTUNITY (DEO) - The State of Florida agency charged with reviewing amendments to local comprehensive plans and land development regulations (and other aspects of local planning) or compliance with Florida Statutes.

DESIGNATED OFFICIAL PLANNING AGENCY (DOPA) - Provides planning services in accordance with Chapter 427, F.S., for the local Transportation Disadvantaged (TD) Program. These include staff support to the Local Coordinating Board (LCB), evaluation of the local community transportation coordinator (CTC) and the administration and implementation of the TD Service Plan. The MPO serves as the Planning Agency in Pinellas County.

DYNAMIC MESSAGE SIGNS (DMS) - (also called Variable Message Signs VMS) - Large, electronic signs that overhang interstates and other major roads. The signs are typically used to display information about traffic conditions, travel times, construction or roadway incidents. The signs are also used to inform the public of important safety alerts (e.g., Amber Alerts), display special event information, and also to display safety messages such as reminders to use seat belts and not to drive impaired.

ENVIRONMENTAL JUSTICE (EJ) - The fair treatment and meaningful involvement of all people regardless of race, color, national origin, or income with respect to the development, implementation and enforcement of environmental laws regulations and policies. Environmental Justice is a mandate of the U.S. Environmental Protection Agency and the result of Executive Order 12898 signed by President Clinton in 1994.
**FEDERAL HIGHWAY ADMINISTRATION (FHWA)** - An agency within the U.S. Department of Transportation (DOT) that supports State and local governments in the design, construction, and maintenance of the Nation’s highway system (Federal Aid Highway Program) and various federally and tribal owned lands (Federal Lands Highway Program).

**FEDERAL TRANSIT ADMINISTRATION (FTA)** - Provides financial and technical assistance to local public transit systems, including buses, subways, light rail, commuter rail, trolleys and ferries. FTA also oversees safety measures and helps develop next-generation technology.

**FLOOR AREA RATIO (FAR)** - A measurement of the intensity of building development on a site. A floor area ratio is the relationship between the floor area of all buildings on a site and the land area, not including water or right-of-way.

**FIXING AMERICA’S SURFACE TRANSPORTATION (FAST) ACT** - The FAST Act was Federal Legislation signed into law in 2015. It authorized over $305 billion in long-term funding for surface transportation infrastructure planning and investment, including highway, highway and motor vehicle safety, public transportation, motor carrier safety, hazardous materials safety, rail, and research, technology, and statistics programs. The FAST Act succeeds the 2012 Moving Ahead for Progress in the 21st Century (MAP 21) Act, the 2005 Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users (SAFETEA-LU) and the 1991 Intermodal Surface Transportation Efficiency Act (ISTEA).

**FLORIDA DEPARTMENT OF TRANSPORTATION (FDOT)** - Formed in 1969, FDOT is a decentralized agency responsible for the development, maintenance and regulation of public transportation systems and facilities in the state. The mission of FDOT is to provide a safe transportation system that ensures the mobility of people and goods, enhances economic prosperity, and preserves the quality of the environment and local communities.

**FLORIDA DEPARTMENT OF TRANSPORTATION (FDOT) WORK PROGRAM** - This is the State Five-Year Work Program of transportation improvements prepared in accordance with Section 339.135, Florida Statutes. It provides direction on where and when to build projects and how to fund them. The first year of the program authorizes FDOT to expend funds to complete the scheduled projects. The last four years of scheduled projects are included for planning purposes. The FDOT Work Program is also included in the MPO Transportation Improvement Program (TIP).

**FLORIDA TRANSPORTATION PLAN (FTP)** - The FTP is the statewide long range transportation plan for all of Florida. The FTP defines Florida’s future transportation vision and identifies goals, objectives, and strategies to accomplish that vision.

**FORWARD PINELLAS** - Countywide land use and transportation planning agency that resulted from the consolidation of the Metropolitan Planning Organization (MPO) and Pinellas Planning Council (PPC) in 2014. The agency is served by a 13 member board representing the County’s local governments and the Pinellas Suncoast Transit Authority (PSTA).

