Final

State Environmental Impact Report

Florida Department of Transportation

Florida's Turnpike Enterprise

Orlando South Ultimate Interchange

Florida's Turnpike (SR 91, MP 254) and Beachline Expressway (SR 528, MP 4)

Orange County, Florida

Financial Project ID Number: 438547-1-22-01

ETDM Number: 14294

Date: May 2021

"The PD&E Study's support documents were developed in consideration of FTE's Express Lanes Master Plan, which was in effect before October 2019. However, during design phase, the concepts will be updated to Managed Lanes criteria. Managed Lanes plan will not have additional tolls on the facility and will not affect the results of the PD&E study (please see Section A.0 – Project Addendum)"

1. PROJECT DESCRIPTION AND PURPOSE AND NEED:

a. Project Information:

Project Name: Orlando South Ultimate Interchange, Florida's Turnpike (SR 91, MP 254) and Beachline Expressway (SR 528, MP 4)

Project Limits: from South of Taft Vineland Road overpass to Sand Lake Road on Florida's Turnpike and from John Young Parkway (CR 423) to east of the Beachline West Toll Plaza

County: Orange County

ETDM Number (If applicable): 14294

Financial Management Number: 438547-1-22-01

Project Manager: Anil Sharma, P.E., Florida's Turnpike Enterprise (HNTB)

b. Proposed Improvements: Provided in Section 1.3 Proposed Improvements, as amended by Section A.0 Project Addendum

c. Purpose and Need: Provided in Section 1.2 Purpose and Need

d. Project Planning Consistency: disregard providing historical details, instead focus on future phases of segments being advanced. If more than one segment is being advanced additional tables should be added.

Currently Adopted CFP/LRTP	**COMMENTS**
Y	The PD&E phase is currently funded in Metroplan's 2045 Metropolitan Transportation Plan, Cost Feasible Plan. The transportation plan reflects partial funding for design and right of way. The PD&E was split into three packages for design, right of way and construction.

FPID: 438547-2 Orlando South Ultimate Interchange at SR 91 (MP 254) and SR 528 (MP 4)					
Phase	**Currently Approved TIP**	**Currently Approved STIP**	**TIP/STIP $**	**TIP/STIP FY**	**Comments**
PE (Final Design)	Y	Y	$10,381,000 (TIP) $10,381,023 (STIP)	<2020/21 (TIP)* <2020/21 (STIP)	*PE portion of historic cost
R/W	Y	Y	$189,000 (TIP) $47,000 (TIP) $80,000 (TIP) $490,000 (TIP) $558,000 (TIP) $189,271 (STIP) $47,282 (STIP) $80,000 (STIP) $490,000 (STIP) $558,147 (STIP)	<2020/21 (TIP)* 2020/21 (TIP) 2021/22 (TIP) 2022/23 (TIP) 2023/24 (TIP) <2020/21 (STIP) 2020/21 (STIP) 2021/22 (STIP) 2022/23 (STIP) 2023/24 (STIP)	*Right of Way portion of historic cost
Railroad & Utilities	N	Y	$510,000 (STIP)	>2023/2024 (STIP)	
Construction	N	N			Construction phase to be added to the next Metroplan TIP Update

FPID: 444979-1 New Beachline Expressway (SR 528) Interchange at Voltaire Drive					
Phase	**Currently Approved TIP**	**Currently Approved STIP**	**TIP/STIP $**	**TIP/STIP FY**	**Comments**
PE (Final Design)	Y	Y	$68,000 (TIP) $1,000 (TIP) $67,143 (STIP) $829 (STIP)	<2020/21 (TIP) 2020/21 (TIP) 2020/21 (STIP) 2021/22 (STIP)	
R/W	N	N	$0	$0	R/W Not Funded
Construction	N	Y	$1,355 (STIP)	2020/21 (STIP)	Construction phase to be added to the next Metroplan TIP Update
FPID: 444980-1 New Interchange on Turnpike Mainline (SR 91) at Taft Vineland Road (MP 253)					
Phase	**Currently Approved TIP**	**Currently Approved STIP**	**TIP/STIP $**	**TIP/STIP FY**	**Comments**
PE (Final Design)	Y	Y	$2,105,000 (TIP) $73.000 (TIP) $2,101,746 (STIP) $73,128 (STIP)	<2020/21 (TIP) 2020/21 (TIP) 2020/21 (STIP) 2021/22 (STIP)	
R/W	N	N	$0	$0	R/W Not Funded
Construction	N	Y	$2,853 (STIP)	2020/21 (STIP)	Construction phase to be added to the next Metroplan TIP Update

See **Appendix A** for Planning Consistency information.

2. ENVIRONMENTAL ANALYSIS

Issues/Resources	*Substantial Impacts? Yes	No	Enhance	No Inv	**Supporting Information
A. SOCIAL and ECONOMIC					
1. Social	☐	☐	☒	☐	see Section 2.1.1
2. Economic	☐	☐	☒	☐	see Section 2.1.2
3. Land Use Changes	☐	☒	☐	☐	see Section 2.1.3
4. Mobility	☐	☐	☒	☐	see Section 2.1.4
5. Aesthetic Effects	☐	☒	☐	☐	see Section 2.1.5
6. Relocation Potential	☐	☒	☐	☐	see Section 2.1.6
B. CULTURAL					
1. Historic Sites/Districts	☐	☒	☐	☐	see Section 2.2.1
2. Archaeological Sites	☐	☒	☐	☐	see Section 2.2.2
3. Recreational Areas	☐	☐	☐	☒	see Section 2.2.3
C. NATURAL					
1. Wetlands and Other Surface Waters	☐	☒	☐	☐	see Section 2.3.1
2. Aquatic Preserves and Outstanding FL Waters	☐	☒	☐	☐	see Section 2.3.2
3. Water Quality and Water Quantity	☐	☒	☐	☐	see Section 2.3.3
4. Wild and Scenic Rivers	☐	☐	☐	☒	see Section 2.3.4
5. Floodplains	☐	☒	☐	☐	see Section 2.3.5
6. Coastal Barrier Resources	☐	☐	☐	☒	see Section 2.3.6
7. Protected Species and Habitat	☐	☒	☐	☐	see Section 2.3.7
8. Essential Fish Habitat	☐	☐	☐	☒	see Section 2.3.8
D. PHYSICAL					
1. Highway Traffic Noise	☐	☒	☐	☐	see Section 2.4.1
2. Air Quality	☐	☒	☐	☐	see Section 2.4.2
3. Contamination	☐	☒	☐	☐	see Section 2.4.3
4. Utilities and Railroads	☐	☒	☐	☐	see Section 2.4.4
5. Construction	☐	☒	☐	☐	see Section 2.4.5
6. Bicycles and Pedestrians	☐	☒	☐	☐	see Section 2.4.6
7. Navigation	☐	☐	☐	☒	see Section 2.4.7

* Substantial Impacts?: Yes = Substantial Impact; No = No Substantial Impact; Enhance = Enhancement; NoInv = Issue absent, no involvement.

**Supporting information is documented in the referenced attachment(s).

3. ANTICIPATED PERMITS

- ☒ Individual Dredge and Fill Permit- FDEP
- ☒ Environmental Resource Permit South Florida Water Management District
- ☒ Environmental Resource Permit St Johns River Water Management District
- ☒ General permit for "Short-Term Dewatering", per 40E-2.061(2), FAC. – South Florida Water Management District
- ☒ NPDES Generic Permit (FDEP) per Section 403.0885, Florida Statues for authorization to discharge stormwater associated with large and small construction activities to surface waters of the State.
- ☒ Gopher Tortoise Relocation Permit – Florida Fish and Wildlife Conservation Commission

4. ENGINEERING ANALYSIS

Documented in the *Orlando South Ultimate Interchange at Florida's Turnpike (SR 91, MP 254) and Beachline Expressway (SR 528, MP 4) PD&E Study Preliminary Engineering Report*, April 2021.

5. COMMITMENTS

To minimize the impacts of this project to the social, cultural, natural, and physical environment, the Florida's Turnpike Enterprise (FTE) has identified the following commitments for the *Orlando South Ultimate Interchange at Florida's Turnpike (SR 91, MP 254) and Beachline Expressway (SR 528, MP 4) PD&E Study*.

1. Additional cultural resource assessments of project stormwater management sites will be conducted during the project's design phase. Findings of these assessments will be coordinated with the SHPO for their review and concurrence.
2. The USFWS "*Standard Protection Measures for the Eastern Indigo Snake*" will be implemented to assure that the Eastern indigo snake will not be adversely impacted by the project.
3. Impacts to suitable foraging habitat for the federally protected wood stork will be mitigated through the purchase of credits from a U.S. Fish and Wildlife Service approved mitigation bank pursuant to Section 373.4137, F.S. or as otherwise agreed to by the FDOT and the appropriate regulatory agencies. FTE will consult with USFWS through the USACE permitting process and provide documentation that impacts to wood stork foraging habitat are offset.
4. A gopher tortoise survey within the construction limits (including roadway footprint, construction staging areas, and stormwater management ponds) will be performed prior to the start of project construction per Florida Fish and Wildlife Conservation Commission guidelines. FTE will secure any relocation permits needed and ensure that gopher tortoises are relocated prior to construction.
5. The FTE will follow the FDOT Supplemental Standard Specification 7-1.4.1 *Additional Requirements for the Florida Black Bear* to minimize human-bear interactions associated with construction sites during project construction.
6. A Level 1 Contamination Screening Evaluation Report Update will be prepared. During the project's design phase, a Level II Contamination Assessment will be conducted for locations with risk ratings of "medium" or "high", if the identified contamination concerns have the potential to impact the existing and/or proposed project right of way.
7. To minimize the unavoidable effects of right of way acquisition and displacement of people and businesses, the FDOT will carry out a *Right of Way Acquisition and Relocation Assistance Program* in accordance with Florida Statute 339.09 and the *Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970* (Public Law 91-646 as amended by Public Law 100-17) and the established guidelines by which these programs are administered.
8. Air pollution associated with the creation of airborne particles will be controlled using watering or the application of other control materials in accordance with FDOT's Standard Specifications for road and Bridge Construction.
9. Noise control measures will be implemented as set forth in the FDOT's Standard Specifications for Road and Bridge Construction.
10. Water quality impacts associated with project construction and resulting from erosion and sedimentation will be controlled in accordance with FDOT's Standard Specifications for Road and Bridge Construction and thorough use of Best Management Practices (BMPs).

6. FDOT SELECTED ALTERNATIVE

As a result of the public involvement, engineering and environmental evaluations documented as part of this PD&E Study, Alternative 3 is the Preferred Alternative. This alternative includes improvements to the Orlando South interchange as well as the construction of a new Florida's Turnpike/Taft Vineland Road reliever interchange and a new Beachline Expressway/Voltaire Drive Extension reliever interchange. Each of these proposed improvements are described below and are shown on the conceptual plans in **Appendix B**.

Orlando South Interchange

Improvements to the Orlando South interchange include improvements to Florida's Turnpike and the Beachline Expressway, ramps connecting these facilities, All Electronic Tolling (AET) and surface street ramp modifications that are described below:

- Systems ramps improvements include:
    - New Directional General Toll Lane (GTL) systems ramps.
    - Ramp braiding in both directions along the Beachline Expressway between John Young Parkway (CR 423) and Consulate Drive to preclude adverse weaving.
    - Ramp braiding in both directions along Florida's Turnpike between the new reliever interchange at Florida's Turnpike/Taft Vineland Road interchange and the Beachline Expressway to preclude adverse weaving.
    - Additional auxiliary lanes between interchanges to improve traffic operations:
        - Southbound (SB) Florida's Turnpike between the exit to the Beachline Expressway and the entry from Sand Lake Road (SR 482).
        - Eastbound (EB) and Westbound (WB) Beachline Expressway between Florida's Turnpike and the new reliever interchange at Beachline Expressway/Voltaire Drive Extension.
- Realignment of the Beachline Expressway to provide longer spans for a ten-lane Florida's Turnpike typical section.
- Raising the Florida's Turnpike profile between the Beachline Expressway and Sand Lake Road to provide minimum base clearance to meet design criteria.
- New AET gantries on NB Florida's Turnpike entry and SB Florida's Turnpike exit ramps.
- Surface street ramp modifications:
    - Removal of the Landstreet Road ramps connecting to the Beachline Expressway.
    - A Northbound (NB) collector-distributor road connecting the Sand Lake Road exit with the entry from Taft Vineland Road and SB Orange Blossom Trail.
    - Maintaining Consulate Drive entry/exit ramps connecting to the Beachline Expressway and the SB exit from Florida's Turnpike with a new Diverging Diamond Interchange (DDI) configuration.
    - Removal of Florida's Turnpike ramps connecting to Orange Blossom Trail, except the NB Florida's Turnpike exit to NB Orange Blossom Trail.
    - A new SB entry ramp to Florida's Turnpike via Consulate Drive.
    - A new more direct NB entry to Florida's Turnpike from SB Orange Blossom Trail.
- Reconfiguration of the Consulate Drive/Orange Blossom Trail intersection to provide triple left turn lanes EB to NB.

Florida's Turnpike/Taft Vineland Road Reliever Interchange

Improvements include a new Florida's Turnpike reliever interchange at Taft Vineland Road. Taft Vineland Road is a county facility that is programmed to be widened to four lanes from Orange Blossom Trail to Florida's Turnpike. Improvements include:

- New ramps
    - SB ramps and NB entry ramp in the northwest quadrant.
    - A supplemental SB entry ramp (EB Taft Vineland Road to SB Florida's Turnpike) in the southeast quadrant within existing right of way.

- A NB Florida's Turnpike exit ramp to Taft Vineland Road at the Bachman Road intersection, which will be signalized.

- Widening of the Taft Vineland Road/Bachman Road intersection to provide:
  - Separate SB Bachman Road turn lanes to EB and WB Taft Vineland Road.
  - Two WB approach lanes and a transition to the existing two-lane section, east of the intersection.
- Modification of the proposed Taft Vineland Road median to accommodate signalized dual left-turn lanes from EB Taft Vineland Road to NB Florida's Turnpike and from SB Florida's Turnpike to EB Taft Vineland Road.
- Modification of the Taft Vineland Road profile adjacent to the Florida's Turnpike overpass to provide a maximum grade of 4%.

Beachline Expressway/Voltaire Drive Extension Reliever Interchange

Improvements include a new Beachline Expressway reliever interchange east of the Florida Mall. This new interchange includes a new north-south four-lane arterial facility connecting Landstreet Road to the south with Sand Lake Road to the north. Other improvements include:

- A Tight Urban Diamond Interchange (TUDI) over the Beachline Expressway providing full access between the Beachline Expressway and the new arterial.
- South of the Beachline Expressway, the new arterial alignment:
  - Parallels a Duke Energy easement.
  - Crosses CSX railroad spur at-grade.
  - Requires a new signal at Landstreet Road.
- North of the Beachline Expressway, the new arterial alignment:
  - Extends the southern alignment along the east side of the Terrace at Florida Mall and intersects with Sand Lake Road.
  - The Sand Lake Road intersection requires removal of a signal to the west, which provides access to Voltaire Drive and the Terrace at Florida Mall. To mitigate this change of access, Voltaire Drive is realigned to form the fourth leg of the arterial intersection with a signal. In addition, a new driveway is provided along the arterial to provide access to the Terrace at Florida Mall.

7. ☒ APPROVED FOR PUBLIC AVAILABILITY (Before public hearing when a public hearing is required)

Environmental or Project Development Manager or Administrator — **Date** 2/28/2020

8. PUBLIC INVOLVEMENT: (check one only)

1. ☐ A public hearing is not required.
2. ☐ A public hearing will be held _____. This draft document is publicly available and comments can be submitted to FDOT until _____.

District Contact Information: Philip Stein
Environmental Administrator
Florida Turnpike Enterprise
MP 263, Building 5316
Ocoee, Florida, 34761
Phone 407.264.3301
Email AddressPhilip.Stein@dot.state.fl.us

3. X A public hearing was held on February 16, 2021 and the transcript is available.
4. ☐ An opportunity for a public hearing was afforded and was documented_____.

9. APPROVAL OF FINAL DOCUMENT

This project has been developed without regard to race, color, national origin, age, sex, religion, disability, or family status.

The final SEIR reflects consideration of the PD&E Study and the public hearing.

Jennifer A. Stults Digitally signed by Jennifer A. Stults Date: 2021.05.25 13:36:35 -04'00'

District Secretary or Designee **Date**
Florida's Turnpike Enterprise
(See Appendix E for Delegation Letter)

10. SUPPORTING INFORMATION: SEE ATTACHMENTS

A.0 PROJECT ADDENDUM

The development of alternatives for the Orlando South Ultimate Interchange Project Development & Environment (PD&E) Study was completed in consideration of the Florida's Turnpike Enterprise (FTE's) Express Lane Master Plan in effect at the study Notice to Proceed which included the following:

- Two Express Lanes and three General Toll Lanes in each direction on Florida's Turnpike, separated by a buffer with Express Lane Markers
- One Express Lane and three General Toll Lanes in each direction on the Beachline Expressway, separated by a buffer with Express Lane Markers

Incorporation of the Express Lane Plan is included in the supporting documents and analysis.

In October 2019, FTE elected to change its operational approach and will not implement dynamically tolled express lanes on these facilities. The FTE is now implementing a Managed Lane system that restricts truck usage on selected lanes on its facilities without the additional toll. Revised typical sections for Florida's Turnpike and the Beachline Expressway are shown on **Figures A-1: Florida's Turnpike Managed Lane Typical Section and A-2: Beachline Expressway Managed Lane Typical Section**.

Figure A-1: Florida's Turnpike Managed Lane Typical Section

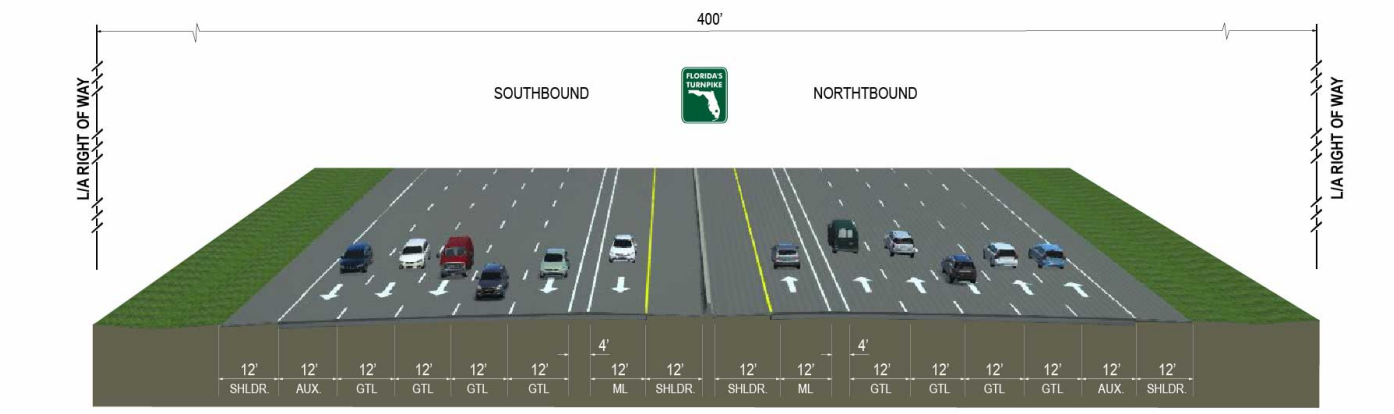
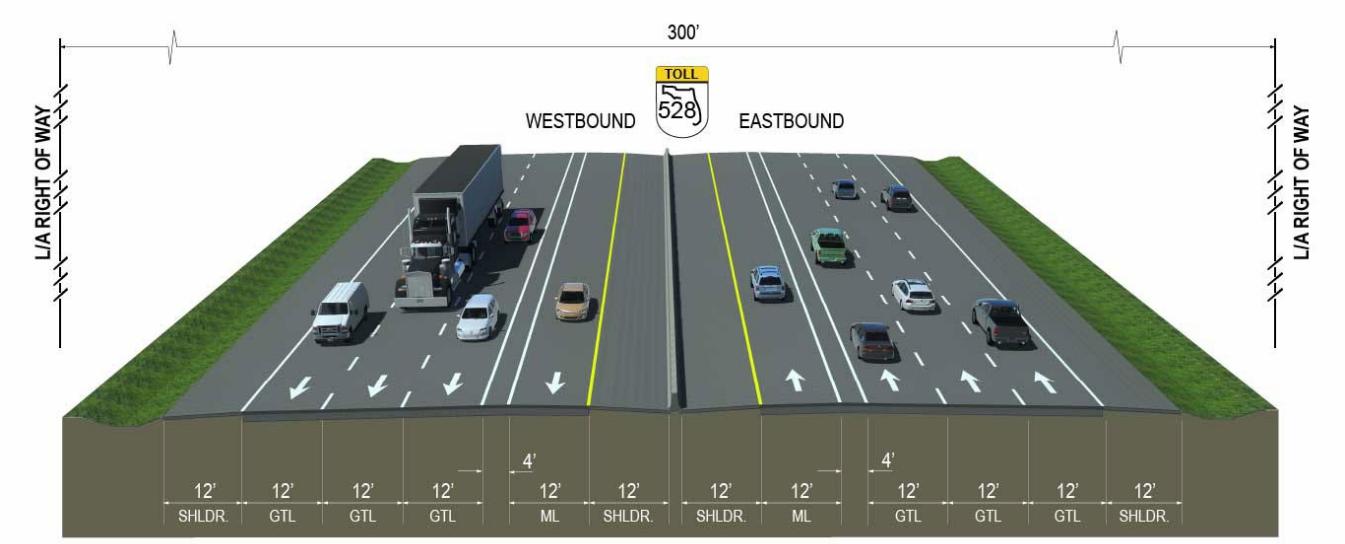


Figure A-2: Beachline Expressway Managed Lane Typical Section



This proposed change will be implemented during final design. The change does not invalidate the results of this study because the proposed footprint of the Florida's Turnpike and the Beachline Expressway is the same as the studied typical section. Therefore, there is no increase in impacts.

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APPENDICES

ACRONYMS AND ABBREVIATIONS

Ac	acre(s)
AET	All Electronic Toll
AREMA	American Railway Engineering and Maintenance-of-Way Association
AN	Advanced Notification
APE	Area of Potential Effect
BEBR	Bureau of Business and Economic Research
BFE	Base Flood Elevation
BGEPA	Bald and Golden Eagle Protection Act
BMP	Best Management Practice
CA	Consultation Area
CAA	Clean Air Act
CERCLA	Comprehensive Environmental Resource, Compensation and Liability Act
CESQG	Conditionally Exempt Small Quantity Generator
CFA	Core Foraging Area
CH	Critical Habitat
CO	carbon monoxide
CR	County Road
CRAS	Cultural Resource Assessment Survey
CSER	Contamination Screening Evaluation Report
DDI	Directional Diamond Interchange
EB	Eastbound
EFH	Essential Fish Habitat
FGT	Florida Gas Transmission
EL	Express Lanes
ERP	Environmental Resource Permit
ESA	Endangered Species Act
ETDM	Efficient Transportation Decision Making
FAC	Florida Administrative Code
FDACS	Florida Department of Agricultural and Consumer Services
FDEP	Florida Department of Environmental Protection
FDHR	Florida Department of Historic Resources
FDOT	Florida Department of Transportation
FEMA	Federal emergency Management Agency
FIRM	Federal Insurance Rate Maps
FLUCFCS	Florida Land Use, Cover, and Forms Classification System
FMSF	Florida Master Site File
FNAI	Florida Natural Area Inventory
FPID	Financial Project Identification
FTE	Florida's Turnpike Enterprise
FWC	Florida Fish and Wildlife Conservation Commission
GIS	Geographic Information System
GTL	General Toll Lane
I-4	Interstate 4
I-Drive	International Drive
LOS	Level of Service
LRTP	Long Range Transportation Plan
MBTA	Migratory Bird Treaty Act
MPH	Miles per Hour
MSA	Magnuson-Stevens Fishery Conservation and Management Act
MSAT	Mobile Source Air Toxics
NAVD	North American Vertical Datum
NAAQS	National Ambient Air Quality Standards
NB	Northbound

NMFS	National Marine Fisheries Service
NPL	National Priorities List
NPDES	National Pollutant Discharge Elimination System
NRCS	Natural Resources Conservation Service
NRE	Natural Resource Evaluation
NRHP	National Register of Historic Places
MP	Mile Post
OBT	Orange Blossom Trail
OFW	Outstanding Florida Waters
ORT	Open Road Toll
PD&E	Project Development and Environment
PER	Preliminary Engineering Report
PSR	Pond Siting Report
ROW	right of way
SB	Southbound
SEIR	State Environmental Impact Report
SFH	suitable foraging habitat
SFWMD	South Florida Water Management District
SHPO	State Historic Preservation Office
SIS	Strategic Intermodal System
SJRWMD	St. Johns River Water Management District
SPUI	Single Point Urban Interchange
SR	State Road
SSC	species of special concern
STIP	State Transportation Improvement Plan
TIP	Transportation Improvement Plan
TUDI	Tight Urban Diamond Interchange
UCF	University of Central Florida
UMAM	Uniform Mitigation Assessment Method
US	United States
USACE	United States Army Corp of Engineers
USEPA	United States Environmental Protection Agency
USCG	United States Coast Guard
USFWS	United States Fish and Wildlife Service
UST	Underground Storage Tank
VMA	Vehicle-Miles-Traveled
WB	Westbound
WMD	Water Management District

1 PROJECT INTRODUCTION

The Florida Department of Transportation (FDOT), Florida's Turnpike Enterprise (FTE) is conducting a Project Development and Environment (PD&E) Study for the Orlando South Ultimate Interchange at Florida's Turnpike (State Road [SR] 91, MP 254) and Beachline Expressway (SR 528, MP 4), in Orange County, Florida. The project limits are shown on **Figure 1-1: Project Location Map**. The specific project limits for the study are:

- Florida's Turnpike from south of Taft Vineland Road to north of Sand Lake Road (SR 482), and
- Beachline Expressway from west of John Young Parkway (County Road [CR] 423) to east of the Beachline West Toll Plaza.

Florida's Turnpike is a limited access facility with a four-lane typical section (two lanes in each direction) south of Taft Vineland Road and eight lanes (four lanes in each direction) north of the Beachline Expressway. FTE is currently constructing a project to provide a consistent eight-lane typical section within these project limits.

The Beachline Expressway is also a limited access facility with a four-lane typical section (two lanes in each direction) west of the Orlando South Ultimate Interchange and six-lanes (three in each direction) up to the eastern limits of the project. FTE is currently constructing a project to provide eight lanes on the Beachline Expressway from Interstate 4 (I-4) to McCoy Road.

