FLORIDA

VULNERABLE ROAD USER SAFETY ASSESSMENT

STRATEGIC HIGHWAY SAFETY PLAN ADDENDUM

TARGET ZERO
FATALITIES & SERIOUS INJURIES

NOVEMBER 2023

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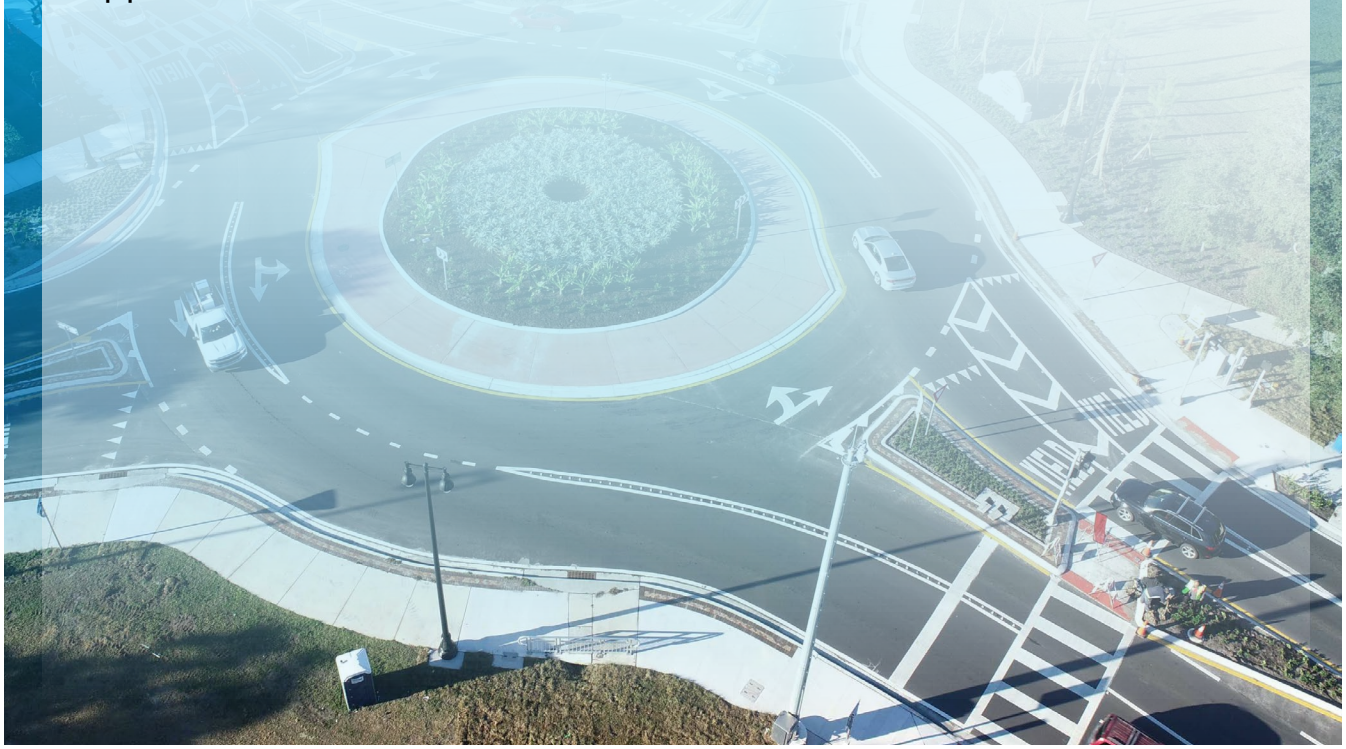


EXECUTIVE SUMMARY

The Florida Vulnerable Road User (VRU) Safety Assessment is an assessment of the safety performance in Florida for vulnerable road users and Florida's plan to improve the safety of these users based on a data-driven analysis, outreach to affected communities, and a program of strategies. This initial assessment is an addendum to Florida's 2021-2025 Strategic Highway Safety Plan (SHSP) and complies with 23 U.S.C. 148(l).

For the purposes of this report, a VRU is a person walking, biking, rolling, or a highway worker on foot in a work zone, given they are considered a pedestrian. It does not include motorcyclists.

Florida has a long-standing vision of zero traffic-related deaths and serious injuries. Losing a family member, loved one, friend, or coworker to a preventable traffic crash is unacceptable. Because of this, eliminating roadway fatalities and serious injuries is the highest priority of the Florida Department of Transportation (FDOT) and its safety partners.

This report focuses on high-priority fatal and serious injury crashes involving VRUs. It provides an overview of safety trends and performance, a quantitative assessment identifying high-priority areas, a summary of consultation efforts with affected communities, and a program of strategies to reduce the safety risks for these users. The core of this report is organized around the analysis and identification of high-priority segments for VRUs and the strategies being used to reduce the safety risks of these segments.

Through a five-step process, the safety assessment identified high-priority areas for VRUs based on roadway data, including location, roadway functional classification, design speed, speed limit, and time of day. It also considered demographic data such as race, ethnicity, income, and age. One-mile segments were created along all state-owned and major non-state-owned roads and associated to the VRU crashes. The segments with the most crashes were prioritized into three tiers with each tier based on the number of crashes per segment. An interactive dashboard summarizes the quantitative analysis. The dashboard includes all the data examined during the analysis and selection of the tiered segments.

	TIER 1 (12-23 CRASHES)	TIER 2 (7-11 CRASHES)	TIER 3 (3-6 CRASHES)	TOTAL
Number of One-Mile Segments	22	168	1,069	**1,259**

The 22 one-mile segments in Tier 1 represent the highest priority for VRU safety investments. The Appendix provides demographic and community characteristics for each Tier 1 segment based on data and community feedback collected for the segments. Focusing on eliminating VRU fatalities and serious injuries in these locations will significantly impact progress toward zero.

The safety assessment was developed with input from FDOT District Safety staff and Florida's Metropolitan Planning Organizations (MPOs) to gain local knowledge and perspective on the factors contributing to the safety risks in areas with high-priority segments. Feedback was also gathered through internal briefings and partner meetings that promoted the safety assessment work broadly.

This report also lists strategies to address the safety risks in the high-priority areas identified through the quantitative analysis. The strategies provide the context for FDOT, MPOs, and safety partners to address VRU safety concerns on these priority segments specifically. All strategies work together with the safety goal of the Florida Transportation Plan and strategies of the SHSP to support the overarching commitment to eliminating VRU fatalities and serious injuries. The strategies are also aligned with the FHWA's Safe System Approach, which aims to address and mitigate risks inherent in the transportation system.

INTRODUCTION

The Florida Vulnerable Road User (VRU) Safety Assessment is an assessment of the safety performance in Florida for vulnerable road users and Florida's plan to improve the safety of these users based on a data-driven analysis, outreach to affected communities, and a program of strategies. It has been developed in accordance with the VRU Safety Assessment Guidance released by the Federal Highway Administration (FHWA) in October 2022. This initial assessment is an addendum to Florida's 2021-2025 Strategic Highway Safety Plan (SHSP) and complies with 23 U.S.C. 148(l).

According to federal requirements, a Vulnerable Road User (VRU) is a non-motorist with a fatality analysis reporting system (FARS) person attribute code for pedestrian, bicyclist, other cyclist, and person on personal conveyance or an injured person that is, or is equivalent to, a pedestrian or pedalcyclist.

For the purpose of this report, a VRU is a person walking, biking, rolling, or a highway worker on foot in a work zone, given they are considered a pedestrian. It does not include motorcyclists.

SAFETY PLANNING FOR VULNERABLE ROAD USERS IN FLORIDA

Florida has a long-standing vision of zero traffic-related deaths and serious injuries. Losing a family member, loved one, friend, or coworker to a preventable traffic crash is unacceptable. Because of this, eliminating roadway fatalities and serious injuries is the highest priority of the Florida Department of Transportation (FDOT) and its safety partners.

The VRU Safety Assessment builds on a strong foundation of pedestrian and bicycle safety planning and prioritization. Through well-established partnerships with safety advocates, FDOT works tirelessly to collect and analyze data, research and report on new design and behavior techniques, and actively implement strategies and projects to keep VRUs safe. This report coalesces the priorities in preceding plans and processes to continually address fatalities and serious injuries for VRUs and adjusts approaches to ensure resources are in the right locations, within the right communities, and around the most effective strategies given the context of the safety challenge.

Safety planning begins at the overarching level of the Florida Transportation Plan (FTP), the state's long range transportation plan which guides Florida's transportation future. The FTP goal of "Safety and security for Florida's residents, businesses, and visitors" along with specific safety strategies affirms and strengthens the statewide commitment to eliminating transportation fatalities and serious injuries.

The Florida 2021-2025 SHSP is a data-driven, multi-year statewide safety plan identifying *Pedestrians and Bicyclists* as one of 12 emphasis areas and defines key strategies to specifically eliminate these types of fatalities and serious injuries. The SHSP was developed in close coordination with the FTP.

In addition to the FTP and the SHSP, VRU safety is addressed in the following plans which were reviewed for the safety assessment.

STATE

Highway Safety Improvement Program (HSIP)

HSIP Implementation Plan

Triennial Highway Safety Plan (HSP)

Florida's Pedestrian and Bicycle Strategic Safety Plan

Florida's Safe Mobility for Life Strategic Action Plan

FEDERAL

National Highway Traffic Safety Administration's (NHTSA) Countermeasures That Work

FHWA's PedBikeSafe.org

SAFE SYSTEM APPROACH

FHWA's Safe System Approach aims to address and mitigate risks inherent in the transportation system. Safe System principles recognize that humans make mistakes and are susceptible to serious injury or even death if the transportation system is not designed and operated to accommodate the common mistakes of humans. Safe System objectives are arranged around five complementary elements, including Safer People, Safer Roads, Safer Speeds, Safer Vehicles, and Post-Crash Care.

The goal is to build layers of protection into the system first to prevent crashes but also to lessen human impacts when crashes do occur. This approach takes into consideration the likelihood of human error and addresses human injury tolerance by considering likely crash type, impact forces, and the ability of the human body to withstand those forces. The Safe System Approach inherently places a priority on pedestrians and bicyclists, who are at higher risk for fatal or serious injury than a person driving or traveling in a motor vehicle.

The Safe System Approach was introduced in the 2021-2025 Florida SHSP to address all elements of a safe transportation system in an integrated manner. FDOT and its safety partners understand that one agency alone cannot solve the state's safety challenges. A collective determination toward Safe System principles and objectives will go a long way toward identifying and mitigating risks in the transportation system to avoid fatal and serious injuries.

ORGANIZATION OF THE SAFETY ASSESSMENT REPORT

This report focuses on high-priority fatal and serious injury crashes involving VRUs. It provides an overview of safety trends and performance, a quantitative assessment identifying high-priority areas, a summary of consultation efforts with affected communities, and a program of strategies to reduce the safety risks for these users. The core of this safety assessment is organized around the analysis and identification of high-priority segments for VRUs and the strategies being used to reduce the safety risks of these segments, which account for 38 percent of all VRU fatal and serious injury crashes in Florida. The Appendix summarizes data, projects, feedback, and potential solutions for the 22 Tier 1 high-priority segments identified during the quantitative analysis.

OVERVIEW OF VRU SAFETY TRENDS

Florida is one of the nation's largest and fastest growing states, with more than 22.2 million residents as well as more than 137 million visitors each year. Population has increased in recent years, with most of that growth concentrated in the state's urban areas. This growth trend is expected to continue with an increase of 25 percent projected by 2050. While this growth helps to drive the economy, it also increases the number of people walking and bicycling.

60% OF FLORIDA'S **POPULATION GROWTH** BETWEEN **2021** AND **2050** IS PROJECTED TO BE CONCENTRATED IN **10 COUNTIES**

Source: Bureau of Economic and Business Research.

FLORIDA IS PROJECTED TO ADD **548 NET NEW PEOPLE PER DAY** BETWEEN NOW AND **2050**

Source: U.S. Census Bureau.

Many choose active transportation for health and recreation, while others use it as their sole means of transportation. The growing population and the derived additional vehicular travel lead to increased vulnerability for walkers and bicyclists in both urban and rural areas.

LOCATION OF CRASHES FOR 2017-2021 BY ROAD MAINTAINING AGENCY:

STATE: 40%
CITY: 35%
COUNTY: 17%
OTHER: 8%

Source: FDOT Pedestrian & Bicycle Crash Facts.

PEDESTRIAN & BICYCLISTS ACCOUNT FOR **27%** OF **ALL FATALITIES** IN FLORIDA DURING **2017-2021**

Source: Florida Department of Highway Safety and Motor Vehicles (FLHSMV).

1,259 MILES ACCOUNT FOR **38%** OF PEDESTRIAN & BICYCLIST **FATALITIES & SERIOUS INJURY CRASHES DURING 2017-2021**

Source: FLHSMV.

Even though over three quarters of Floridians drive alone to work, everyone is a pedestrian at some point in their trip and is vulnerable to the safety risks of walking. When analyzed individually, pedestrians are the most vulnerable to fatalities and serious injuries on Florida's roadways. Bicyclist fatalities also continue to increase. Improving the safety of all vulnerable road users is paramount.

OVER **3,600** **PEDESTRIANS DIED** AND OVER **6,800** WERE **SERIOUSLY INJURED** IN FLORIDA DURING **2017-2021**

Source: FLHSMV

OVER **800** **BICYCLISTS DIED** AND OVER **3,800** WERE **SERIOUSLY INJURED** IN FLORIDA DURING **2017-2021**

Source: FLHSMV.

INNER CITY TRIPS WITH

SHARED BICYCLES & E-SCOOTERS

HAVE RISEN

60%

YEAR-OVER-YEAR

Source: McKinsey & Company, 2021.

In addition to the growth in population, the way in which people move is also evolving. New technologies for automated vehicles and personal conveyance are changing at a rapid pace. Automated vehicles are introducing many promising safety features. However, their interactions with pedestrians and bicyclists become increasingly challenging to navigate because of the often unpredictable behavior of VRUs. In this technology space, many shared services for electronic devices such as e-scooters and e-bikes have expanded the transportation choices for a variety of Floridians and led to more VRUs in some of the state's most densely populated and congested areas. Many of these users are less comfortable on these vehicles than seasoned bicycle or pedestrian commuters and can be at greater risk for engaging in unsafe behaviors. Also, shared vehicle services like these do not offer helmets or other protective gear, so it's incumbent upon the user to plan to have their own. The vulnerability of the user increases without the protective gear.

WORK ZONE SAFETY

According to 2017-2021 statewide crash data, Florida experienced 66 non-motorist fatalities and 118 non-motorist serious injuries in work zones. Speeding in work zone areas accounts for 31 percent of fatal work zone crashes. To address crashes in work zone areas, Florida focuses on enforcing traffic laws within work zone areas, using advanced technologies to enhance safety, training to improve staff skills, and education and outreach to raise public awareness regarding work zone safety.

In 2021, FDOT received a National Roadway Safety Award for the successful use of innovative technologies on arterial roadway work zones through the utilization of Active Work Zone Awareness Devices, which boosted safe driving in work zones by 39 percent.

OVERVIEW OF VRU SAFETY PERFORMANCE

Florida's Target Zero holds that fatalities and serious injuries are unacceptable and preventable. In addition, it encompasses the mindset that all share the responsibility of reaching zero fatalities and serious injuries, including system users, system designers, and policymakers. The goal translates into a target of zero for all safety performance. FDOT continually monitors the progress to zero and aligns resources accordingly to plan, design, operate, and maintain the transportation system.

Florida specifically monitors the total number of fatalities and serious injuries involving non-motorized transportation users compared to the target of zero. As required by federal law, this number is reported annually as a five-year rolling average to monitor trends over time. Florida closely watches this trend to provide education, enforcement, and other resources to eliminate the safety risks for VRUs.

PROGRESS TOWARD MEETING SAFETY PERFORMANCE TARGETS FOR NON-MOTORIZED USERS

Florida has not achieved their target of zero non-motorized fatalities and serious injuries based on a five-year rolling average. During 2017-2021, fatalities increased for both pedestrians and bicyclists, but serious injuries began to decline on a five-year rolling average basis. Based on these trends, FDOT is making progress toward achieving the targets.

FDOT uses crash data to identify the types, severity, location, and other characteristics of crashes on all public roadways. To monitor progress, FDOT analyzes the crash data, along with other information such as driver, citation, vehicle, emergency services, and roadway data, to identify specific actions to improve safety. FDOT also uses data-driven forecasting to provide projections for safety performance measures. This statistical modeling process is conducted annually using historical data.

The table below summarizes data and trends in VRU safety performance between 2017-2021.

	5-YEAR TOTAL FATALITIES	% OF TOTAL FATALITIES	5-YEAR CHANGE IN FATALITIES	% CHANGE IN FATALITIES	5-YEAR TOTAL SERIOUS INJURIES	% OF TOTAL SERIOUS INJURIES	5-YEAR CHANGE IN SERIOUS INJURIES	% CHANGE IN SERIOUS INJURIES
U.S.	192,426	100%	↑ 5,466	15%	NA	NA	NA	NA
U.S. VRUs	37,065	19%	↑ 1,473	21%	NA	NA	NA	NA
U.S. Pedestrians	32,625	17%	↑ 1,313	22%	NA	NA	NA	NA
U.S. Bicyclists	4,440	2%	↑ 160	20%	NA	NA	NA	NA
Florida	16,509	100%	↑ 625	9%	133,270	100%	↓ 3,554	-17%
Florida VRUs	4,501	27%	↑ 233	29%	10,741	8%	↓ 117	-5%
Florida Pedestrians	3,687	22%	↑ 170	26%	6,880	5%	↓ 38	-3%
Florida Bicyclists	814	5%	↑ 63	48%	3,861	3%	↓ 79	-10%

NA – data for serious injuries at the national level is not available.

Even when compared to the nation, Florida is losing pedestrians and bicyclists at a higher rate. Between 2017 and 2021, 4,501 vulnerable road users were lost on Florida's roadways – more than 1,000 in 2021, the highest of the five years. These numbers represent more than a quarter of total fatalities and are increasing faster than total fatalities. Every number represents a loved one, and every person has a story. Florida's story reveals there is more work to be done in achieving zero VRU fatalities and serious injuries.

Overall, Florida's non-motorized fatalities and serious injuries (based on a five-year rolling average) increased each year between 2017 and 2019 before declining in 2020 and again in 2021. A closer look at the data shows there are more pedestrian fatalities than bicyclist fatalities. Bicyclist fatalities increased by 48 percent, representing 63 people; however, pedestrian fatalities increased by 26 percent, representing 170 people. Because even one death is too many, monitoring performance is critical to staying on top of solutions to remedy the reasons for these crashes. FDOT continues to evaluate existing activities to determine what is working well, make adjustments where changes are needed, and identify innovations to move the needle to zero. FDOT is committed to changes in policy, procedures, and practices to make meaningful progress toward this aggressive but only acceptable target.

FDOT is working diligently to identify the state's most dangerous locations for VRUs and applying key strategies and countermeasures in those locations because losing a loved one to a preventable vulnerable road user crash is unacceptable, heartbreaking, and life-changing.