**HILLSBOROUGH AREA REGIONAL TRANSIT (HART)** - The primary transit provider in Hillsborough County, HART provides fixed route bus and door to door para-transit service and operates the Tampa Electric Company (TECO) Line Streetcar System.
**INTELLIGENT TRANSPORTATION SYSTEMS (ITS)** - Encompasses a broad range of advanced technology solutions designed to improve the efficiency and safety of transportation facilities and services. Examples of ITS technology include coordinated traffic signal controls, smart phone applications to monitor traffic conditions, variable message signs, intersection cameras monitoring vehicle speeds and automated bus fare systems.

**INTENSITY** - A measure of nonresidential or mixed-use development, usually expressed as a maximum Floor Area Ratio.

**LAND USE** - The type of development on a given parcel of land (e.g., residential, commercial, industrial).

**LEVEL OF SERVICE (LOS)** - A qualitative measure of roadway performance expressed in letter grades ranging from A through F, with A roads operating under optimum free-flow conditions and F roads operating under the most deficient conditions characterized by forced-flow traffic with considerable delays.

**LIMITED ENGLISH PROFICIENCY (LEP)** - Refers to individuals whose primary language is not English and have difficulty communicating effectively in English. Title VI of the Civil Rights Act of 1964 requires MPOs and other recipients of federal funding to take reasonable steps to make their programs, services and activities accessible to persons with LEP. The MPO Title VI Plan includes an element addressing the agency’s approach to accommodating people who are LEP.

**LOCAL COMPREHENSIVE PLAN** - A plan adopted by each of the local governments in Pinellas County, including the local future land use map as well as goals, objectives and policies that provide the basis for development decisions, consistent with the requirements of Chapter 163, Florida Statutes, and Chapter 2012-245, Laws of Florida.

**LOCAL COORDINATING BOARD (LCB)** - A board comprised of social service agencies, transportation providers, and citizens responsible for governing the Pinellas County Transportation Disadvantaged Program. The LCB identifies local service needs and provides information, advice and direction to the Community Transportation Coordinator (CTC) on the coordination of services to be provided to the transportation disadvantaged within their local service area. The LCB also serves as an advisory committee to the MPO, which is the Planning Agency for the Pinellas County Transportation Disadvantaged (TD) Program.

**LOCAL FUTURE LAND USE MAP** - A map adopted by each of the local governments as part of the local comprehensive plan, which graphically depicts future land use categories establishing allowable uses and maximum permitted densities/intensities for each land parcel.

**LOCAL LAND DEVELOPMENT REGULATIONS (LDRs)** - Land development regulations enacted by local government ordinance for the regulation of development, including any local government zoning, rezoning, subdivision, building construction, or any other regulations controlling the development of land.

**LONG RANGE TRANSPORTATION PLAN (LRTP)** - A 20-year strategy plan developed to guide the investment of public funds in transportation facilities while addressing all major modes of transportation including automobile, bicycle, air, rail, surface freight, and pedestrian travel. The LRTP is a federal requirement that also identifies the transportation goals, objectives and priorities of Pinellas County and the region.
METROPOLITAN PLANNING ORGANIZATION (MPO) - Created under federal and state law to provide a forum for cooperative decision-making in regard to regional transportation issues. Metropolitan planning organizations ensure that existing and future expenditures of governmental funds for transportation projects and programs are based on a continuing, cooperative, and comprehensive (“3 C”) planning process. Membership includes elected and appointed officials representing local jurisdictions and transportation agencies.

METROPOLITAN PLANNING ORGANIZATION ADVISORY COUNCIL (MPOAC) - A statewide organization created by the Florida Legislature to augment the role of the individual MPOs in the cooperative transportation planning process. The MPOAC assists MPOs in carrying out the urbanized area transportation planning process by serving as the principal forum for collective policy decisions.

MORE OR LESS (M.O.L.) - A term used to describe approximate acreages of parcels in land use cases.