FTE has identified the need for improvements to optimize the interchange operations at Florida's Turnpike and Beachline Expressway. The alternatives evaluated include:

- New and improved connections between Florida's Turnpike and the Beachline Expressway
- All Electronic Toll (AET)
- Improved connections to local roads to address traffic operations
- Future expansion of Florida's Turnpike

This PD&E Study also includes analysis of the No-Build Alternative which would result in no improvements to the study area if selected.

1.1 Project Background

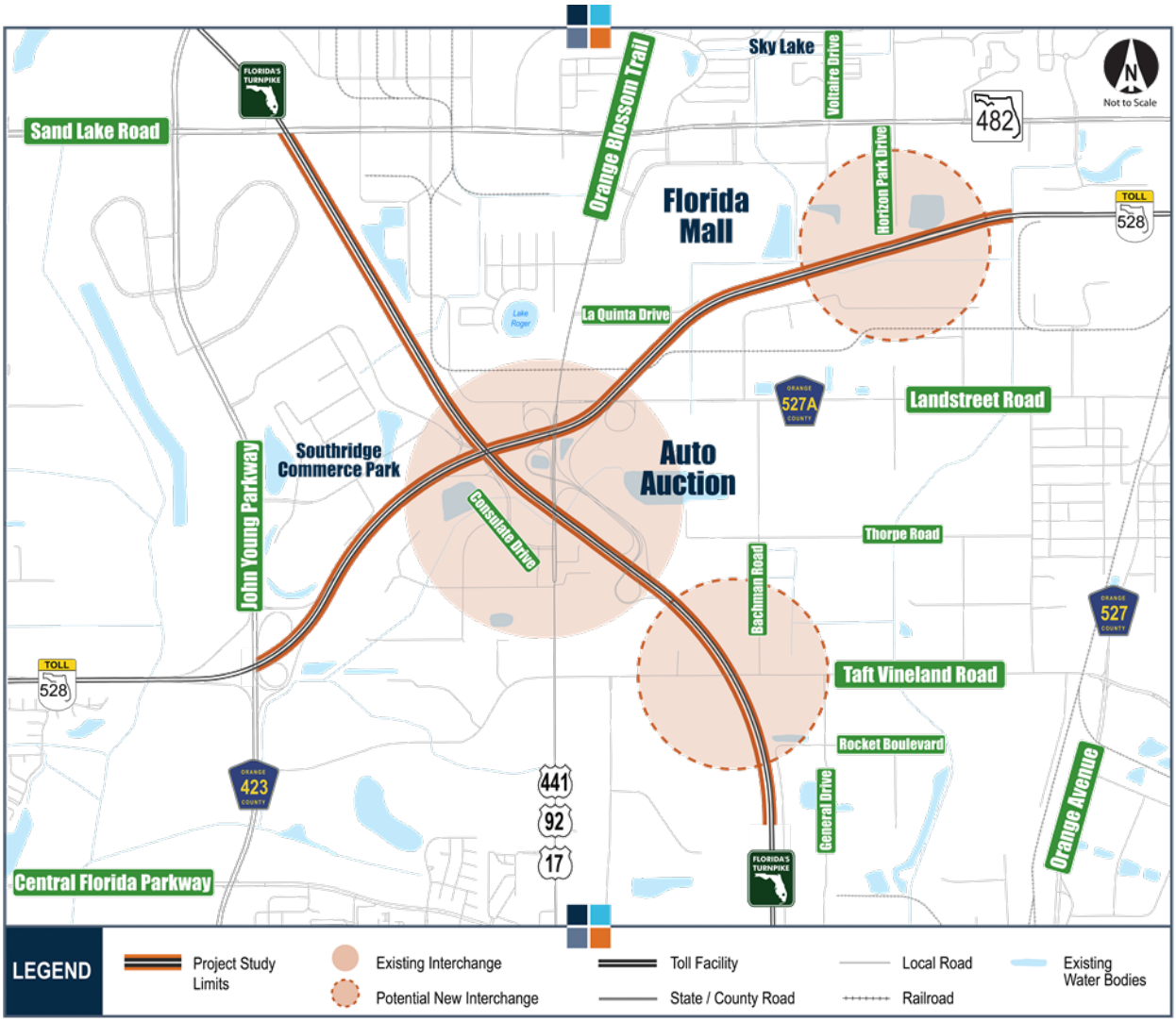
1.1.1 Existing Conditions

The Orlando South Ultimate Interchange is a complex interchange that includes a combination of ramps that connect the Florida's Turnpike, the Beachline Expressway and Orange Blossom Trail (US 441/17/92) directly and indirectly. The project study limits extend from south of the Taft Vineland Road overpass to Sand Lake Road on Florida's Turnpike and from John Young Parkway (CR 423) to east of the Beachline West Toll Plaza.

The existing interchange was constructed in 1963 as a double trumpet interchange between Florida's Turnpike and Orange Blossom Trail that allowed for a single toll plaza for manned, ticketed toll operations. Subsequent construction projects added the Beachline Expressway with service ramp connections to Consulate Drive and Landstreet Road (CR 527A) and system movements to/from the east connected to the trumpet. Previous and on-going improvements constructed in the last 20 years have included:

- Capacity improvements to both Florida's Turnpike and Beachline Expressway,
- Operational improvements to the interchange, including a southbound (SB) Florida's Turnpike exit to Consulate Drive and widened ramps,
- Reconstruction of the Beachline West Toll plaza to include both conventional (manned) toll lanes and Open Road Toll (ORT) lanes, and
- Toll operational improvements, which will result in AET conversion for the expanded segment of the Florida's Turnpike (Three Lakes Toll Plaza to I-75) in July 2020.

Figure 1-1: Project Location Map



Key deficiencies of the existing interchange include:

- Low speed loop ramp connections to Landstreet Road, Orange Blossom Trail and Florida's Turnpike,
- Weaving conditions on the trumpet that will adversely impact operations with AET,
- Ramps between the Beachline Expressway east and Florida's Turnpike that are very circuitous and do not meet desirable systems ramps design speeds of 50 miles per hour (MPH),
- No direct ramps between the Beachline Expressway west and Florida's Turnpike, resulting in travelers using the surface streets to connect between the two facilities,
- Interconnected systems ramps and service ramps that allow surface street congestion to propagate onto the freeway system,
- Lack of capacity, such that the Orlando South interchange and connecting surface streets cannot efficiently handle projected traffic, and
- The existing span configuration for the Beachline Expressway over Florida's Turnpike that does not accommodate a future ten-lane typical section.

These conditions are magnified by proximity to industrial areas and associated truck traffic that impacts signal operations on the surface streets.

Congestion relief, improved travel time, safety and limited impacts are the principal goals of the project. Objectives to address these goals include:

- New ramps connecting Florida's Turnpike northbound/southbound (NB/SB) to the Beachline Expressway west to improve system and surface street operations,
- Replacement ramps connecting NB/SB Florida's Turnpike to the Beachline Expressway east to improve operating speeds,
- Reconstruction of remaining service ramps to improve operations and safety,
- Added Express Lane (EL) capacity on Florida's Turnpike to minimize weaving and provide traveler choices, and
- Dispersing surface street demand.

1.1.2 Previous Planning Studies

Bee Line (Beachline) West Expressway Widening PD&E Study, Preliminary Engineering Report, April 9, 2003; I-4 to McCoy Road, FPID 410321-1-22-01

Under this study, the Preferred Alternative for the Orlando South interchange maintained the existing conventional interchange toll plaza as a constraint. Although widening of the Beachline Expressway is being implemented, interchange improvements were never programmed. Since the implementation of AET on this segment of the Florida's Turnpike, the basis of this preferred interchange alternative is no longer valid. This current PD&E Study addresses current interchange needs without this constraint.

Technical Memorandum Interchange Design Alternatives Orlando South Interchange, July 28, 2016

This technical memorandum developed and evaluated alternative interchange concepts for the Orlando South interchange. These concepts took into consideration FTE's plans to implement AET throughout the Northern Coin System of the Florida's Turnpike, as well as implementation of ELs on both Florida's Turnpike and the Beachline Expressway. Alternatives 3, 10, 11 and 12 provided the starting point of concepts for the current PD&E study. Key features of these alternatives included different combinations of:

- Maintained ramps
    - Consulate Drive ramps to/from the west on the Beachline Expressway and from SB Florida's Turnpike for all alternatives.
    - Landstreet Road ramps to/from the east on the Beachline Expressway.
- Added ramps
    - System ramps between the Beachline Expressway west and NB/SB Florida's Turnpike.
    - Full or partial diamond interchange at the Taft Vineland Road crossing of Florida's Turnpike to supplement or replace Florida's Turnpike/Orange Blossom Trail ramps.
    - Express direct connections between north and east systems legs of the Orlando South interchange.
- Modified ramps
    - Systems ramps between the Beachline Expressway east and NB/SB Florida's Turnpike.
    - Florida's Turnpike connections to Orange Blossom Trail.

Toll Point Sites & Configurations: Northern Coin Ramp AET/AET Lite Memorandum, September 2016, Three Lakes Mainline Toll Plaza to the Wildwood Interchange at I-75, FPID 437301-2-22-01

This study evaluated conversion of the Northern Coin segment of Florida's Turnpike to AET. Key findings of this study included use of ORT gantries for mainline applications and reuse of existing toll plazas (AET Lite) at ramps, with subsequent construction ramp ORT gantries with widening or reconstruction projects.

AET Conversion Report for the Beachline Expressway, January 2019, Mainline Toll Plaza at Milepost (MP) 6 to Ramp Toll Plaza at MP 31, FPID 437301-8-22-01

This study evaluated the conversion of the Beachline Expressway to AET. Since the Orlando South Ultimate Interchange project overlaps the Beachline West Toll Plaza, it was recommended that initial conversion of this site include closure of cash lanes and use of the existing ORT gantry. A replacement site east of the current site was identified if the Orlando South improvements conflicted with the existing gantry.

1.2 Purpose and Need

The purpose of the Orlando South Ultimate Interchange improvement is to accommodate future travel demands expected along Florida's Turnpike and Beachline Expressway due to increased population, freight demands, and employment opportunities expected in Orange County, Florida. The interchange improvements will also provide improved access to tourist centers, Orlando International Airport, Port Canaveral, and the growing industrial region surrounding the project location.

Within the Orlando South interchange, there are 13 ramp connections that directly or indirectly connect between the Beachline Expressway, Florida's Turnpike and Orange Blossom Trail. Although the planned construction of the Florida's Turnpike at Sand Lake Road interchange will alleviate demand at some ramps, in the study area, traffic on all facilities are still expected to increase over time. In order to maintain an acceptable Level of Service (LOS) (LOS D for Florida's Turnpike mainline and LOS E for ramps), Florida's Turnpike will need to be widened to ten lanes by the year 2038 north of the Orlando South interchange and by the year 2040 to the south of the interchange under the No-Build scenario. Additionally, total freight movements across Orange County are expected to increase by up to 58% by 2040, which will place higher traffic demands on designated Strategic Intermodal System (SIS) corridors like Florida's Turnpike and Beachline Expressway.

The Florida Future Corridors Initiative has recommended improvements be made to Florida's Turnpike and Beachline Expressway near Orlando to accommodate future traffic demands. Currently, the Beachline Expressway is the only limited access roadway that provides a high-speed connection between Orlando and Brevard County. The interchange improvements, along with existing plans to widen Beachline Expressway to eight lanes from I-4 to McCoy Road (Financial Project Identification (FPID) #406090-5 and #437156-1) will address these needs. Currently, this area is home to Southpark Center with over 2.9 million square feet of building space.

Although not directly serviced by the interchange, the Orange County Convention Plaza Overlay District and International Drive (I-Drive) are located approximately four miles to the west of the project location. Universal Orlando has also recently acquired approximately 500 acres of vacant land between the project location and I-Drive, which has been zoned for theme park use and is expected to be developed as such in the future.

These developments will contribute to increasing traffic volumes on the limited access roadways that connect the area with other parts of the state, such as, Florida's Turnpike, Beachline Expressway and I-4. Improvements on interchanges that surround this area of future growth relieve congestion and provide efficient access to new development from multiple limited access facilities.

1.3 Proposed Improvements

Proposed improvements include improvements to the Orlando South interchange as well as the construction of a new Florida's Turnpike/Taft Vineland Road reliever interchange and a new Beachline Expressway/Voltaire Drive Extension reliever interchange. Additional improvements include modifications to the Florida's Turnpike and

Beachline Expressway typical sections. These proposed improvements are described in more detail in the following sections.

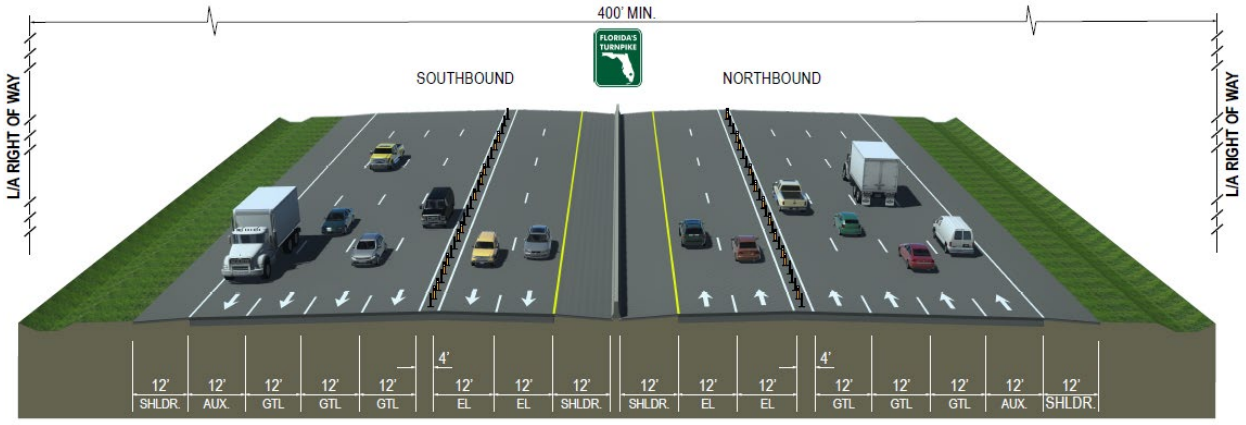
A detailed description of the build alternatives considered for this project can be found in the Preliminary Engineering Report (PER) (April 2021) developed for this project.

1.3.1 Proposed Typical Sections

Florida's Turnpike

The proposed roadway ultimate typical section for Florida's Turnpike is shown in **Figure 1-2: Proposed Ultimate Florida's Turnpike Typical Section.** This typical section includes a minimum 400 feet of roadway right of way, three 12-foot General Toll Lane(s) (GTLs) and two 12-foot ELs in each direction, and 12-foot inside and outside paved shoulders. The GTLs and ELs will be separated by a 4-foot buffer with express lane markers. The NB and SB traffic will be separated by a median barrier.

Figure 1-2: Proposed Ultimate Florida's Turnpike Typical Section*

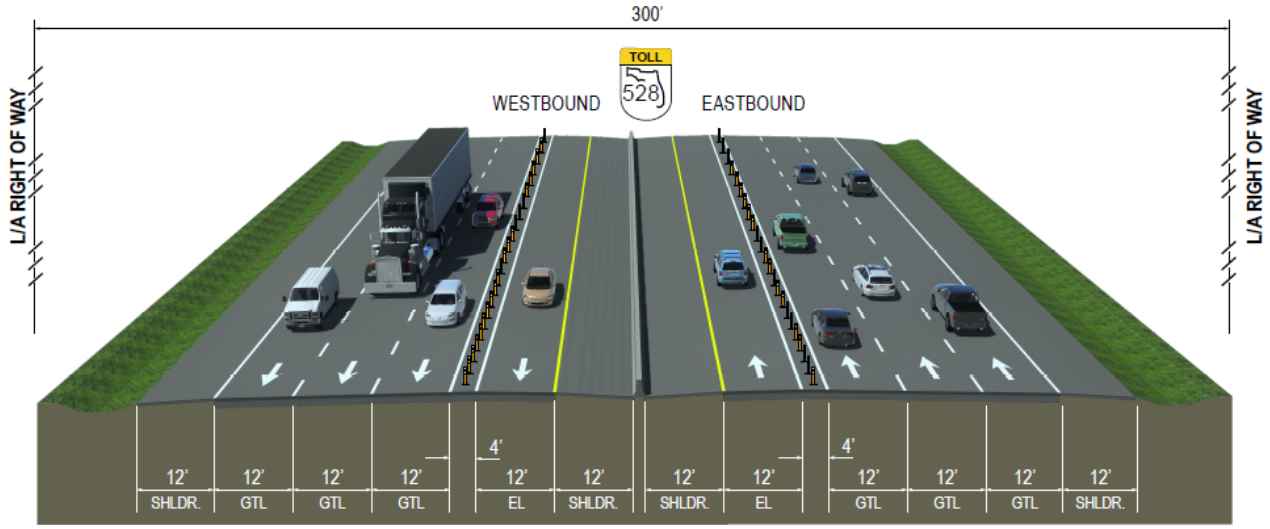


* NOTE: The revised proposed typical section for Florida's Turnpike is shown in Addendum A.0 – Project Addendum

Beachline Expressway

The proposed roadway typical section for the Beachline Expressway is shown in **Figure 1-3: Proposed Beachline Expressway Typical Section.** This typical section includes 300 feet of roadway right of way, three 12-foot GTLs and one 12-foot EL in each direction, and 12-foot inside and outside paved shoulders. The eastbound (EB) and westbound (WB) traffic will be separated by a median barrier.

Figure 1-3: Proposed Beachline Expressway Typical Section*



* NOTE: The revised proposed typical section for the Beachline Expressway is shown in Addendum A.0 – Project Addendum

1.3.2 Preferred Alternative

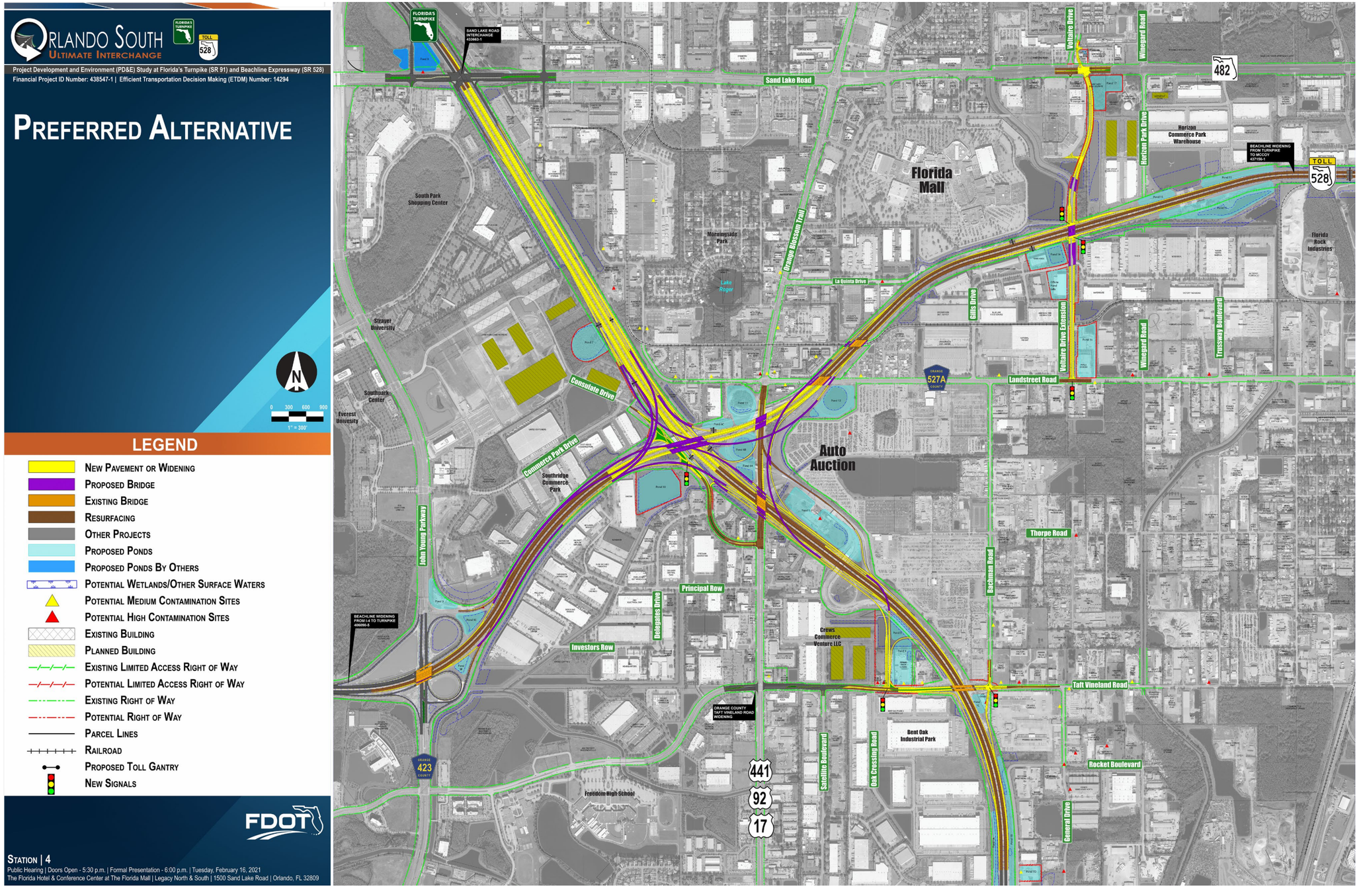
As a result of the public involvement, engineering and environmental evaluations documented as part of this PD&E Study, the Preferred Alternative includes improvements to the Orlando South interchange as well as the construction of a new Florida's Turnpike/Taft Vineland Road reliever interchange and a new Beachline Expressway/Voltaire Drive Extension reliever interchange. Each of these proposed improvements are described below and are shown on the conceptual plans in **Appendix B**. This Preferred Alternative is also shown on **Figure 1-4: Preferred Build Alternative**.

Orlando South Interchange

Improvements to the Orlando South interchange include improvements to Florida's Turnpike and the Beachline Expressway, ramps connecting these facilities, AET and surface street ramp modifications that are described below.

- Systems ramps improvements include:
  - New Directional GTL systems ramps.
  - Ramp braiding in both directions along the Beachline Expressway between John Young Parkway and Consulate Drive to preclude adverse weaving.
  - Ramp braiding in both directions along Florida's Turnpike between the new reliever interchange at Florida's Turnpike/Taft Vineland Road interchange and the Beachline Expressway to preclude adverse weaving.
  - Additional auxiliary lanes between interchanges to improve traffic operations:
    - SB Florida's Turnpike between the exit to the Beachline Expressway and the entry from Sand Lake Road.
    - EB and WB Beachline Expressway between Florida's Turnpike and the new reliever interchange at Beachline Expressway/Voltaire Drive Extension.
- Realignment of the Beachline Expressway to provide longer spans for a ten-lane Florida's Turnpike typical section.
- Raising the Florida's Turnpike profile between the Beachline Expressway and Sand Lake Road to provide minimum base clearance to meet design criteria.
- New AET gantries on NB Florida's Turnpike entry and SB Florida's Turnpike exit ramps.

Figure 1-4: Preferred Build Alternative



- Surface street ramp modifications:
    - Removal of the Landstreet Road ramps connecting to the Beachline Expressway.
    - A NB collector distributor road connecting the Sand Lake Road exit with the entry from Taft Vineland Road and SB Orange Blossom Trail.
    - Maintaining Consulate Drive entry/exit ramps connecting to the Beachline Expressway and the SB exit from Florida's Turnpike with a new Diverging Diamond Interchange (DDI) configuration.
    - Removal of Florida's Turnpike ramps connecting to Orange Blossom Trail, except the NB Florida's Turnpike exit to NB Orange Blossom Trail.
    - A new SB entry ramp to Florida's Turnpike via Consulate Drive.
    - A new more direct NB entry to Florida's Turnpike from SB Orange Blossom Trail.
- Reconfiguration of the Consulate Drive/Orange Blossom Trail intersection to provide triple left turn lanes EB to NB.

Florida's Turnpike/Taft Vineland Road Reliever Interchange

Improvements include a new Florida's Turnpike reliever interchange at Taft Vineland Road. Taft Vineland Road is a county facility that is programmed to be widened to four lanes from Orange Blossom Trail to Florida's Turnpike. Improvements include:

- New ramps
    - SB ramps and NB entry ramp in the northwest quadrant.
    - A supplemental SB entry ramp (EB Taft Vineland Road to SB Florida's Turnpike) in the southeast quadrant within existing right of way.
    - A NB Florida's Turnpike exit ramp to Taft Vineland Road at the Bachman Road intersection, which will be signalized.
- Widening of the Taft Vineland Road/Bachman Road intersection to provide:
    - Separate SB Bachman Road turn lanes to EB and WB Taft Vineland Road.
    - Two WB approach lanes and a transition to the existing two-lane section, east of the intersection.
- Modification of the proposed Taft Vineland Road median to accommodate signalized dual left-turn lanes from EB Taft Vineland Road to NB Florida's Turnpike and from SB Florida's Turnpike to EB Taft Vineland Road.
- Modification of the Taft Vineland Road profile adjacent to the Florida's Turnpike overpass to provide a maximum grade of 4%.

Beachline Expressway/Voltaire Drive Extension Reliever Interchange

Improvements include a new Beachline Expressway reliever interchange east of the Florida Mall. This new interchange includes a new north-south four-lane arterial facility connecting Landstreet Road to the south with Sand Lake Road to the north. Other improvements include:

- A Tight Urban Diamond Interchange (TUDI) over the Beachline Expressway providing full access between the Beachline Expressway and the new arterial.
- South of the Beachline Expressway, the new arterial alignment:
    - Parallels a Duke Energy easement.
    - Crosses CSX railroad spur at-grade.
    - Requires a new signal at Landstreet Road.
- North of the Beachline Expressway, the new arterial alignment:
    - Extends the southern alignment along the east side of the Terrace at Florida Mall and intersects with Sand Lake Road.

- The Sand Lake Road intersection requires removal of a signal to the west, which provides access to Voltaire Drive and the Terrace at Florida Mall. To mitigate this change of access, Voltaire Drive is realigned to form the fourth leg of the arterial intersection with a signal. In addition, a new driveway is provided along the arterial to provide access to the Terrace at Florida Mall.

1.3.3 Summary of Preferred Alternative

The Preferred Alternative was analyzed to determine the potential impacts to the social, cultural, natural, and physical environment compared to the No-Build Alternative. **Table 1-1: Environmental Impact Summary of Preferred and No-Build Alternatives** summarizes the impacts associated with the Preferred Alternative. The project specific alternative evaluation between the Preferred Alternative and the No-Build Alternative is shown in **Table 1-2: Alternative Evaluation Matrix**.