QUANTITATIVE ANALYSIS

To assess the safety performance of VRUs, FDOT performed a quantitative analysis of VRU fatal and serious injury crashes that identified high-priority areas for VRUs based on roadway data, including location, roadway functional classification, design speed, speed limit, and time of day. It also considered demographic data, such as race, ethnicity, income, and age.

The safety assessment for all public roads included five steps:

STEP 1: Review Florida's priority counties for pedestrian and bicycle crashes.

STEP 2: Identify one-mile segments associated with the crashes.

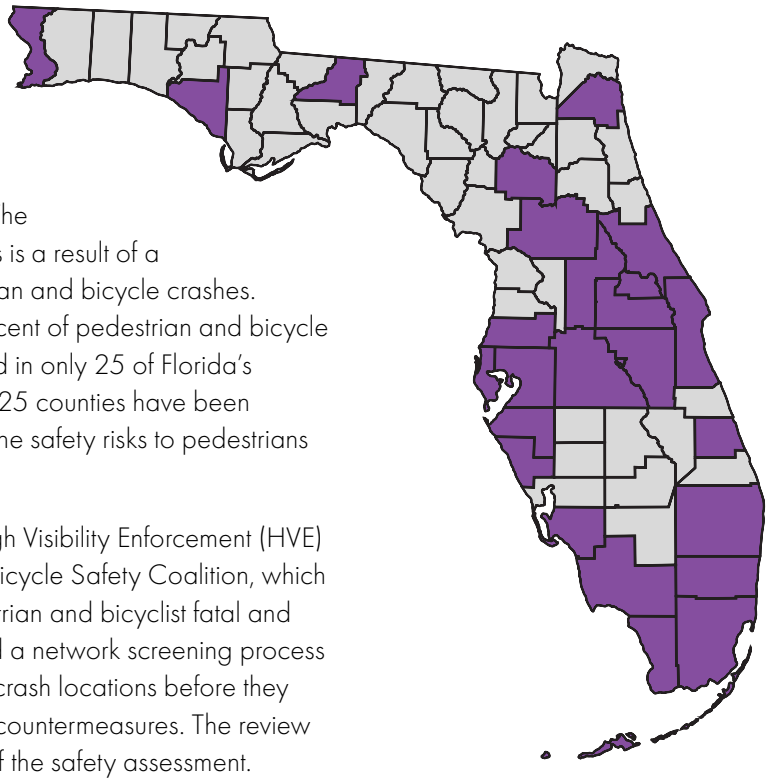
STEP 3: Develop prioritization tiers.

STEP 4: Analyze data for Tier 1, 2, and 3 segments.

STEP 5: Identify High-Priority Areas.

STEP 1: REVIEW FLORIDA'S PRIORITY COUNTIES FOR PEDESTRIAN AND BICYCLE CRASHES

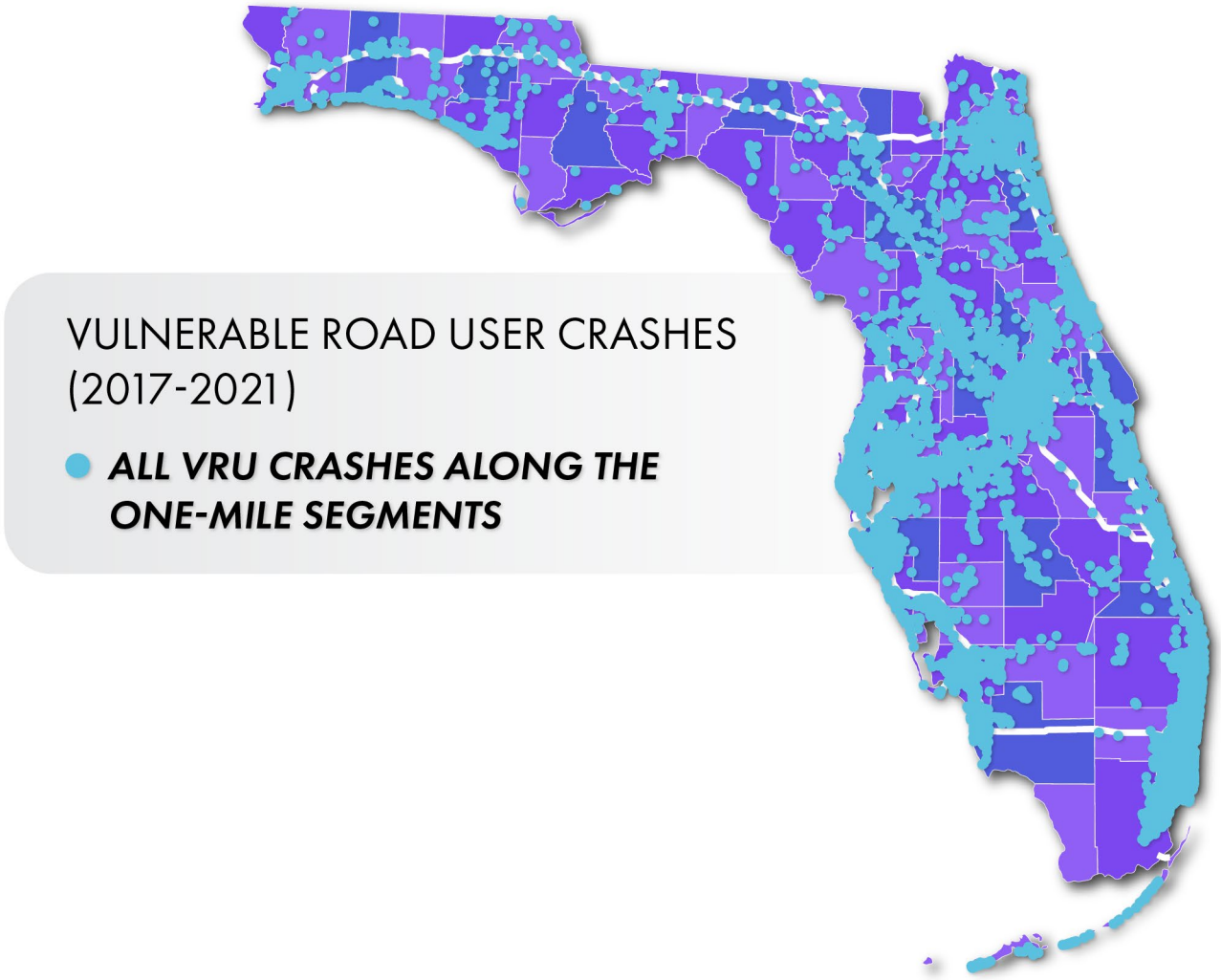
The first step in the assessment was to review the Florida Pedestrian and Bicycle Strategic Safety Plan (FPBSSP), produced by the Florida Pedestrian and Bicycle Safety Coalition, which identifies the 25 counties with the highest number of fatal and serious injury crashes involving pedestrians and bicyclists. The FPBSSP indicates the identification of these counties is a result of a systemwide data analysis on the trends for pedestrian and bicycle crashes. In FPBSSP's analysis, it was determined that 90 percent of pedestrian and bicycle fatalities and serious injuries on state roads occurred in only 25 of Florida's 67 counties. As a result of FBPSSP's analysis, these 25 counties have been prioritized to allocate limited resources to address the safety risks to pedestrians and bicyclists.



The VRU safety assessment also considered the High Visibility Enforcement (HVE) segments identified by the Florida Pedestrian and Bicycle Safety Coalition, which focuses on areas with high representation of pedestrian and bicyclist fatal and serious injury crashes. Florida has also implemented a network screening process using predictive analytics to identify potential high-crash locations before they become a safety concern and to apply life-saving countermeasures. The review of these previous analyses grounded Steps 2 – 5 of the safety assessment.

STEP 2: IDENTIFY ONE-MILE SEGMENTS ASSOCIATED WITH VRU CRASHES

After reviewing the crash locations of the top 25 counties identified by FPBSSP, the potential for high crash areas outside the 25 counties was considered. The assessment continued by collecting all non-motorist fatal and serious injury crashes for the most recent five-year period (2017-2021) from the Florida Department of Highway Safety and Motor Vehicle (FLHSMV) and Signal4Analytics crash data sources. The location of all crashes were mapped, and uniform one-mile segments were created along all state-owned and major non-state-owned roads. A geospatial process was used to associate the VRU crashes with the one-mile segment.

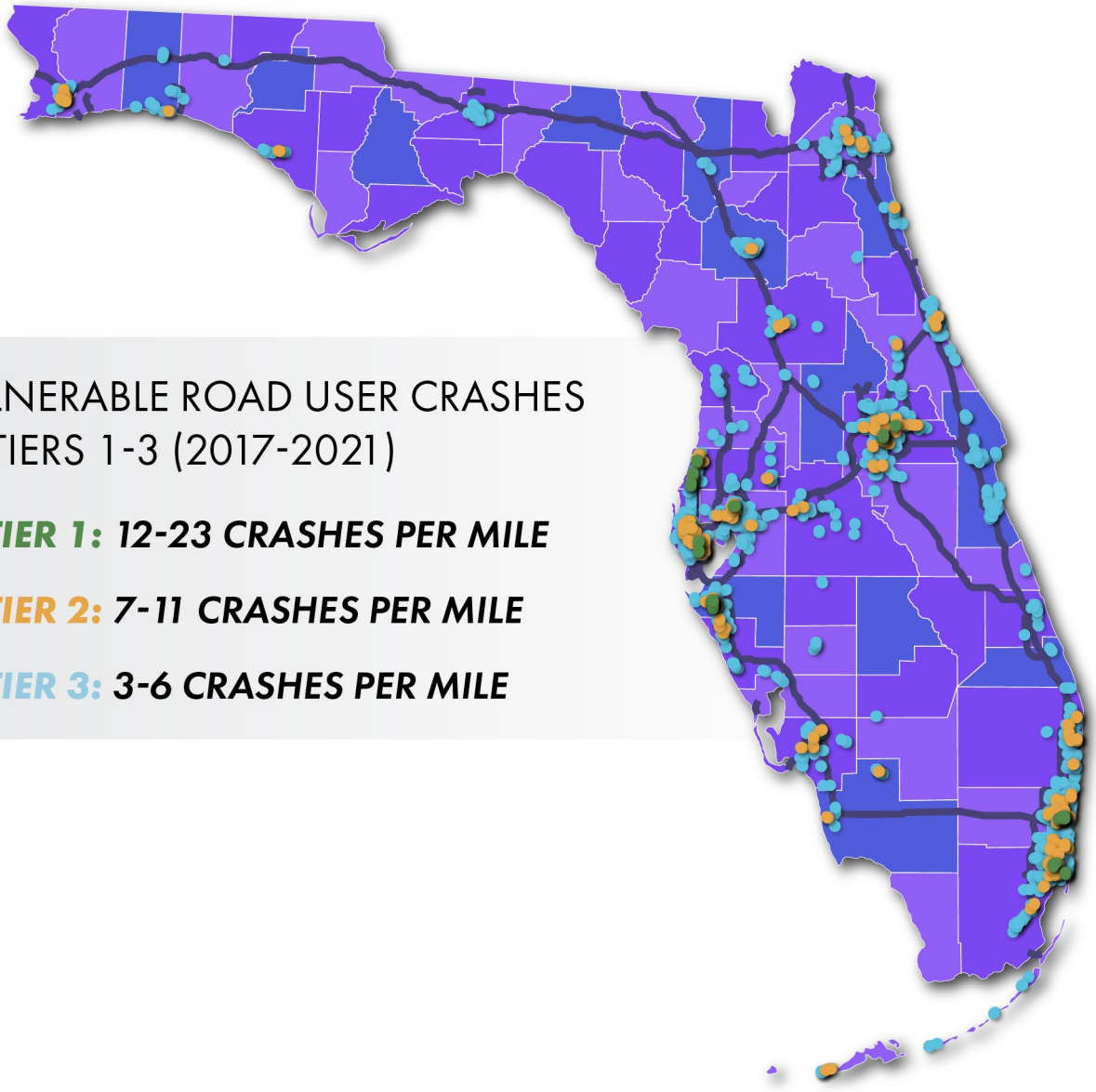


According to the FLHSMV Traffic Crash Data definition, "non-motorist" indicates any person other than an occupant of a motor vehicle in transport. This includes pedestrians; other pedestrians such as a person in a wheelchair, a person in a building, a skater, a person using a pedestrian conveyance, etc.; bicyclists, other cyclists; occupants of motor vehicles not in transport such as parked, etc.; occupants of a non-motor vehicle transportation device; and unknown types of non-motorists.

STEP 3: DEVELOP PRIORITIZATION TIERS

The third step was to develop prioritization tiers for the one-mile segments based on the number of fatal and serious injury crashes in the five-year time period on all state-owned and major non-state-owned roads. The natural break classification method was used to determine tiers for the VRU crashes. Prioritization is based on the number of crashes per segment: the more crashes per segment, the higher the priority.

TIER	1	2	3
Segment Priority	High	Medium	Low
Number of Crashes per segment	12 to 23 crashes per mile	7 to 11 crashes per mile	3 to 6 crashes per mile



STEP 4: ANALYZE DATA FOR TIER 1, 2, AND 3 SEGMENTS

The fourth step was to review roadway and demographic characteristics to understand the contributing factors related to VRU fatalities and serious injuries.

ROADWAY CHARACTERISTICS

The following roadway data were reviewed for each segment. The table below summarizes roadway characteristics for identified Tier 1, 2, and 3 segments.

	TIER 1	TIER 2	TIER 3
Context Classification* Criteria for roadway design elements that promote safety and mobility.	C3C-Suburban Commercial C4-Urban General	C3C-Suburban Commercial C3R-Suburban Residential C4-Urban General C5-Urban Center	C2-Rural C2T-Rural Town C3C-Suburban Commercial C3R-Suburban Residential C4-Urban General C5-Urban Center C6-Urban Core
Functional Classification* Character of service of the road.	Principal Arterial Minor Arterial Minor Collector	Principal Arterial Minor Arterial Major Collector Minor Collector	Principal Arterial Minor Arterial Major Collector Minor Collector Local
Speed Limit* Posted maximum speed.	30-55	25-55	20-70
Time of Day** Time period when the crash occurred (i.e., weekday morning, weekday midday, weekday evening, weekend, and nighttime).	All time periods	All time periods	All time periods

Source: *FDOT Roadway Characteristics Inventory. **FLHSMV.

CONSIDERATION OF DEMOGRAPHICS

The safety assessment considered demographics of the locations of fatalities and serious injuries, including race, ethnicity, income, and age. The table below summarizes these characteristics identified for Tier 1, 2, and 3 segments. This information was carefully considered during consultation with stakeholders to prioritize strategies for reducing VRU risks in the identified segments.

Cumulative Data for Segments in the Tier	TIER 1	TIER 2	TIER 3
Population	3,736	4,341	4,187
Gender (Females Per 100 Males)	101.1	98.5	99.5
Percent White	56.6%	55.6%	61.8%
Percent Black	31.8%	27.6%	21.2%
Percent American Native Or Alaska Native	0.2%	0.3%	0.3%
Percent Asian	1.3%	2.5%	2.3%
Percent Hawaiian And Other Pacific Islander	0.1%	0.1%	0.1%
Percent Other Race	3.4%	4.6%	4.7%
Percent Two Or More Races	6.6%	9.3%	9.5%
Percent Two Or More Races Including Some Other Race	3.5%	6.6%	6.7%
Percent Two Or More Races Excluding Some Other Race Or Three Or More Races	3.1%	2.7%	2.9%
Percent Hispanic Or Latino	19.5%	27.4%	28.2%
Range of Median Household Income	$22,287-$109,543	$13,801-$126,364	$13,686-$210,313
Average Age	40.6	41.8	42

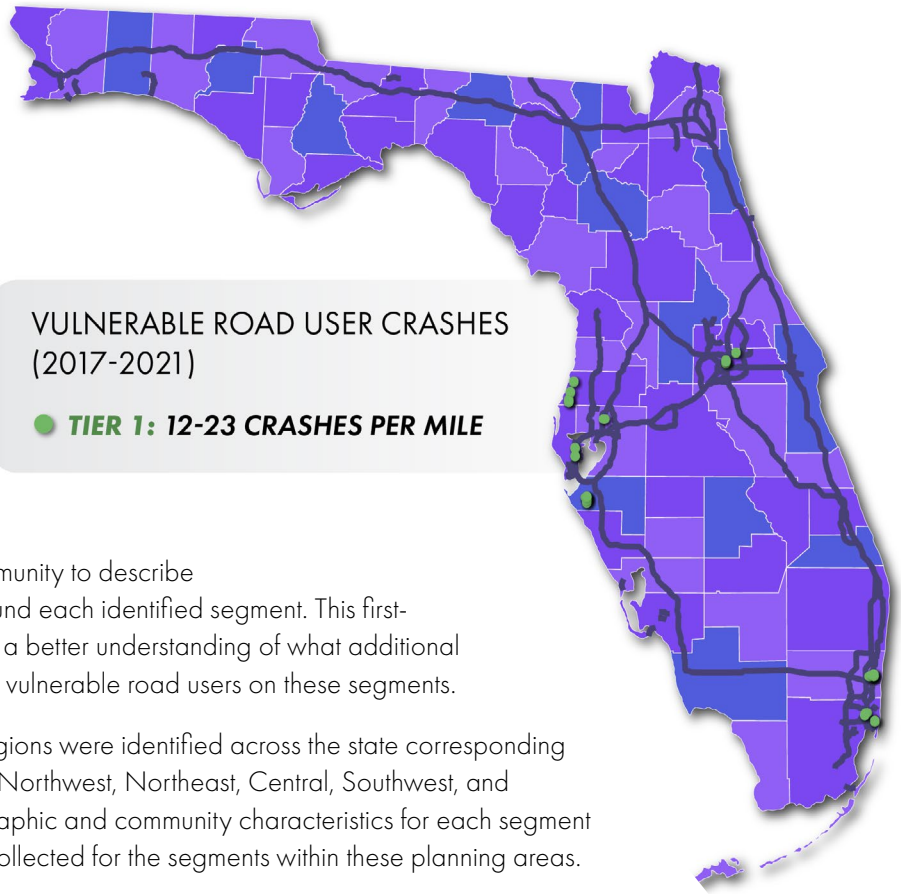
Source: U.S. Census Bureau.

STEP 5: IDENTIFY PRIORITY AREAS

The final step was to identify the high-priority areas. The analysis identified 1,259 centerline one-mile segments within Tiers 1, 2, and 3 that account for 38 percent of VRU fatal and serious injury crashes. These segments had at least three VRU fatal or serious injury crashes associated with them in the last five years (2017-2021). The table below summarizes the number of centerline miles, bicycle crashes, and pedestrian crashes within Tier 1, 2, and 3 segments.

	TIER 1 (12-23 CRASHES)	TIER 2 (7-11 CRASHES)	TIER 3 (3-6 CRASHES)	TOTAL
Number Of Centerline Miles	22	168	1,069	**1,259**
Number Of Bicycle Crashes	93	338	1,221	**1,652**
Number Of Pedestrian Crashes	250	1,038	2,874	**4,162**
% Of Statewide VRU Crashes	2%	9%	27%	**38%**

The 22 one-mile segments in Tier 1 represent the highest priority for VRU safety investments. Focusing on eliminating VRU fatalities and serious injuries in these locations will have a significant impact on making progress toward zero. To understand contributing factors to the high number of crashes, FDOT District safety liaisons summarized direct feedback they received about these segments and the projects currently programmed to address the risks identified. In addition, outreach was performed with representatives knowledgeable of the community to describe street-level activity for the areas in and around each identified segment. This first-hand community knowledge contributed to a better understanding of what additional steps are needed to address safety risks for vulnerable road users on these segments.