PEDESTRIAN SAFETY ACTION PLAN (PSAP) - Developed by the Florida Department of Transportation (FDOT) through the collaborative efforts of Forward Pinellas and community stakeholders, the PSAP is designed to help local government agencies address pedestrian crash issues specific to their jurisdiction. It is intended to help these agencies understand the tools and organizational changes necessary to improve pedestrian safety.

PINELLAS PLANNING COUNCIL (PPC) - Pursuant to a special act of the State Legislature (Chapter 2012-245, Laws of Florida), the PPC serves as the advisory body to the Countywide Planning Authority, and is responsible for coordinating Countywide land use planning and maintaining and implementing the Countywide Plan. The PPC and Metropolitan Planning Organization (MPO) consolidated in 2014 and now serve under a joint policy making board operating as Forward Pinellas.

PINELLAS SUNCOAST TRANSIT AUTHORITY (PSTA) - The primary provider of public transportation services in Pinellas County. Their services include fixed route bus and the transport of individuals with disabilities through their DART para-transit program.

PINELLAS TRAIL SECURITY TASK FORCE (PTSTF) - Comprised of elected officials, law enforcement personnel and County staff, the PTSTF monitors and addresses issues affecting the safety of the Pinellas Trail.

PLANNERS ADVISORY COMMITTEE (PAC) - Provides technical input and makes recommendations on land use matters that go before Forward Pinellas, acting as the Pinellas Planning Council. The PAC membership is comprised of various local government planning department directors or their representatives.

PROJECT DEVELOPMENT AND ENVIRONMENT (PD&E) STUDY - A process developed to ensure that the design of transportation projects appropriately reflects and incorporates the unique engineering and community characteristics of the area. The FDOT created the process to ensure that projects receiving Federal aid follow the policies and procedures outlined in the National Environmental Policy Act.

PUBLIC HEARING - Formal meeting required by regulation, rule or policy where public comments are recorded into official public record. Public hearings invite public comment but do not offer a question-and-answer format as is typical for at a public meeting.
PUBLIC PARTICIPATION PLAN (PPP) - Provides a systematic approach for involving citizens in the MPO planning process. The PPP identifies the agency’s public involvement objectives, outreach strategies and measures of effectiveness. Performance of the PPP is evaluated periodically to gauge the Plan’s effectiveness toward meeting its objectives.

PUBLIC PRIVATE PARTNERSHIP (P3) - A contractual agreement between a public and private sector entity. The agreement leverages the skills and assets of each partner to complete public projects with the private sector assuming much of the risk in exchange for being compensated based on performance.

RIGHT-OF-WAY (ROW) - A type of land easement, either granted or reserved, for transportation and/or utility purposes.

ROAD SAFETY AUDIT (RSA) - Formal safety performance examination of a road or intersection by an independent, multidisciplinary team. It qualitatively estimates and reports on potential road safety issues and identifies opportunities for improvements for all users.

ST. PETE-CLEARWATER INTERNATIONAL AIRPORT (PIE) - Located in the mid-County Gateway area, PIE is an international, commercial service airport operating under the authority of the Board of County Commissioners.

SAFE ROUTES TO SCHOOL (SRTS) PROGRAM - Funded and managed by the Florida Department of Transportation (FDOT), the SRTS Program helps communities address school transportation needs while encouraging more students to walk or bicycle to school. The SRTS Program provides funding for projects such as sidewalks, shared-use paths, flashing beacons and median refuge islands.

SCHOOL TRANSPORTATION SAFETY COMMITTEE (STSC) - Established by the MPO in 1998, the STSC is made up of representatives of the School Board, Board of County Commissioners and local municipalities. The STSC considers transportation and safety matters concerning the safe movement of students traveling to and from school. They serve in an advisory capacity to Forward Pinellas.

SINGLE OCCUPANT VEHICLE (SOV) - A vehicle occupied by only one person.

SPECIAL ACT - Chapter 2012-245, Laws of Florida, as amended. The Special Act establishes the Pinellas Planning Council and the authority for the Countywide Planning Authority and provides the legal requirements for Countywide planning and coordination in Pinellas County.