Table 1-1: Environmental Impact Summary of Preferred and No-Build Alternatives

Item		Preferred Alternative	No-Build Alternative
Social	Right of Way Impacts (acres)	90.9	0
	Number of Parcels Impacted	38	0
	Number of Business or Resident Relocations	27	0
	Number of Community Facilities Impacted	0	0
	Park and Recreational Facilities Impacted	0	0
Cultural	Native American Lands Impacted (acres)	0	0
	Number of NRHP Eligible Historical and Archaeological Sites Impacted	0	0
Natural	Wetland Impacts (acres)	8.9	0
	Other Surface Water Impacts (acres)	56.0	0
	Floodplain Impacts (acre-feet)	71.9	0
	Protected Species (potential)	Minimal	None
Physical	Number of Contamination/Hazardous Waste Sites Impacted*	18	0
	Number of Sensitive Noise Receptors Impacted	2	0
	Number of Potential Utilities Relocated	9	0

*=total medium or high ranked sites within 500 feet of project area

Table 1-2: Alternative Evaluation Matrix

Comparison Metric	Preferred Alternative	No-Build Alternative
Conforms with Transportation Plan	Yes	No
Maintains Florida's Turnpike LOS	Yes	No
Accommodates Future Travel Demands	Yes	No
Improves Evacuation Time	Yes	No
Improves Emergency Response Time	Yes	No
Additional Right of Way Required (acres)	90.9	0.00
Project Cost (in 2020 dollars)	$841,200,000	$0.00

2 ENVIRONMENTAL IMPACT ANALYSIS

An Efficient Transportation Decision Making (ETDM) programming screen (ETDM #14294) was completed in 2017 for a proposed Orlando South Ultimate Interchange. Through ETDM, early agency and public comments are obtained to provide project information on environmentally sensitive areas and identification of project issues. The *ETDM Programming Summary Report* is available on the ETDM public web site at (https://etdmpub.flaetat.org/est/) and is provided in **Appendix C.**

On January 4, 2017 an Advance Notification (AN) package was distributed in accordance with state requirement, to initiate coordination with federal, state, and local government agencies as part of the ETDM process. The process allows the agencies to review the proposed project and provide comments that are incorporated into the *ETDM Summary Report* and Project Development and Environment (PD&E) project evaluations. Agency comments received separate from the AN/ETDM Programming Summary Report are provided in **Appendix C**. Concerns or issues identified because of the AN and ETDM process were evaluated during the PD&E Study phase.

This section describes the environmental impact analysis conducted for the proposed project in compliance with applicable federal, state, and local guidelines. Key environmental input from agency coordination through ETDM coordination, AN comments, and other public involvement and agency coordination is summarized within this *State Environmental Impact Report* (*SEIR*).

2.1 Social and Economic Impacts

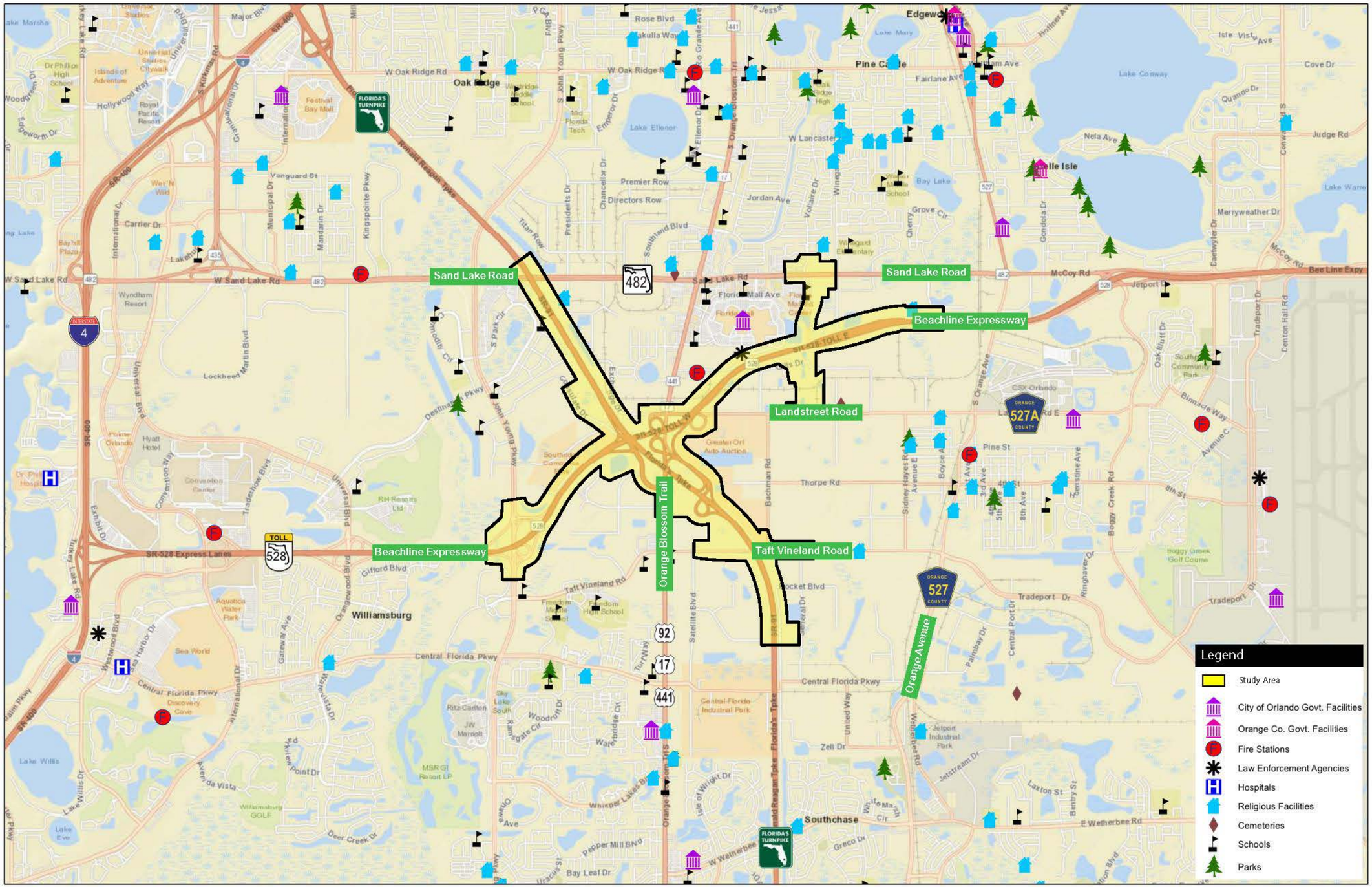
As part of the environmental analysis, an assessment of social impacts was completed in accordance with FDOT's PD&E Manual, Part 2, Chapter 4 – *Sociocultural Effects Evaluation*. The results of this assessment are provided below.

2.1.1 Social

The Orlando South Ultimate interchange will enhance access to the social resources located in the area. The proposed project includes improvements to the system to system interchange for the two limited access roadway facilities and the proposed construction of two new interchanges from the two limited access roadway facilities to surface roads. These improvements will improve emergency response and enhance emergency evaluation routes for the area and reduce surface street congestion. The Orange County GIS database was used to locate existing resources. The social resources listed are shown in **Figure 2-1: Location of Social Resources**. Additionally, the list below reflects the number of facilities that are located within the map boundary.

- City of Orlando Government facilities (10)
- Orange County Government facilities (2)
- Fire Stations (9)
- Law Enforcement (4)
- Hospitals (3)
- Religious facilities (57)
- Cemeteries (3)
- Schools (58)
- Parks (17)

Figure 2-1: Location of Social Resources



The project is located entirely within unincorporated Orange County. The ETDM Sociocultural Data Report (SDR) prepared for this project indicated the study area consisted of 0.772 square miles. Regarding geography there were two Census Block Groups in 2000 and five Census Block Groups in 2010 that were used to summarize the demographics in the SDR. The block group boundaries are shown in **Figure 2-2: Census Block Group Boundaries**.

Several sociocultural and economic characteristics were included in the SDR. The sources of the data collected included:

- 2000 Census Data, which reflects 100% count data or some sample-based information
- 2010 American Community Survey (ACS), which reflects sample data (i.e., 40% or 2.5% of U.S. households received the ACS questionnaire)

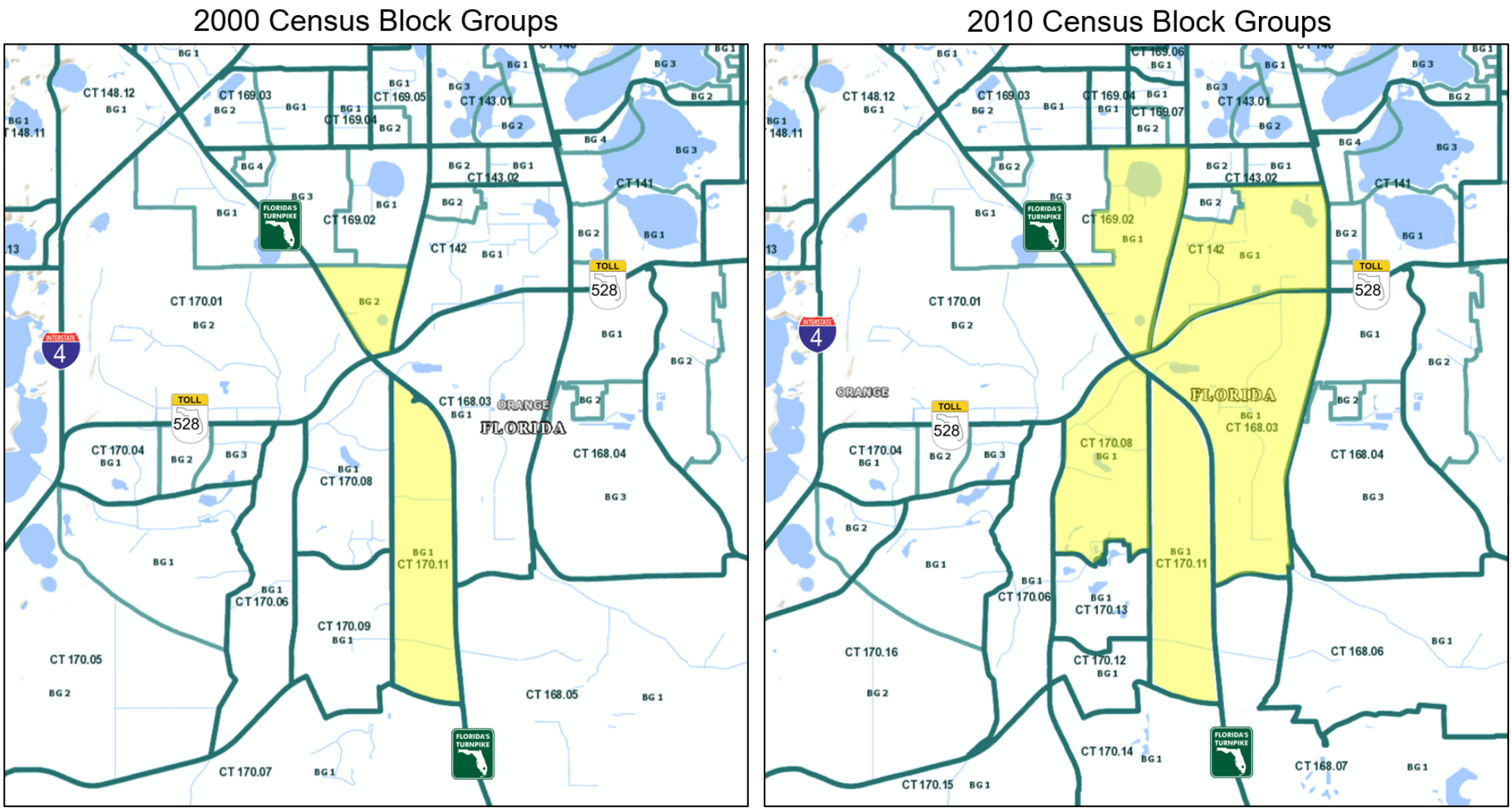
Table 2-1: Sociocultural and Economic Data Summary provides a comparison of key characteristic for both the study area and Orange County. Due to the differences in the sampling techniques for the 2000 and 2010 data, caution should be used when comparing this data.

Table 2-1: Sociocultural and Economic Data Summary

Description	Study Area		Orange County	
	2000	2010	2000	2010
General Population/Age				
Total	247	376	896,344	1,116,094
Average Persons per Household	2.88	3.00	2.61	3.00
Median Age	36	34	33	33
Age 65 and Over	8.91%	10.90%	10.04%	9.40%
Race/Ethnicity				
Hispanic or Latino of Any Race	87	186	168,191	287,760
% of Total Population	35%	49%	19%	26%
Not Hispanic of Latino of any Race	160	190	728,153	828,334
% of Total Population	65%	51%	81%	74%
Language (Age 5 and Over)				
Speak English Well	27	74	47,230	65,314
% of Total Population	53%	56%	54%	49%
Speak English Not Well or Not at All	24	57	40,039	67,954
% of Total Population	47%	44%	46%	51%
Total Surveyed	51	131	87,269	133,268
Income				
Median Household Income	$47,475	$47,229	$41,311	$50,138
Households Below Poverty Level	6.25%	12.50%	10.91%	12.68%
Households with Public Assistance Income	3.75%	1.67%	2.50%	1.44%

Regarding the Hispanic population living in the study area, **Table 2-1: Sociocultural and Economic Data Summary** illustrates in 2010 the population is almost split between Hispanic and Non-Hispanic, indicating the need to provide a Spanish translation of newsletters and notices.

Figure 2-2: Census Block Group Boundaries



Within the study area there are Census Designated Places (CDP). The United States Census Bureau defines a CDP as a:

> *"Statistical counterparts of incorporated places and are delineated to provide data for settled concentrations of population that are identifiable by name but are not legally incorporated under the laws of the state in which they are located. The boundaries usually are defined in cooperation with local or tribal officials and generally updated prior to each decennial census. These boundaries, which usually coincide with visible features or the boundary of an adjacent incorporated place or another legal entity boundary, have no legal status, nor do these places have officials elected to serve traditional municipal functions. CDP boundaries may change from one decennial census to the next with changes in the settlement pattern; a CDP with the same name as in an earlier census does not necessarily have the same boundary. CDPs must be contained within a single state and may not extend into an incorporated place. There are no population size requirements for CDPs"*

There are three CDPs located near the project:

- Oak Ridge
- Sky Lake
- Pine Castle

The existing land use designations obtained from the Orange County Government zoning map are shown on **Figure 2-3: Zoning Map**. This provides a general illustration of the land use located in the area. Currently the majority of the land is zoned industrial and planned development, which typically reflects a mixed-use type of development. There are three established residential subdivisions in the area:

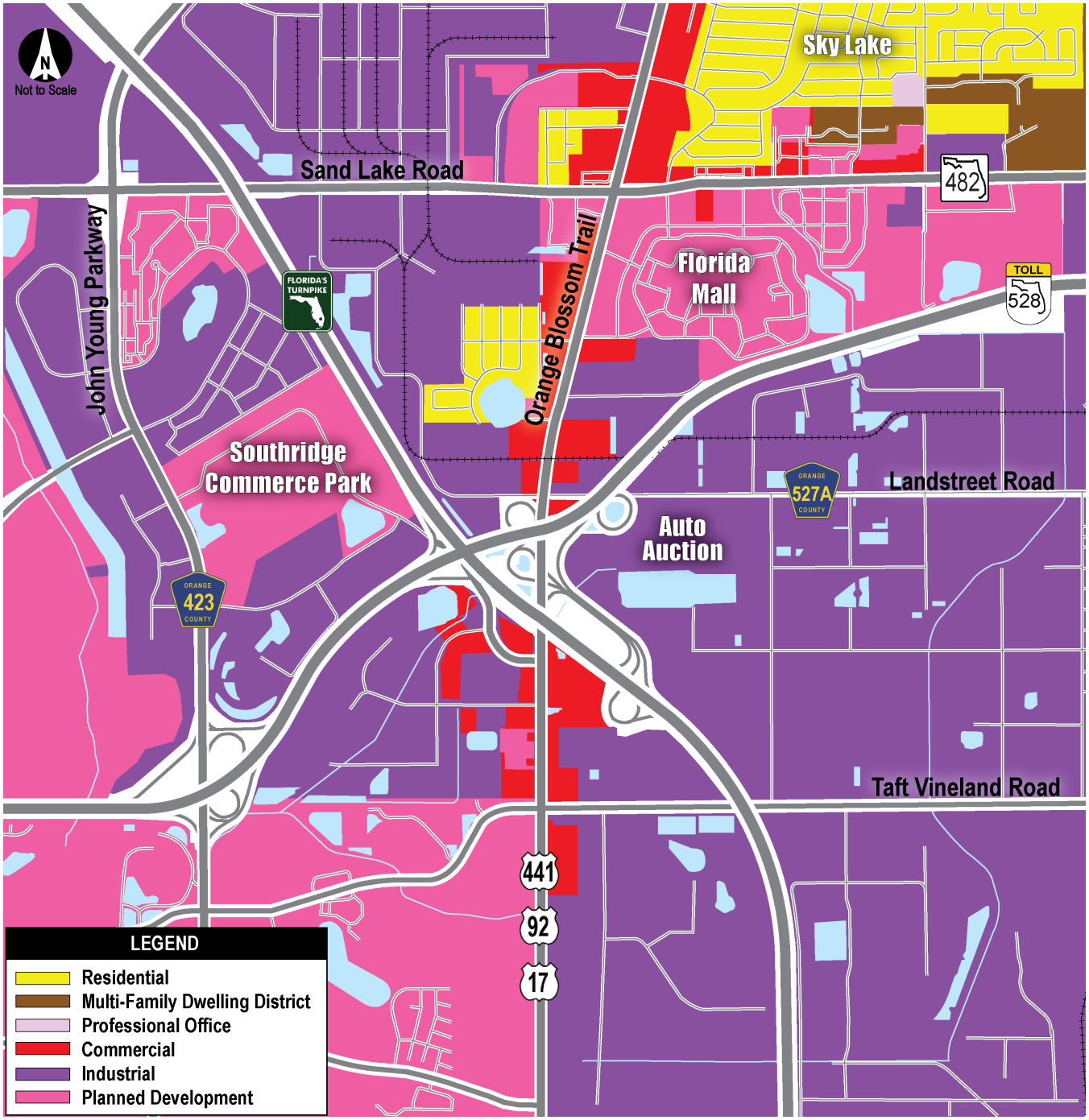
- Oak Ridge Manor
- Morningside
- Prosper Colony

Additionally, the Florida Mall is located to the northeast of the interchange and the Auto Market is located to the east of the interchange.

The South Orange Blossom Trail Overlay District established by Orange County provides a list of permitted land uses within the District. Additional it restricts the use of billboards and provides signing guidelines along Orange Blossom Trail. There is no other overlay district designated for this area.

Due to the land use characteristics primarily consisting of industrial and commercial uses, the primary goal is to support infill development and continue to enhance the community infrastructure including roadways to improve services to all land uses which will support and enhance economic development for the area.

Figure 2-3: Zoning Map



Source: Orange County Zoning Map, Published January 4, 2019

2.1.2 Economic

Population data was obtained from the University of Florida Bureau of Business and Economic Research (BEBR). As shown in **Table 2-2: Historical Population Data – Orange County**, Orange County experienced a higher annual growth rate between 2000 and 2010 when compared to the post 2010 data. **Table 2-3: BEBR Population Projections – Orange County** shows the low, medium and high projections for county.

Table 2-2: Historical Population Data – Orange County

2000	2010	2017	2000 – 2010 Annual Growth Rate (%)	2010 – 2017 Annual Growth Rate (%)
896,344	1,145,956	1,313,880	2.78%	1.47%

Table 2-3: BEBR Population Projections – Orange County

2018 Estimate	Estimation	2045 Projection	Annual Growth	Annual Growth Rate
1,349,597	Low	1,595,500	9,108	0.67%
	Medium	1,975,300	23,174	1.72%
	High	2,352,400	37,141	2.75%

One of the economic indicators of growth is employment. According to the Florida Department of Economic Opportunity, Orange County is projected to grow by 12.1 percent between 2018 and 2026 for all employment industries. This is slightly greater than the state growth in employment, which is expected to be 10.1 percent during the same time period. For Orange County the industry rankings are included in **Table 2-4: Fastest Growing Industries – Orange County** and **Table 2-5: Industries Gaining the Most Jobs – Orange County**.

The Florida Mall is located in the study area and is Central Florida's largest shopping center, spanning 1.7 million square feet. The mall has an established tourism-oriented business and private bus lines provide service to the mall from the Orlando areas tourist centers. Therefore, the economic status of the mall is expected to remain healthy for the future. Providing improved access will help to enhance the continued success of the mall.

The Leisure and Hospitality industry (i.e., tourism) accounted for 21.6 percent of the total employment in 2018, and in 2026 it is expected to be 21.2 percent. Additionally, the tourism industry (Accommodation, including Hotels and Motels and Amusement, Gambling, and Recreation) is expected to be in the top 20 for gaining the most jobs by 2026.

Although not directly serviced by the interchange, the Orange County Convention Plaza Overlay District and International Drive are located approximately four miles to the west of the project location. Based on their current planning efforts, Orange County expects the International Drive (I-Drive) corridor to see a significant increase in high-density mixed-use development in the future. Universal Orlando has also recently acquired approximately 500 acres of vacant land between the project location and I-Drive which has been zoned for theme park use and is expected to be developed as such in the future.

These developments will contribute to increasing traffic volumes on the limited access roadways that connect the area with other parts of the state, such as, Florida's Turnpike, Beachline Expressway, and I-4. Improvements on interchanges that surround this area of future growth will relieve congestion and provide efficient access to the new development and theme parks from multiple limited access facilities.

Table 2-4: Fastest Growing Industries – Orange County

Rank	NAICS Code	NAICS Title	Employment			
			2018	2026	Growth	Percent Growth
1	621	Ambulatory Health Care Services	35,538	46,668	11,130	31.3
2	454	Non-store Retailers	4,098	4,964	866	22.1
3	624	Social Assistance	9,883	11,897	2,014	20.4
4	622	Hospitals	27,614	32,972	5,358	19.4
5	451	Sporting Goods, Hobby Book and Music Stores	3,697	4,394	697	18.9
6	551	Management of Companies and Enterprises	16,053	18,874	2,821	17.6
7	811	Repair and Maintenance	9,582	11,255	1,673	17.5
8	481	Air Transportation	8,345	9,763	1,418	17.0
9	238	Specialty Trade Contractors	27,378	31,943	4,565	16.7
10	452	General Merchandise Stores	16,137	18,665	2,528	15.7
11	531	Real Estate	13,639	15,761	2,122	15.6
12	623	Nursing and Residential Care Facilities	10,004	11,529	1,525	15.2
13	444	Building Materials and Garden Equipment and Supplies Dealers	4,513	5,175	662	14.7
14	523	Securities, Commodity Contracts, and Other Financial Investments and Related Activities	3,602	4,121	519	14.4
15	541	Professional, Scientific, and Technical Services	63,284	72,004	8,720	13.8
16	488	Support Activities for Transportation	5,391	6,114	723	13.4
17	611	Educational Services	15,360	17,419	2,059	13.4
18	493	Warehousing and Storage	4,218	4,774	556	13.2
19	812	Personal and Laundry Services	9,302	10,506	1,204	12.9
20	920	State Government	18,852	21,262	2,410	12.8

Table 2-5: Industries Gaining the Most Jobs – Orange County

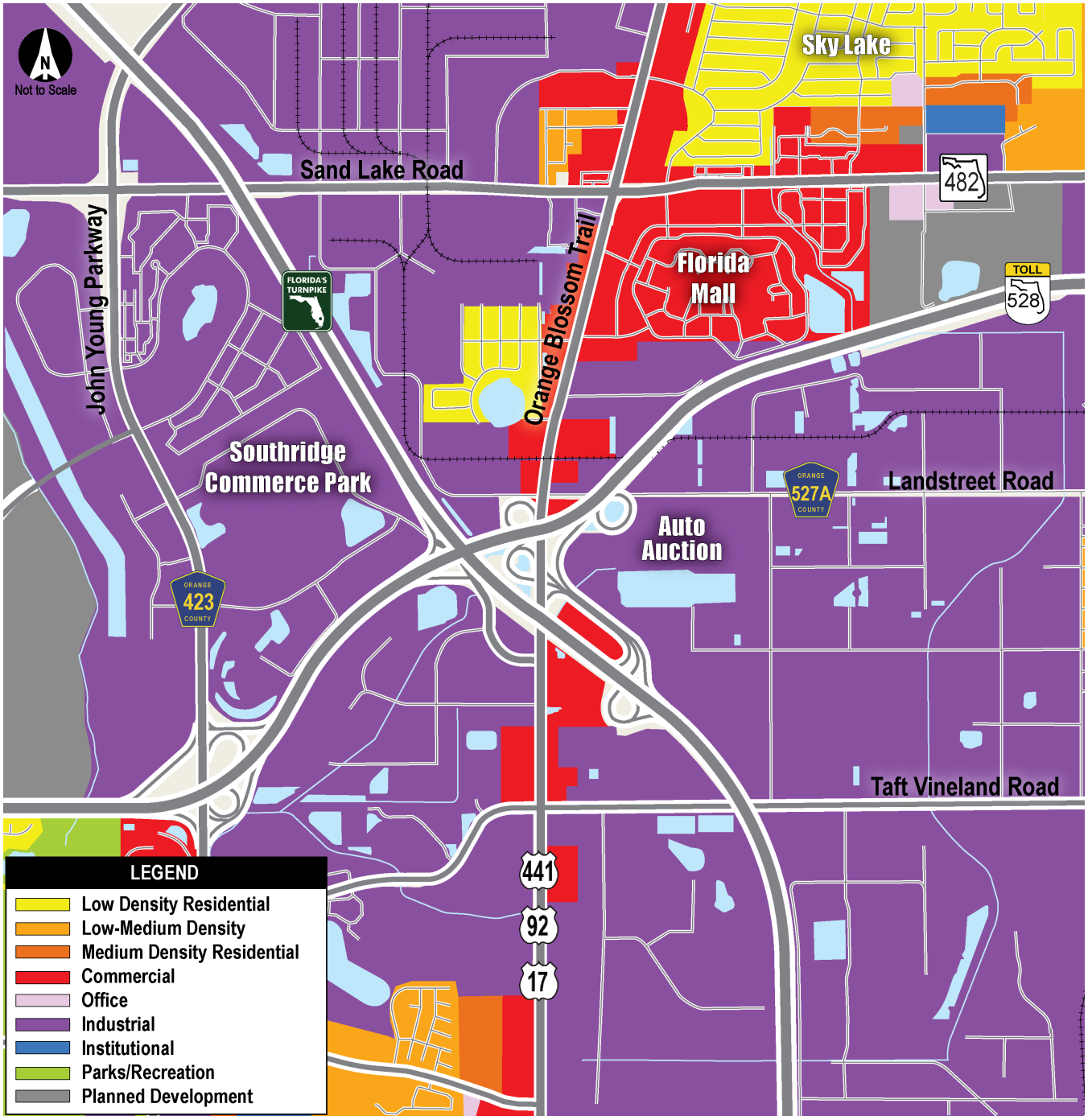
Rank	NAICS Code	NAICS Title	Employment			
			2018	2026	Growth	Percent Growth
1	621	Ambulatory Health Care Services	35,538	46,668	11,130	31.3
2	624	Social Assistance	9,883	11,897	2,014	20.4
3	622	Hospitals	27,614	32,972	5,358	19.4
4	551	Management of Companies and Enterprises	16,053	18,874	2,821	17.6
5	811	Repair and Maintenance	9,582	11,255	1,673	17.5
6	481	Air Transportation	8,345	9,763	1,418	17.0
7	238	Specialty Trade Contractors	27,378	31,943	4,565	16.7
8	452	General Merchandise Stores	16,137	18,665	2,528	15.7
9	531	Real Estate	13,639	15,761	2,122	15.6
10	623	Nursing and Residential Care Facilities	10,004	11,529	1,525	15.2
11	541	Professional, Scientific, and Technical Services	63,284	72,004	8,720	13.8
12	611	Educational Services	15,360	17,419	2,059	13.4
13	920	State Government	18,852	21,262	2,410	12.8
14	722	Food Services and Drinking Places	76,784	86,460	9,676	12.6
15	561	Administrative and Support Services	84,507	94,872	10,365	12.3
16	721	Accommodation, including Hotels and Motels	55,159	61,607	6,448	11.7
17	445	Food and Beverage Stores	13,932	15,284	1,352	9.7
18	930	Local Government	51,114	55,852	4,738	9.3
19	813	Religious, Grantmaking, Civic, Professional and Similar Organizations	22,427	24,505	2,078	9.3
20	713	Amusement, Gambling, and Recreational Industries	72,475	77,065	4,590	6.3

2.1.3 Land Use Changes

The existing zoning obtained from Orange County is shown on **Figure 2-3: Zoning Map**. The existing zoning surrounding the study interchange consist of four major zoning types, residential, commercial, industrial and planned development.