To organize review of the segments, five regions were identified across the state corresponding with geographic planning areas, including Northwest, Northeast, Central, Southwest, and Southeast. The Appendix provides demographic and community characteristics for each segment based on data and community feedback collected for the segments within these planning areas.

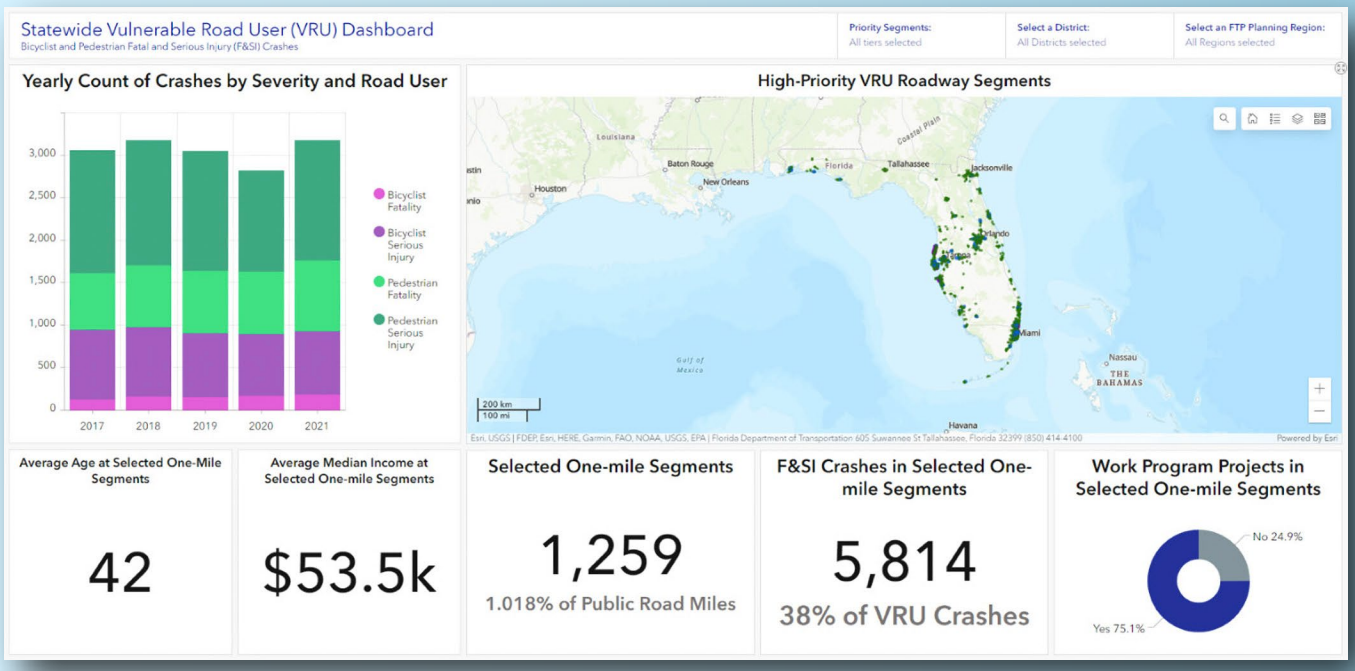
STATEWIDE VRU DASHBOARD

FDOT developed an interactive dashboard to summarize the quantitative analysis, allowing for geospatial visualization and dynamic aggregation of key features such as location, number of crashes, time of day, roadway characteristics, and demographics. These features can be obtained in aggregation by district or tier as well as segment level.

The dashboard includes all the data examined during the analysis and selection of the high-priority segments. Key required roadway layers, such as context classification, functional classification, and posted speed limit, are included. Other related layers include bike lanes, state highway system, top 25 counties, district boundaries and geographic planning regions.

Demographic characteristics data for the communities related to priority segments are also included, such as race, income, and age. Projects on each segment already programmed in the FDOT Work Program are identified in the dashboard, highlighting where action is being taken to address safety risks.

This dashboard works in concert with this report to interactively show the high-priority segments. Tier 1 segments, the highest focus area, are individually described in the Appendix.



CONSULTATION

OVERVIEW

Community engagement is at the core of FDOT's mission, and the Department continues its commitment to these activities with the VRU Safety Assessment. Engagement activities strengthen coordination, encourage input, and promote dialogue for a more inclusive and comprehensive approach to safety planning.

Community engagement within the safety realm is an ongoing effort in Florida. FDOT District staff are in constant contact with the communities in their district, building relationships, listening to feedback, educating, and collaborating on solutions to address safety challenges.

DISTRICT AND MPO MEETINGS

8 virtual meetings with FDOT Districts and MPOs involving 150 attendees

Specifically, the safety assessment was developed with input from FDOT District Safety staff and Florida's Metropolitan Planning Organizations (MPOs) to gain local knowledge and perspective on the factors contributing to the safety risks in areas with high-priority segments. To obtain this insight, FDOT conducted eight virtual meetings early in the process with District and MPO staff to provide an overview of VRU Safety Assessment guidance and discuss the specific community engagement requirements.

WORKSHOP

In-person, interactive breakout session at the Florida Metropolitan Planning Partnership Meeting involving over 100 participants

Feedback was also gathered through internal briefings and partner meetings to promote the safety assessment work broadly. A key consultation activity occurred at the Florida Metropolitan Planning Partnership meeting, where an interactive breakout session was conducted with all MPOs to gather feedback, identify ongoing actions being taken on high-priority segments, and potential strategies and countermeasures to address safety risks. Specific comments on potential solutions, countermeasures, and strategies were received and used to refine the strategy framework.

SUMMARY OF CONSULTATION

Consultation with FDOT District Safety staff and Florida MPO staff included reviewing community engagement efforts in locations with one or more high-priority segments, identifying strategies used by FDOT Districts and MPOs, and identifying potential strategies and countermeasures to highlight on priority segments. This consultation provided insights on safety concerns related to priority segments, safety projects currently underway or scheduled in the FDOT Work Program to address VRU safety, and community engagement strategies focused on reducing VRU fatalities and serious injuries while considering unique community characteristics.

Observations From The Community Engagement Practices

- *There are many community participants engaging in conversations about the road safety of their communities, including residents, civic leaders, community advocates, local partners, MPO boards, Citizen Advisory Committees (CACs), Community Traffic Safety Teams (CTST), Community Oversight Advisory Team, law enforcement, traffic safety coalitions, and FDOT.*
- *Many commonly practiced engagement strategies are being used, such as pedestrian and bicycle safety educational and enforcement campaigns, educational materials (multiple languages) distribution, helmet fitting, educational bike rides, media/press releases, safety pop-up events, digital and print advertisements, community meetings, and workshops.*
- *There are ongoing/planned VRU safety improvement projects on the identified priority segments, such as pedestrian crossing signal and signage, median and sidewalk enhancement, pavement marking, improved lighting, and safety audits.*

STRATEGY FRAMEWORK

A collection of strategies is provided in the following pages for addressing the safety risks in the high-priority areas identified through the quantitative analysis. The strategies provide the context for FDOT, MPOs, and safety partners to address VRU safety concerns on these priority segments specifically.

A review of strategies from multiple existing safety planning documents, including the SHSP, the FPBSSP, the HSP, and the HSIP, was conducted to consider approaches already being implemented to address VRU safety. The strategy framework for this assessment highlights existing strategies that should receive greater emphasis, as well as new or refined strategies for implementation in the near future. The strategies were refined to address safety risks in the high-priority segments. This collection of strategies reflects FDOT's long-standing commitment to safety, continual coordination with the communities, and an urgency for addressing safety challenges.

All strategies work together with the safety goal of the FTP and strategies of the SHSP to support the overarching commitment to eliminating VRU fatalities and serious injuries. These Florida-produced documents also work in concert with FHWA's Safe System Approach. In keeping with this trajectory, the collection of strategies is aligned with the Safe System Approach objectives of Safer People, Safer Roads, and Safer Speeds. Given the nature of this assessment, reference to Safer Vehicles and Post-Crash Care are summarized below.

SAFER VEHICLES

The focus on this objective is to continually advance vehicle systems to prevent crashes and minimize the impact of crashes on occupants and non-occupants. While the research and performance on vehicle safety can be a factor in VRU crashes, the focus on the vehicle is more pertinent to vehicle manufacturers and the drivers who operate the vehicles. Therefore, specific strategies for vehicle safety are not captured in this framework of strategies but the Safe System Approach is weaved throughout the assessment.

POST-CRASH CARE

This critical aspect of the Safe System Approach focuses on enhancing the survivability of crashes through the ability of first responders to expedite critical care, the availability of access to the right level of care, and preventing secondary crashes with carefully planned incident management procedures. While the expediency of care in a crash can be a factor in VRU crashes, the focus on access to and incident management during a crash is more pertinent to law enforcement, EMS personnel, and incident managers such as the Road Rangers. Therefore, specific strategies for post-crash care are not captured in this framework of strategies but the Safe System Approach generally is weaved throughout the assessment.

SAFER PEOPLE

Saving lives is at the core of Florida's Target Zero. Getting to zero takes educating people on safe driving behaviors, providing enforcement to reinforce those behaviors, and developing engineering solutions that deter risky behaviors. Most people use the roadway system safely, but all are capable of mistakes and misjudgments that make them vulnerable to crashes. In other cases, more risky behavior is to blame. Getting everyone to their destination unharmed is the priority.

STRATEGIES

- Reduce disparities in pedestrian and bicycle safety risks by ensuring that all transportation projects provide safety, mobility, and accessibility to all road users, regardless of age or ability.
- Prioritize inclusive decision-making in transportation planning for pedestrians and bicyclists, taking into account the unique needs of diverse communities, high-risk groups, and individuals with disabilities.
- Create and distribute easy-to-understand, uniform, and situation-specific information about pedestrian and bicyclist safety. Target this outreach to essential groups such as transportation safety partners, industry professionals, and impacted communities, ensuring it's accessible to people of all ages and abilities.
- Enhance training for construction, maintenance, and permitting staff regarding safe work zones for pedestrians and bicyclists.
- Advance High Visibility Enforcement activities in areas where traffic crashes resulting in fatal or serious injuries to people walking and biking are most prevalent, and integrate enforcement activities based on problem identification and community context.
- Provide law enforcement officers with training, tools, and resources to enforce laws that support the safety of pedestrians and bicyclists.
- Identify and support state and local legislation and policies for pedestrians and bicyclists that clarify the responsibilities of users and support safe travel behavior.
- Facilitate updates to state laws, policies, and regulations that affect the safety of people walking and biking.
- Promote the collection, analysis, distribution, and use of quality data and tools to guide, enhance, and evaluate transportation-related decision making at the state, regional, and local levels to reduce pedestrian and bicyclist fatalities and serious injuries.
- Partner with law enforcement to improve both the accuracy and breadth of crash reporting to better address those driving behaviors that most commonly lead to fatalities and injuries among people walking and biking.

SAFER SPEEDS

Speeding increases the frequency and severity of crashes, yet is a persistent and often blatant behavior among the traveling public. Speed is a critical factor in crashes and can mean the difference between life and death, especially when vulnerable road users are involved. Reducing speeds, especially in locations with pedestrian and bicyclist activity, is one of the best ways to prevent serious injury and fatal crashes.

STRATEGIES

- Increase application of speed management techniques to reduce crash severity for VRUs.
- Implement countermeasures that ensure design speeds reflect the desired target speed.
- Prevent speeding by studying and piloting the equitable application of enforcement strategies, including automated enforcement.

In July 2021, revisions to the Florida Design Manual (FDM) and Project Development and Environment Manual (PD&E Manual) were introduced to implement target speeds on projects where a design speed is required. These revisions include new requirements for multidisciplinary participation in the target speed selection process. The use of target speed will be used to influence design speed selection and is based on definitions and best practices outlined in the FDOT Context Classification Guide and the FDOT Speed Zoning for Highways, Roads, and Streets in Florida.

FDOT understands that pedestrians and bicyclists have a much higher risk of being seriously injured or killed at speeds above 35 miles per hour, yet until this change in the FDM, three of the five context classifications where pedestrians and bicyclists were most often present include a range of speeds in excess of 35 miles per hour. Aligning target speeds with context classification has helped FDOT achieve a better understanding of how to appropriately deliver projects and implement countermeasures that ensure design speeds reflect the desired target speed.

SAFER ROADS

Roadway design strongly influences roadway use. Characteristics of land use and intersections with other transportation modes, such as rail and transit, also impact the safety risks exposed to the traveling public. Designing roadways to accommodate vulnerable road users is vital to their ability to navigate the transportation system safely. Achieving safer roadways requires incorporating design elements that offer redundant layers of protection to prevent crashes from occurring and mitigate harm when they do occur.

STRATEGIES

- Develop and deploy engineering solutions and best practices to prioritize crossing operations improvements, including leading pedestrian intervals and traffic control devices, and crossing design improvements such as bulbouts, pedestrian refuge islands, and other design elements to protect pedestrians and bicyclists at intersections and midblock locations.
- Separate bicycle facilities on roadways that operate at higher speeds or volume.
- Accelerate the implementation of existing and emerging safety countermeasures to improve the safety of people who walk and bike.
- Encourage multidisciplinary partnerships between law enforcement and engineering to enhance roadway design for VRUs.
- Develop and use a systematic approach to identify locations and behaviors prone to pedestrian and bicycle crashes and implement multi-disciplinary countermeasures.
- Use artificial intelligence and machine learning to evaluate and apply predictive analysis to prioritize safety countermeasures at key intersections for VRUs.
- Elevate operations and maintenance of strategic signalized corridors on the state highway system to improve safety and efficiency for VRUs.

In 2020, FDOT added the Channelizing Curb Device as a Developmental Specification. The modular, configurable devices can be used to create separated bike lanes, curb extensions, hardened centerlines, or other semi-temporary speed management and safety tools. Requests to use these devices on low-speed projects are growing. Careful monitoring under the Developmental Specification program ensures they perform as intended. Channelizing Curb Devices offer a relatively low-cost, low-investment opportunity to provide additional safety through bicycle separation and speed management.

LOOKING AHEAD

Implementation of the assessment will focus on three main tasks to move the needle on VRU-related fatalities and serious injuries, including focusing on the high-priority segments to address safety risks, monitoring the progress of eliminating VRU fatalities and serious injuries, and enhancing the VRU interactive dashboard to elevate its use and value for not only VRU data but for all SHSP emphasis areas.

FOCUS ON HIGH-PRIORITY SEGMENTS

The strategies of the assessment will be used to adjust priorities and funding, as needed, to address the high-priority segments identified in the assessment. In many cases, projects have already been programmed on the high-priority segments. In these instances, FDOT will work with the District safety liaisons to monitor the crash data on these segments to ensure the measures being taken to address the safety risks are accomplishing the intended target of eliminating fatalities and serious injuries. Where projects have not been programmed on a high-priority segment, FDOT will work with the District safety liaison and the community to expedite the implementation of strategies and countermeasures needed to address the safety risks on that segment.

MONITOR PROGRESS OF VRU SAFETY

As strategies are implemented and safety projects are completed, FDOT will continue to review and monitor crash data to determine the impact FDOT's investments are having on the high-priority segments. Continual focus will be on efforts to align resources accordingly to plan, design, operate, and maintain a safe transportation system. As annual data is updated, FDOT will reevaluate the tiers to determine the classification of segments based on the most current data. Successes are celebrated as the work continues to address the safety risks at all high-priority segments.

ENHANCE INTERACTIVE DASHBOARD

The interactive dashboard allows for ongoing use even after this initial assessment is complete. Its public domain also allows use by FDOT partners so they can work collaboratively with FDOT on the same segments with the largest number of fatalities and serious injuries. As FDOT monitors performance on these segments for VRU, they will enhance the dashboard to consider other SHSP emphasis areas. This comprehensive approach allows FDOT to focus on the highest-priority segments with full knowledge of other safety risks in the area and around the state. A by-product of the enhanced, comprehensive dashboard is a more synergistic approach to community engagement.

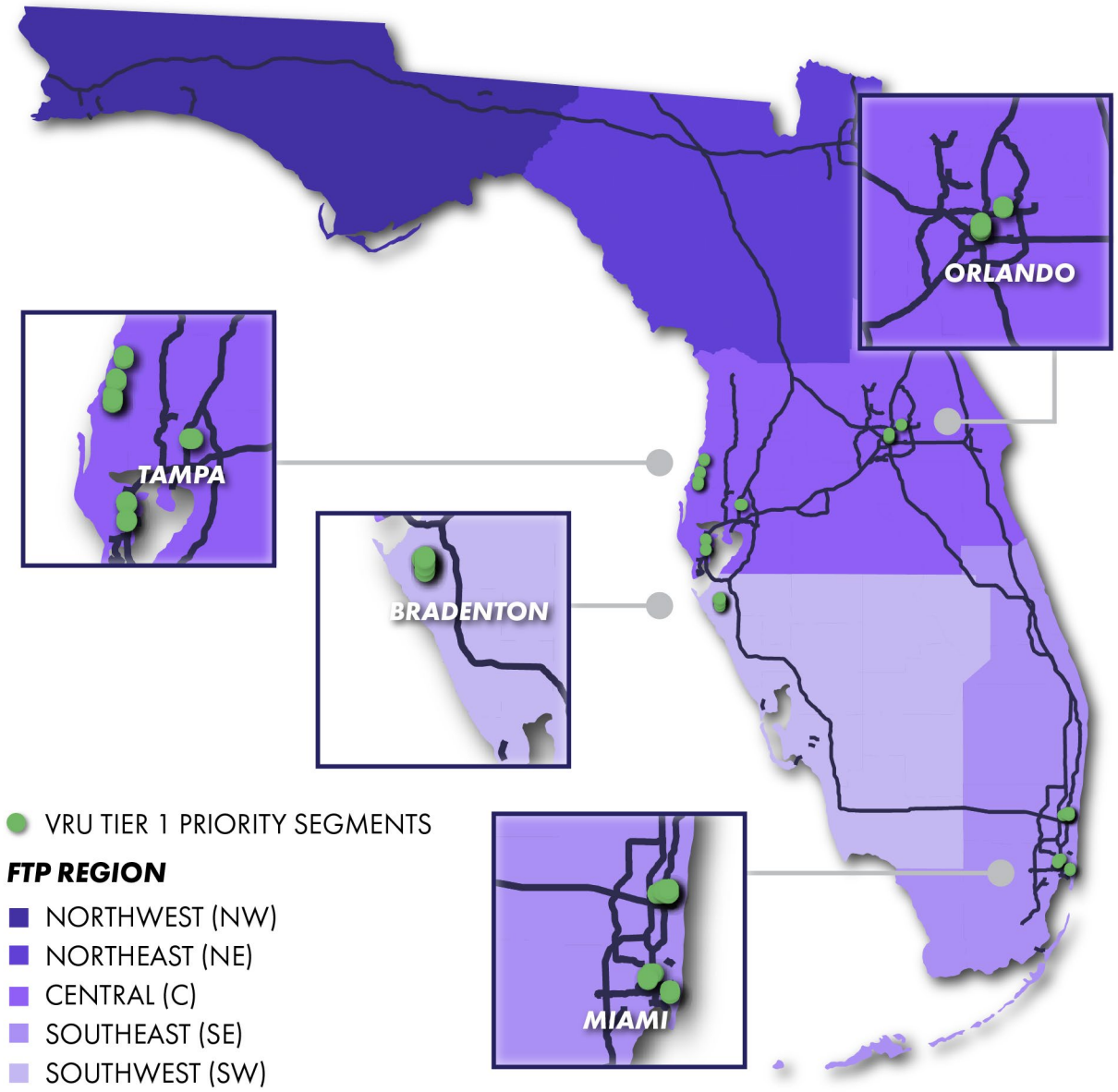
APPENDIX

TIER 1 PRIORITY SEGMENTS

Twenty-two one-mile segments were identified as Tier 1, signifying the highest priority for VRU safety improvements. The table below lists the segments by number of crashes from highest to lowest in Tier 1. The remainder of the Appendix provides a summary of each segment, current High Visibility Enforcement activities, planned VRU safety projects, and feedback for consideration as identified through community engagement for each segment. The segment number in the table is linked to the summary information for that segment.