STRATEGIC COMMUNICATIONS PLAN - Approved by the Forward Pinellas Board in 2017, this Plan guides the communication efforts of Forward Pinellas as it relates to land use as well as transportation planning. The Strategic Communications Plan complements and is consistent with the PPP.

STRATEGIC INTERMODAL SYSTEM (SIS) - The Governor and Legislature established the SIS in 2003 to focus the state’s limited transportation resources on the facilities most significant for interregional, interstate, and international travel. The SIS is the state’s highest priority for transportation capacity investments and a primary focus for implementing the Florida Transportation Plan (FTP), the state’s long-range transportation vision and policy plan.
SURFACE TRANSPORTATION PROGRAM (STP) - A block grant program authorized under the Fixing America’s Surface Transportation (FAST) Act that allows for flexibility in State and local transportation decisions and provides flexible funding to address multimodal transportation needs.

TAMPA BAY REGIONAL PLANNING COUNCIL (TBRPC) - One of 11 regional planning councils in Florida, established by the Legislature to coordinate planning for the 43 jurisdictions in the Tampa Bay region. Specific duties include environmental management, economic analysis, water quality, emergency preparedness, and hurricane evacuation planning.

TAMPA BAY AREA REGIONAL TRANSIT AUTHORITY (TBARTA) - Created by the Florida State Legislature in 2007 to develop and implement a Regional Transportation Master Plan for the seven-County West Central Florida region consisting of Citrus, Hernando, Hillsborough, Manatee, Pasco, Pinellas and Sarasota counties. The agency was reconstituted in 2017 with a directive to develop a Regional Transit Development Plan. The agency was also reduced in size to represent Hernando, Hillsborough, Manatee, Pasco and Pinellas counties. Their purpose is to improve mobility and expand multimodal transportation options for people and freight throughout the seven-County region.

TAMPA BAY AREA REGIONAL TRANSIT AUTHORITY (TBARTA) CITIZENS ADVISORY COMMITTEE (CAC) - Comprised of residents and business representatives from the Tampa Bay area, members are appointed by the TBARTA Board to advise them on a range of regional transportation issues. They are also responsible for assisting in the development and maintenance of a multimodal transportation master plan. There are 17 voting members and 8 advisory members serving on the TBARTA CAC.

TAMPA INTERNATIONAL AIRPORT (TIA) - The largest airport in the Tampa Bay region, TIA is a public airport that opened in 1971 at its current location six miles west of downtown Tampa. The Airport serves more than 16 million daily passengers.

TECHNICAL COORDINATING COMMITTEE (TCC) - Represents local governments, the School District, PSTA, TBARTA, and Pinellas County. They assist the Forward Pinellas Board by reviewing transportation plans and programs and making recommendations based on their technical adequacy. There are 31 voting members on the Committee.

TITLE VI - Refers to Title VI of the Civil Rights Act of 1964, which prohibits discrimination on the basis of race, color, and national origin in programs and activities receiving federal financial assistance.

TITLE VI PLAN - As a recipient of federal transportation funds, the MPO is required to document its compliance with Title VI requirements through the submittal of a Title VI Program once every three years. This documentation is included in the MPO’s Title VI Plan. Included in the documentation is the process involved in submitting and investigating a Title VI complaint, public involvement efforts targeting environmental justice communities, minority representation on advisory committees and providing people with limited English proficiency (LEP) access to the MPO planning process.
**TRANSIT DEVELOPMENT PLAN (TDP)** - PSTA’s planning, development and operational guidance document required for Florida Public Transit Block Grant funding. The TDP is used in creating the mass transit portions of the Long Range Transportation Plan (LRTP), Transportation Improvement Program (TIP) and the FDOT Work Program.

**TRANSIT ORIENTED DEVELOPMENT (TOD)** - A type of community development that includes a mixture of housing, office, retail and/or other amenities integrated into a walkable neighborhood and located within a half-mile of a transit stop or terminal.