The future land use was obtained from the Orange County GIS database and is also documented in the Orange County Comprehensive Plan, is shown on **Figure 2-4: Future Land Use Map**. The future land use surrounding the study interchange consist of three major land use types, residential, commercial, and industrial.

Figure 2-4: Future Land Use Map



Source: 2010-2030 Orange County Comprehensive Plan Future Land Use Map, May 14, 2019

Since the Orange County uses zoning to reflect the existing land use, most of the difference between the two maps is the designation between planned development zoning and commercial and industrial land use. Planned development in zoning covers an umbrella of development types. For example, a developer may request zoning for a planned development that contains light industrial land use and/or commercial land use, etc. Since, the majority of the area surrounding the interchange is developed, shown on **Figure 2-5: Existing Aerial Photo**, it is anticipated that the no changes in land use will occur as a result of this project.

2.1.4 Mobility

Minimal disruptions to local traffic and traffic along Florida's Turnpike will occur during construction activities. In addition, in the event of a natural disaster or other scenarios requiring evacuation measures, the proposed interchanges will improve mobility for emergency responders and the public located within the area of the Orlando South interchange. By facilitating a more efficient movement of vehicular traffic, as well as providing enhancements to bicycle and pedestrian facilities, a net enhancement to mobility is expected.

2.1.5 Aesthetic Effects

Proposed construction of improvements to the existing Orlando South interchange, including modifications to the existing interchange and addition of two reliever interchanges, will not involve changes to the aesthetic character, compatibility, community values, sensitive areas or visual features within the project area. The majority of the project area consists of commercial and industrial development with limited natural lands which supports the determination of no involvement of aesthetic effects. However, to enhance the overall aesthetic character of the project corridor, aesthetic features will be included in the design of proposed structures and landscaping.

Structure Aesthetics

The project bridge aesthetic objective is to focus on a balance between form, function, color, texture, durability, and cost.

Per the Florida Design Manual (FDM) Section 121.9.3.(2), the levels of aesthetics can be described as:

- Level One (1): baseline aesthetic treatment with minor cosmetic improvements such as concrete colors, texturing of surfaces and pleasing shapes for columns and caps.
- Level Two (2): Level One plus full integration of efficiency, economy and elegance in all bridge components. This includes consideration of aesthetically enhanced piers shapes (i.e., hammerhead piers and oval columns), concrete texture through form liners; smooth superstructure shapes and transitions; as well as concealing pipes, conduits, and any other utilitarian attachments.
- Level Three (3): Level Two plus providing a synergy with environment. This level includes historic or highly urbanized areas where landscaping or unique "neighborhood features" are to be considered.

Based on the overall project environmental context and costs, and the varying significance of each bridge site, it has been determined that Aesthetics Level One and Two will be utilized, as applicable, throughout the project.

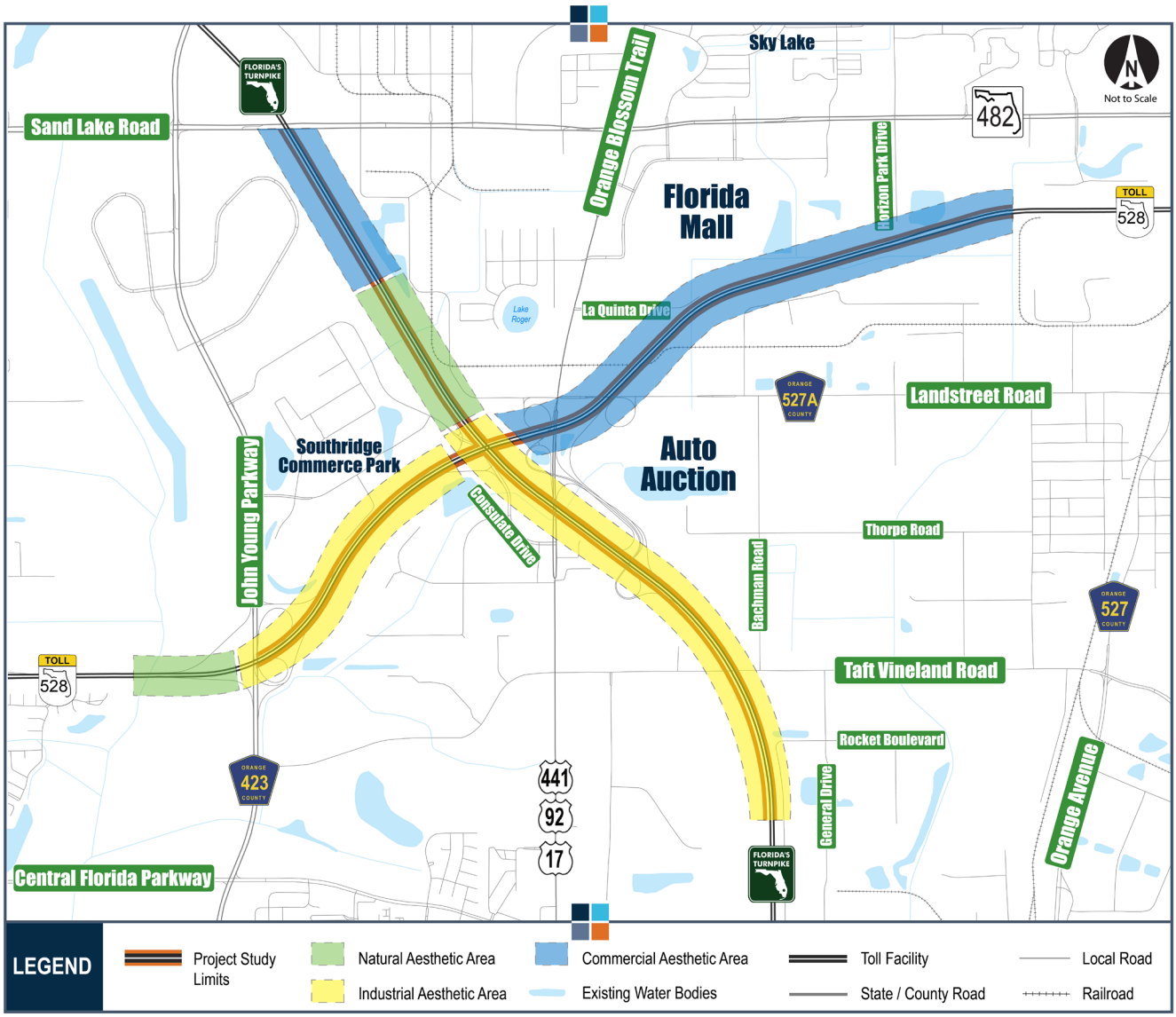
Landscape Aesthetics

Based on an evaluation of the project area, three general aesthetic areas were identified. These aesthetic areas are listed below and show in **Figure 2-6: Aesthetic Area Map**.

- Natural Aesthetic Area: consists of natural, green spaces and views adjacent to the corridor.
- Commercial Aesthetic Area: consists primarily of commercial business land uses and views.
- Industrial Aesthetic Area: consists primarily of industrial business land uses and views.

Figure 2-5: Existing Aerial Photo

Figure 2-6: Aesthetic Area Map



During the project design phase, five aesthetic effect criteria will be utilized to determine aesthetic treatments that will be utilized within each of these areas. These five criteria include:

- Character,
- Compatibility,
- Community Values,
- Sensitive Areas, and
- Visual Features.

2.1.6 Relocation Potential

A Conceptual Stage Relocation Plan (CSRP) was developed as part of the Florida's Turnpike Orlando South Ultimate Interchange from Florida's Turnpike (SR 91, MP 254) and Beachline Expressway (SR 528, MP 4) PD&E Study. Based on the CSRP, the Preferred Alternative will impact properties and require right of way to accommodate changes at both new and existing interchanges along the Beachline Expressway and the Florida Turnpike facilities, also referred

to as the Orlando South Ultimate Interchange. The Preferred Alternative will impact a total of 38 properties and result in 27 industrial / commercial relocations. Sixteen of the total relocations are business tenants and 11 are landlord businesses. **Table 2-6: Industrial/Commercial Relocations** shows the county parcel identification number and property owner for each relocation.

To minimize the unavoidable effects of right of way acquisition and displacement of people and businesses, the FDOT will carry out a *Right of Way Acquisition and Relocation Assistance Program* in accordance with Florida Statute 339.09 and the *Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970* (Public Law 91-646 as amended by Public Law 100-17) and the established guidelines by which these programs are administered. The FDOT provides advance notification of impending acquisition. Before acquiring right of way, all properties are appraised based on comparable sales and land use values in the area. Owners of property to be acquired will be offered and paid fair market value for their property rights.

Table 2-6: Industrial/Commercial Relocations

Owner	Address	Business Relocation	Landlord Relocation	Total Relocations
Taft Vineland Truck Repairs, LLC	998 Taft Vineland Road Orlando, FL 32824	1	1	2
Premium Truck Tires, LLC	998 Taft Vineland Road Orlando, FL 32824	1	0	1
Envirowaste	1425 Taft Vineland Road Orlando, FL 32837	1	1	2
JRC Auto Sales & Tire Shop	1435 Taft Vineland Road Orlando, FL 32837	1	1	2
Rob the Truck	1435 Taft Vineland Road Orlando, FL 32837	1	0	1
Universal Motors of Orlando	1445 Taft Vineland Road Orlando, FL 32837	1	1	2
Penske Truck Leasing	1303 Taft Vineland Road Orlando, FL 32837	1	0	1
Beyel Crane & Rigging	1235 Taft Vineland Road Orlando, FL 32837	1	1	2
7-Eleven	801 W. Sand Lake Road Orlando, FL 32809	1	1	2
Carvana Haulers	10615 Rocket Boulevard Orlando, FL 32824	1	1	2
Watershed Innovation	770 Gills Drive Orlando, FL 32824	1	1	2
Air Gas	851 Gills Drive #100 Orlando, FL 32824	1	1	2
Truck Pro	851 Gills Drive #200 Orlando, FL 32824	1	0	1
Technisch Creative	851 Gills Drive #900 Orlando, FL 32824	1	0	1
Inproduction	691 W. Landstreet Road Orlando, FL 32824	1	1	2
Furniture Factory Outlet	701 Landstreet Drive Orlando, FL 32824	1	1	2
Total		**16**	**11**	**27**

Based on the analysis in the CSRP, there is sufficient decent, safe and sanitary replacement housing and replacement industrial/commercial properties within the immediate vicinity and market area. Refer to the CSRP for more information on FDOT policies.

2.2 CULTURAL RESOURCES

The documentation of the existing and proposed conditions and the evaluation of the potential effects of the project on Cultural Resources are provided in the following support document completed as part of the Orlando South Ultimate Interchange Florida's Turnpike (SR 91, MP 254) and Beachline Expressway (SR 528, MP 4) PD&E Study*:*

- Cultural Resources Assessment Survey (CRAS) (March 2021)

A CRAS was conducted in accordance with the revised Chapter 267, Florida Statutes and standards embodied in the Florida Department of Historic Resources (FDHR) *Cultural Resource Management Standards and Operational Manual* (February 2003), and Chapter 1A-46 (*Archaeological and Historical Report Standards and Guidelines*), Florida Administrative Code. In addition, this report was prepared in conformity with standards set forth in Part 2, Chapter 8 - *Archaeological and Historical Resources* of the FDOT PD&E Manual. All work also conforms to professional guidelines set forth in the Secretary of Interior's Standards and Guidelines for Archaeology and Historic Preservation (48 FR 44716, as amended and annotated). Principal Investigators meet the Secretary of the Interior's Professional Qualification Standards (48 FR 44716) for archaeology, history, architecture, architectural history, or historic architecture.

The archaeological APE was defined as the footprint of any subsurface activities proposed within and extending outside of the existing right of way, as well as the footprint of the newly proposed right of way and pond sites. The historical APE was defined as the footprint of all proposed improvements and proposed right of way, adjacent parcels for a distance of up to 150 feet from the proposed at-grade improvements and proposed right of way, and a distance of 250 feet from the proposed level to elevated improvements. The archaeological and architectural surveys were completed in August 2019.

Background research was conducted to identify NRHP-listed, NRHP-eligible, and potentially eligible cultural resources present within the APE. Background research included a review of ETDM No. 14294 (May 2017), previous cultural resource assessments in the vicinity, Florida Master Site File (FMSF) data, and the NRHP. The methodology and results of the identification, evaluation, and assessment of cultural resources within the APE is documented separately in the CRAS.

Based on the background research and survey, no previously recorded or newly recorded archaeological sites were identified within the archaeological APEs. The CRAS identified a total of nine historic resources within the project APE and three within the pond site APE. Three were previously recorded sites determined by the State Historic Preservation Officer (SHPO) to be ineligible for listing in the NRHP and the remaining sites were considered ineligible for listing in the NRHP.

The CRAS was forwarded to the SHPO for consultation and review for determination of no NRHP-listed, NRHP eligible, or potentially eligible cultural resources within the APE. Copies of the SHPO concurrence letter (dated November 25, 2019 and signed January 08, 2020) is included in **Appendix D**.

The following sections summarize the results of the evaluation of cultural resources.

2.2.1 Historic Sites/Districts

As a result of the cultural assessment, a total of nine historic resources were identified within the historic resource APE of the project area. Of these nine resources, three were previously recorded and six are newly recorded. The three previously recorded structures (8OR9609, 8OR9610, and 8OR9611) were determined by the SHPO to be ineligible for listing in the NRHP. The six new structures included two bridges (8OR11512 and 8OR11513), two historic structures (8OR11514 and 8OR11515), one roadway segment (Orange Blossom Trail)(8OR11516), and one railroad segment (Seaboard Coast Line South Orlando Spur)(8OR11517); all of which were considered ineligible for listing in the NRHP either individually or as part of a historic district.

In addition, three historic resources were identified within the historic resources APE of the project preferred pond sites. Of these three resources, two were previously recorded and one is newly recorded. The two previously recorded structures (8OR9610 and 9OR9611) were determined by SHPO to be ineligible for listing in the NRHP.

The one new structure (9OR11516) is a roadway segment (Orange Blossom Trail) and is considered ineligible for listing in the NRHP.

2.2.2 Archaeological Sites

No archaeological resources were identified within or adjacent to the archaeological APE of either the project area or the project preferred pond sites.

Data from 16 CRASs previously conducted in the area, combined with regional site location predictive models indicate that prehistoric archaeological sites in this area tend to be in hardwood hammocks having slightly elevated land relative to the surrounding terrain, and adjacent to either freshwater ponds, large marshlands, or other reliable water sources. A listing of the 16 CRASs previously conducted in the project area may be found within the CRAS conducted for this project.

Historically, the project APE lacked elevated hammocks/tree islands and a diversity of natural resources that are usually associated with prehistoric archaeological sites. Thus, the project APE is considered to have a low archaeological site potential.

Additional cultural resource assessments of preferred stormwater management sites will be conducted during the project's design phase. The results of these additional assessments will be coordinated with the SHPO for their review and concurrence.

2.2.3 Recreational Areas

The proposed project is not located within 0.25 miles of any city or county parks. There are no designated national parks or forests, and there are no designated trails within the study area. No recreation areas will be adversely impacted as a result of proposed project improvements.

2.3 NATURAL ENVIRONMENT

The documentation of the existing and proposed conditions and the evaluation of the potential effects to the natural environment are provided in the following support documents completed as part of the Orlando South Ultimate Interchange Florida's Turnpike (SR 91, MP 254) and Beachline Expressway (SR 528, MP 4) PD&E Study*:*

- *Natural Resources Evaluation* (NRE) *Report* (March 2021)
- *Pond Siting Report* (PSR) (April 2021)
- *Location Hydraulics Report* (LHR) (April 2021)
- *Water Quality Impact Evaluation (WQIE) (February 2020)*

A natural resources evaluation was performed as part of the Orlando South Ultimate Interchange PD&E Study and documented in an NRE Report which combines the Endangered Species Biological Assessment and Wetland Evaluation. The NRE Report describes environmental communities in the study area, including wetlands and surface waters; discusses the protected species that may occur in the vicinity; and assesses the effects that the proposed improvements may have on these resources.

Data collection for the NRE were conducted through the review of existing literature and resource agency documents, and a field reconnaissance visits conducted on February 27, 2018 and March 28, 2019. Literature reviews were used to determine the current federal- and state-listed status of all protected fauna and flora species having the potential for occurrence within and adjacent to the project corridor. Field activities consisted of vehicular and limited pedestrian investigations within and adjacent to the right of way. Natural communities in the study area were characterized and evaluated, with an emphasis to assess the potential occurrence of federal or state listed species. Dominant vegetative species were noted as well as general conditions. Project biologists researched the public-accessible databases of the federal, state, and local government agencies to gather information on known sightings of listed species and important habitats in Orange County. These agencies included the USFWS, FWC, and Florida Natural Areas Inventory (FNAI). Land uses within and adjacent to the study area consist primarily of a

mix of man-dominated uplands and man-made wetlands, with interspersed areas of natural uplands and wetlands. The existing land uses and cover in the study area are described according to the *Florida Land Use Cover Classification System* (FLUCFCS), as mapped and defined by the SFWMD (2008).

The following sections summarize the potential effects to the natural environment based on the analysis of the proposed improvements.

2.3.1 Wetlands and Other Surface Waters

In accordance with Executive Order 11990, Protection of Wetlands, the project area was evaluated to determine potential impacts on wetlands. Wetlands and surface waters found within the project area include Mixed Wetland Hardwoods (FLUCFCS 6170), Cypress (FLUCFCS 6210), Wetland Forested Mixed (FLUCFCS 6300), Wetland Scrub (FLUCFCS 6310), Freshwater Marshes (FLUCFCS 6410), Channelized Waterways, Canals (FLUCFCS 5120), Channelized Waterways, Ditches (FLUCFCS 5130), and reservoirs (FLUCFCS 5300). Total direct wetland and surface water impacts associated with the preferred project alternative will include 8.91 acres of wetlands and 55.96 acres of surface waters. Due to the condition of existing wetlands within the project area, secondary impacts are anticipated to be minimal and will be quantified as part of the permitting process during the project design phase. The wetlands and surface waters found within the project area are described in detail below.

Channelized Waterways (FLUCFCS 5120 & 5130). This category includes rivers, creeks, canals and other linear water bodies where the water course is interrupted by a control structure. Within the project area, land uses that fall within this category are both roadside ditches and larger scale canals associated with the existing roadway and nearby developments.

Reservoirs (FLUCFCS 5300). Reservoirs are artificial impoundments of water. They are used for irrigation, flood control, municipal and rural water supplies, recreation and hydroelectric power generation. Dams, levees, other water control structures or the excavation itself usually will be evident. The reservoirs within the study area consist primarily of existing stormwater management facilities with control structures.

Mixed Wetland Hardwoods (FLUCFCS 6170). This category is reserved for those wetland hardwood communities which are composed of a large variety of hardwood species tolerant of hydric conditions yet exhibit an ill-defined mixture of species.

Cypress (FLUCFCS 6210). This community is composed of pond cypress or bald cypress which is either pure or predominant. In the case of pond cypress, common associates are swamp tupelo, slash pine, and black titi. In the case of bald cypress, common associates are water tupelo, swamp cottonwood, red maple, American elm, pumpkin ash. Bald cypress may be associated with laurel oak, sweetgum and sweetbay on less moist sites.

Wetland Forested Mix (FLUCFCS 6300). This category includes mixed wetland forest communities in which neither hardwoods nor conifers achieves a 66% dominance of the crown canopy composition.

Wetland Scrub (FLUCFCS 6310). This community is associated with topographic depressions and poorly drained soil. Associated species include pond cypress, swamp tupelo, willows, and other low scrub with no dominate species.

Freshwater Marshes (FLUCFCS 6410). The communities in this category are characterized by having one or more of the following species predominate: sawgrass, cattail, arrowhead, maidencane, buttonbush, cordgrass, giant cutgrass, switchgrass, bulrush, and needle rush.

Table 2-7: Potential Impacts by Wetland Type presents potential wetland and surface water impacts associated with the Preferred Alternative. Existing wetlands are jurisdictional to federal and state environmental regulatory agencies (USACE and SFWMD). As presented in **Table 2-7: Potential Impacts by Wetland Type**, impacts to these wetlands total 8.91 acres, and include 7.83 acres of impact to forested systems and 1.08 acres of impact to herbaceous systems. Anticipated impacts to surface waters total 55.96 acres and include 12.74 acres to channelized waterways and 43.22 acres to reservoirs.

The potentially affected wetland areas were evaluated using the Uniform Mitigation Assessment Method (UMAM) to assess their ecological functions and determine the amount of mitigation necessary to offset the loss. Required habitat mitigation for Channelized Waterways (FLUCFCS 5120 & 5130) and Reservoirs (FLUCFCS 5300) is not anticipated. A total of approximately 128 acres of additional surface waters will be created for stormwater management purposes. These surface waters will replace the functions provided by the 55.96 acres of existing surface waters impacted by project construction. The UMAM assessment of forested and herbaceous wetlands within the project area, estimates that 3.95 UMAM credits would be required to offset the 8.91 acres of potential jurisdictional wetland impacts. Due to the condition of existing wetlands within the project area, secondary impacts are anticipated to be minimal and will be quantified as part of the permitting process during the project design phase.

In accordance with FDOT's PD&E Manual, Part 2, Chapter 9 - *Wetlands and Other Surface Waters*, compensatory mitigation of wetland impacts resulting from FDOT projects, *a*s per Section 373.4137, F.S., "will be funded by the FDOT and be carried out by the use of mitigation banks and any other mitigation options that satisfy state and federal requirements."

Table 2-7: Potential Impacts by Wetland Type

FLUCFCS Code	FLUCFCS Description	Impact Area of Preferred Alternative (acres)	UMAM Score	Functional Loss
5120	Channelized Waterways, Canals	6.23	N/A	N/A
5130	Channelized Waterways, Ditches	6.51	N/A	N/A
5300	Reservoirs	43.22	N/A	N/A
Surface Water Total		**55.96**	**0.00**	**0.00**
6170	Mixed Wetland Hardwoods	1.65	0.40	0.66
6210	Cypress	5.70	0.47	2.68
6216	Cypress – Wetland Forested Mixed	0.48	0.43	0.21
6310	Wetland Scrub	0.10	0.33	0.03
6410	Freshwater Marsh	0.45	0.37	0.17
6417	Freshwater Marsh with Shrubs, Brush, and Grasses	0.53	0.37	0.20
Forested Wetland Total		**7.83**	**---**	**3.55**
Herbaceous Wetland Total		**1.08**	**---**	**0.40**
Wetland Total		**8.91**	**---**	**3.95**

Mitigation banks with service areas that extend over the project area and which may potentially be used to offset wetland impacts include:

- Bullfrog Bay Mitigation Bank
- Collany Mitigation Bank
- Florida Mitigation Bank
- Hatchineha Ranch Mitigation Bank
- Quickdraw Mitigation Bank
- Reedy Creek Mitigation Bank
- Shingle Creek Mitigation Bank
- Southport Ranch Mitigation Bank
- Split Oak Mitigation Bank

2.3.2 Aquatic Preserves and Outstanding Florida Waters

There are no Outstanding Florida Waters (OFW) or Aquatic Preserves found within the project area. The proposed project will have no effect on these resources.

2.3.3 Water Quality and Water Quantity

The proposed project is located primarily within the limits of the South Florida Water Management District (SFWMD) and crosses two major drainage basins. A small segment of the project area, located north of the Beachline Expressway and east of Florida's Turnpike, is within the limits of the St. Johns River Water Management District (SJRWMD). The Florida's Turnpike corridor from its southern limits to Taft Vineland Road lies within the Boggy Creek Basin, and from Taft Vineland Road to its northern limits within the Shingle Creek Basin. A total of 20 sub-basins were identified within the project study area. All drainage basins are open basins and ultimately discharge to Boggy Creek (Water Body Identification Number [WBID] 3168B) and Shingle Creek (WBID Number 3169A). Stormwater runoff intercepted by roadside drainage swales is typically drained to the low point along the roadway within each sub-basin and conveyed across the right of way by existing cross drain culvert or bridge structures. Several sub-basins contain multiple cross drains.