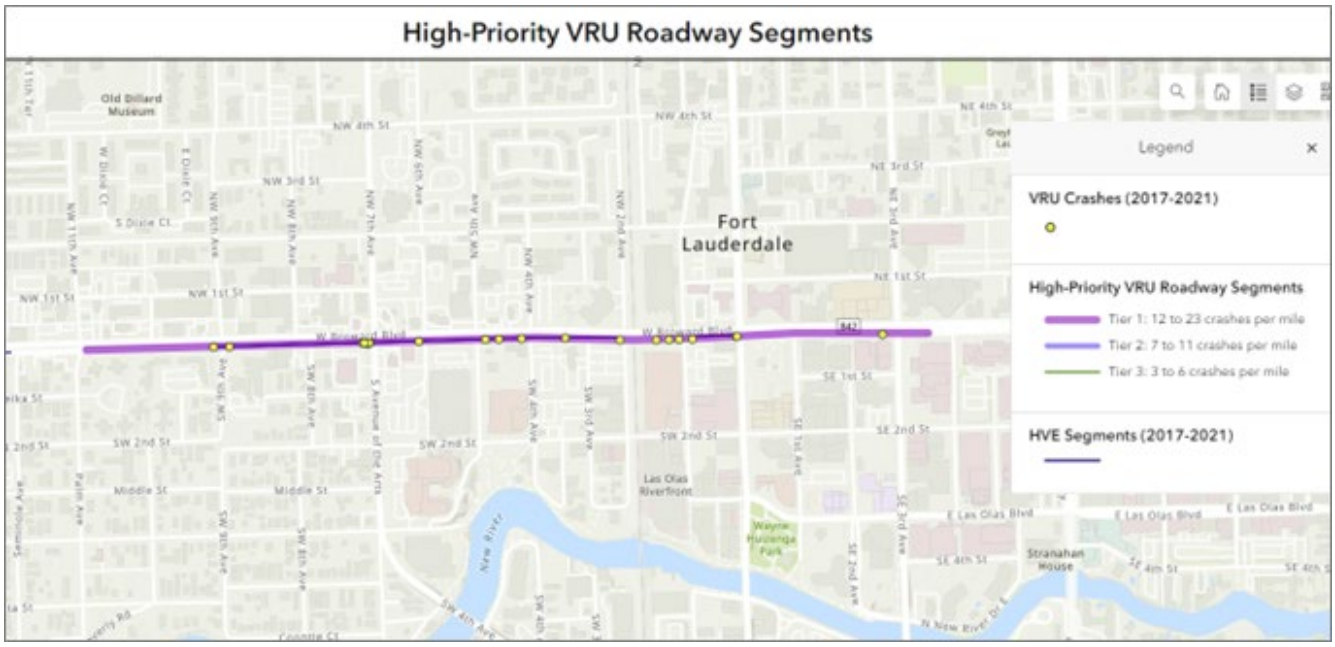
SEGMENT NUMBER	REGION	SEGMENT NAME	BEGINNING POINT	ENDING POINT	VRU CRASHES
1	SE	Broward Blvd I	Palm Avenue	SE 4th Avenue	23
2	SW	Cortez Road	26th Street West	9th Street West	20
3	SW	14th St W I	30th Avenue W	Orlando Avenue	19
4	SE	Sunrise Blvd	NW 10th Avenue	N Flagler Drive	19
5	C	US-19 I	Phoenix Ave	Mile Stretch Drive	19
6	SE	Alton Road	16th Street	NW 5th Street	18
7	C	US-19 II	56th Avenue N	72nd Avenue N	17
8	C	Orange Blossom Trail I	Holden Avenue	35th Street W	17
9	C	34th St N	6th Avenue S	7th Avenue N	16
10	C	SR-582/E Fowler Ave	N 15th Street	Bruce B Downs Boulevard	16
11	SE	Broward Blvd II	Florida Avenue	I-95	15
12	C	US-19 III	Johnson Road	Beacon Woods Drive	15
13	SW	14th St W II	Orlando Avenue	55th Avenue West	15
14	SW	14th St W III	55th Avenue West	63rd Avenue West	13
15	C	US-19 IV	Imperial Drive	Palmetto Road	13
16	SE	NW 79 St	NW 12th Avenue	NW 2nd Avenue	13
17	SE	NW 6 St	NW 13th Avenue	NW 24th Avenue	13
18	SE	NW 17 Ave	NW 71st Street	NW 54th Street	13
19	C	Orange Blossom Trail II	Rose Blvd	Holden Avenue	13
20	SW	14th St W/Tamiami Trail	63rd Avenue West	Montgomery Avenue	12
21	C	Semoran Blvd	Hewett Drive	Cornelia Avenue	12
22	C	US-19 V	Mile Stretch Drive	Camry Drive	12

VULNERABLE ROAD USER CRASHES IN TIER 1 (2017-2021)



1. BROWARD BOULEVARD (I)

Broward Boulevard is a principal arterial roadway in Broward County (Southeast Planning Region, District 4) with a posted speed limit of 40 mph. The priority segment between Palm Avenue and SE 4th Avenue had the highest number of vulnerable road user fatal and serious injury crashes (23) in the state between 2017 and 2021, and two-thirds of those crashes occurred at night. The community surrounding this segment is predominantly White (72.2%) and non-Hispanic or Latino (80.6%), with an average age of 37.1 years old and a median income of $109,543. Women make up 56% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
Broward Boulevard	NW 9th Avenue	S Andrews Avenue	Fort Lauderdale Police Department	02:00 to 24:00	Friday, Saturday, Sunday, Thursday, Tuesday, Wednesday

FDOT WORK PROGRAM PROJECTS

FDOT has programmed three projects in the FY 2024-2028 Annual Work Program on this segment. Out of those three, the project below is related to VRU safety.

ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
446999-1	Lighting	Intersection Lighting Retrofit Improvement	3.63	2024	2024

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

BROWARD BOULEVARD (I)	
What is the community saying?	
People are leaving urban density and speeding up as density lessens.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
Transit; commercial activity.	
What strategies should be prioritized?	
Roadways	***Road Users***
Poor rail crossing design for pedestrians; match cross-section to the east (west of US 1); because light rail is planned on this corridor, it appears roadway improvements are delayed.	Faster speeds in 6 lane cross section.
User Behavior	***Data***
	40 mph is too fast.

2. CORTEZ ROAD

Cortez Road is a minor arterial roadway in Manatee County (Southwest Planning Region, District 1) with a posted speed limit of 45 mph and a C3C context classification. The priority segment between 26th Street West and 9th Street West had the second highest number of VRU fatal and serious injury crashes (20) between 2017 and 2021, with eight crashes occurring on weekday midday, six crashes on the weekend, three crashes on the weekday evening, two crashes on the weekday morning, and one crash at night. The community surrounding this segment of Cortez Road is predominantly White (80.9%) and non-Hispanic or Latino (90.5%), with an average age of 56 years old and a median income of $36,641. Men make up 52% of the community. The roadway is one of the primary access roads to the beach.

HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
Cortez Road W	28th St W	17th St W	Manatee County Sheriff's Office	08:00 to 20:00	Saturday, Sunday, Monday, Tuesday, Thursday, Friday

FDOT WORK PROGRAM PROJECTS

FDOT has programmed three projects in the FY 2024-2028 Annual Work Program on this segment. Out of those three, the projects below are related to VRU safety.

ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
446954-1	Median Modification	SR 684 (Cortez Rd W) From 26th St W To 14th St W	0.768	2024	2024
440120-1	Lighting	Cortez Rd (SR 684) Intersection Lighting Retrofit	8.011	2024	2024

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

CORTEZ ROAD

What is the community saying?

Why did FDOT install lights? No right-of-way exists for pedestrian overpass/underpass.

What are the major drivers of pedestrian and bicycle activity on this segment?

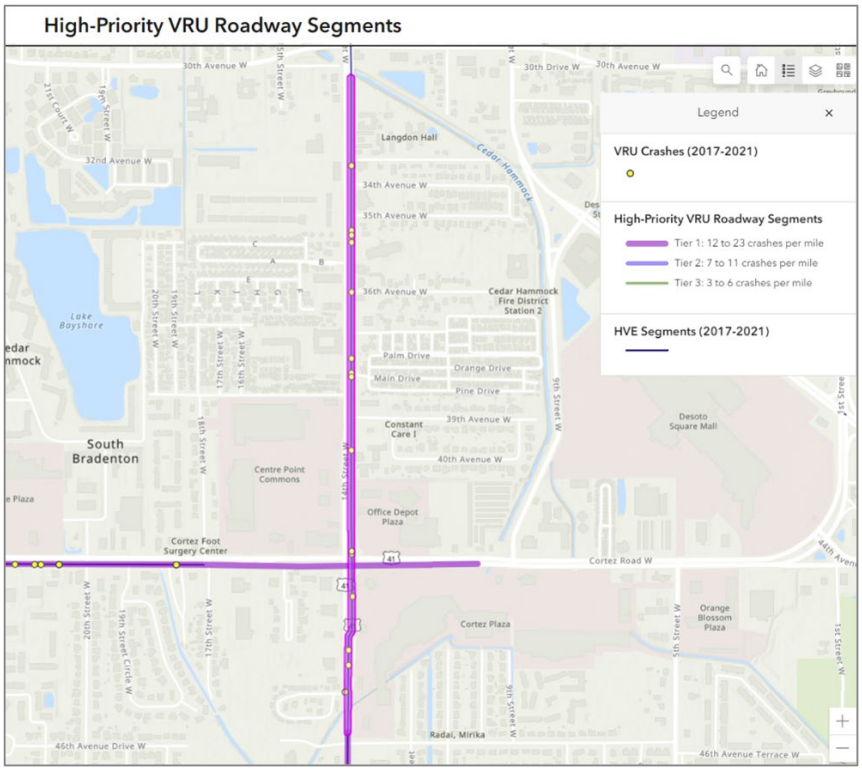
Residents along the southern side are predominately low income no car households often crossing midblock. Additionally, there are several big box retailers along the northern portion of the segment. Because of the population and type of segment, crossing the roadway is challenging for VRUs due to the high volume of traffic during daytime hours.

What strategies should be prioritized?

Roadways	*Road Users*
Five Rapid Flashing Beacons within a half mile of crashes; installation of yield to pedestrian signs; fencing could deter some midblock crossings; narrow lanes and speed reduction; reducing the number of lanes could decrease right turn conflicts with pedestrians at intersections.	Drivers fail to yield at midblock crossings with Rapid Flashing Beacons; use automated sensor that activates the beacon(s) automatically when a pedestrian enters the crossing could be helpful.
User Behavior	***Data***
Given the distance between signalized intersections, pedestrians often cross midblock; more education and awareness on laws for all road users.	Rear end collisions; lower visibility at night.

3. 14TH ST WEST (I)

14th Street West I is a principal arterial roadway in Manatee County (Southwest Planning Region, District 1) with a posted speed limit of 35 mph. The priority segment between 30th Avenue West and Orlando Avenue had 19 VRU fatal and serious injury crashes between 2017 and 2021 with five crashes occurring on the weekday midday as well as five crashes on the weekend, four crashes at night, three crashes on weekday mornings, and two crashes on the weekday evenings. The community surrounding this segment is predominantly White (68.8%) and Hispanic or Latino (62.2%) with an average age of 36.2 years old and a median income of $27,449. Women make up 55% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
14th St W	Cortez Road W	North of 27th Ave W	Manatee County Sheriff's Office	06:00 to 03:00	Friday, Saturday, Sunday, Tuesday, Wednesday. Thursday

FDOT WORK PROGRAM PROJECTS

FDOT has programmed four projects in the FY 2024-2028 Annual Work Program on this segment. Out of those four, the projects below are related to VRU safety.

ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
433592-1	Sidewalk	SR 45 (US 41) From 69th Ave (Bay Drive) to Cortez Road (Preliminary Engineering, Right Of Way, Railroad & Utilities, Environmental)	2.913	2024	2024
433592-4	Sidewalk	SR 45 (Us 41) From 69th Ave (Bay Drive) to Cortez Road (Preliminary Engineering, Construction)	2.913	2024	2024
449646-1	Safety Project	US 41 From 53rd Ave to Cortez Rd	1.001	2024	2028

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

14TH ST WEST (I)

What is the community saying?

There is significant commercial activity along this segment; one of the most dangerous places for pedestrians and bicyclists. Congestion is a challenge as well; there are very few opportunities for safe crossings due to the distance between signalized intersections.

What are the major drivers of pedestrian and bicycle activity on this segment?

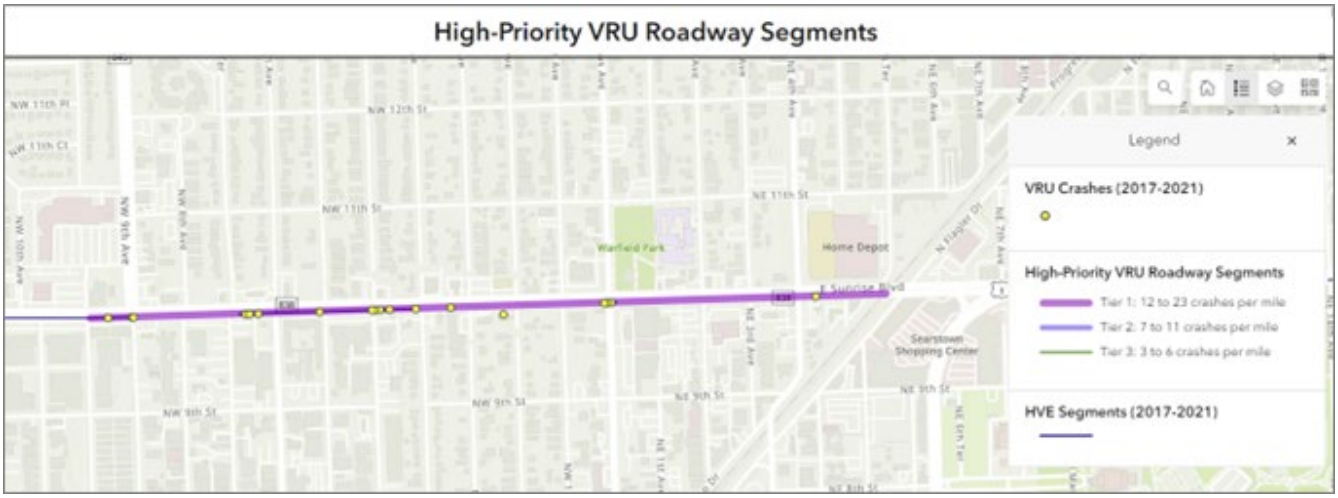
Intermittent sidewalks; few opportunities for safe walking and biking.

What strategies should be prioritized?

Roadways	*Road Users*
Access Management should be considered due to the many private entry/exit ways; no bike lanes due to lack of right of way; right of way constraints put pedestrians and bicyclists on same path.	
User Behavior	***Data***
Predominately pedestrians use this facility with few bicyclists.	ITS solutions could reduce speed even if no cross traffic; safety audits provide information.

4. SUNRISE BOULEVARD

Sunrise Boulevard is a principal arterial roadway in Broward County (Southeast Planning Region, District 4) with a posted speed limit of 40 mph. The priority segment between NW 10th Avenue and N Flagler Drive had 19 VRU fatal and serious injury crashes between 2017 and 2021 and more than half of those crashes occurred at night. The community surrounding this segment is predominantly White (75.9%) and non-Hispanic or Latino (88.2%) with an average age of 31.4 years old and a median income of $71,550. Women make up 55% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Parts of the segment were identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
Sunrise Boulevard	NW 7th Terrace	NW 4th Avenue	Fort Lauderdale Police Department	07:00 to 22:00	Friday, Saturday, Sunday, Monday, Tuesday, Wednesday, Thursday
Sunrise Boulevard	50-feet West of N Andrews Avenue	50-feet East of N Andrews Avenue	Fort Lauderdale Police Department	18:00 to 10:00	Tuesday, Wednesday, Friday, Saturday

FDOT WORK PROGRAM PROJECTS

FDOT has programmed six projects in the FY 2024-2028 Annual Work Program on this segment. Out of those six, the projects below are related to VRU safety.

ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
443844-1	Lighting	SR-838/Sunrise Blvd from NW 34th Ave to SR-845/Powerline Road	2.396	2024	2024
440074-1	Lighting	SR-838/Sunrise Blvd from Magic Leap Entrance to Andrews	7.414	2024	2024

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

SUNRISE BOULEVARD

What is the community saying?

Issue with roadway design; both US 1 and EW Roadway; asymmetrical lanes; able to go faster in this section; densely populated area; high transit ridership transit routes and stops.

What are the major drivers of pedestrian and bicycle activity on this segment?

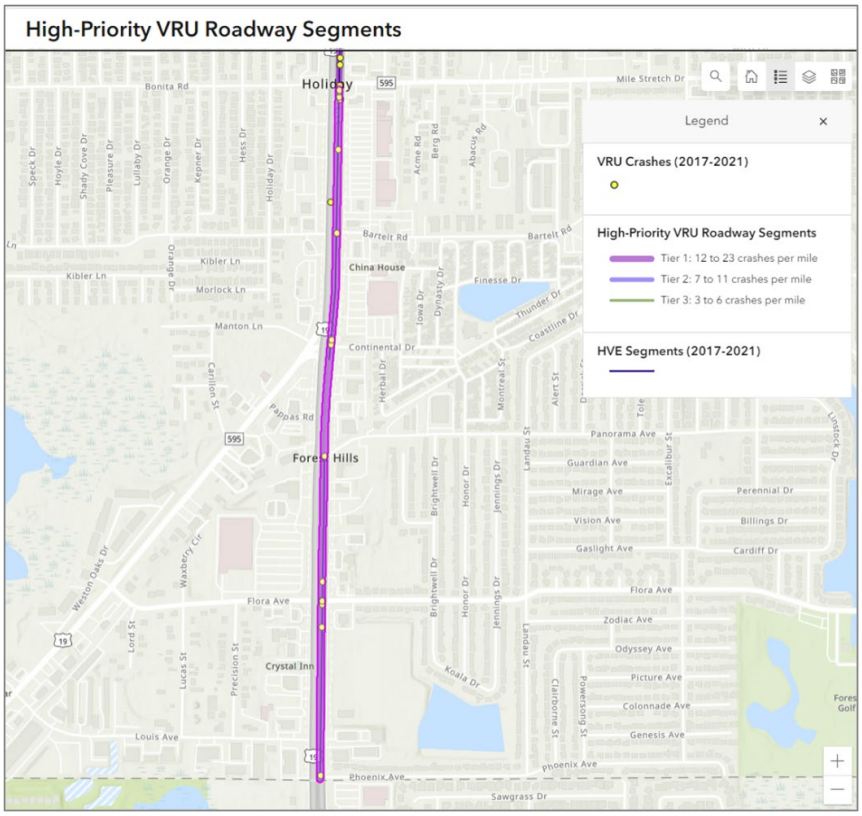
Retail, residential, and schools to north and south

What strategies should be prioritized?