**TRANSPORTATION ALTERNATIVES (TA)** - Provides Surface Transportation Block Grant (STBG) program funding for projects and activities encompassing a variety of smaller-scale transportation projects such as pedestrian and bicycle facilities, recreational trails, safe routes to school projects, community improvements such as historic preservation and vegetation management, and environmental mitigation related to stormwater and habitat connectivity. Forward Pinellas adopts a priority list of projects for TA funding each year for inclusion in the Transportation Improvement Program (TIP).

**TRANSPORTATION DEMAND MANAGEMENT (TDM)** - The application of strategies and policies to reduce demand for single occupant vehicle (SOV) travel and vehicle miles traveled (VMT). Common TDM strategies include the promotion of vanpooling services, transit use, and telecommuting.

**TRANSPORTATION DISADVANTAGED (TD) PROGRAM** - A statewide program supported by funding provided through the Florida TD Trust Fund, the TD Program provides low cost transportation to individuals who, because of a disability, income status, or age are unable to transport themselves or purchase transportation. In Pinellas County individuals who are unable to transport themselves receive transportation from others and are 150 percent of the federal poverty guidelines are eligible to participate in the TD Program. The Pinellas TD Program provides 10-day or 31-day bus passes with a co-payment, door-to-door transportation or group trips, depending on the individual, their needs and abilities.

**TRANSPORTATION IMPROVEMENT PROGRAM (TIP)** - A five-year program of transportation improvements adopted annually by Forward Pinellas. The TIP incorporates state and federal work programs along with the capital improvement programs/elements of the local governments within Pinellas County, as well as PSTA.

**TRANSPORTATION MANAGEMENT AREA (TMA)** - Urbanized areas with populations of over 200,000 are designated as TMAs and are subject to federal planning requirements. The Tampa Bay TMA is populated by over 2.4 million people and includes portions of Hillsborough and Pasco counties and nearly all of Pinellas County. Transportation plans and programs within a TMA must be carried out by the MPO(s) in cooperation with the state and transit operators and based on a continuing and comprehensive planning process.

**TRANSPORTATION REGIONAL INCENTIVE PROGRAM (TRIP)** - State funded program created to improve regionally significant transportation facilities in “regional transportation areas”. The funds are intended to provide incentives for local governments and the private sector to help pay for critically needed projects that benefit regional travel and commerce.
TRI-COUNTY BICYCLE PEDESTRIAN ADVISORY COMMITTEE (BPAC) - Comprised of BPAC representatives from Pinellas, Pasco and Hillsborough counties, the Tri-County (BPAC) formed in 2015 to coordinate planning efforts involving the development of regional bicycle/pedestrian facilities and to address regional issues affecting with these travel modes.

UNIFIED PLANNING WORK PROGRAM (UPWP) - Federally required biennial statement of MPO planning work. The UPWP includes a description of planning tasks and resulting products, agencies that will perform the work, time frames for completing the work, and associated costs and the source(s) of funds.

UNITED STATES DEPARTMENT OF TRANSPORTATION (USDOT) - Established in 1966, the USDOT is a federal Cabinet department responsible for ensuring a fast, safe, efficient, accessible and convenient transportation system that meets vital national interests and enhances the quality of life of American citizens. The agency oversees the operations of several subsidiary agencies that include the Federal Aviation Administration (FAA), Federal Highway Administration (FHWA), Federal Transit Administration (FTA), Federal Motor Carrier Safety Administration (FMCSA), National Highway Traffic Safety Administration (NHTSA), Federal Railroad Administration (FRA) and Maritime Administration (MARAD).

VEHICLE HOURS TRAVELED (VHT) - The total vehicle hours expended traveling on the roadway network in a specified area during a specified time period.

VEHICLE MILES TRAVELED (VMT) - Calculated by multiplying the average (mean) of the total average annual daily traffic volume (AADT) by the length of the segment where the data is collected in centerline miles. It is used to identify travel habits within an urbanized area.