The ETDM Summary Report (2017) noted that the proposed project was assigned a Moderate Degree of Effect (3) on Water Quality by SFWMD. The proposed project was evaluated for potential impacts to surface water and groundwater resources within the study area. As part of the evaluation, a Water Quality Impact Evaluation was completed for the existing basins within the study area in accordance with Part 2, Chapter 11 - *Water Quality and Stormwater* of the FDOT PD&E Manual.

A Pond Siting Report, dated April 2021 and a Location Hydraulic Report, dated April 2021 were completed in accordance with Part 2, Chapter 11, *Water Quality and Stormwater* and Part 2 Chapter 13, *Floodplains* of the FDOT PD&E Manual, respectively. These reports utilized the National Flood Insurance Program maps to determine highway location encroachments, evaluated risks associated with the implementation of the project, impacts on natural and beneficial floodplain values, support of incompatible floodplain development, and measures to minimize floodplain impacts. Local, state and federal water resources and floodplain management agency regulations and guidelines were reviewed to ensure that the proposed project is consistent with existing floodplain management programs.

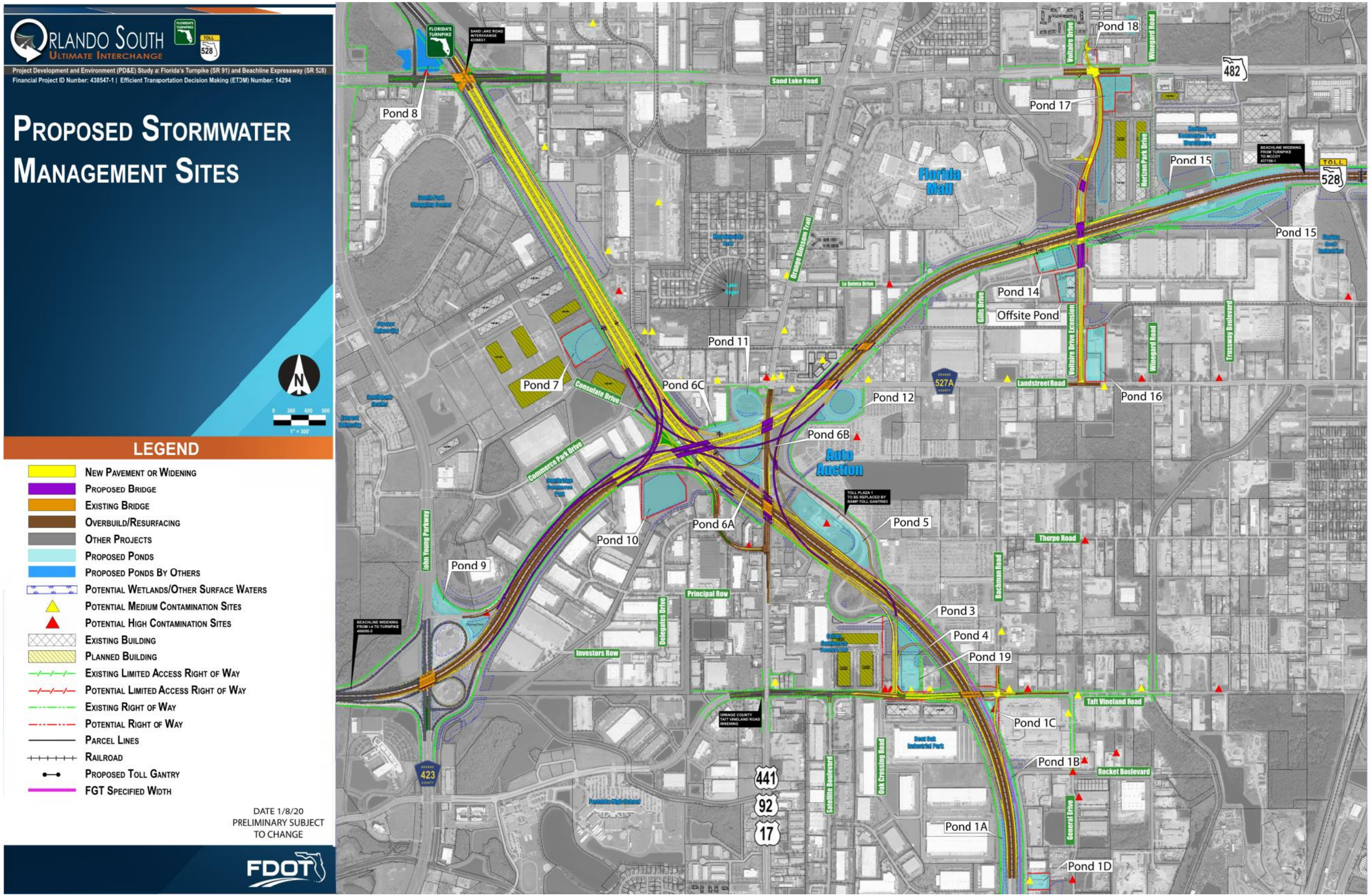
The stormwater runoff from the project limits will be collected and conveyed in roadside ditches or closed drainage systems to 21 on-site and off-site wet detention swales and ponds. **Figure 2-7**: **Proposed Stormwater Management Sites** shows the location of proposed stormwater management facilities. These preferred alternative stormwater management facilities were developed in accordance with the rules and regulation of the SFWMD and FDOT. Water quality treatment and water quantity attenuation requirements will be achieved through the construction of these ponds, some of which will require the acquisition of additional right of way. Approximately 48.1 acres of additional right of way will be required for stormwater management. This estimate of right of way needed is based on a volumetric analysis which accounts for water quality treatment and water quantity for runoff attenuation. The recommendations were based on pond sizes determined from preliminary data calculations and reasonable engineering assumptions and judgment. The study estimates the total required water quality treatment and attenuation volume to be approximately 102 acre-feet. The preferred pond sites provide a total of approximately 194 acre-feet of water quality treatment and attenuation volume. Pond sizes and configurations may change during final design as more detailed information becomes available.

The Preferred Alternative is expected to result in **no substantial water quality or quantity impacts**.

2.3.4 Wild and Scenic Rivers

No Wild and Scenic Rivers are present within the project area. The proposed project will have no effect on these resources.

Figure 2-7: Proposed Stormwater Management Sites



2.3.5 Floodplains

Potential floodplain impacts estimated for the Orlando South Ultimate Interchange are in accordance with Executive Order 11988, Floodplain Management, U.S. Department of Transportation Order 5650.2, Floodplain Management and Protection, and Federal-Aid Policy Guide 23 CF1R 650A. Floodplains must be protected. The intent of these regulations is to avoid or minimize highway encroachments within the 100-year (base) floodplains, and to avoid supporting land use development, which is incompatible with floodplain values. The Federal Emergency Management Agency (FEMA) Flood Insurance Rate Maps (FIRM) developed for Orange County were used to identify potential floodplain encroachments associated with this study. Proposed interchange improvements and roadway widening will impact the floodplain at various locations within the study area. According to FEMA FIRM Map Numbers 12095C0410F and 12095C0420F (effective date of revision to both panels: 11/25/2009), portions of the proposed roadway and roadside swales are located in the 100-year floodplain. The areas impacted by the proposed roadway show an AE designated 100-year floodplain with Base Flood Elevation (BFE) varying from 89.0 North American Vertical Datum (NAVD '88) to 97.0 (NAVD'88).

At the local level, the SFWMD regulates the FEMA-mapped floodplain as part of the Environmental Resource Permit (ERP) process. The SFWMD requires replacement of floodplain storage lost because of encroachments or demonstration of no impact to offsite properties. In addition, the SFWMD and FDOT design criteria for conveyance systems (e.g., culverts) allow no significant increase in flood stages. Approximately 71.9-acre feet of floodplain impacts are anticipated as a result of the proposed project. As required by the SFWMD, floodplain compensation measures will be implemented and will include approximately 82-acre feet of cup-for-cup floodplain replacement.

There are two waterways within the study area designated as FEMA floodways, Shingle Creek and Boggy Creek. Shingle Creek passes from north to south along the western side of the study area crossing the Beachline Expressway and Florida's Turnpike. The west branch of Boggy Creek (Sky Lake Canal) passes through the project at the Beachline Expressway reliever interchange at the Voltaire Drive Extension.

There are no anticipated encroachments into the Shingle Creek floodway by the proposed widening of the Beachline Expressway Bridge (Bridge Number 750631). The Sky Lake Canal is a designated FEMA floodway and impacts to this canal will be hydraulically balanced to avoid upstream and downstream flooding due to the proposed roadway improvements. In this area, bridges or box bridges will be used to span the encroachments.

This project will have no adverse impact to the area's water quality. Stormwater treatment of the additional impervious areas will be treated as required by the SFWMD ERP. There is no change in flood "Risk" associated with this project. The following floodplain statement is a slightly modified version of statement Number 4 in the FDOT's PD&E Manual, tailored for this project:

The construction of fill within the floodplain, and the modification of existing drainage structures for this project will be mitigated by floodplain compensation where required. These changes may cause minimal increases in flood heights and flood limits; however, will not result in any significant adverse impacts on the natural and beneficial floodplain values or any significant changes in flood risk or damage. There will not be a significant change in the potential for interruption or termination of emergency service or emergency evacuation routes. Construction of the proposed project will greatly enhance existing evacuation facilities in the area. Therefore, it has been determined that this encroachment is not significant.

2.3.6 Coastal Barrier Resources

No Coastal Barrier Resources are present within the project area. The proposed project will have no effect on these resources.

2.3.7 Protected Species and Habitat

The project was evaluated for impacts to wildlife and habitat resources, including protected species, in accordance with the Endangered Species Act (ESA) of 1973, as amended, the Florida Endangered and Threatened Species Act, and the FDOT PD&E Manual Part 2, Chapter 16 - *Protected Species and Habitat*. The ETDM Summary Report notes that the USFWS, FWC and FDACS assessed the direct impacts to fish and wildlife resources as minimal,

primarily based on the small amount of natural habitat in the project area and the developed nature of the project corridor. However, the USFWS did identify potential project related impacts to suitable foraging habitat of the wood stork as a concern.

USFWS classifies protected wildlife as endangered (E), threatened (T), proposed for listing (P) or candidate for listing (C). FWC applies the same federal classification to those species found in Florida and classifies additional wildlife species found in Florida as threatened (T) or species of special concern (SSC). Those federal and state listed species found within Orange County and having the potential to be found within the project area are discussed below. Species identified from existing data bases or observed during field reviews are shown in **Figure 2-8: Listed Species Historic Location Data and Field Observations Map.**

Federal Protected Animal Species

The project falls entirely within the USFWS consultation areas (CAs) of the Florida scrub-jay, red-cockaded woodpecker, Everglade snail kite, and sand skink. The southern limits of the project also falls within the CA of the crested caracara, and the project falls partially or entirely within the core foraging areas (CFAs) of four wood stork colonies.

The project area is not located within USFWS designated critical habitat (CH) for any species.

Six federally listed wildlife species were identified as potentially occurring within the study area (based on known range and presence of suitable habitat). These species include the Eastern indigo snake, sand skink, Florida scrub-jay, crested caracara, wood stork, and Everglades snail kite. In addition, 11 federally listed plant species have the potential to occur within the project study area. Direct, temporary, indirect, and cumulative effects are not expected for these species as documented in the NRE Report.

A list of the federally listed wildlife and plant species that have the potential to occur within the project area, and their effects determination are provided in **Table 2-8: Federally Listed Species and Their Effects Determination**.

Table 2-8: Federally Listed Species and Their Effects Determination

Effect Determination	Species
No Effect	Florida Bonamia (*Bonamia grandiflora*) Scrub Buckwheat (*Eriogonum longifolium var gnaphalifolium*) McFarlin's Lupine (*Lupinus aridorum*) Papery Whitlow Wort (*Paronychia chartacea*) Lewton's Polygala (*Polygala lewtonii*) Sandlace (*Polygonella myriophylla*) Scrub Plum (*Prunus geniculata*) Sand Skink *(Neoseps reynoldsi)* Florida Scrub-Jay (*Aphelocoma coerulescens*) Crested Caracara (*Caracara cheriway*) Everglade Snail Kite (*Rostrhamus sociabilis plumbeus*)
May Affect, but is Not Likely to Adversely Affect	Pigeon Wings (*Clitoria fragrans*) White Squirrel-banana (*Deeringothamnus pulchellus*) Britton's Bear-grass (*Nolina brittoniana*) Clasping Warea (*Warea amplexifolia*) Eastern Indigo Snake *(Drymarchon corais couperi*) Wood Stork (*Mycteria americana*)

Figure 2-8: Listed Species Historic Location Data and Field Observations Map

Figure 4-1 - Listed Species: Historic Location Data and Field Observations Map

FPID #: 438547-1-22-01
Orlando South Ultimate Interchange PD&E Study
Orange County, Florida

All data within this map are supplied as is, without warranty. This product has not been prepared for legal, engineering, or survey purposes. Users of this information should review or consult the primary data sources to ascertain the usability of the information.

State-only Protected Animal Species

A total of ten state-only listed wildlife species were identified as potentially occurring within the study area (based on known range and presence of suitable habitat). These species include the gopher tortoise, Florida pine snake, Florida sandhill crane, Florida burrowing owl, wading birds (little blue heron, reddish egret, tricolored heron, roseate spoonbill), Southeastern American kestrel, and least tern. In addition, 17 state-only listed plant species have the potential to occur within the project study area. Direct, temporary, indirect, and cumulative effects are not expected for these species as documented in the NRE Report.

A list of the federally listed wildlife and plant species that have the potential to occur within the project area, and their effects determination are provided in **Table 2-9: State-only Listed Species and Their Effects Determination**.

Protected Non-listed Animal Species

While not identified as federal or state listed protected species, additional species are afforded protection under other federal and/or state regulations. Wildlife species which have the potential to occur within the project area and are protected under federal or state regulations include the Bald Eagle, Southern Fox Squirrel, Florida Black Bear, and bat species. Direct, temporary, indirect, and cumulative effects are not expected for these species as documented in the NRE Report.

A list of the other protected wildlife species that have the potential to occur within the project area, and their effects determination are provided in **Table 2-10: Other Protected Species and Their Effects Determination**.

Based on the findings of database searches, field surveys, and regulatory agency coordination, no significant adverse impacts are anticipated to the regional populations of the federally listed species protected by the ESA of 1973, amended (16 U.S.C. 1531 et seq.), because of the proposed improvements. This finding fulfills the requirements of the Act.

Further information on potential involvement with listed threatened and endangered species, and state-only protected species and SSC is provided in the NRE Report (March 2021).

Table 2-9: **State-only Listed Species and Their Effects Determination**

Effect Determination	Species	
No Effect Anticipated	Florida Pine Snake (*Pituophis melanoleucus mugitus*) Florida Burrowing Owl (*Athene cunicularia floridana*)	
No Adverse Effect Anticipated	Florida Beargrass (*Nolina atopocarpa*) Delicate Spleenwort (*Asplenium verecundum*) Star Anise (*Illicium parviflorum*) Lowland Loosestrife (*Lythrum flagellare*) Florida Spiny-pod (*Matelea floridana*) Sandhill Spiny-pod (*Matelea pubiflora*) Celestial Lily (*Nemastylis floridana*) Hand Fern (*Ophioglossum palmatum*) Cut-throat Grass (*Panicum abscissum*) Orange Rein Orchid (*Platanthera integra*) Plum Polypoda (*Polypodium plumula*) Swamp Plum Polypody (*Polypodium ptilodon*) Florida Willow (*Salix floridana*)	Clarke's Buckthorn (*Sideroxylon alachuense*) Small Ladiestresses (*Spiranthes brevilabris*) Austin's Dawnflower (*Stylisma abdita*) Three-birds Orchid (*Triphora trianthophoros*) Gopher Tortoise (*Gopherus polyphemus*) Florida Sandhill Crane (*Antigone canadensis pratensis*) Little Blue Heron (*Egretta caerulea*) Reddish Egret (*Egretta rufescens*) Tricolored Heron (*Egretta tricolor*) Roseate Spoonbill (*Platalea ajaja*) Southeastern American Kestrel (*Falco spaverius paulus*) Least Tern (*Sternula antillarum)*

Table 2-10: Other Protected Species and Their Effects Determination

Effect Determination	Species
No Effect	Bald Eagle (*Haliaeetus leucocephalus*)
No Effect Anticipated	Southern Fox Squirrel (*Sciurus niger niger*) Bats (multiple species)
No Adverse Effect Anticipated	Florida Black Bear (*Ursus americanus floridanus*)

Based on the findings of the data collection, corridor surveys and ongoing coordination with the USFWS and FWC, Florida's Turnpike Enterprise will commit to the following:

- The USFWS "*Standard Protection Measures for the Eastern Indigo Snake*" will be implemented to assure that the Eastern indigo snake will not be adversely impacted by the project.
- Impacts to suitable foraging habitat for the federally protected wood stork will be mitigated through the purchase of credits from a U.S. Fish and Wildlife Service approved mitigation bank pursuant to Section 373.4137, F.S. or as otherwise agreed to by FTE and the appropriate regulatory agencies. FTE will consult with USFWS through the USACE permitting process and provide documentation that impacts to wood stork foraging habitat are offset.
- A gopher tortoise survey within the construction limits (including roadway footprint, construction staging areas, and stormwater management ponds) will be performed prior to the start of project construction per Florida Fish and Wildlife Conservation Commission guidelines. FTE will secure any relocation permits needed and ensure that gopher tortoises are relocated prior to construction.
- The FTE will follow the FDOT Supplemental Standard Specification 7-1.4.1 *Additional Requirements for the Florida Black Bear* to minimize human-bear interactions associated with construction sites during project construction

2.3.8 Essential Fish Habitat

No essential fish habitat (EFH) pursuant to the Magnuson-Stevens Fishery Conservation and Management Act (MSA) of 1976, as amended, is present within the project area. The proposed project will have no effect on essential fish habitat.

2.4 PHYSICAL ENVIRONMENT

The documentation of the existing and proposed conditions and the evaluation of the potential physical impacts to the study area are provided in the following support documents completed as part of Orlando South Ultimate Interchange Florida's Turnpike (SR 91, MP 254) and Beachline Expressway (SR 528, MP 4) PD&E Study*:*

- Noise Study Report (NSR) (March 2021)
- Air Quality Technical Memorandum (March 2021)
- Contamination Screening Evaluation Report (CSER) (March 2021)
- Utility Assessment Report (UAR) (March 2021)

The following sections summarize the potential physical impacts to the study area based on the analysis of the proposed project improvements.

2.4.1 Highway Traffic Noise

The NSR was prepared for this project where a total of 11 receptor points representing 11 special use noise sensitive sites located adjacent to the Orlando South interchange were evaluated for traffic noise related impacts within the project limits. Of the 11 noise sensitive sites there are no Noise Activity Category (NAC) B residences, one NAC C outdoor seating area at a senior living community, four NAC D interior receptors at church facilities, and six outdoor use NAC E receptors at: hotel pools, a restaurant seating area, and outdoor seating at number of office

buildings within the project area. The results of the analysis indicate that exterior traffic noise levels for the future year (2045) build alternative are predicted to range from 58.0 dB(A) to 73.2 dB(A). The maximum increase at any noise sensitive site in the future build condition is 4.6 dB(A). This means that no noise sensitive sites are expected to experience a substantial increase in traffic noise compared to existing conditions.

Noise levels at two special use sites are predicted to approach or exceed the NAC (i.e., 71 dB(A) for Activity Category D) established by the Federal Highway Administration (FHWA) for the Build condition. Noise barriers were evaluated for these special use sites. Noise barriers were determined not to be a potentially feasible and reasonable noise abatement measure at either location, the La Quinta Inn & Suites outdoor pool area and on outdoor seating area at an office building. At the La Quinta Inn & Suites a combination of a 22-foot tall right of way barrier and a 14-foot & 8-foot tall shoulder barriers along Florida's Turnpike were evaluated and were not able to provide a 5 dB(A) benefit to this receptor. This is likely due to the traffic noise from an adjacent local roadway not shielded by the noise barrier system. A 22-foot tall noise barrier at the right of way was evaluated for the outdoor seating area at the office building and while it was able to provide a 5 dB(A) benefit to the impacted location, it was not cost reasonable. Based on the analyses performed to date, there are no feasible and reasonable solutions available to mitigate noise impacts at La Quinta Inn & Suites pool or at the outdoor seating area at an office building. Additional information on the noise analysis conducted for this project may be found within the project's NSR.

Highway noise will be reassessed during the project's design phase to confirm if any new noise sensitive receptors received construction permits prior to the Date of Public Knowledge, which is the date the SEIR was approved.

2.4.2 Air Quality

An air quality analysis was performed, and an Air Quality Technical Memorandum was developed for the Opening Year (2025) and Design Year (2045) for the No- Build Alternative and the Preferred Alternative. The methodology and results are documented in the project files. The analysis was conducted in compliance with Part 2, Chapter 19 - *Air Quality* of the FDOT's PD&E Manual.

The project alternatives were subjected to a carbon monoxide (CO) screening model that makes various conservative worst-case assumptions related to site conditions, meteorology and traffic. The FDOT's screening model for CO uses United States Environmental Protection Agency (USEPA) - approved software to produce estimates of one-hour and eight-hour CO at default air quality receptor locations. The one-hour and eight-hour estimates can be directly compared to the current one-and eight-hour NAAQS for CO.

The project-level analysis for the No-Build and Build alternatives was performed using the procedures documented in the *User's Guide to CO Florida* (FDOT 2012). The alternatives were evaluated for both the project's opening year (2025) and the project's design year (2045). To evaluate the effect of the project, the results of the screening test for both alternatives and both years were compared to the one- and eight-hour NAAQS for CO (35 and 9 parts per million [ppm], respectively).

Based on the screening model results, the highest predicted one- and eight-hour concentrations would not exceed the NAAQS for carbon monoxide regardless of alternative in either the opening or design year of the project. Therefore, the project "passes" the air quality screening test.

2.4.3 Contamination

A contamination screening evaluation was conducted and documented in accordance with FDOT's PD&E Manual, Part 2, Chapter 20 – *Contamination*. The purpose of this survey was to identify, review, and provide risk ratings for properties or facilities that have potential contamination sites that may be impacted by the proposed improvements. The evaluation included an identification of potential contamination sites within the study area, as documented in the *Level 1 Contamination Screening Evaluation Report (CSER)*, prepared for this study. In accordance with FDOT guidance, the "search distances" (i.e., contamination screening buffers) vary depending on the context of the project and type of contamination source.

Because the project also involves a number of stormwater pond locations, these same buffer distances were used from the closest edge of the proposed pond locations.

Based on a preliminary assessment of contamination risk, the potential sites were assigned a contamination risk potential rating of no risk, low risk, medium risk and high risk. A total of 162 locations within the study area were investigated for sites that may present the potential for finding petroleum contamination or hazardous materials, and therefore may impact the proposed improvements for this project. The investigation of the 162 sites resulted in the following risk ratings: Six "High" rated sites, 12 "Medium" rated sites, 144 "Low" rated sites, and zero sites rated "No" for potential contamination. No additional assessment is recommended for sites ranked "Low."

There were no sites identified in the project area that are listed on the U.S. EPA "Superfund" program, involved mining, waste treatment or constitute other large-scale sources of environmental contamination.

During the final design phase, Level II field screening should be conducted for locations with risk ratings of "Medium" or "High," if the identified contamination concerns have impacted the existing and/or proposed right of way. **Table 2-11: Medium- and High-Ranked Contamination Sites** provides a summary listing of the Medium- and High-Risk Contamination sites. This information includes the site I.D. number, site name and address, agency databases from which site-specific information was obtained, distance from the right of way and other supporting information that describes the potential contamination risks to the project.

A soil and groundwater sampling plan will be developed for all sites for which a Level II field screening is proposed. The sampling plan will provide sufficient detail as to the number of soil and groundwater samples to be obtained and the specific analytical test to be performed. A site location sketch showing all proposed boring locations and groundwater monitoring wells will be prepared. The Level II field screening plan will be submitted to and coordinated with the District Contamination Impact Coordinator.

Site location maps and additional site specific information can be found in the Contamination Screening Evaluation Report developed for this project.

2.4.4 Utilities and Railroads

The ETDM Summary Report noted that the proposed project was assigned a Minimal Degree of Effect (2) for Infrastructure within the project corridor. The proposed project was evaluated for potential impacts to utilities and railroads within the study area. As part of this study a *Utility Assessment Report*, dated March 2021, was developed in accordance with Part 2, Chapter 21, *Utilities and Railroads* of the FDOT PD&E Manual.

Utilities

Eighteen existing utilities have been identified in the project area. Major utilities include telecommunications and fiber optics, electric, power, gas, water and wastewater. These existing utilities are described in **Table 2-12: Existing Utility Information.** Due to the extent of roadway and drainage improvements, existing utilities located within the project corridor will likely be impacted. These utility impacts have been quantified and the estimated relocation costs can be found with the project's *Preliminary Engineering Report*, dated March 2021; located in the project files.

It is anticipated that nine utilities will be impacted by the proposed project. These impacted utilities and anticipated impacts are described in **Table 2-13: Anticipated Utility Impacts.**

Exact locations of existing utilities and the extent of impacts will be determined during the final design phase of the project. Coordination with the known utility companies during the final design phase will assist in minimizing relocation adjustments and disruptions of service to the public. Additional information regarding the existing utilities and anticipated impacts can be found in the *Utility Assessment Report* (UAR) dated March 2021.

Table 2-11: Medium- and High-Ranked Contamination Sites

Site ID	Contamination Risk Rating	Site Name	Address	Agency Database	Description/Notes
2	MEDIUM	No name/LESLIE TIRES DISPOSAL, INC. (F/K/A RECYCLE & SHREDDED TIRES)	1445 TAFT VINELAND RD	SPILLS, LF, RGA	▪ Located in proposed stormwater pond area with solid waste and reported spills. ▪ Potential for soil and/or groundwater contamination of petroleum-based substances and solid waste materials in pond area. ▪ Agency information supplemented during field visit.
9	HIGH	TAFT VINELAND TRUCK SERVICES, LLC / DE LEON TIRE SERVICES	998 TAFT VINELAND RD	LF, FINDS, ERNS, SPILLS	▪ Located within ROW and proposed stormwater pond area with reported spills and solid waste disposal. ▪ Potential for soil and/or groundwater contamination in ROW and proposed pond location from fuel and other petroleum-based substances, storage tanks and other regulated wastes (e.g., oil, coatings, solvents). ▪ Agency information supplemented during field visit.
11	MEDIUM	BEYEL BROTHERS INC/UNITED RENTALS INC - HEAVY EQUIPMENT DIV	1235 W TAFT VINELAND RD	RCRA-CESQG, LUST	▪ Located adjacent to proposed stormwater pond area with reported UST and soil contamination. ▪ Potential for soil and/or groundwater contamination from fuel and other petroleum-based substances, storage tanks and other regulated wastes (e.g., oil, coatings, etc.) in ROW. ▪ Tank(s) removed and cleanup reported complete. ▪ See http://prodenv.dep.state.fl.us/DepNexus/public/electronic-documents/9805742/gis-facility!search
12	HIGH	DAYS INN FLORIDA MALL	1851 W LANDSTREET ROAD	RCRA-NLR, LUST, UST, RCRA-CESQG, INST CONTROL	▪ Located with ROW with abandoned buildings with reported leaky tanks. ▪ Potential for soil and/or groundwater contamination from petroleum-based fuels and abandoned fuel adjacent to ROW. ▪ Agency information developed during field visit.
14	MEDIUM	FL DEPT OF TRANSPORTATION-TURNPK	MP 254 EXIT 70 ORLANDO S MAINT	LUST, UST CONTAM, CLEANUP SITES, RGA LUST	▪ Located within ROW with reported soil contamination. ▪ Potential for soil and/or groundwater contamination from petroleum-based fuels and fuel tanks in ROW. ▪ Ongoing site soil sampling and groundwater monitoring as of 2019. ▪ See http://prodenv.dep.state.fl.us/DepNexus/public/electronic-documents/8622603/facility!search.