Roadways	***Road Users***
Narrow road width; pedestrian signalization/crossings; change cross section to same as east; lack of enclosure compared to east; need better lighting.	Speed. Drivers are leaving the urban dense are area and speeding through this segment.
User Behavior	***Data***
Drivers are speeding; peds are crossing where ever they can/not at signals; getting off buses and crossing at transit stops.	Road bisects one neighborhood

5. US-19 (I)

US-19 is a principal arterial roadway in Pasco County (Central Planning Region, District 7) with a posted speed limit of 45 mph and a C3C context classification. The priority segment between Phoenix Ave and Mile Stretch Drive had the highest (19) number of VRU fatal and serious injury crashes in the Central region (fifth highest in Statewide) between 2017 and 2021 where the majority (74%) of the crashes occurred at night. The community surrounding this segment is predominantly White (91.3%) and non-Hispanic or Latino (81.4%) with an average age of 49.1 years old and a median income of $33,341. Men make up 52% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Parts of the segment were identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
US-19	Phoenix Avenue	Panorama Avenue	Pasco County Sheriff's Office	14:00 to 23:00	Friday, Saturday, Monday, Tuesday, Thursday
US-19	Continental Drive	300 ft N of Bonita Rd	Pasco County Sheriff's Office	06:00 to 24:00	Friday, Saturday, Sunday, Monday, Tuesday, Thursday

FDOT WORK PROGRAM PROJECTS

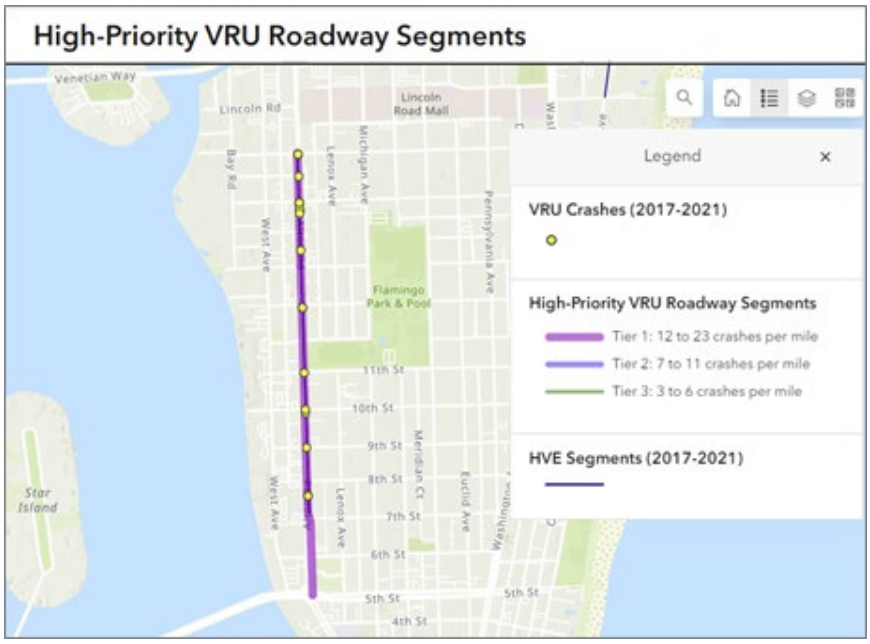
FDOT has programmed two projects in the FY 2024-2028 Annual Work Program on this segment, but none of the projects are related to VRU safety.

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

US-19 (I)	
What is the community saying?	
High number of homeless people; people drive too fast; people avoid walking here; drunk drivers.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
People crossing street to get to shopping and work.	
What strategies should be prioritized?	
Roadways	***Road Users***
Installing mid blocks, improving lighting; mixed use path all down this corridor, crossing is a major issue.	Providing drivers with real time information and notifications.
User Behavior	***Data***
Providing safety information to pedestrians crossing street.	Providing crash reports closer to incident date.

6. ALTON ROAD

Alton Road is a minor arterial roadway in Miami-Dade County (Southeast Planning Region, District 6) with a posted speed limit of 30 mph and a C4 context classification. The priority segment between 16th Street and NW 5th Street had 18 VRU fatal and serious injury crashes between 2017 and 2021 and half of those crashes occurred at night while an additional 5 occurred on weekday evenings. The community surrounding this segment is predominantly White (60.7%), Black (8.2%) and Hispanic or Latino (67.2%) with an average age of 35.4 years old and a median income of $42,064. Men and women each make up 50% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
Alton Road	7th Street	17th Street	Miami Beach Police Department	01:00 to 24:00	Friday, Saturday, Monday, Wednesday

FDOT WORK PROGRAM PROJECTS

FDOT has programmed two projects in the FY 2024-2028 Annual Work Program on this segment. Out of those two, the project below is related to VRU safety.

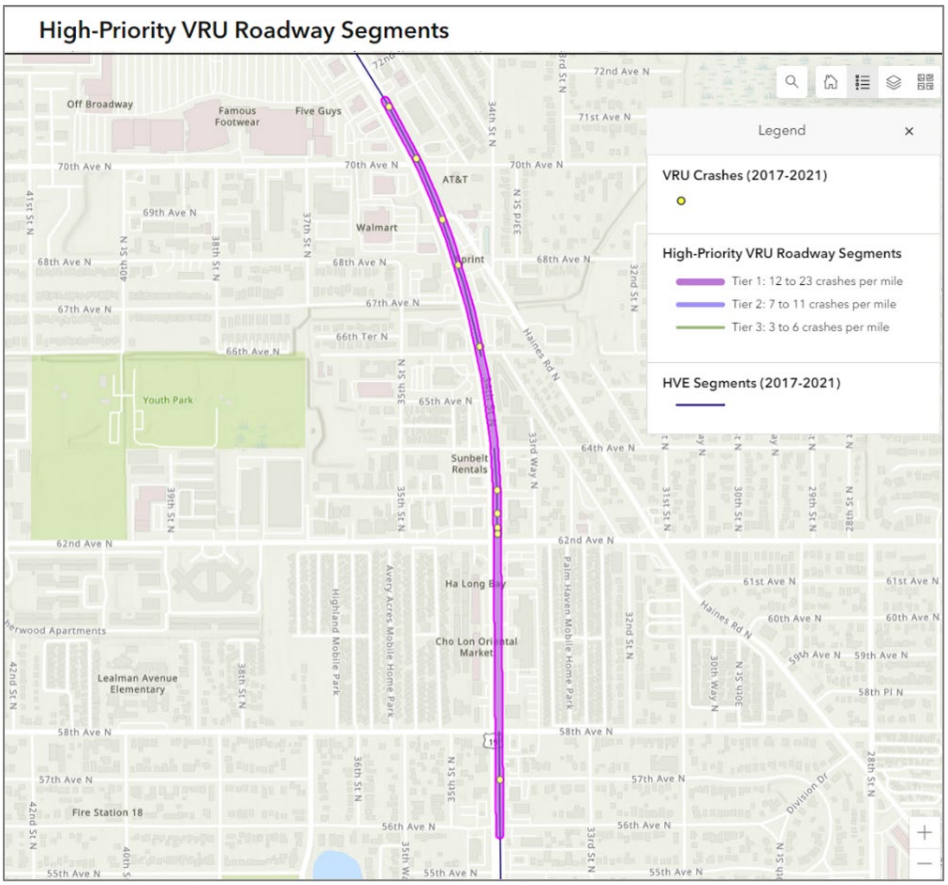
ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
449710-1	Pedestrian Safety Improvement	City of Miami Beach - South Beach Pedestrian Priority Zone	0.997	2025	2025

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

ALTON ROAD	
What is the community saying?	
A lot of construction/redevelopment; a lot of money and drinking.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
Density; costly to park; and transit	
What strategies should be prioritized?	
Roadways	***Road Users***
Excessive speed; poor lighting.	Speeding coming off bridge
User Behavior	***Data***
Drinking.	

7. US-19 (II)

US-19 is a principal arterial roadway in Pinellas County (Central Planning Region, District 7) with a posted speed limit of 55 mph and a C3C context classification. The priority segment between 56th Avenue N and 72nd Avenue N had 17 VRU fatal and serious injury crashes between 2017 and 2021 and five of those crashes occurred at night while four occurred on the weekday mornings, three occurred on the weekday midday, three occurred on the weekday evenings, and two crashes on the weekends. The community surrounding this segment is predominantly White (63.3%), Black (31.1%) and non-Hispanic or Latino (98.7%) with an average age of 45.7 years old and a median income of $36,141. Men make up 62% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Parts of the segment were identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
US-19N	66th Ave N	Park Blvd N	Pinellas Park Police Department	06:00 to 20:00	Friday, Saturday, Monday, Wednesday, Thursday
US-19N	N of 62nd Ave	64th Ave N	Pinellas Park Police Department	06:00 to 22:00	Friday, Saturday, Sunday, Monday, Tuesday, Wednesday, Thursday

FDOT WORK PROGRAM PROJECTS

FDOT has programmed five projects in the FY 2024-2028 Annual Work Program on this segment. Out of those five, the project below is related to VRU safety.

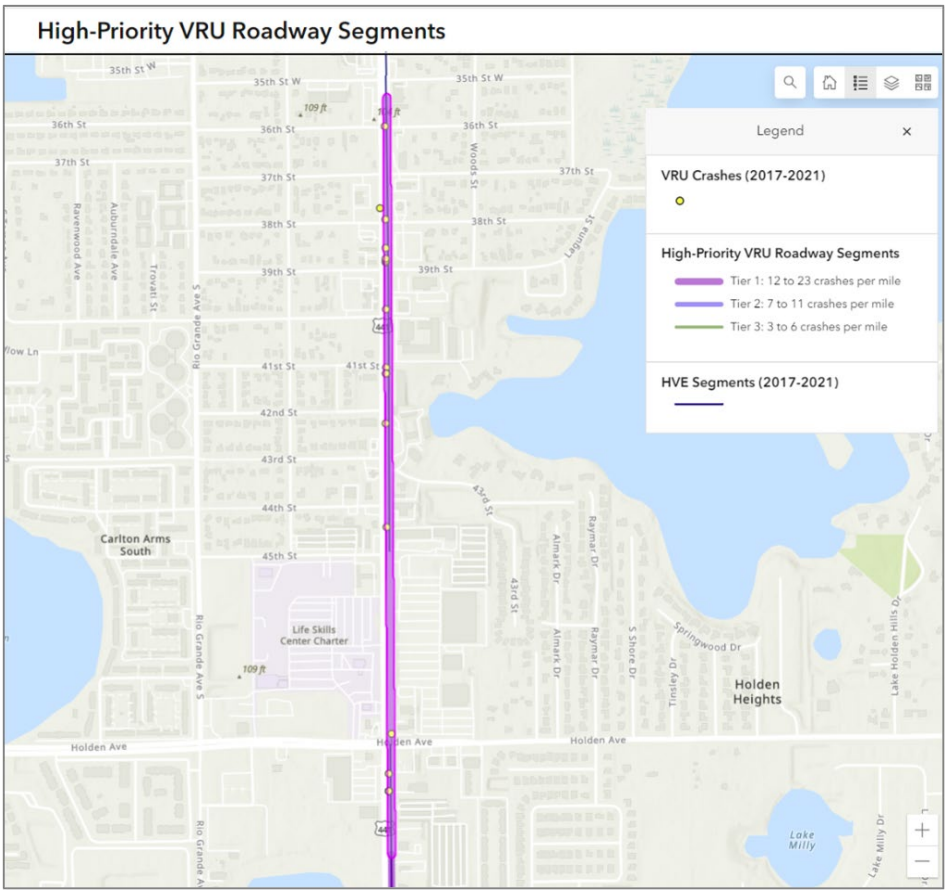
ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
437625-1	Resurfacing	US 19/SR55/34TH ST N from S of 44th Ave N To Park Blvd	1.973	2024	2024

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

US-19 (II)	
What is the community saying?	
People want access to destinations; high speed through traffic; too much traffic; good lighting, but still issues with accidents at night.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
Heavily commercial and retail area, also low-income; mobile home parks line corridor.	
What strategies should be prioritized?	
Roadways	***Road Users***
Increasing ROW, providing bike lanes; add midblock crossing.	Change signal timing to favor pedestrians.
User Behavior	***Data***
May potentially be future BRT corridor, bringing 6 lanes to 4 lanes channelizing pedestrians to cross at crosswalk.	Look into data to determine best location for midblock.

8. ORANGE BLOSSOM TRAIL (I)

Orange Blossom Trail is a principal arterial roadway in Orange County (Central Planning Region, District 5) with a posted speed limit of 40 mph and a C3C context classification. The priority segment between Holden Avenue and 35th Street W had 17 VRU fatal and serious injury crashes between 2017 and 2021 where the majority (59%) of those crashes occurred at night. The community surrounding this segment is predominantly White (73.1%) and non-Hispanic or Latino (82.6%) with an average age of 49.4 years old and a median income of $70,191. Women make up 65% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
Orange Blossom Trail	45th Street	34th Street	Orange County Sheriff's Office	01:00 to 24:00	Friday, Saturday, Sunday, Monday, Tuesday, Wednesday, Thursday

FDOT WORK PROGRAM PROJECTS

FDOT has programmed seven projects in the FY 2024-2028 Annual Work Program on this segment. Out of those seven, the project below is related to VRU safety.

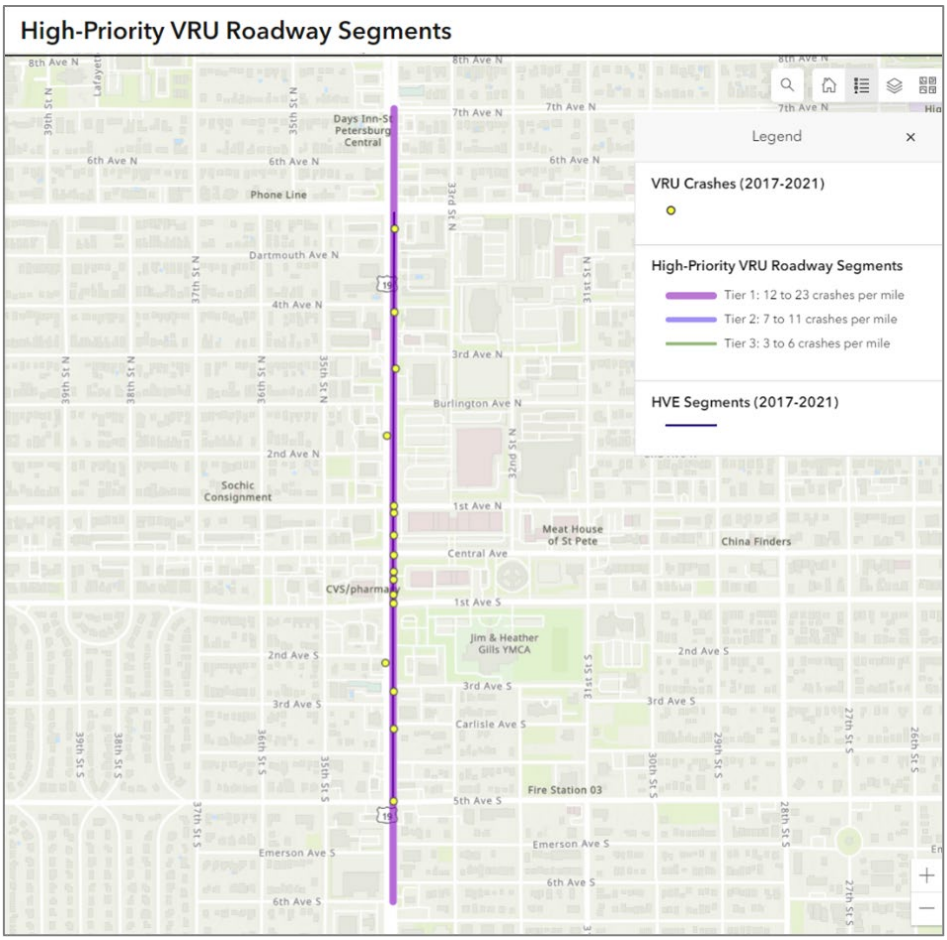
ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
447395-1	Pedestrian Safety Improvement	SR 500/Orange Blossom Trail from S of Holden Ave to 34th St	1.1	2024	2024

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

ORANGE BLOSSOM TRAIL (I)	
What is the community saying?	
Context Classification, the built environment, socioeconomic status, demographics and speed limits greater than 40 mph are correlated for a variety of reasons; there may be push back from businesses if access management strategies focused on reducing vulnerable road user and vehicle conflicts are prioritized; construction project on this segment is underway; public outreach completed for this phase of the segment.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
Neighborhood residents are biking and walking to access commercial areas; residents walk from home to this corridor.	
What strategies should be prioritized?	
Roadways	***Road Users***
User Behavior	***Data***
	Before and after data may be useful once construction project is completed.

9. 34TH ST NORTH

34th Street North is a principal arterial roadway in Pinellas County (Central Planning Region, District 7) with a posted speed limit of 55 mph and a C3C context classification. The priority segment between 6th Avenue S and 7th Avenue N had 16 VRU fatal and serious injury crashes between 2017 and 2021 and nearly half of those crashes occurred at night while an additional five occurred on the weekday evenings. The community surrounding this segment is predominantly White (57.2%), Black (39.4%) and non-Hispanic or Latino (98.6%) with an average age of 40.3 years old and a median income of $67,585. Men make up 56% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
34th Street	5th Ave S	US-19/ 5th Ave N	St. Petersburg Police Department	12:00 to 24:00	Friday, Saturday, Monday, Tuesday, Wednesday, Thursday

FDOT WORK PROGRAM PROJECTS

FDOT has programmed four projects in the FY 2024-2028 Annual Work Program on this segment. Out of those four, the project below is related to VRU safety.

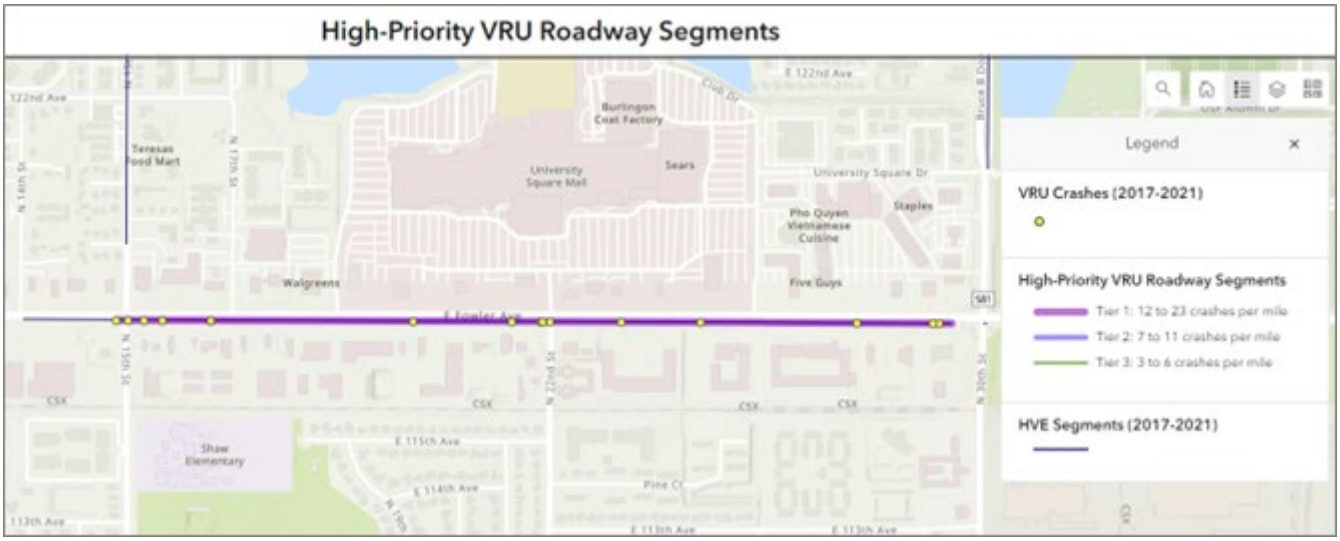
ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
440246-1	Resurfacing	US 19/SR55/34th St from SR 682/54th Ave S to 22nd Ave N	4.994	2024	2024

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

34TH ST NORTH	
What is the community saying?	
High number of recreational/commuter bicyclists; many signaled crossings.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
TOD located in segment; high density, large number of bicycles and pedestrians; commercial retail corridor in conflict with desire for bicycle and pedestrian facilities.	
What strategies should be prioritized?	
Roadways	***Road Users***
Addressing conflicts at major transit corridors; BRT in area has improved safety making it feel more like local street.	Improvements to I-275 may lead drivers to use the interstate instead of US-19.
User Behavior	***Data***
Educate recreational bikers and drivers on safety.	Study area before and after BRT.

10. SR-582/EAST FOWLER AVENUE

SR-582/East Fowler Avenue is a principal arterial roadway in Hillsborough County (Central Planning Region, District 7) with a posted speed limit of 50 mph and a C3C context classification. The priority segment between N 15th Street and Bruce B Downs Boulevard had 16 VRU fatal and serious injury crashes between 2017 and 2021 where the majority (44%) of those crashes occurred at night, while an additional three occurred in weekend. The community surrounding this segment is 43% Black, 37% White, and 40.2% Hispanic or Latino with an average age of 30.5 years old and a median income of $31,257. Men and Women evenly make up 50% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
Fowler Ave	N 14th Street	Bruce B Downs Blvd	Tampa Police Department	06:00 to 24:00	Friday, Saturday, Sunday, Monday, Tuesday, Wednesday, Thursday

FDOT WORK PROGRAM PROJECTS

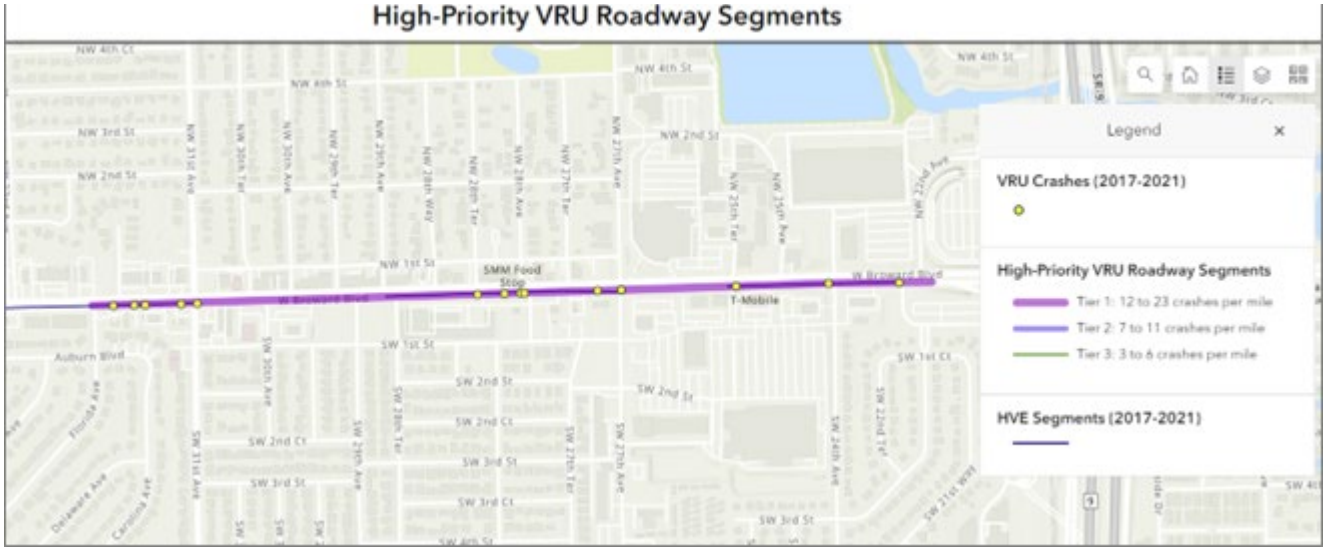
FDOT has programmed five projects in the FY 2024-2028 Annual Work Program on this segment, but none of these are related to VRU safety.

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

SR-582/EAST FOWLER AVENUE	
What is the community saying?	
Lighting has been recently updated, but there are still a high number of fatal and serious injuries; there are too many lanes and people speed and race on this road; high speeds next to a transit-dependent community (university/multifamily housing); bus riders need to cross street to reach bus stop, putting them at risk.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
Next to USF, students walk/bike to school; top 3 job cluster in Hillsborough County with large groups going to/from work; active at night with student night life, hospital, hotels, and apartments.	
What strategies should be prioritized?	
Roadways	***Road Users***
Safe speeds, should not go higher than 35 mph; need change in design to support bike/ped.	Reduce number of through lanes.
User Behavior	***Data***
Add design elements that enforce speed.	Research how to increase safety around transit stops.

11. BROWARD BOULEVARD (II)

Broward Boulevard is a principal arterial roadway in Broward County (Southeast Planning Region, District 4) with a posted speed limit of 40 mph. The priority segment between Florida Avenue and I-95 had 15 VRU fatal and serious injury crashes between 2017 and 2021 and 80% of those crashes occurred at night. The community surrounding this segment is predominantly Black (82.4%) and non-Hispanic or Latino (84.7%) with an average age of 31.6 years old and a median income of $54,620. Women make up 64% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Parts of the segment were identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
Broward Blvd	NW 25th Terrace	SW 1st Street	Fort Lauderdale Police Department	18:00 to 23:00	Sunday, Monday, Tuesday
Broward Blvd	NW 29th Ave	NW 27th Ave	Fort Lauderdale Police Department	18:00 to 24:00	Friday, Sunday, Monday, Wednesday, Thursday.
Broward Blvd	W of NW 36th Ave	NW 31st Ave	Fort Lauderdale Police Department	18:00 to 05:00	Friday, Saturday, Sunday, Tuesday, Wednesday.

FDOT WORK PROGRAM PROJECTS

FDOT has programmed seven projects in the FY 2024-2028 Annual Work Program on this segment. Out of those seven, the projects below are related to VRU safety.

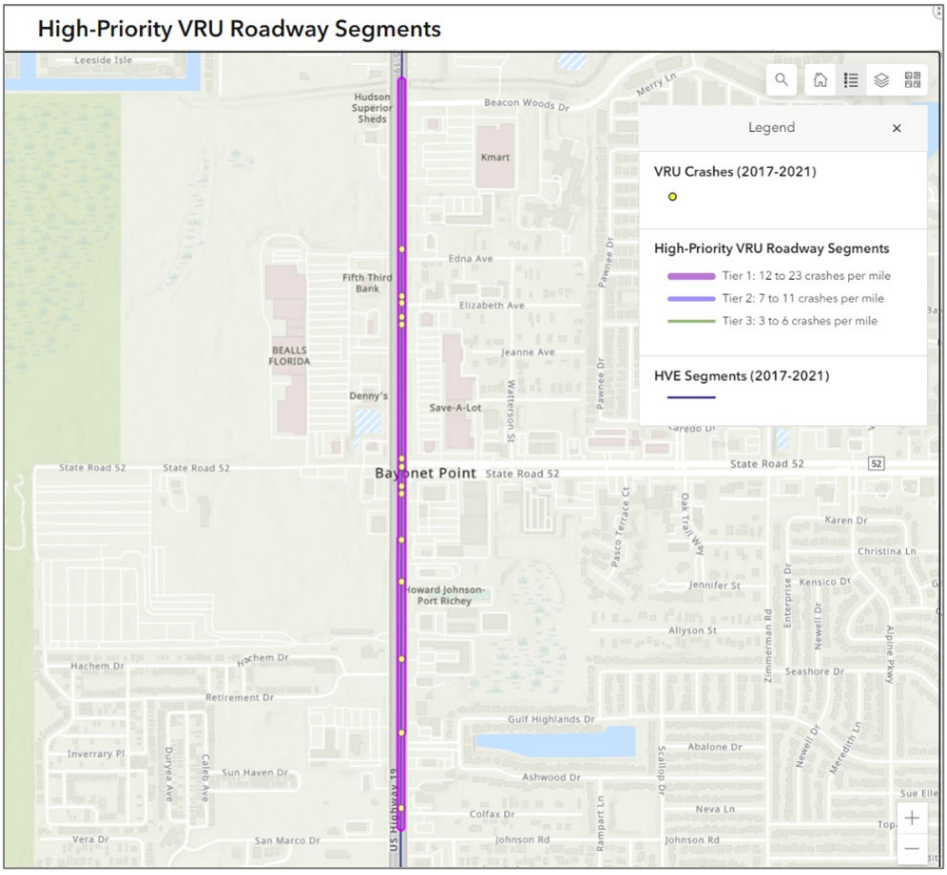
ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
441799-1	Lighting	SR-842/Broward Boulevard From SR-7/ Us-441 to West of W 27th Avenue	1.483	2024	2024
446999-1	Lighting	Intersection Lighting Retrofit Improvement	3.63	2024	2024

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

BROWARD BOULEVARD (II)	
What is the community saying?	
Lots of midblock crossings; light rail is planned to go on this corridor, there's hesitation to invest on roadway right now.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
Mix of businesses; transit dependent population; homeless population feeding center.	
What strategies should be prioritized?	
Roadways	***Road Users***
Lack of lighting; six lanes; right turn lanes; lack of crosswalks at signalized intersections; sidewalk back of curb; speed was mentioned as an issue.	Crossing midblock (with no refuge)
User Behavior	***Data***
Lots of midblock crossings	Light rail planned for corridor

12. US-19 (III)

US-19 is a principal arterial roadway in Pasco County (Central Planning Region, District 7) with a posted speed limit of 45 mph and a C3C context classification. The priority segment between Johnson Road and Beacon Woods Drive had 15 VRU fatal and serious injury crashes between 2017 and 2021 where the majority (47%) of those crashes occurred at night, while an additional six crashes occurred on weekday midday and weekday evening. The community surrounding this segment is predominantly White (94.6%) and non-Hispanic or Latino (98%) with an average age of 66.6 years old and a median income of $42,408. Men make up 58% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Parts of the segment were identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
US-19	SR 52	Hudson Ave	Pasco County Sheriff's Office	01:00 to 24:00	Friday, Saturday, Sunday, Monday, Tuesday, Wednesday, Thursday.
US-19	Gordon Drive	SR 52	Pasco County Sheriff's Office	18:00 to 24:00	Friday, Saturday, Sunday, Monday, Tuesday, Wednesday, Thursday.

FDOT WORK PROGRAM PROJECTS

FDOT has programmed three projects in the FY 2024-2028 Annual Work Program on this segment. Out of those three, the project below is related to VRU safety.

ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
447522-1	Traffic Signals	Us 19/SR 55 from Jasmine Blvd to Palatine Dr	5.028	2024	2024

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

US-19 (III)

What is the community saying?

Dissatisfaction with public transit because a fuller bus schedule is needed; disconnected land use; living and shopping are at different sides of US 19; impaired issues with pedestrians and drivers; lack of speed enforcement and pedestrian infrastructure; too many lanes to cross the street.

What are the major drivers of pedestrian and bicycle activity on this segment?

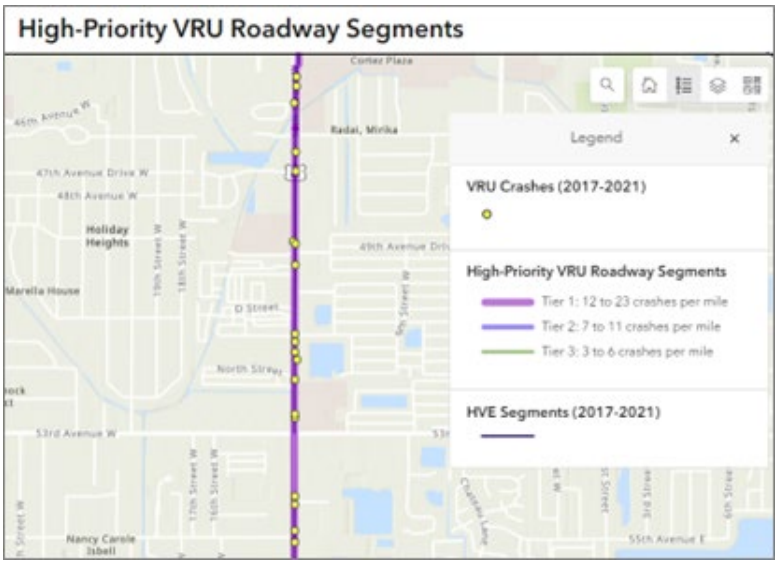
People crossing road to get to and from living and shopping/work; large homeless population crossing; many older pedestrians who have difficulty crossing.

What strategies should be prioritized?

Roadways	*Road Users*
Shortening crossing distance; stop allowing right on red; improving post-crash care, first responders slow in this area.	Messaging in advance in high crash areas to notify road user of traffic conditions.
User Behavior	***Data***
Design to reduce speed limit.	Studying speed in area; conducting pedestrian counts.

13. 14TH ST WEST (II)

14th Street West is a principal arterial roadway in Manatee County (Southwest Planning Region, District 1) with a posted speed limit of 35 mph. The priority segment between Orlando Avenue and 55th Avenue West had 15 VRU fatal and serious injury crashes between 2017 and 2021 with the majority (53%) of those crashes occurring at night. The community surrounding this segment is predominantly White (53.3%) and non-Hispanic or Latino (86.3%) with an average age of 35.2 years old and a median income of $46,319. Women make up 51% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
14th Street W	53rd Ave W	Cortez Road W	Manatee County Sheriff's Office	06:00 to 03:00	Friday, Saturday, Monday, Tuesday, Wednesday, Thursday.

FDOT WORK PROGRAM PROJECTS

FDOT has programmed seven projects in the FY 2024-2028 Annual Work Program on this segment. Out of those seven, the projects below are related to VRU safety.

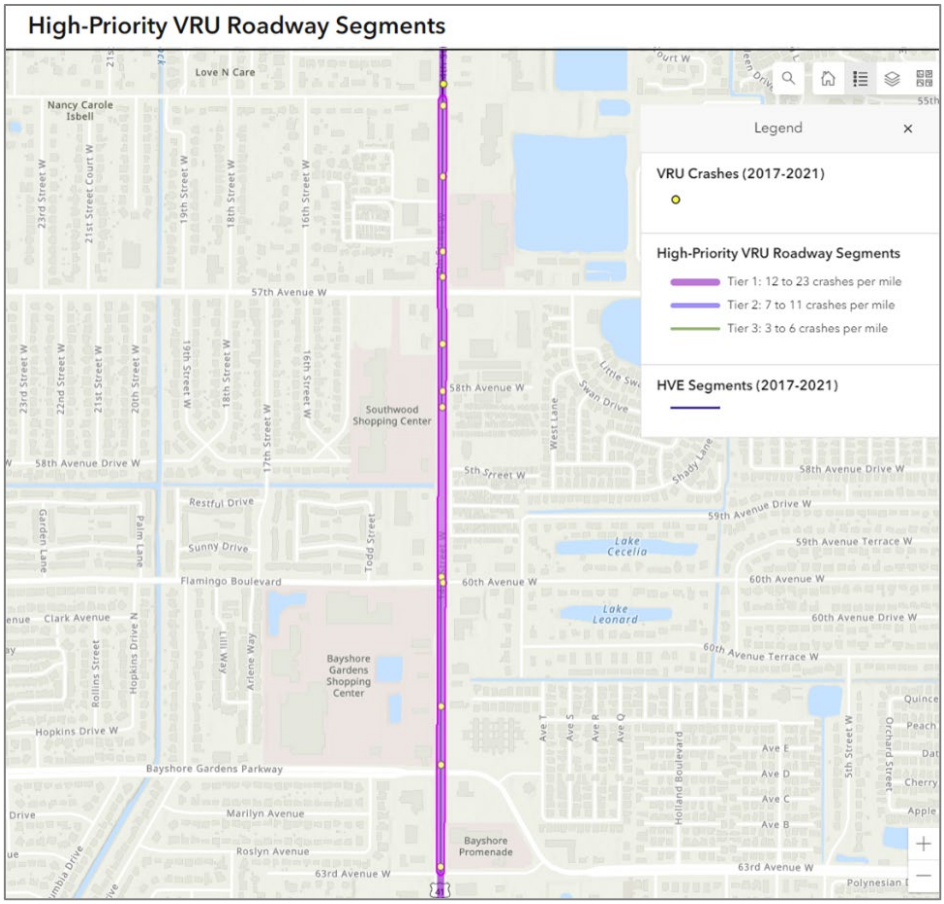
ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
433592-1	Sidewalk	SR 45 (US 41) From 69th Ave (Bay Drive) to Cortez Road (Preliminary Engineering, Construction)	2.913	2024	2024
433592-4	Sidewalk	SR 45 (US 41) From 69th Ave (Bay Drive) to Cortez Road (Preliminary Engineering, ROW, Railroad and Utilities, Environmental)	2.913	2024	2024
449646-1	Safety Project	US 41 From 53rd Ave to Cortez Rd	1.001	2024	2028
448390-1	Safety Project	SR 45 (US 41) From 63rd Ave to 53rd Ave	1.27	2024	2025

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

14TH ST WEST (II)	
What is the community saying?	
Speed increases as traffic turns by the river; there are not enough lights on the corridor at night; commercial and industrial are the predominant land uses along this segment; land use and lack of lights make for a very dark road at night.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
Roadway carries regional traffic volumes and is located within a mile of the airport; airport generates traffic as well.	
What strategies should be prioritized?	
Roadways	***Road Users***
11 and 12 ft lanes by river; no radar control by airport; low lighting and commercial area; the busiest transit line runs along US 4;. several people have been killed by buses.	
User Behavior	***Data***
Three colleges on US41 resulting in many people crossing dangerous roadways at midblock.	Vehicular and VRU crashes are high in this area; FDOT conducted a Safety Study for US41 in the past

14. 14TH ST WEST (III)

14th Street West is a principal arterial roadway in Manatee County (Southwest Planning Region, District 1) with a posted speed limit of 35 mph. The priority segment between 55th Avenue West and 63rd Avenue West had 13 VRU fatal and serious injury crashes between 2017 and 2021 where five of those crashes occurred weekday midday, four crashes occurred at night, two crashes on the weekend, one crash on the weekday morning, and one crash on the weekday evening. The community surrounding this segment is predominantly White (93.2%) and non-Hispanic or Latino (67.5%) with an average age of 62.1 years old and a median income of $31,081. Men make up 54% of the community. Residents of a nearby mobile home community tend to cross this roadway.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Parts of the segment were identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
14th St W	Luxor Mobile Home Park	54th Ave W	Manatee County Sheriff's Office	06:00 to 02:00	Saturday, Sunday, Monday, Wednesday.
14th St W	63rd Ave W	60th Ave W	Manatee County Sheriff's Office	12:00 to 23:00	Friday, Sunday, Tuesday.