Table 2-11 (continued): Medium- and High-Ranked Contamination Sites

Site ID	Contamination Risk Rating	Site Name	Address	Agency Database	▪ Description/Notes
17	MEDIUM	KENAN ADVANTAGE GROUP 05-7I-3265	CONSULATE DR ON RAMP TO SR 528 W	LUST, TANKS	▪ Located within ROW with reported leaky UST. ▪ Potential for soil and/or groundwater contamination from petroleum-based fuels and fuel tanks in ROW. ▪ Agency files unlocatable. ▪ Agency information supplemented during field visit
18	HIGH	PENSKE TRUCK LEASING	1301 W TAFT VINELAND ROAD	LUST, UST, DWM CONTAM, CLEANUP SITES, RCRA-CESQG, ECHO, RGA,	▪ Located within ROW and proposed stormwater pond area with reported leaky USTs and soil contamination. ▪ Ongoing soil monitoring in 2019. ▪ Potential for soil and/or groundwater contamination from fuel and other petroleum-based substances, storage tanks and other regulated wastes (e.g., oil, coatings, solvents) in ROW and proposed pond location. ▪ See http://prodenv.dep.state.fl.us/DepNexus/public/electronic-documents/8945370/facility!search
25	HIGH	CENTRAL TRANSPORT/CF MOTORFREIGHT/CENTRAL TRANSPORT INTERNATIONAL INC	10066 GENERAL DRIVE	LUST, RCRA-CESQG, RGA LUST, AST, UST, DWM CONTAM, CLEANUP SITES	▪ Located within ROW and proposed stormwater pond area with reported leaky USTs and soil contamination. ▪ Potential for soil and/or groundwater contamination from fuel and other petroleum-based substances, storage tanks and other regulated wastes (e.g., oil, coatings, solvents) in ROW and proposed pond location. ▪ Agency information supplemented during field visit.
37	HIGH	CHEVRON #47783	9005 S ORANGE BLOSSOM TRAIL	LUST, UST, RGA LUST	▪ Abandoned gas station located adjacent to ROW. ▪ Potential for soil and/or groundwater contamination from petroleum-based fuels and fuel tanks in ROW. ▪ Agency files unlocatable. ▪ Agency information supplemented during field visit.
38	MEDIUM	AMERICAN PROPERTY GROUP II INC SITE	9000 S ORANGE BLOSSOM TRAIL	LUST, UST, CLEANUP SITES,	▪ Located adjacent to ROW with reported USTs and soil contamination. ▪ Potential for soil and/or groundwater contamination from petroleum-based fuels and fuel tanks in ROW. ▪ Ongoing soil and monitor well testing 2019. ▪ See http://prodenv.dep.state.fl.us/DepNexus/public/electronic-documents/8512886/facility!search

Table 2-11 (continued): Medium- and High-Ranked Contamination Sites

Site ID	Contamination Risk Rating	Site Name	Address	Agency Database	▪ Description/Notes
46	MEDIUM	SUNSHINE FOOD MART#363 (MOBILE MART)	8911 S ORANGE BLOSSOM TRAIL	LUST, UST, FIN ASSU 1, DWM CONTAM, CLEANUP SITES, RCRA-NLR, ECHO, RGA LUST, FINDS, EDR GAS STATIONS	▪ Located adjacent to ROW with reported leaky UST. ▪ Potential for soil and/or groundwater contamination from petroleum-based fuels and fuel tanks in ROW. ▪ Ongoing site soil and groundwater monitoring in 2019. ▪ See http://prodenv.dep.state.fl.us/DepNexus/public/electronic-documents/8513509/facility!search
61	MEDIUM	CHEMICAL CONSERVATION CORPORATION/PERMA FIX OF ORLANDO INC	10225 GENERAL DRIVE	SPILLS, AST, RCRA-NLR, FINDS	▪ Located adjacent to ROW with reported non-compliant UST. ▪ Potential for soil and/or groundwater contamination from fuel and other petroleum-based substances, storage tanks and other regulated wastes (e.g., oil, coatings, solvents) in ROW.. ▪ See http://prodenv.dep.state.fl.us/DepNexus/public/electronic-documents/9501552/gis-facility!search
76	HIGH	AIR PRODUCTS & CHEMICALS, INC. ORLANDO FL FACILITY	8300 EXCHANGE DRIVE	LUST, SPILLS, RGA LUST, RCRA-CESQG	▪ Industrial facility adjacent to ROW with reported tanks and spills. ▪ Registered as Haz. Mat. user/generator. ▪ Potential for soil and/or groundwater contamination from fuel and other petroleum-based substances, storage tanks and other regulated materials and wastes in ROW.
81	MEDIUM	7-ELEVEN FOOD STORE #24162	8910 S ORANGE BLOSSOM TRAIL	LUST, UST, CONTAM, CLEANUP SITES,	▪ Gas station located adjacent to ROW with reported leaky tank. ▪ Potential for soil and/or groundwater contamination from petroleum-based fuels and fuel tanks in ROW. ▪ Ongoing soil and groundwater sampling. Awaiting remedial action or Natural Attenuation funding, as of 2015. ▪ See http://prodenv.dep.state.fl.us/DepNexus/public/electronic-documents/8512594/facility!search
91	MEDIUM	PENSKE TRUCK LEASING CO LP	2177 W LANDSTREET ROAD	AST, LUST, UST, TIER 2, RGA LUST, RCRA-CESQG	▪ Located adjacent to ROW with reported leaky USTs and spills. ▪ Potential for soil and/or groundwater contamination from petroleum-based fuels and fuel tanks in ROW.

Table 2-11 (continued): Medium- and High-Ranked Contamination Sites

Site ID	Contamination Risk Rating	Site Name	Address	Agency Database	▪ Description/Notes
113	MEDIUM	POLYNT COMPOSITES USA INC./ CCP COMPOSITES US	10124 ROCKET BOULEVARD	RCRA-LQG, TRIS, AIRS (AFS), ECHO, FINDS, TSCA, SPILLS,	▪ Located adjacent to ROW with reported use of solvents and other industrial chemicals. ▪ Potential for soil and/or groundwater contamination from petroleum-based substances other regulated wastes (e.g., oil, coatings, solvents) in ROW.
116	MEDIUM	[Unknown name]	2101 CONSULATE DRIVE	SPILLS	▪ Located adjacent to ROW with reported leaky UST. ▪ Potential for soil and/or groundwater contamination from unknown substances and fuel tanks in ROW. ▪ Agency files unlocatable. ▪ Agency information supplemented during field visit.
128	MEDIUM	FOUNTAIN AUTO MALL	8701 SOUTH ORANGE BLOSSOM TRAIL	RGA LUST, RCRA-SQG, UST, CONTAM, CLEANUP SITES, RGA LUST	▪ Located adjacent to ROW with reported leaky UST. ▪ Potential for soil and/or groundwater contamination from petroleum-based fuels and fuel tanks in ROW. ▪ Monitoring ongoing and clean-up planned. ▪ See http://prodenv.dep.state.fl.us/DepNexus/public/electronic-documents/9102647/facility!search

Table 2-12: Existing Utility Information

Utility Agency Owner	Contact	Utility Type
AT&T Florida 5100 Steyr Street Orlando, FL 32835	Alan Reynolds 407-351-8180 ar2916@att.com	Communications
AT&T Corp. 6000 Metro West Blvd, Suite 201 Orlando, FL 32835	c/o PEA, Inc. Stefan Eriksson 407-578-8000 seriksson@pea-inc.net	Communications
America Traffic Solutions 7681 E Gray Rd Scottsdale, AZ 85260	Greg Parks 913-575-2912 greg.parks@atsol.com	Communications & Electric
CenturyLink 380 S. Lake Destiny Drive Orlando, FL 32810	Ron Prario 407-754-0116 ron.prario@centurylink.com	Communications
Bright House Networks (Charter) 3767 All American Blvd Orlando, FL 32810	Marvin Usry Jr 407-532-8509 marvin.usryjr@charter.com	Communications
Comcast 4305 Vineland Rd, Ste. G-2 Orlando, FL 32811	Cesar Rivera 352-315-8528 cesar_rivera@comcast.com	Communications
Crown Castle 4511 N. Himes Ave. Suite 210 Tampa, FL 33614	Shawn Williams 813-947-6004 shawn.williams@crowncastle	Communications
Duke Energy Distribution 3300 Exchange Place, NP4A Lake Mary, FL 32746	Robb Brown 352-459-4671 robb.brown@duke-energy.com	Power
Duke Energy Fiber 299 1st Ave North St. Petersburg, FL 33701	Mark Hurst 727-820-5208 mark.hurst@duke-energy.com	Communications
Duke Energy Transmission 20525 Amberfield Dr., Ste. 201 Land O' Lakes, FL 34638	Jennifer Williams 813-909-1210 jewilliams@pike.com	Power
Florida Gas Transmission 2405 Lucien Way, Suite 200 Maitland, FL. 32751	Joseph E. Sanchez 407-838-7171 joseph.e.sanchez@energytransfer.com	Gas
Orange County Utilities 9150 Curry Rd Orlando, FL 32825	Christina Crosby 407-254-2796 christina.crosby@ocfl.net	Water/Wastewater
Orange County Public Works 4200 S John Young Pkwy Orlando, FL 32839	Roger Smith 407-836-7804 roger.smith@ocfl.net	Traffic Signal & Fiber
Orlando Utilities Commission 6003 Pershing Ave. Orlando, FL 32822	Steve Grubbs 407-434-2560 sgrubbs@ouc.com	Water
Summit Broadband (Orlando Telephone Company) 100 W. Anderson St Orlando, FL 32802	Michelle Daniel 407-996-1183 mdaniel@summit-broadband.com	Communications
TECO Peoples Gas 600 W Robinson St. Orlando, FL 32801	Shawn Winsor 407-420-6663 swinsor@tecoenergy.com Bruce Stout 407-420-2678 bstout@tecoenergy.com	Gas
Uniti Fiber 107 St. Francis Street, Suite 1800 Mobile, AL 36602	Michel-Lee Chapuseaux (352) 256-1524 michel-lee.chapuseaux@uniti.com	Communications
Verizon/MCI 69 West Concord St. Orlando, FL 32801	Brandon Cole 407-325-7267 bcole8@yahoo.com	Communications

Table 2-13: Anticipated Utility Impacts

Impact	General Location	Approximate Conflict Length	Impacts
AT&T FLORIDA			
Buried Transmission and Fiber Optics Cable	Conduit system with manholes containing fiber and copper cables along the south side of Taft Vineland Road. from beginning of study, continuing out of the study limits.	2,650 ft.	Roadway and bridge construction at Florida's Turnpike.
Buried Transmission and Fiber Optics Cable	Conduit system with manholes with buried copper and fiber along the west side of Orange Blossom Trial from south of Principal Row to north of Landstreet.Road.	2,900 ft.	Roadway and bridge construction along Orange Blossom Trail.
Buried Transmission and Fiber Optics Cable	Conduit system with manholes with buried copper and fiber along the south side of Sand Lake Road.	950 ft.	Roadway construction along Sand Lake Road and at Florida's Turnpike.
Buried Transmission and Fiber Optics Cable	Conduit system with manholes with buried copper and fiber along the west side of John Young Parkway.	2,200 ft.	Roadway construction along John Young Parkway and bridge construction at Florida's Turnpike
Buried Transmission and Fiber Optics Cable	Conduit system with manholes with buried copper and fiber along the south side of Landstreet Road.	600 ft.	Roadway and bridge construction at Florida's Turnpike.
Overhead Fiber Optics Cable	South side of Sand Lake road at the intersection with Voltaire Drive Extension.	950 ft.	Roadway construction for Voltaire Drive and Sand Lake Road.
AT&T CORPORATION			
Buried Transmission	2 x 2" PVC conduits in a 10-foot easement in the northbound Florida's Turnpike median along the entire length of the study.	3.2 mi.	Roadway and bridge construction along Florida's Turnpike.
CENTURYLINK			
Buried Transmission	Buried fiber optic cable on the south side of Sand Lake Road at the Voltaire Drive Extension intersection.	400 ft.	New construction on the south side of Sand Lake Road.
COMCAST			
(To Be Determined)			
DUKE ENERGY - DISTRIBUTION			
(To Be Determined)			
DUKE ENERGY - FIBER			
(To Be Determined)			
DUKE ENERGY - TRANSMISSION			
Transmission	Aerial transmission facilities on the east side of John Young Parkway crossing over Florida's Turnpike.	1,700 ft.	Bridge construction at Florida's Turnpike and John Young Parkway.
Transmission	Aerial transmission facilities in easement on the east side of new Voltaire Drive alignment from CSX RR to south side of the Beachline Express.	1,700 ft.	New Roadway and bridge construction for Voltaire Drive Extension.
Transmission	Aerial transmission facilities in easement on the north side of Landstreet Road crossing over Beachline Expressway.	1,180 ft.	Bridge construction at Florida's Turnpike and Landstreet Road .

Table 2-13 (continued): Anticipated Utility Impacts

Impact	General Location	Approximate Conflict Length	Impacts
FLORIDA GAS TRANSMISSION			
Gas	In easement on the east side of Florida's Turnpike along Rocket Boulevard in Pond 1B.	650 ft.	Construction of Pond 1B.
Gas	In easement on the east side of Florida's Turnpike in Pond 1C.	320 ft.	Construction of Pond 1C.
Gas	In easement on the east side of Florida's Turnpike in area of Taft Vineland Road.	3,900 ft.	Road and bridge construction at Florida's Turnpike and Taft Vineland Road.
Gas	In easement crossing proposed westbound ramp from Beachline Expressway to south bound Florida's Turnpike.	1,177 ft	Road and bridge construction of Florida's Turnpike, related ramps, and Beachline expressway and related ramps.
ORANGE COUNTY UTILITIES			
Reclaimed Water	Along the west side of John Young Parkway at Florida's Turnpike.	1,470 ft.	Road and bridge construction on Florida's Turnpike and John Young Parkway.
Sewer	Along the east side of Orange Blossom Trail the entire length of the study area.	3,000 ft.	Road and bridge construction on Orange Blossom Trail at Beachline Expressway and Florida's Turnpike.
ORLANDO UTILITIES COMMISSION			
Water	Along the west side of Orange Blossom Trail throughout the length of the study.	2,900 ft.	Road and bridge construction on Orange Blossom Trail at Beachline Expressway and Florida's Turnpike.
Water	Along the south side of Taft Vineland Road crossing under Florida's Turnpike.	1,000 ft.	Road and bridge construction on Florida's Turnpike at Taft Vineland Road.
SUMMIT BROADBAND			
Communications	Buried fiber optic cable on the east side of John Young Parkway along the length of the study area.	800 ft.	Road and bridge construction on Beachline Expressway and John Young Parkway.
Communications	Buried fiber optic cable on the north side of Landstreet Road in the study area under Beachline Expressway.	1,100 ft.	Road and bridge construction on Beachline Expressway and Landstreet Road.
TECO PEOPLE'S GAS			
Gas	Gas main along the west side of Rocket Boulevard on the east side of Florida's Turnpike in Pond 1B.	650 ft.	Construction of Pond 1B.
Gas	Gas main along the west side of Orange Blossom Trail.	2,650 ft.	Bridge construction for Florida's Turnpike and Beachline Expressway and roadway construction along Orange Blossom Trail.
Gas	Gas mains along Landstreet Road crossing Beachline Expressway.	600 ft. (x 2) 1,200 ft.	Bridge construction for Beachline Expressway overpass.
Gas	Gas main crossing Voltaire Drive Extension south of	200 ft.	Construction of Voltaire Drive

Table 2-13 (continued): Anticipated Utility Impacts

Impact	General Location	Approximate Conflict Length	Impacts
	Beachline Expressway.		Extension.
Gas	Gas main in Voltaire Drive Extension connecting to gas main at Sand Lake Road,	245 ft. (x2) 490 ft.	Construction of Voltaire Drive Extension/ Sand Lake Road intersection.

Notes: SR 91 = Florida's Turnpike
SR 528 = Beachline Expressway

Railroads

CSX is the holding company for the rail lines in the project area shown on **Figure 2-9: Railroad Locations and Type of Crossings**. The tracks within the project area serve warehouses and distribution centers. Generally, the trains utilizing these spurs do not operate on a schedule. **Table 2-14: Railroad Crossing Data** provides detail of each crossing within the project area.

The project will add one new at-grade crossing for the Voltaire Drive Extension. CSX is also currently reviewing removal of several at-grade crossings north of the Beachline Expressway and east of Florida's Turnpike. The net effect of these closures and the construction of the project will reduce the number of crossings in the area.

The project will also modify the Beachline Expressway mainline and ramps crossings over CSX spur. These modifications will be done in accordance with FDOT and American Railway Engineering and Maintenance-of-Way Association (AREMA) standards. However, the project will incorporate existing bridges which have 22.5 feet of vertical clearance, one foot less than the AREMA standard of 23.5 feet. A design exception of this feature will be processed with the concurrence of CSX.

Figure 2-9: Railroad Locations and Type of Crossings

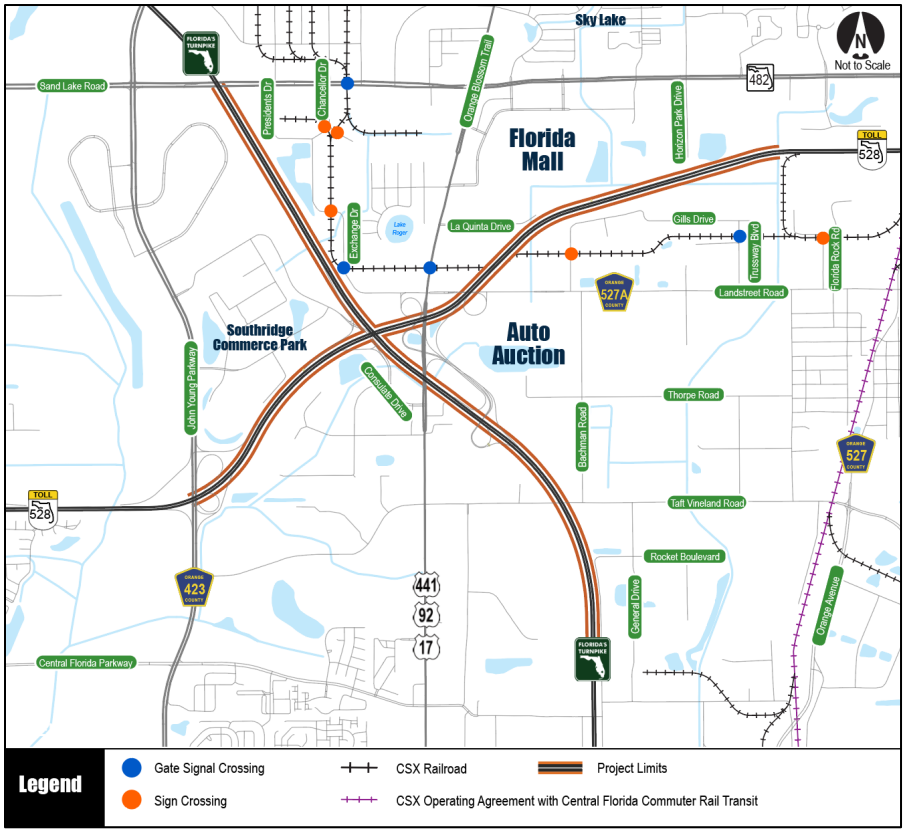


Table 2-14: Railroad Crossing Data

Crossing ID	Street	Type of Crossing	Operating Railroad	Number of Tracks	Number of Train Crossing per Day	Maximum Speed (mph)	Type of Train	Type of Warning Device	Crossing Position
622328X	Sand Lake Road	Public	CSX	1		10	Freight	Gates	At-grade
622325C	Beachline Expressway	Public	CSX	1		5	Freight	None(1)	RR Under
621488H	Exchange Drive	Public	CSX	1	≥ 1	10	Freight	Gates	At-grade
621489P	Exchange Drive	Public	CSX	1	≥ 1	10	Freight	Signs	At-grade
622326J	Orange Blossom Trail	Public	CSX	1	≥ 1	10	Freight	Gates	At-grade
918552E	Trussway Boulevard	Public	CSX	1	≥ 1	10	Freight	Gates	At-grade
621490J	Presidents Drive	Public	CSX	Not in Use	< 1	10	Freight	Signs	At-grade
622327R	Chancellor Drive	Public	CSX	1	≥ 1	10	Freight	Signs	At-grade
626434U	Florida Rock Industry	Public	CSX	1	≥ 1	10	Freight	Signs	At-grade
626434U	Gills Drive	Public	CSX	1	≥ 1	10	Freight	Signs	At-grade

Source: CSX Database
(1) Beachline Expressway Bridges over CSX

2.4.5 Construction

The construction activities associated with the Orlando South Ultimate Interchange proposed improvements will result in temporary air, noise, vibration, water quality, traffic flow, and visual impacts for those residents and travelers within the immediate vicinity of the project. Air quality impacts will be temporary and primarily be in the form of exhaust emissions from trucks and construction equipment as well as fugitive dust from construction sites. Air pollution associated with the creation of airborne particles will be effectively controlled using watering or the application of other control materials in accordance with FDOT's *Standard Specifications for Road and Bridge Construction*.

Noise and vibration impacts may be generated by heavy equipment and construction activities such as pile driving and vibratory compaction of embankments. Noise control measures will be implemented as set forth in the FDOT's *Standard Specifications for Road and Bridge Construction.* Adherence to local construction noise and/or construction vibration ordinances by the construction contractor will also be required where applicable.

Water quality impacts resulting from erosion and sedimentation will be controlled in accordance with FDOT's *Standard Specifications for Road and Bridge Construction* and using Best Management Practices (BMPs).

Maintenance of traffic and sequence of construction will be planned and scheduled to minimize traffic delays during project construction. Signs will be used as appropriate to provide notice of road closures and other pertinent information to the traveling public. The local news media will be notified in advance of road closings and other construction-related activities which could inconvenience the community so that motorists, residents, and business persons can plan travel routes in advance.

Access to all businesses and residences will be maintained to the extent practical through controlled construction scheduling. Within the project study limits, the present traffic congestion may become worse during stages of construction where narrow lanes may be necessary. Traffic delays will be controlled to the extent possible where many construction operations are in progress at the same time.

Visual impacts associated with the storage of construction materials and establishment of temporary construction facilities will occur but are temporary and short term.

Construction of the roadway and bridges requires excavation of unsuitable material, placement of embankments, and the use of materials, such as lime rock, asphaltic concrete, and Portland cement concrete. The removal of structure and debris will be in accordance with local and state regulation agencies permitting this operation. The construction contractor will be responsible for controlling pollution on haul roads, in borrow areas, and areas used for disposal of waste materials from the project. Temporary erosion control features as specified in the FDOT's *Standard Specifications for Road and Bridge Construction*, Section 104, will consist of temporary grassing, sodding, mulching, sandbagging, slope drains, sediment basins, sediment checks, artificial coverings, and berms.

2.4.6 Bicycles and Pedestrians

Bicycle Facilities

Florida's Turnpike and the Beachline Expressway are limited access facilities and do not accommodate bicycle facilities. The absence of bicycle facilities on these limited access facilities is consistent with state policy. In addition, there are no bicycle lanes on Orange Blossom Trail, and Landstreet Road. Orange County improvements to Taft Vineland Road include a wide 14-foot outside lane for motor vehicles to pass cyclists safely within the travel lane.

Sand Lake Road has a non-designated paved shoulder from Florida's Turnpike to Orange Blossom Trail, a designated paved shoulder from 1350 feet west of Voltaire Drive to Sand Lake Pointe Loop and a buffered bike lane on the shoulder east of Sand Lake Pointe Loop.

Existing bicycle facilities will not be impacted by the project. The Voltaire Drive Extension will have 4-foot wide bicycle lanes in each direction.

Pedestrian Accommodations

Florida's Turnpike and the Beachline Expressway are limited access facilities and do not accommodate pedestrian facilities. The absence of pedestrian facilities on these limited access facilities is consistent with state policy. Pedestrian facilities on the surface streets are shown in **Table 2-15: Pedestrian Facilities on Surface Streets**. The north side sidewalk on Taft Vineland Road between Orange Blossom Trail and Florida's Turnpike will be completed concurrently with roadway improvements planned by Orange County.

Table 2-15: Pedestrian Facilities on Surface Streets

Facility	Limits	South Side	North Side	West Side	East Side
Orange Blossom Trail	Taft Vineland Road to 375' North of Consulate Drive			X	X
	375' North of Consulate Drive to Landstreet Road				X
	Landstreet Road to Sand Lake Road			X	X
Taft Vineland Road	Orange Blossom Trail to General Drive	X	X		
Landstreet Road	Orange Blossom Trail to Winegard Road	X	X		
Sand Lake Road	Orange Blossom Trail to Golden Sky Lane	X	X		
	Golden Sky Lane to Voltaire Drive	X			

Pedestrian crossings will be added where new roadways cross sidewalks. Existing and proposed pedestrian accommodations will not be impacted by proposed project improvements. The Voltaire Drive extension will have 5-foot wide sidewalks on both sides of the road. In addition, a sidewalk connection will be completed on Consulate Drive from north of Delegates Drive to Commerce Park Drive.

2.4.7 Navigation

The USACE commented in the 2017 ETDM Summary Report that there are no designated navigable waters within the study area and the proposed project would have no effect on navigation.