FDOT WORK PROGRAM PROJECTS

FDOT has programmed eight projects in the FY 2024-2028 Annual Work Program on this segment. Out of those eight, the projects below are related to VRU safety.

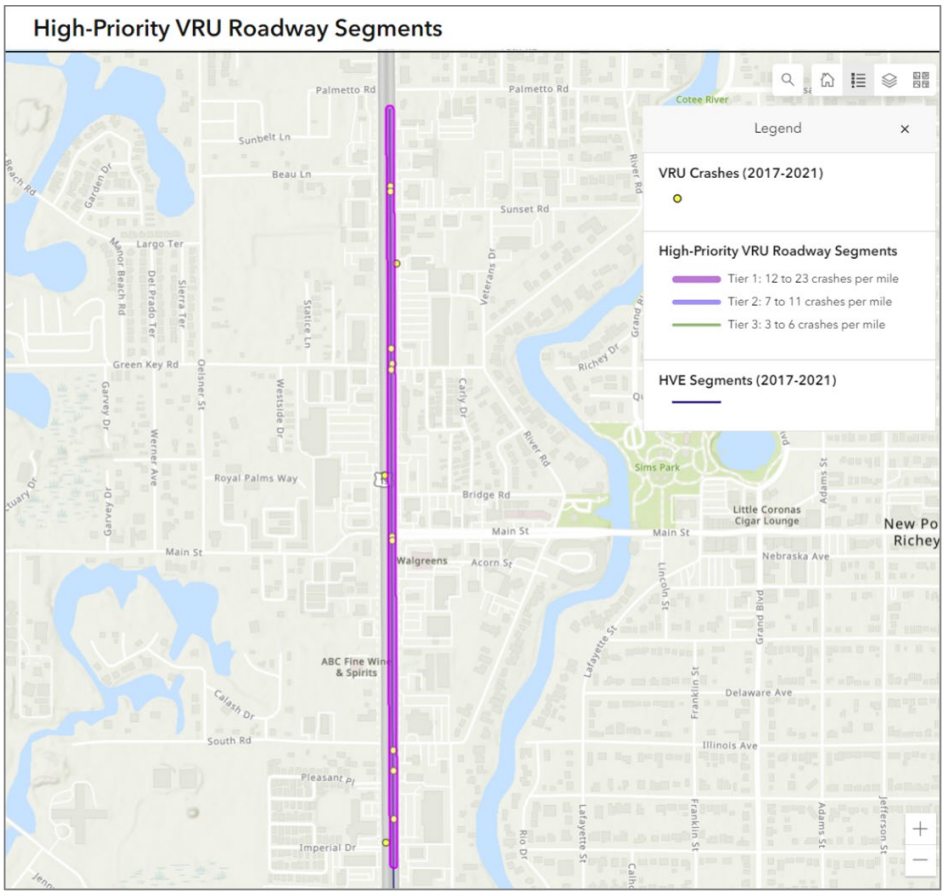
ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
449653-1	Safety Project	US 41 From Magellan Dr to 63rd Ave	0.871	2024	2027
433592-1	Sidewalk	SR 45 (US 41) From 69th Ave (Bay Drive) to Cortez Road (Preliminary Engineering, Construction)	2.913	2024	2024
433592-4	Sidewalk	SR 45 (US 41) From 69th Ave (Bay Drive) to Cortez Road (Preliminary Engineering, ROW, Railroad and Utilities, Environmental)	2.913	2024	2024
448390-1	Safety Project	SR 45 (US 41) From 63rd Ave To 53rd Ave	1.27	2024	2025

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

14TH ST WEST (III)	
What is the community saying?	
Commercial and industrial are the predominant land uses along this segment.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
The roadway carries regional traffic volumes and is located a few miles from the airport; the airport generates traffic.	
What strategies should be prioritized?	
Roadways	***Road Users***
No radar control by airport.	Covered crosswalks; more pedestrians.
User Behavior	***Data***
There are three colleges on US41 resulting in many people crossing dangerous roadways at midblock.	Add zero-car household layer.

15. US-19 (IV)

US-19 is a principal arterial roadway in Pasco County (Central Planning Region, District 7) with a posted speed limit of 45 mph and a C3C context classification. The priority segment between Palmetto Road and Imperial Drive had 13 VRU fatal and serious injury crashes between 2017 and 2021 where 85% of those crashes occurred at night. The community surrounding this segment is predominantly White (83.1%) and non-Hispanic or Latino (81.9%) with an average age of 45.2 years old and a median income of $36,838. Men make up 56% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
US-19	Flormar Terrace	Palmetto Road	New Port Richey Police Department	01:00 to 24:00	Friday, Saturday, Sunday, Monday, Tuesday, Wednesday, Thursday.

FDOT WORK PROGRAM PROJECTS

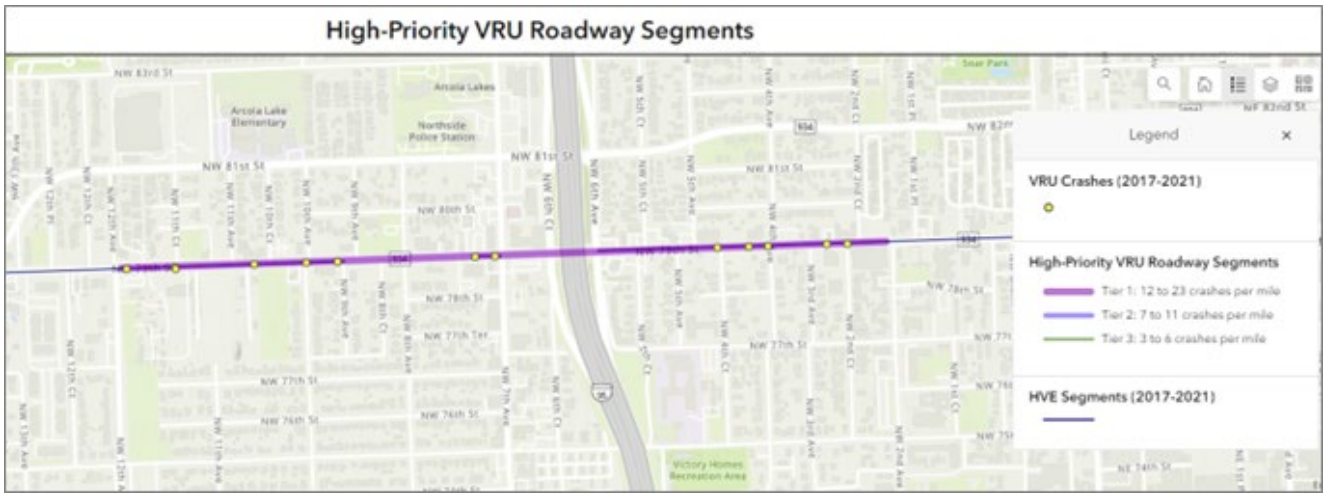
FDOT has programmed two projects in the FY 2024-2028 Annual Work Program on this segment, but none of these are related to VRU safety.

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

US-19 (IV)	
What is the community saying?	
Large homeless population crossing the street; people need to cross the street to get to transit; high level of golf cart drivers, not enforced.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
Nightlife leads to higher level of impaired pedestrians and drivers; near downtown area, more pedestrians; lower average age than the rest of US-19; disadvantaged groups that depend on transit.	
What strategies should be prioritized?	
Roadways	***Road Users***
Curb bumps have been added to roadway; reducing speed, road diet; no refuge islands in median.	New Port Richey is doing more to enforce safety.
User Behavior	***Data***
Educating drivers and pedestrians; providing lights to pedestrian and cyclists; increasing enforcement, ticketing in the school zone.	Research who road users are and how to meet their needs.

16. NW 79TH STREET

NW 79th Street is a principal arterial roadway in Miami-Dade County (Southeast Planning Region, District 6) with a posted speed limit of 35 mph and a C4 context classification. The priority segment between NW 12th Avenue and NW 2nd Avenue had 13 VRU fatal and serious injury crashes between 2017 and 2021 and nearly two thirds of those crashes occurred at night. The community surrounding this segment is predominantly Black (80.9%) and non-Hispanic or Latino (79.8%) with an average age of 29.4 years old and a median income of $22,287. Men make up 58% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Parts of the segment were identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
NW 79th St	NW 17th Ave	NW 9th Ave	Miami-Dade Police Department	01:00 to 24:00	Friday, Saturday, Sunday, Tuesday, Wednesday, Thursday.
NW 79th St	Miami City Limits	NW 7th Ave	Miami Police Department	07:00 to 24:00	Sunday, Tuesday, Wednesday.
NW 79th St	NW 6th Ave	N Miami Ave	Miami Police Department	11:00 to 03:00	Friday, Sunday, Monday, Thursday.

FDOT WORK PROGRAM PROJECTS

FDOT has programmed four projects in the FY 2024-2028 Annual Work Program on this segment. Out of those four, the projects below are related to VRU safety.

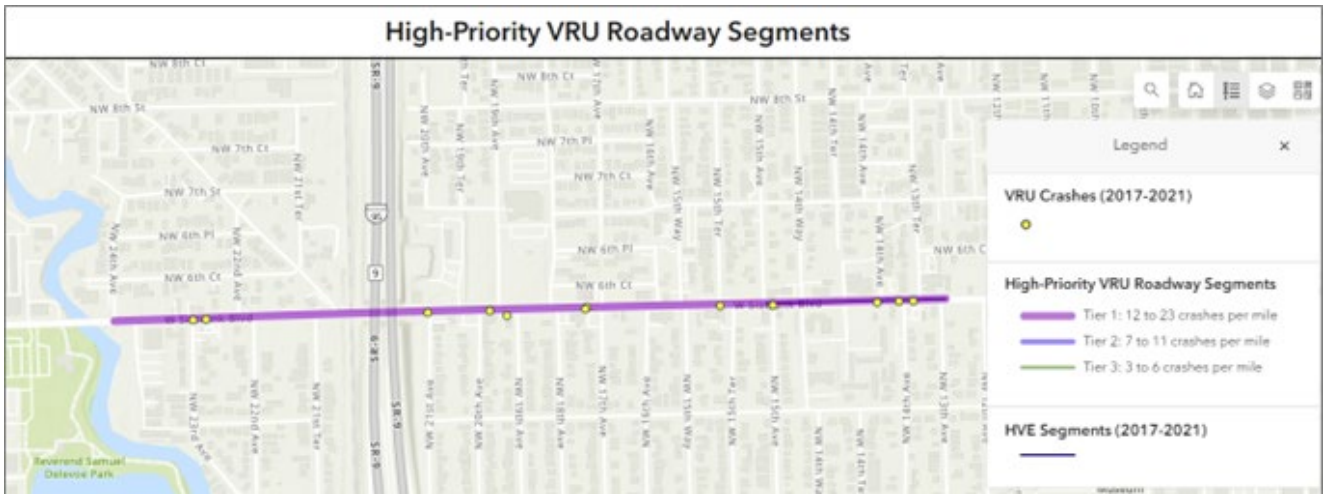
ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
446947-3	ITS Freeway Management	Wrong Way Driving Initiative at Various Ramp Locations - Phase 3	0.04	2025	2025
410646-7	Safety Project	SR 934/NW 79 Street From NW 27 Avenue To NW 1 Place	2.651	2024	2026

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

NW 79TH STREET	
What is the community saying?	
Conflict between FDOT and MPO on bike lane design; future Metrorail planned for area.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
Transit; business; no/little pedestrian refuge for crossings	
What strategies should be prioritized?	
Roadways	***Road Users***
Planned pedestrian improvements (multiple projects); need pedestrian refuse area.	Speeding
User Behavior	***Data***

17. NW 6TH STREET

NW 6th Street is a minor collector roadway in Broward County (Southeast Planning Region, District 4) with a posted speed limit of 30 mph and a C4 context classification. The priority segment between NW 13th Avenue and NW 24th Avenue had 13 VRU fatal and serious injury crashes between 2017 and 2021 with five crashes occurring at night, four on weekday evenings, and three on the weekend. The community surrounding this segment is predominantly Black (91.1%) and non-Hispanic or Latino (96.6%) with an average age of 30.7 years old and a median income of $34,286. Men make up 57% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
Sistrunk Blvd (NW 6th Street)	NW 15th Ave	NW 9th Ave	Fort Lauderdale Police Department	16:00 to 23:00	Sunday, Monday, Wednesday, Thursday.

FDOT WORK PROGRAM PROJECTS

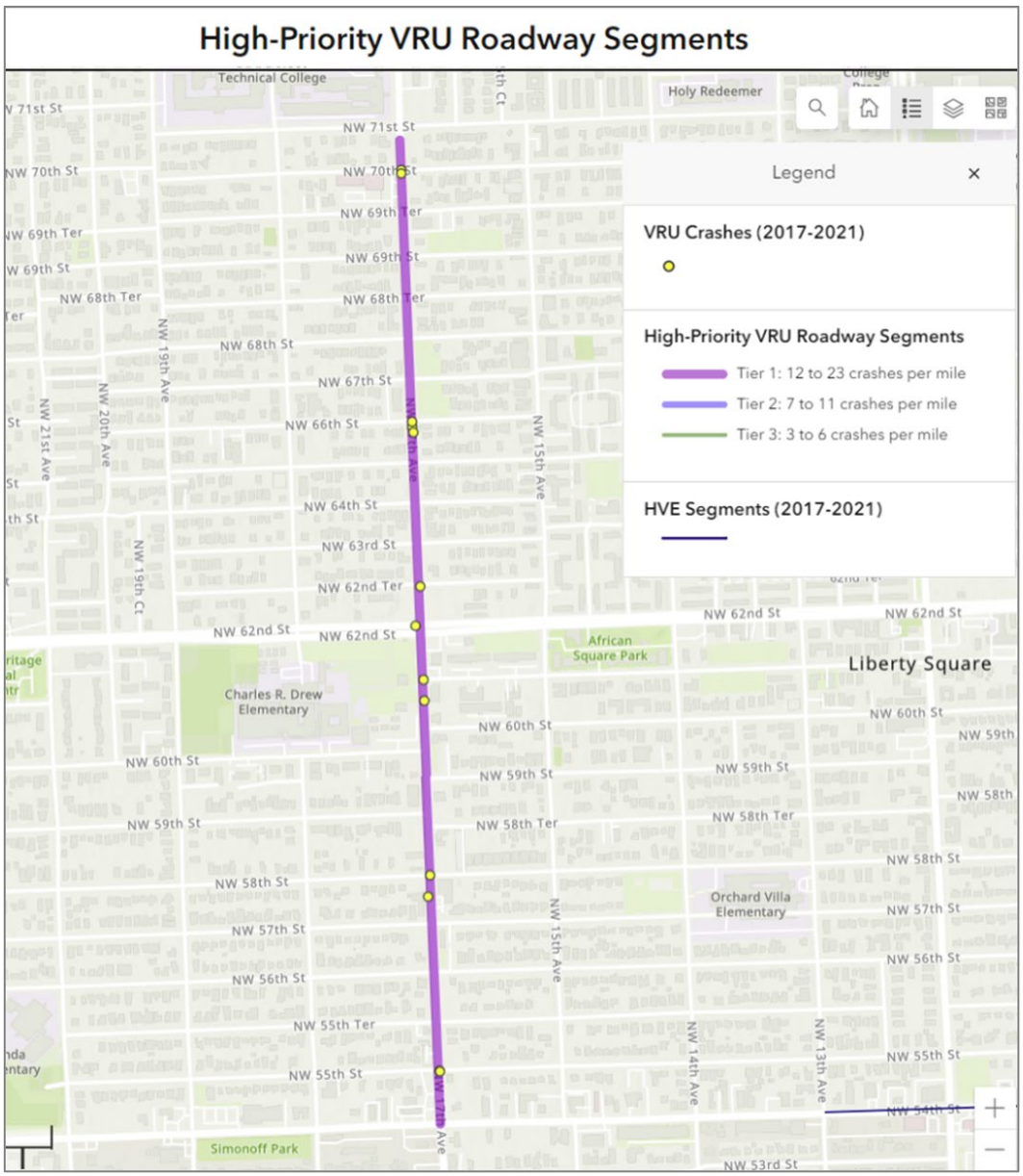
There are no project programmed in the FY 2024-2028 Annual Work Program for NW 6th Street.

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

NW 6TH STREET	
What is the community saying?	
Historic African American community, former business district; street widened and then narrowed; street is used as a bypass and cut-through.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
A lot of pedestrian activity; neighborhood, local businesses; bicyclists are hopping off and on sidewalk and road throughout.	
What strategies should be prioritized?	
Roadways	***Road Users***
Lack of crosswalks at signals; lack of traffic signals; doesn't need 4 lanes (Road Diet).	Driving fast.
User Behavior	***Data***
Vehicle speed; cyclists leave sidewalk due to pedestrian conflicts.	Need to know specifics on types of crashes.

18. NW 17TH AVENUE

NW 17th Avenue is a minor arterial roadway in Miami-Dade County (Southeast Planning Region, District 6) with a posted speed limit of 35 mph. The priority segment between NW 71st Street and NW 54th Street had 13 VRU fatal and serious injury crashes between 2017 and 2021 with seven crashes occurring at night, four on weekday evenings, and two on the weekend. The community surrounding this segment is predominantly Black (81.7%) and non-Hispanic or Latino (90.7%) with an average age of 31.7 years old and a median income of $24,500. Men make up 61% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

The NW 17th Avenue segment does not have any HVE program (2017-2021) identified, targeting pedestrian and bicycle safety.