APPENDIX A
Planning Consistency

FY 2020/21 - 2024/25
Orlando Urban Area
Transportation Improvement Program

Adopted June 29, 2020

Amended March 10, 2021

MetroPlan Orlando
Transportation Improvement Program
Toll Road Projects - Florida's Turnpike Enterprise
Orange County

FDOT Financial Management Number	Project Name or Designation	Project Description				2045 MTP Reference	Historic Cost Prior to 2020/21 ($000's)	Project Status and Cost ($000's)							Estimated Future Cost After 2024/25 ($000's)	Total Project Cost ($000's)	Responsible Agency
		From	To	Length (Miles)	Work Description			2020/21	2021/22	2022/23	2023/24	2024/25	Funding Sources	Project Phases			
4371662 *SIS Project*	Florida's Turnpike	at I-4		0.60	Build Direct Connect Ramps	Tech. Series 12 Page 12-6 E+C		10 227 1,059	0 0 0	0 0 0	0 0 0	0 0 0	PKYI PKED PKYI	PE DSB DSB			FTE
							93,045	1,296	0	0	0	0	Total		0	94,341	
4371831 *SIS Project*	SR 528/Beachline Expy.	at SR 520		0.54	Guardrail Improvements	Cost Feas. Plan Page 17		5	0	0	0	0	PKYI	PE			FTE
							1	5	0	0	0	0	Total		TBD	TBD	
4385471 *SIS Project*	Orlando South Ultimate Interchange	SR 528/Beachline Expy. at Florida's Turnpike		1.90	Project Development & Environment Study	Cost Feas. Plan Table 8		9 1	0 0	0 0	0 0	0 0	PKYI PKYI	PD&E PE			FTE
							4,092	10	0	0	0	0	Total		0	4,102	
4385472 *SIS Project*	SR 528/Beachline Expy.	at Florida's Turnpike		1.98	Interchange Improvement	Cost Feas. Plan Table 8		47	80	490	558	0	PKYI	ROW			FTE
							10,570	47	80	490	558	0	Total		567,014	578,759	
4385481 *SIS Project*	Florida's Turnpike	at SR 429		1.54	Bridge Painting	Cost Feas. Plan Page 17		0	0	0	11,195	0	PKYR	CST			FTE
							356	0	0	0	11,195	0	Total		0	11,551	
4391053 *SIS Project*	Florida's Turnpike	at Turkey Lake Service Plaza			ITS Freeway Management	Cost Feas. Plan Page 17		72	0	0	0	0	PKYR	CST			FTE
							865	72	0	0	0	0	Total		0	937	
4394571 *SIS Project*	Florida's Turnpike	Milepost 269.4	Milepost 273.3	3.90	Resurfacing	Cost Feas. Plan Page 17		4 3	0 0	0 0	0 0	0 0	PKYI PKYR	PE CST			FTE
							14,638	7	0	0	0	0	Total		0	14,645	
4394572 *SIS Project*	Florida's Turnpike	ramps at SR 408, SR 429 & SR 50		4.39	Guardrail Improvements	Cost Feas. Plan Page 17		1 2,428	0 0	0 0	0 0	0 0	PKYI PKYR	PE CST			FTE
							351	2,429	0	0	0	0	Total		0	2,780	
4394573 *SIS Project*	Florida's Turnpike	at SR 408		1.00	Resurfacing	Cost Feas. Plan Page 17		1	0	0	0	0	PKYI	PE			FTE
							276	1	0	0	0	0	Total		TBD	TBD	
4394574 *SIS Project*	Florida's Turnpike	ramps at SR 408, SR 429 & SR 50		4.39	Resurfacing	Cost Feas. Plan Page 17		2 4,947	0 0	0 0	0 0	0 0	PKYI PKYR	PE CST			FTE
							7	4,949	0	0	0	0	Total		0	4,956	
4394575 *SIS Project*	Florida's Turnpike	Milepost 265.3	Milepost 269.4	4.07	Resurfacing	Cost Feas. Plan Page 17		4 20,514	0 0	0 0	0 0	0 0	PKYR PKYR	PE CST			FTE
							2,966	20,518	0	0	0	0	Total		0	23,484	
4394576 *SIS Project*	Florida's Turnpike	Milepost 265.3	Milepost 269.4	4.07	Safety Improvements	Cost Feas. Plan Page 17		3 1,563	0 0	0 0	0 0	0 0	PKYI PKYR	PE CST			FTE
							299	1,566	0	0	0	0	Total		0	1,865	
4394577 *SIS Project*	Florida's Turnpike	off-ramp to SR 429		0.64	Improve Traffic Operations	Cost Feas. Plan Page 17		6,490	0	0	0	0	PKYI	CST			FTE
							5	6,490	0	0	0	0	Total		0	6,495	
4394781 *SIS Project*	SR 528/Beachline Expy.	Milepost 30.8	Milepost 35.8	4.96	Resurfacing	Cost Feas. Plan Page 17		1 4	0 0	0 0	0 0	0 0	PKYR PKYR	PE CST			FTE
							8,787	5	0	0	0	0	Total		0	8,792	
4395981 *SIS Project*	Florida's Turnpike	at Consulate Dr.		1.20	Improve Traffic Operations	Cost Feas. Plan Page 17		11	0	0	0	0	PKYI	CST			FTE
							83	11	0	0	0	0	Total		0	94	

MetroPlan Orlando
Transportation Improvement Program
Toll Road Projects - Florida's Turnpike Enterprise
Orange County

FDOT Financial Management Number	Project Name or Designation	Project Description				2045 MTP Reference	Historic Cost Prior to 2020/21 ($000's)	Project Status and Cost ($000's)							Estimated Future Cost After 2024/25 ($000's)	Total Project Cost ($000's)	Responsible Agency
		From	To	Length (Miles)	Work Description			2020/21	2021/22	2022/23	2023/24	2024/25	Funding Sources	Project Phases			
4439541	Turkey Lake Service Plaza	at Milepost 268.0		5.41	Miscellaneous Construction (Relocate Palm Trees)	Cost Feas. Plan Page 17		1	0	0	0	0	PKYI	PE			FTE
								130	0	0	0	0	PKYI	CST			
							587	131	0	0	0	0	Total		0	718	
4439542	Turkey Lake Service Plaza Visitor Parking Lot			0.57	Miscellaneous Construction	Cost Feas. Plan Page 17		1	0	0	0	0	PKYI	PE			FTE
								137	0	0	0	0	PKYI	CST			
							1,605	138	0	0	0	0	Total		0	1,743	
4439543	Turkey Lake Service Plaza Pedestrian Walkway			0.57	Landscaping	Cost Feas. Plan Page 17		1	0	0	0	0	PKYI	PE			FTE
								54	0	0	0	0	PKYI	CST			
							583	55	0	0	0	0	Total		0	638	
4440061 *SIS Project*	Florida's Turnpike	S of Sand Lake Rd.	S of SR 408	6.00	Project Development & Environment Study	Cost Feas. Plan Table 8		1	4,000	0	0	0	PKYI	PD&E			FTE
							84	1	4,000	0	0	0	Total		0	4,085	
4440071 *SIS Project*	Florida's Turnpike	S of SR 408	SR 50	28.87	Project Development & Environment Study	Cost Feas. Plan Table 8		7	0	0	0	0	PKYI	PD&E			FTE
							5,153	7	0	0	0	0	Total		0	5,160	
4449791 *SIS Project*	SR 528	at Voltaire Dr.		1.76	New Interchange	Cost Feas. Plan Table 8		1	0	0	0	0	PKYI	PE			FTE
							68	1	0	0	0	0	Total		TBD	TBD	
4449801 *SIS Project*	Florida's Turnpike	at Taft-Vineland Rd.		4.09	New Interchange	Cost Feas. Plan Table 8		73	0	0	0	0	PKYI	PE			FTE
							2,105	73	0	0	0	0	Total		TBD	TBD	
4458841 *SIS Project*	SR 417/Southern Connector	Milepost 4.0	Milepost 6.0	2.19	Resurfacing	Cost Feas. Plan Page 17		2	0	0	0	0	PKYR	PE			FTE
							0	2	0	0	0	0	Total		TBD	TBD	
4458842 *SIS Project*	SR 417/Southern Connector	Milepost 4.0	Milepost 6.0	2.19	Safety Improvement	Cost Feas. Plan Page 17		2	0	0	0	0	PKYR	PE			FTE
							0	2	0	0	0	0	Total		TBD	TBD	
4461641 *SIS Project*	SR 429	I-4	Seidel Rd.	9.85	Project Development & Environment Study	Cost Feas. Plan Table 8		4,010	0	0	0	0	PKYI	CST			FTE
							0	4,010	0	0	0	0	Total		0	4,010	
4465781 *SIS Project*	Florida's Turnpike	SR 429	SR 50	5.98	Widen to 8 Lanes	Cost Feas. Plan Table 8		2	0	0	0	0	PKYI	PE			FTE
							0	2	0	0	0	0	Total		TBD	TBD	
4465791 *SIS Project*	Florida's Turnpike	SR 408	SR 429	2.00	Widen to 8 Lanes	Cost Feas. Plan Table 8		2	0	0	0	0	PKYI	PE			FTE
							0	2	0	0	0	0	Total		TBD	TBD	
4465821 *SIS Project*	Florida's Turnpike	at SR 50		0.40	Interchange Improvement	Cost Feas. Plan Table 8		2	0	0	0	0	PKYI	PE			FTE
							0	2	0	0	0	0	Total		TBD	TBD	
4469051 *SIS Project*	SR 528	at SR 520		0.30	Lighting Improvements	Cost Feas. Plan Page 17		63	0	0	0	0	PKYI	PE			FTE
								1	0	0	0	0	PKYR	PE			
								611	0	0	0	0	DS	CST			
								782	0	0	0	0	PKYI	CST			
							21	1,457	0	0	0	0	Total		0	1,478	
4470801 *SIS Project*	Florida's Turnpike	at I-4		0.10	Off Ramp Left Turn Closure	Cost Feas. Plan Page 17		2	0	0	0	0	PKYI	PE			FTE
							2	2	0	0	0	0	Total		TBD	TBD	
4475801 *SIS Project*	Florida's Turnpike	at I-4		0.80	Project Development & Environment Study	Cost Feas. Plan Page 12		2	0	0	0	0	PKYI	PD&E			FTE
							0	2	0	0	0	0	Total		TBD	TBD	

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Florida Department of

TRANSPORTATION

Federal Aid Management Cynthia Lorenzo - Manager

STIP Project Detail and Summaries Online Report

Selection Criteria	
Approved STIP **County/MPO Area:** Orange **Related Items Shown**	**Detail Report** **Financial Project:** 438547 _

TURNPIKE

Item Number: 438547 1 **Project Description:** ORLANDO SOUTH ULTIMATE INTERCHANGE PD&E SR528(MP4) & SR91(MP254)

District: 05 **County:** ORANGE **Type of Work:** PD&E/EMO STUDY **Project Length:** 000001.900MI

	Fiscal Year						
Phase / Responsible Agency	**<2021**	**2021**	**2022**	**2023**	**2024**	**>2024**	**All Years**
CONSTRUCTION / MANAGED BY FDOT							
Fund Code: PKYI - TURNPIKE IMPROVEMENT	14,404						**14,404**
P D & E / MANAGED BY FDOT							
Fund Code: PKYI - TURNPIKE IMPROVEMENT	3,976,321	8,628					**3,984,949**
PRELIMINARY ENGINEERING / MANAGED BY FDOT							
Fund Code: PKYI - TURNPIKE IMPROVEMENT	101,152	1,095					**102,247**
Item: 438547 1 Totals	**4,091,877**	**9,723**					**4,101,600**

Item Number: 438547 2 **Project Description:** ORLANDO SOUTH ULTIMATE INTERCHANGE AT SR528 (MP 4) AND SR91 (MP 254)

District: 05 **County:** ORANGE **Type of Work:** INTERCHANGE IMPROVEMENT **Project Length:** 000001.975MI

	Fiscal Year						
Phase / Responsible Agency	**<2021**	**2021**	**2022**	**2023**	**2024**	**>2024**	**All Years**
CONSTRUCTION / MANAGED BY FDOT							
Fund Code: PKYI - TURNPIKE IMPROVEMENT						566,444,293	**566,444,293**
ENVIRONMENTAL / MANAGED BY FDOT							
Fund Code: PKYI - TURNPIKE IMPROVEMENT						60,000	**60,000**

PRELIMINARY ENGINEERING / MANAGED BY FDOT								
Fund Code:	PKED - 2012 SB1998-TURNPIKE FEEDER RD	7,574,426						**7,574,426**
	PKYI - TURNPIKE IMPROVEMENT	2,806,597						**2,806,597**
	Phase: PRELIMINARY ENGINEERING Totals	**10,381,023**						**10,381,023**
RIGHT OF WAY / MANAGED BY FDOT								
Fund Code:	PKYI - TURNPIKE IMPROVEMENT	189,271	47,282	80,000	490,000	558,147		**1,364,700**
RAILROAD & UTILITIES / MANAGED BY FDOT								
Fund Code:	PKYI - TURNPIKE IMPROVEMENT						510,000	**510,000**
	Item: 438547 2 Totals	**10,570,294**	**47,282**	**80,000**	**490,000**	**558,147**	**567,014,293**	**578,760,016**
	Project Totals	**14,662,171**	**57,005**	**80,000**	**490,000**	**558,147**	**567,014,293**	**582,861,616**
	TURNPIKE Totals	**14,662,171**	**57,005**	**80,000**	**490,000**	**558,147**	**567,014,293**	**582,861,616**
	Grand Total	**14,662,171**	**57,005**	**80,000**	**490,000**	**558,147**	**567,014,293**	**582,861,616**

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Florida Department of

TRANSPORTATION

Federal Aid Management Cynthia Lorenzo - Manager

STIP Project Detail and Summaries Online Report

Selection Criteria	
Approved STIP **County/MPO Area:** Orange **Related Items Shown**	**Detail Report** **Financial Project:** 444979 _

TURNPIKE							
Item Number: 444979 1 **Project Description:** NEW BEACHLINE XWAY (SR 528) INTCHNG AT VOLTAIRE DRIVE							
District: 05 **County:** ORANGE **Type of Work:** INTERCHANGE (NEW) **Project Length:** 000001.759MI							
		Fiscal Year					
Phase / Responsible Agency		**<2021**	**2021**	**2022**	**2023**	**2024**	**>2024**	**All Years**
CONSTRUCTION / MANAGED BY FDOT								
Fund Code:	PKYI - TURNPIKE IMPROVEMENT	1,355						1,355
PRELIMINARY ENGINEERING / MANAGED BY FDOT								
Fund Code:	PKYI - TURNPIKE IMPROVEMENT	67,143	829				6,000,000	6,067,972
	Item: 444979 1 Totals	68,498	829				6,000,000	6,069,327
	Project Totals	68,498	829				6,000,000	6,069,327
	TURNPIKE Totals	68,498	829				6,000,000	6,069,327
	Grand Total	68,498	829				6,000,000	6,069,327

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Florida Department of

TRANSPORTATION

Federal Aid Management Cynthia Lorenzo - Manager

STIP Project Detail and Summaries Online Report

Selection Criteria	
Approved STIP **County/MPO Area:** Orange **Related Items Shown**	**Detail Report** **Financial Project:** 444980 _

TURNPIKE								
Item Number: 444980 1 **Project Description:** NEW INTCHNG ON TPK MAINLINE (SR91) AT TAFT VINELAND RD (~MP 253)								
District: 05 **County:** ORANGE **Type of Work:** INTERCHANGE (NEW) **Project Length:** 000004.087MI								
		Fiscal Year						
Phase / Responsible Agency		**<2021**	**2021**	**2022**	**2023**	**2024**	**>2024**	**All Years**
CONSTRUCTION / MANAGED BY FDOT								
Fund Code:	PKYI - TURNPIKE IMPROVEMENT	2,853						**2,853**
PRELIMINARY ENGINEERING / MANAGED BY FDOT								
Fund Code:	PKYI - TURNPIKE IMPROVEMENT	2,101,746	73,128				2,756,062	**4,930,936**
	Item: 444980 1 Totals	**2,104,599**	**73,128**				**2,756,062**	**4,933,789**
	Project Totals	**2,104,599**	**73,128**				**2,756,062**	**4,933,789**
	TURNPIKE Totals	**2,104,599**	**73,128**				**2,756,062**	**4,933,789**
	Grand Total	**2,104,599**	**73,128**				**2,756,062**	**4,933,789**


2045
FUTURE DR.
BUS
metroplan orlando
A REGIONAL TRANSPORTATION PARTNERSHIP
2045
Metropolitan Transportation Plan
Cost Feasible Plan
Strategies, Programs and Projects
Adopted: 12/09/2020

Table 8 | Florida's Turnpike Enterprise - Cost Feasible Projects

Abbreviations: **PLN/PD&E:** Planning / Project Development & Engineering; **PE:** Preliminary Engineering; **ENV:** Environmental; **CST:** Construction; **CEI:** Construction Engineering Inspection

2045 Metropolitan Transportation Plan (MTP) Funding Program	Program Description		Plan Period I: 2026-2030	Plan Period II: 2031-2035	Plan Period III: 2036-2045	
			YOE $'s	YOE $'s	YOE $'s	
Toll Funded Projects -	Projects and funding for improvements and expansion of the FTE toll road network as identifed in the FTE Master Plan and FY 2020/21 - FY2025/26 Work Program.	FTE Master Plan	$ 1,369.63	$ 675.80	$ -	
Florida's Turnpike Enterprise (FTE)			$ -	$ -		
		FTE MasterPlan	**$ 1,369.63**	**$ 675.80**	**$ -**	
		CFX + Roll Forward	$ 1,369.63	$ 675.80	$ -	Unfunded Needs
		Total Project Cost (YOE)	$ 1,369.63	$ 675.80	$ -	$ 6,393.95
		Remaining Balance (+ / -)	**$ -**	**$ -**	**$ -**	76%

MTP ID#	County	Facility Name & Limits	Project Description	Length (miles)	Project Phase	Total Project Cost (2020 $'s) *Shown in Millions*	Existing TIP: 2020-2025		Plan Period I: 2026-2030		Plan Period II: 2031-2035		Plan Period III: 2036-2045		Unfunded Needs	
							Phase	*YOE $'s*	*Phase*	*YOE $'s*	*Phase*	*YOE $'s*	*Phase*	*YOE $'s*	*Phase*	*YOE $'s*
					Project Cost Inflation Factors					1.32		1.55		2.05		2.05
1034	Orange	SR 91 / Florida's Turnpike From: between SR 528 and US 17/92/441 / OBT - To:	Ultimate Interchange Improvements	0.33	PD&E			$ -		$ -		$ -		$ -		$ -
					PE	$ 5.00	PE	$ 5.00		$ -		$ -		$ -		$ -
					ROW	$ 11.00	ROW	$ 11.00		$ -		$ -		$ -		$ -
					ENV			$ -		$ -		$ -		$ -		$ -
					CST	$ 535.00		$ -	CST	$ 706.20		$ -		$ -		$ -
					CEI			$ -		$ -		$ -		$ -		$ -
1025	Orange	SR 528 / Beachline Expwy From: At Voltaire Dr - To:	New Interchange	0.66	PD&E	$ 2.00	PD&E	$ 2.00		$ -		$ -		$ -		$ -
					PE	$ 6.00		$ -	PE	$ 7.92		$ -		$ -		$ -
					ROW	$ 50.00		$ -	ROW	$ 66.00		$ -		$ -		$ -
					ENV			$ -		$ -		$ -		$ -		$ -
					CST	$ 72.00		$ -	CST	$ 95.04		$ -		$ -		$ -
					CEI			$ -		$ -		$ -		$ -		$ -
1026	Orange	SR 91 / Florida's Turnpike From: at SR 50 / Colonial Dr - To:	Interchange Modification	0.98	PD&E	$ 1.00	PD&E	$ 1.00		$ -		$ -		$ -		$ -
					PE	$ 2.60		$ -	PE	$ 3.43		$ -		$ -		$ -
					ROW			$ -		$ -		$ -		$ -		$ -
					ENV			$ -		$ -		$ -		$ -		$ -
					CST	$ 42.00		$ -	CST	$ 55.44		$ -		$ -		$ -
					CEI			$ -		$ -		$ -		$ -		$ -
1035	Orange	SR 91 / Florida's Turnpike From: Taft Vineland Rd - To:	New Interchange	0.98	PD&E	$ 1.00	PD&E	$ 1.00		$ -		$ -		$ -		$ -
					PE	$ 3.00		$ -	PE	$ 3.96		$ -		$ -		$ -
					ROW			$ -		$ -		$ -		$ -		$ -
					ENV			$ -		$ -		$ -		$ -		$ -
					CST	$ 28.00		$ -	CST	$ 36.96		$ -		$ -		$ -
					CEI			$ -		$ -		$ -		$ -		$ -
1012	Seminole	SR 417 From: SR 434 - To: Lake Mary Blvd / CR 427	Widen to 8 Lanes	5.49	PD&E	$ 4.00	PD&E	$ 4.00		$ -		$ -		$ -		$ -
					PE	$ 16.00		$ -	PE	$ 21.12		$ -		$ -		$ -
					ROW			$ -		$ -		$ -		$ -		$ -
					ENV			$ -		$ -		$ -		$ -		$ -
					CST	$ 161.00		$ -	CST	$ 212.52		$ -		$ -		$ -
					CEI			$ -		$ -		$ -		$ -		$ -
1031	Osceola	SR 91 / Florida's Turnpike From: CR 525 / Kissimmee Park Rd - To: US 192/441	Widen to 8 Lanes	3.19	PD&E	$ 4.00	PD&E	$ 4.00		$ -		$ -		$ -		$ -
					PE	$ 5.00		$ -	PE	$ 6.60		$ -		$ -		$ -
					ROW	$ 8.00		$ -	ROW	$ 10.56		$ -		$ -		$ -
					ENV	$ -		$ -		$ -		$ -		$ -		$ -
					CST	$ 70.00		$ -	CST	$ 92.40		$ -		$ -		$ -
					CEI			$ -		$ -		$ -		$ -		$ -

APPENDIX B
Preferred Alternative Conceptual Plans

CONTRACT PLANS COMPONENTS
CONCEPT PLANS

STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

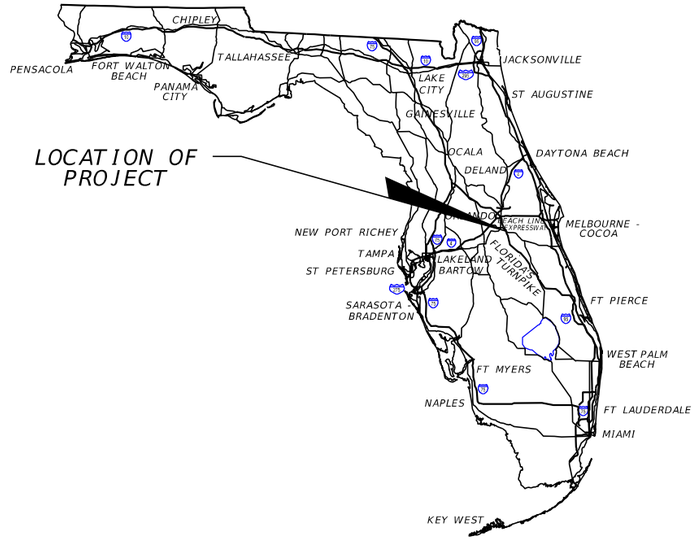
CONTRACT PLANS

FINANCIAL PROJECT ID 438547-1-22-01

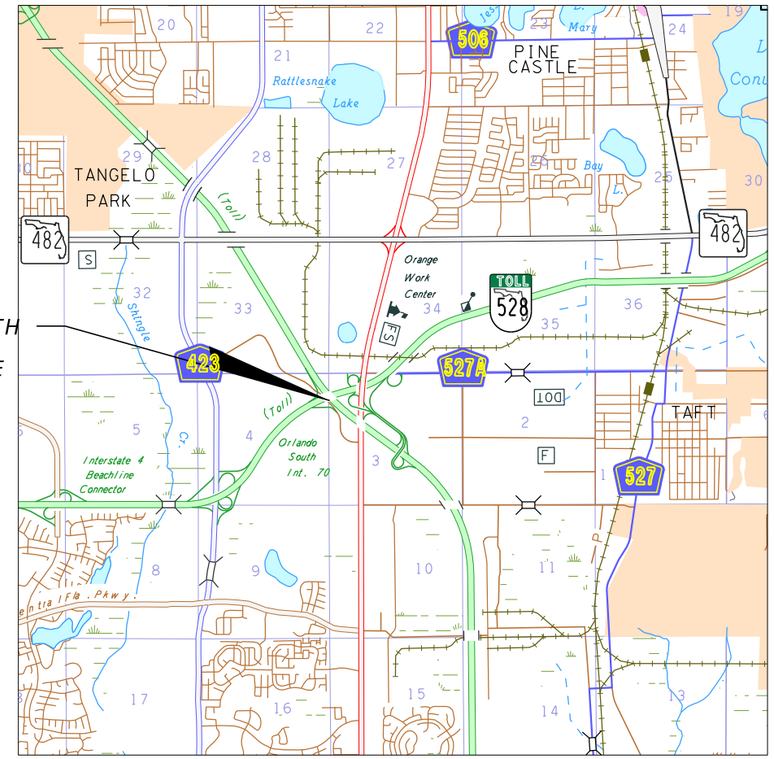
ORANGE COUNTY (75470)

STATE ROAD NO. 91 (FLORIDA'S TURNPIKE)
STATE ROAD NO. 528 (BEACHLINE EXPRESSWAY)

ORLANDO SOUTH ULTIMATE INTERCHANGE PD&E STUDY
FLORIDA'S TURNPIKE (SR 91, MP 254) AND
BEACHLINE EXPRESSWAY (SR 528, MP 4)