FDOT WORK PROGRAM PROJECTS

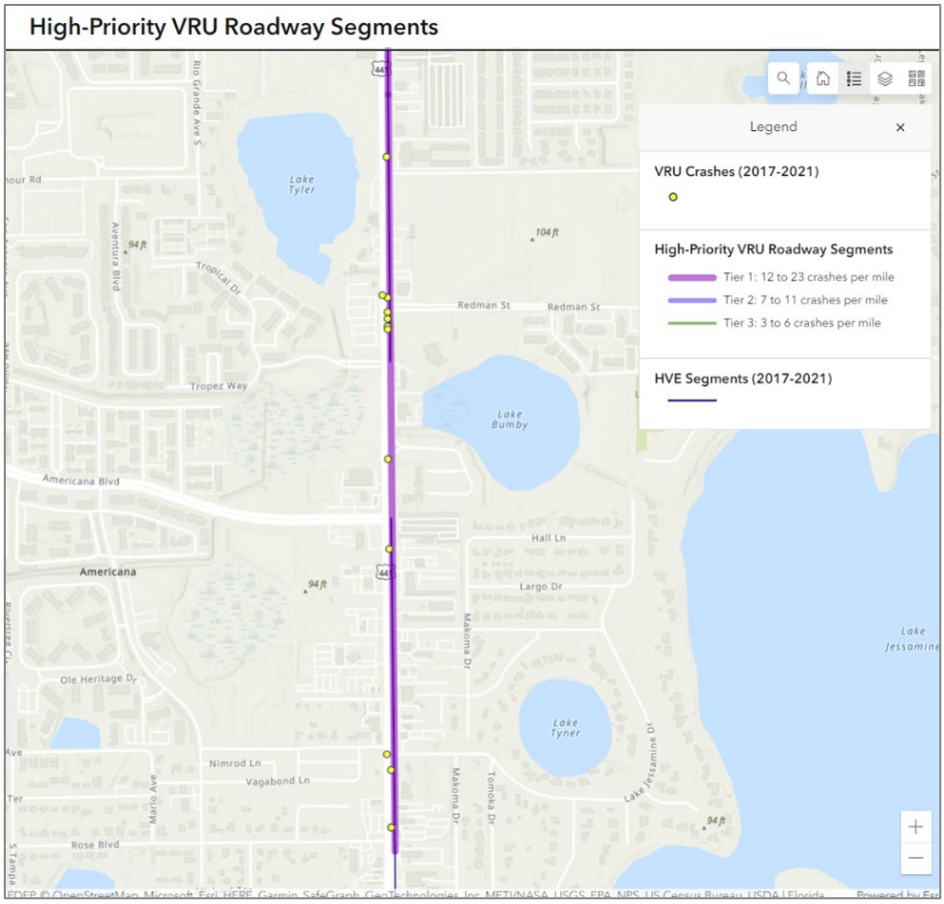
There are no projects programmed in the FY 2024-2028 Annual Work Program for NW 17th Avenue.

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

NW 17TH AVENUE	
What is the community saying?	
Alternative to I-95 where there are incidents; lower income area.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
Historic African American community; many schools	
What strategies should be prioritized?	
Roadways	***Road Users***
Lack of medians and street lighting; should increase sidewalk.	
User Behavior	***Data***
Residents not using bikes properly.	Challenges in using federal funds for education.

19. ORANGE BLOSSOM TRAIL (II)

Orange Blossom Trial is a principal arterial roadway in Orange County (Central Planning Region, District 5) with a posted speed limit of 40 mph and a C3C context classification. The priority segment between Holden Ave and Rose Boulevard had 13 VRU fatal and serious injury crashes between 2017 and 2021 where the majority (46%) of the crashes occurred at night. The community surrounding this segment is half White (51.2%) and Hispanic or Latino (30.7%) with an average age of 39.8 years old and a median income of $50,781. Women make up 54% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Parts of the segment were identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
Orange Blossom Trail	Tropical Drive	Holden Ave	Orange County Sheriff's Office	01:00 to 21:00	Friday, Saturday, Sunday, Monday, Tuesday, Wednesday, Thursday.
Orange Blossom Trail	Oak Ridge Road	Americana Blvd	Orange County Sheriff's Office	20:00 to 02:00	Saturday, Sunday, Monday, Tuesday, Wednesday, Thursday.

FDOT WORK PROGRAM PROJECTS

FDOT has programmed four projects in the FY 2024-2028 Annual Work Program on this segment. Out of those four, the project below is related to VRU safety.

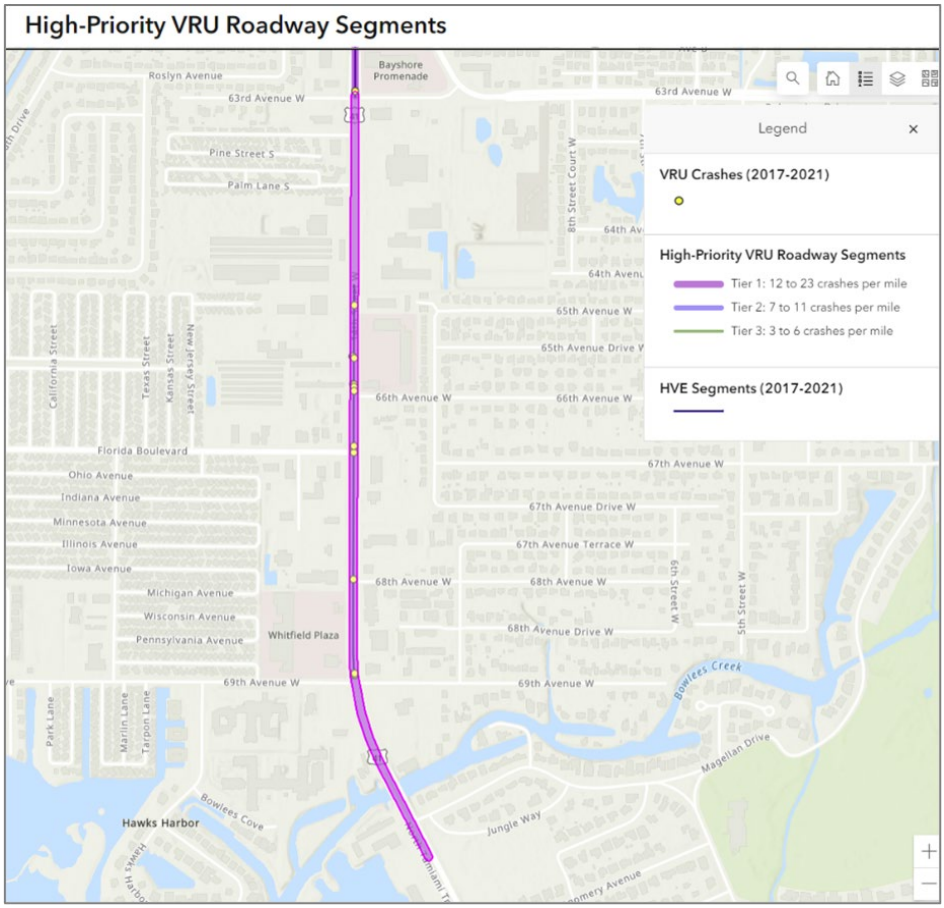
ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
442390-2	Lighting	Orange County Pedestrian Lighting Bundle B	12.954	2024	2024

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

ORANGE BLOSSUM TRAIL (II)	
What is the community saying?	
Low attendance at public meetings.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
Commercial development; fewer adjacent neighborhoods; project planned but not underway; southern section is more sprawling.	
What strategies should be prioritized?	
Roadways	***Road Users***
Reduce operating speeds; add flashing beacons; fencing	
User Behavior	***Data***

20. 14TH ST W/TAMIAMI TRAIL

The 14th Street W/Tamiami Trail is a principal arterial roadway in Manatee County (Southwest Planning Region, District 1) with a posted speed limit of 35 mph. The priority segment between 63rd Avenue West and Montgomery Avenue had 12 VRU fatal and serious injury crashes between 2017 and 2021 where seven of those crashes occurred at night, three crashes occurred at night, three crashes occurred on the weekday morning, and two crashes on the weekend. The community surrounding this segment is predominantly White (75.1%) and non-Hispanic or Latino (80.1%) with an average age of 37.7 years old and a median income of $67,883. Men make up 60% of the community.



This segment is the top priority corridor in the Target Zero Action Plan. FDOT District 1 also conducted a corridor study for this segment. FDOT and the Sarasota/Manatee MPO have conducted multiple studies in the area.

HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
14th St W	69th Ave W	900-ft N of 66th Ave W	Manatee County Sheriff's Office	05:00 to 23:00	Friday, Saturday, Sunday, Monday, Tuesday, Wednesday.

FDOT WORK PROGRAM PROJECTS

FDOT has programmed seven projects in the FY 2024-2028 Annual Work Program on this segment. Out of those seven, the projects below are related to VRU safety.

ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
449653-1	Safety Project	Us 41 From Magellan Dr to 63rd Ave	0.871	2024	2027
444612-1	Resurfacing	SR 45 (US 41) Edwards Drive To Magellan Drive	2.095	2024	2026
433592-1	Sidewalk	SR 45 (US 41) From 69th Ave (Bay Drive) to Cortez Road (Preliminary Engineering, Construction)	2.913	2024	2024
433592-4	Sidewalk	SR 45 (US 41) From 69th Ave (Bay Drive) to Cortez Road (Preliminary Engineering, ROW, Railroad and Utilities, Environmental)	2.913	2024	2024

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

14TH ST W/TAMIAMI TRAIL

What is the community saying?

There are several neighborhoods, mobile home park(s), and families on the east side of the roadway; portion of the corridor contains a two mile segment with only one signalized intersection; lack of signalized intersections contributes to speeding; a state college/university in the area has wanted a light for some time. Vulnerable Road User oriented enhancements could be more effective than signalization alone.

What are the major drivers of pedestrian and bicycle activity on this segment?

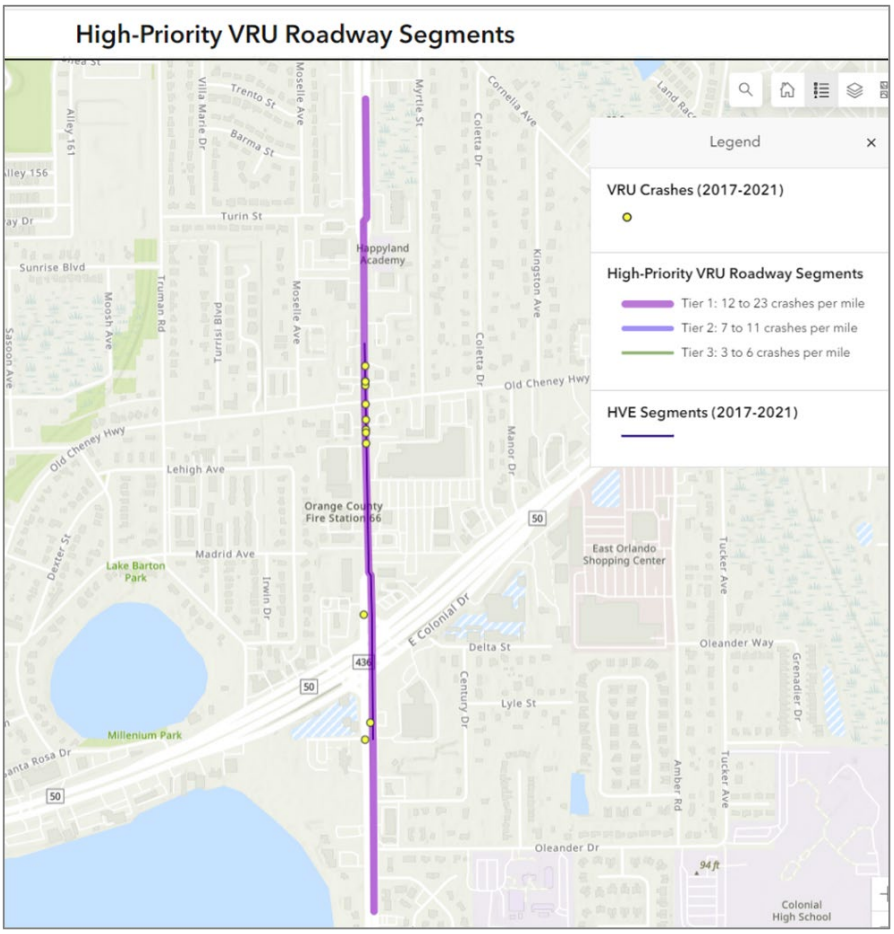
The demographics of the area change closer to the marina; residents travel north to shop on Cortez Road.

What strategies should be prioritized?

Roadways	*Road Users*
Consistent and complete sidewalks, but there may right-of-way challenges.	Transit stops are not always close to crosswalks, potentially encouraging midblock crossings.
User Behavior	***Data***
Automated speed enforcement is not currently feasible in Florida.	Quality data confirms public perception that many students attending state/colleges and universities in the area are walking and biking.

21. SEMORAN BOULEVARD

Semoran Boulevard is a principal arterial roadway in Orange County (Central Planning Region, District 5) with a posted speed limit of 45 mph and a C3C context classification. The priority segment between Cornelia Avenue and Hewett Drive had 12 VRU fatal and serious injury crashes between 2017 and 2021 with three crashes occurred at night and three crashes on the weekday evenings, two crashes occurring at weekday mornings, two crashes on weekday middays, and two crashes on weekends. The community surrounding this segment is predominantly Black (95.2%) and non-Hispanic or Latino (93.9%) with an average age of 28.8 years old and a median income of $27,518. Women make up 52% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
Semoran Blvd	South of Colonial Drive	North of Old Cheney Highway	Orange County Sheriff's Office	05:00 to 21:00	Friday, Saturday, Sunday, Monday, Tuesday, Wednesday.

FDOT WORK PROGRAM PROJECTS

FDOT has programmed five projects in the FY 2024-2028 Annual Work Program on this segment. Out of those five, the projects below are related to VRU safety.

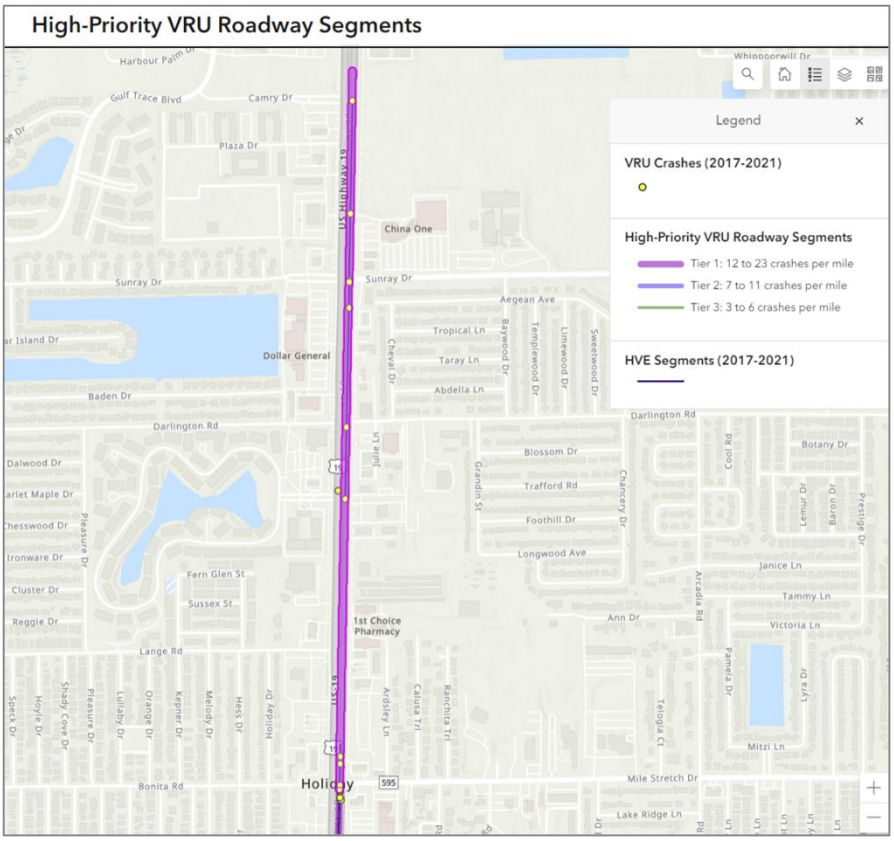
ITEM NUMBER	TYPE OF WORK	PROJECT DESCRIPTION	PROJECT LENGTH (MILES)	MIN FY	MAX FY
442390-2	Lighting	Orange County Pedestrian Lighting Bundle B	9.986	2024	2024
445303-1	Bike Lane/ Sidewalk	SR 436 From North of Old Cheney Hwy to North of University Park Dr	2.022	2024	2024

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

SEMORAN BOULEVARD	
What is the community saying?	
Bus Rapid Transit (BRT) project is underway; Semoran Boulevard intersects with SR 50 with 6 Lanes, 45 MPH; crashes exist at flyover; timed signalization keeps traffic flow moving unless someone is stopped at light; existing projects are planned for Semoran Blvd.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
Access to transit; commercial development.	
What strategies should be prioritized?	
Roadways	***Road Users***
Driveways.	Methadone clinic nearby.
User Behavior	***Data***
Inconsistent speeds.	

22. US-19 (V)

US-19 is a principal arterial roadway in Pasco County (Central Planning Region, District 7) with a posted speed limit of 45 mph and a C3C context classification. The priority segment between Camry Drive and Mile Stretch Drive had 12 VRU fatal and serious injury crashes between 2017 and 2021 where three crashes occurred at night, three crashes on the weekend, two crashes on the weekday mornings, two crashes on the weekday midday, and two crashed on the weekday evenings. The community surrounding this segment is predominantly White (79.9%) and non-Hispanic or Latino (90.7%) with an average age of 42.6 years old and a median income of $32,297. Women make up 52% of the community.



HIGH VISIBILITY ENFORCEMENT (HVE) PROGRAM

Part of the segment was identified for the HVE program (2017-2021), targeting pedestrian and bicycle safety.

HVE Program List (2017-2021)

ROADWAY NAME	FROM	TO	ENFORCEMENT AGENCY	TIME	DAY OF WEEK
US-19	Tahitian Gardens Circle	Camry Drive	Pasco County Sheriff's Office	15:00 to 20:00	Friday, Saturday, Monday, Wednesday.

FDOT WORK PROGRAM PROJECTS

FDOT has programmed two projects in the FY 2024-2028 Annual Work Program on this segment of Sunrise Boulevard, but none of these are related to VRU safety.

FEEDBACK RECEIVED THROUGH COMMUNITY ENGAGEMENT

US-19 (V)	
What is the community saying?	
High number of homeless people; people drive too fats; people avoid walking here; drunk drivers.	
What are the major drivers of pedestrian and bicycle activity on this segment?	
People crossing street to get to shopping and work.	
What strategies should be prioritized?	
Roadways	***Road Users***
Installing mid blocks, improving lighting; mixed use path all down this corridor, improve conditions for crossing intersection.	Providing drivers with real time information and notifications.
User Behavior	***Data***
Providing safety information to pedestrians crossing street.	Providing more in the moment crash reports.

FLORIDA

VULNERABLE ROAD USER SAFETY ASSESSMENT

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