ORLANDO SOUTH ULTIMATE INTERCHANGE



INDEX OF ROADWAY PLANS

SHEET NO.	SHEET DESCRIPTION
i	KEY SHEET
ii	PROJECT LAYOUT
iii-vi	TYPICAL SECTIONS
1 - 11	PLAN SHEETS

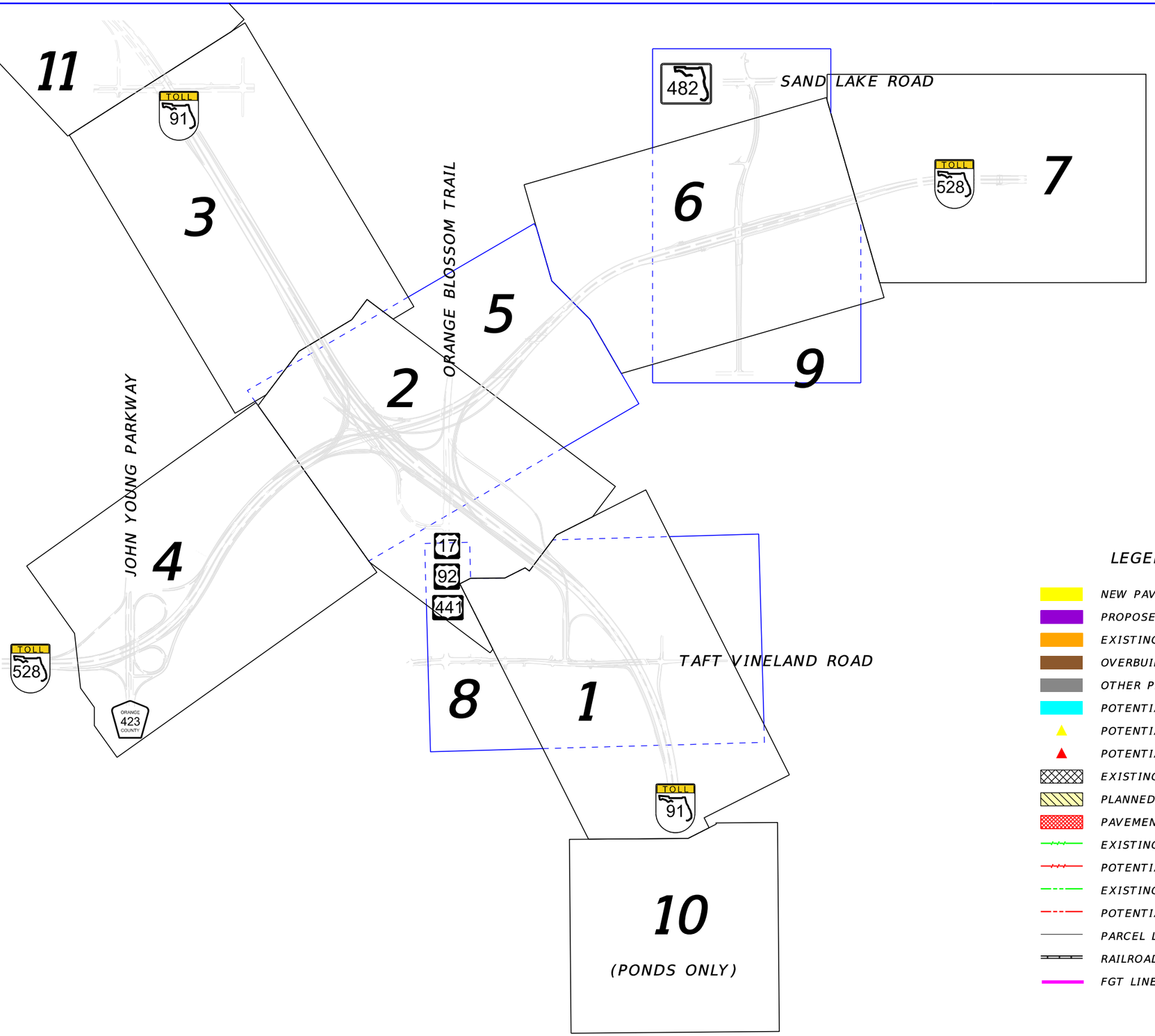
ROADWAY PLANS
ENGINEER OF RECORD:

STEPHAN HEIMBURG, P.E.
P.E. NO.: 41934
HARDESTY & HANOVER LLC
5110 EISENHOWER BLVD, SUITE 310
TAMPA, FL 33634
PHONE NO.: (813) 749-0823
CONTRACT NO.: C-9063
VENDOR NO.: 45-3031954001
CERTIFICATE OF AUTHORIZATION NO.: 29741

FDOT PROJECT MANAGER:

Rax Jung, PhD, PE
GEC Project Manager
Anil Sharma, PE

FISCAL YEAR	SHEET NO.
20	i



LEGEND

- NEW PAVEMENT OR WIDENING
- PROPOSED BRIDGE
- EXISTING BRIDGE
- OVERBUILD/RESURFACING
- OTHER PROJECTS
- POTENTIAL WETLANDS/OTHER SURFACE WATERS
- POTENTIAL MEDIUM CONTAMINATION SITES
- POTENTIAL HIGH CONTAMINATION SITES
- EXISTING BUILDING
- PLANNED BUILDING
- PAVEMENT REMOVAL
- EXISTING LIMITED ACCESS RIGHT OF WAY
- POTENTIAL LIMITED ACCESS RIGHT OF WAY
- EXISTING RIGHT OF WAY
- POTENTIAL RIGHT OF WAY
- PARCEL LINES
- RAILROAD
- FGT LINE

REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
HARDESTY & HANOVER, LLC.
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
CERTIFICATE OF AUTHORIZATION 00029741

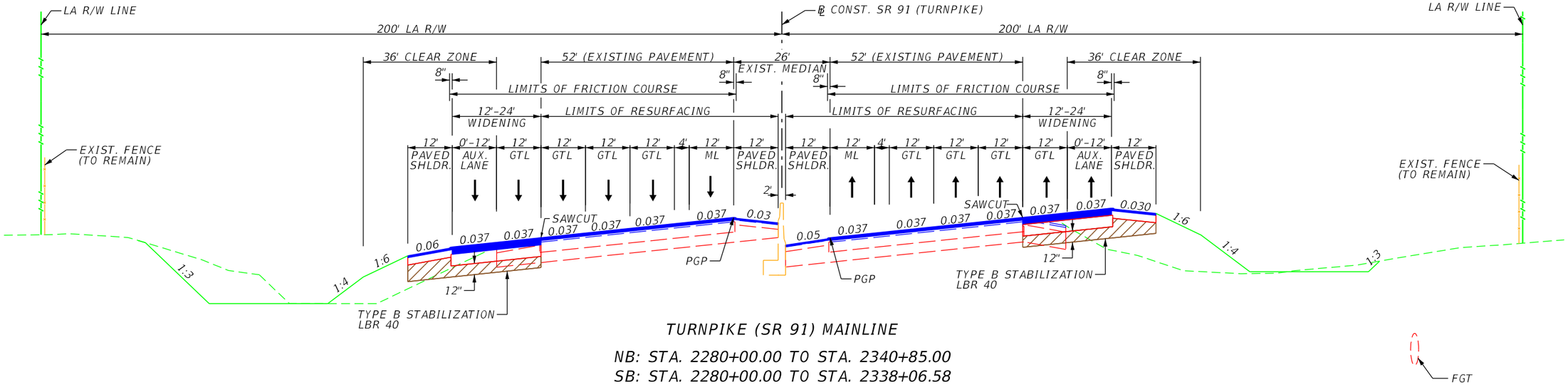
STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

PROJECT LAYOUT

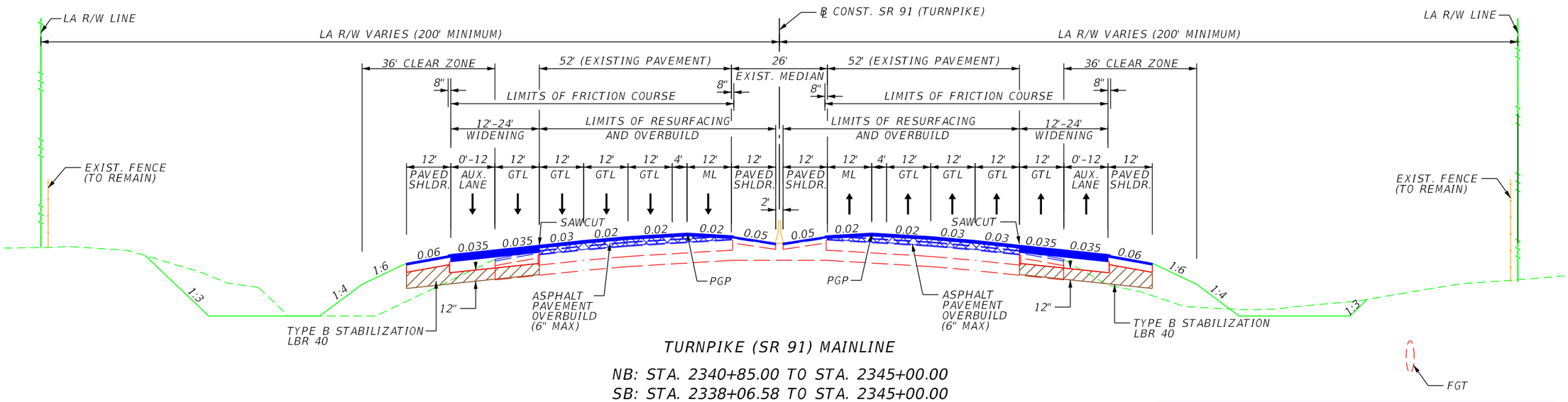
SHEET NO. ii

$USER$ $DATE$ $TIME$ $MODELNAME$ $FILE$



TURNPIKE (SR 91) MAINLINE

NB: STA. 2280+00.00 TO STA. 2340+85.00
SB: STA. 2280+00.00 TO STA. 2338+06.58



TURNPIKE (SR 91) MAINLINE

NB: STA. 2340+85.00 TO STA. 2345+00.00
SB: STA. 2338+06.58 TO STA. 2345+00.00

TYPICAL SECTIONS

REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
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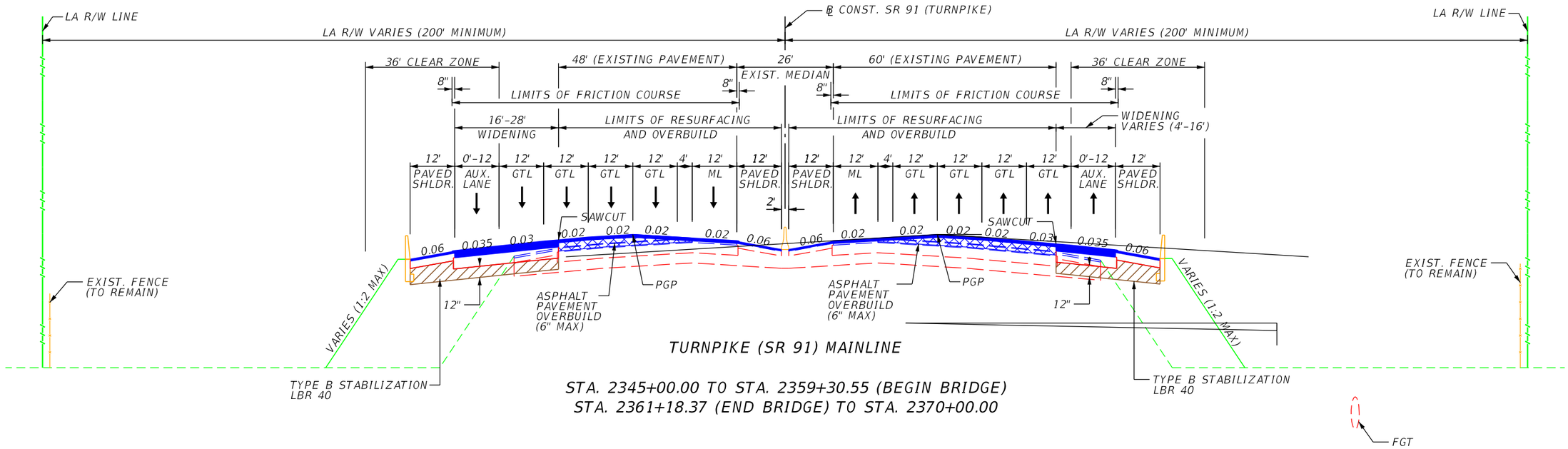
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
CERTIFICATE OF AUTHORIZATION 00029741

STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

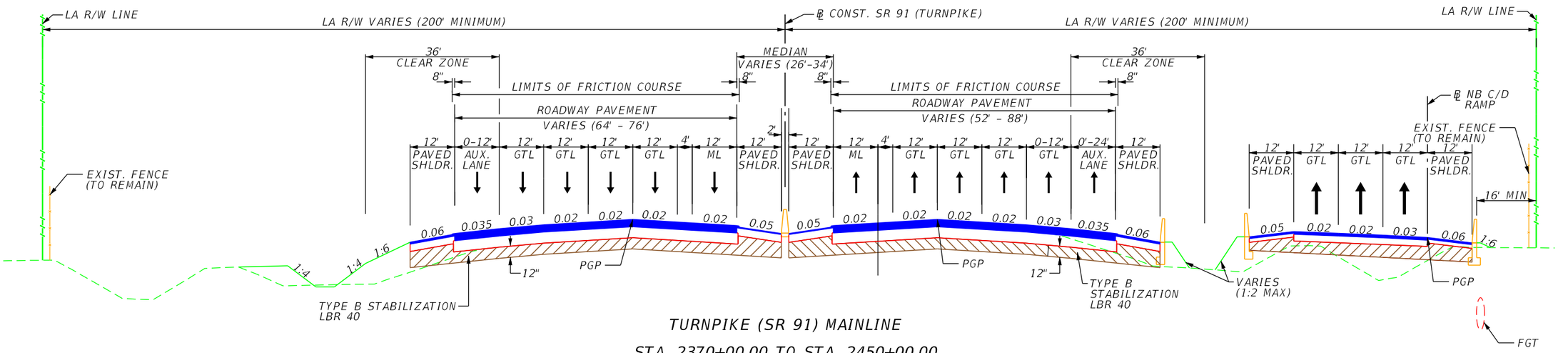
ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. iii



TURNPIKE (SR 91) MAINLINE

STA. 2345+00.00 T0 STA. 2359+30.55 (BEGIN BRIDGE)
STA. 2361+18.37 (END BRIDGE) T0 STA. 2370+00.00



TURNPIKE (SR 91) MAINLINE

STA. 2370+00.00 T0 STA. 2450+00.00

TYPICAL SECTIONS

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
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HARDESTY & HANOVER, LLC.
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
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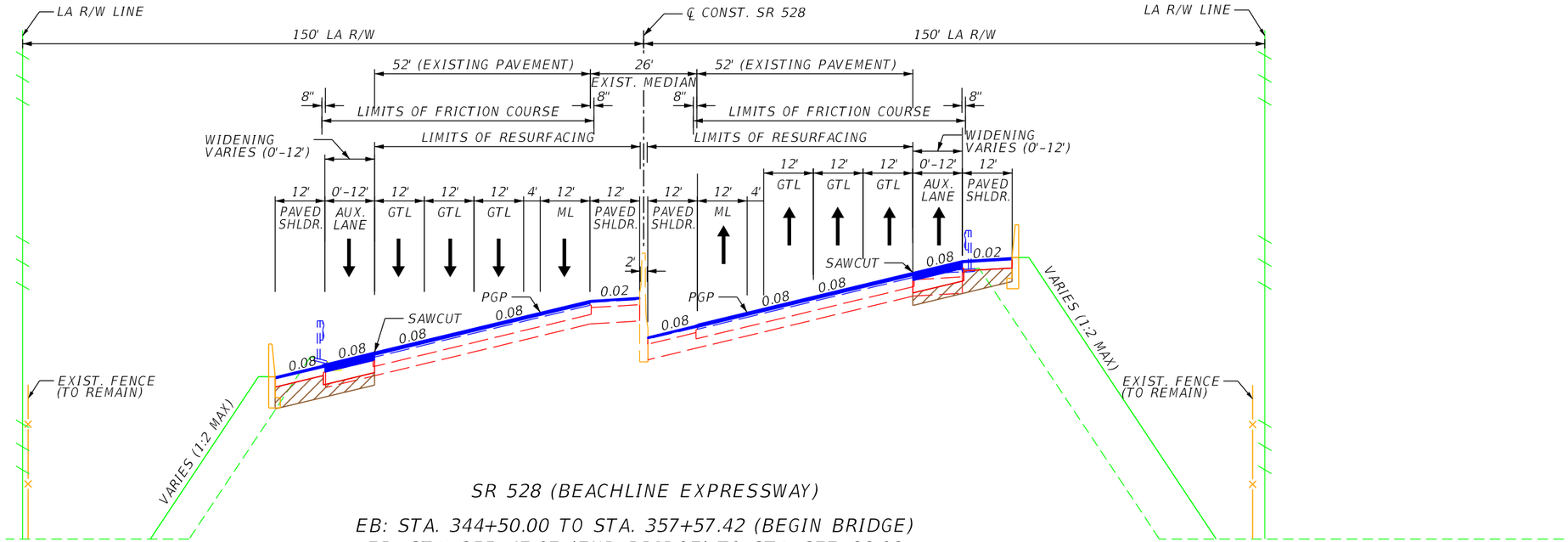
STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

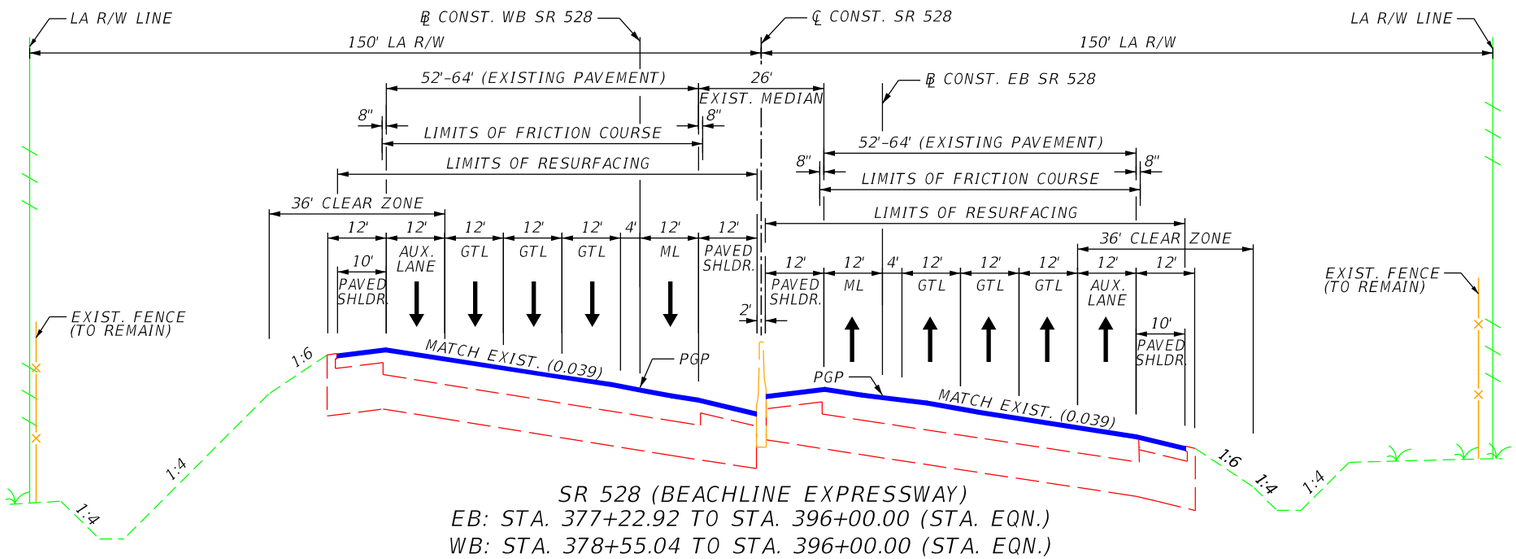
ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

SHEET NO. iv



SR 528 (BEACHLINE EXPRESSWAY)

EB: STA. 344+50.00 TO STA. 357+57.42 (BEGIN BRIDGE)
EB: STA. 355+47.07 (END BRIDGE) TO STA. 377+22.92
WB: STA. 355+47.07 (END BRIDGE) TO STA. 378+55.04



SR 528 (BEACHLINE EXPRESSWAY)

EB: STA. 377+22.92 TO STA. 396+00.00 (STA. EQN.)
WB: STA. 378+55.04 TO STA. 396+00.00 (STA. EQN.)
STA. EQN.: ℄ CONST. SR 528 STA. 396+00.00 = ℄ CONST. EB SR 528 STA. 1396+00.00, 25' RT.
STA. EQN.: ℄ CONST. SR 528 STA. 396+00.00 = ℄ CONST. WB SR 528 STA. 3396+00, 25' LT.
EB: STA. 1396+00.00 (STA. EQN.) TO STA. 1402+01.85
WB: STA. 3396+00.00 (STA. EQN.) TO STA. 3401+90.47

TYPICAL SECTIONS

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. v

REVISIONS

DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
HARDESTY & HANOVER, LLC.
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
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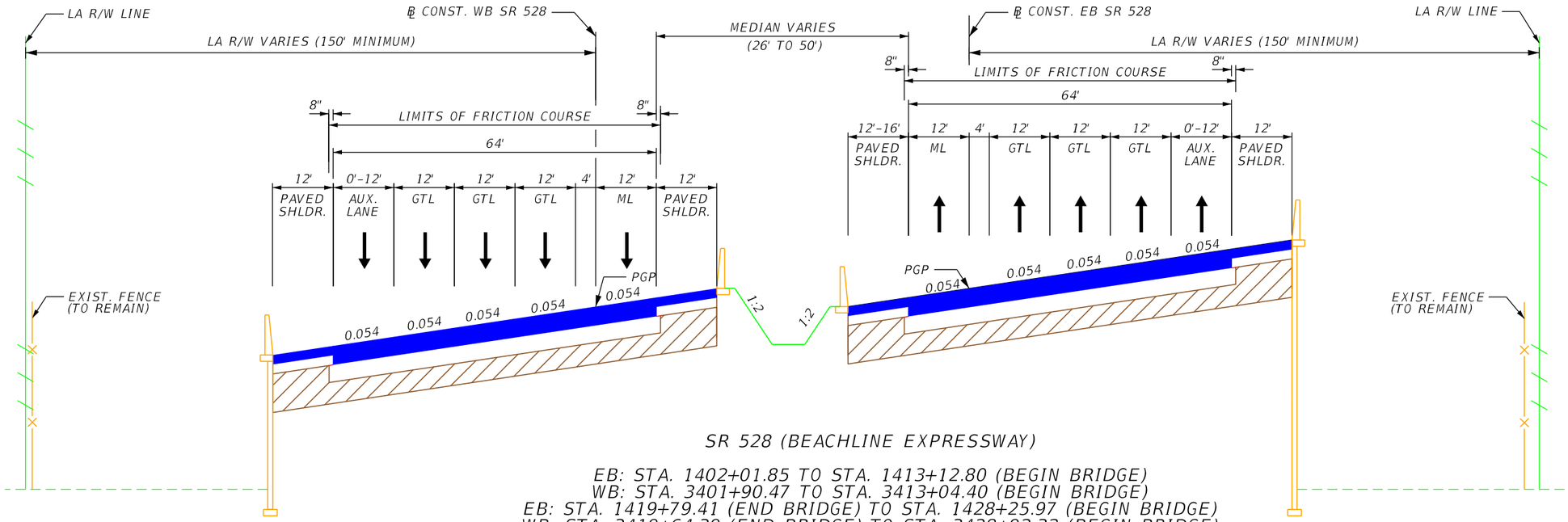
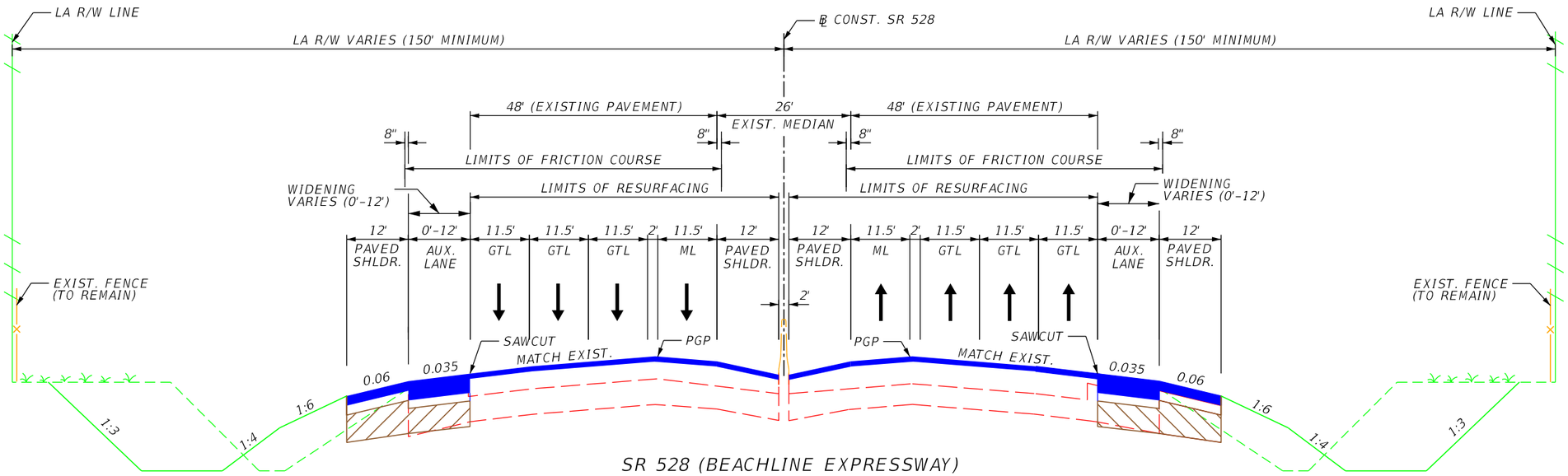
STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01



SR 528 (BEACHLINE EXPRESSWAY)

EB: STA. 1402+01.85 TO STA. 1413+12.80 (BEGIN BRIDGE)
WB: STA. 3401+90.47 TO STA. 3413+04.40 (BEGIN BRIDGE)
EB: STA. 1419+79.41 (END BRIDGE) TO STA. 1428+25.97 (BEGIN BRIDGE)
WB: STA. 3419+64.39 (END BRIDGE) TO STA. 3428+92.32 (BEGIN BRIDGE)
EB: STA. 1430+68.49 (END BRIDGE) TO STA. 1441+49.33 (BEGIN BRIDGE)
WB: STA. 3431+000.67 (END BRIDGE) TO STA. 3441+14.96 (END BRIDGE)



SR 528 (BEACHLINE EXPRESSWAY)

STA. 444+62.31 (END BRIDGE) TO STA. 451+91.95 (BEGIN BRIDGE)
STA. 453+56.18 (END BRIDGE) TO STA. 547+00.00

TYPICAL SECTIONS

REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
HARDESTY & HANOVER, LLC.
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
CERTIFICATE OF AUTHORIZATION 00029741

STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

ORLANDO SOUTH
ULTIMATE INTERCHANGE
BUILD ALT 3

SHEET NO. vi

0 100 400
Feet

MATCHLINE PLAN (1)
STA. 2279+00.00

MATCHLINE PLAN (2)
STA. 2339+00.00

BEGIN SR 91 CONSTRUCTION
℄ STA. 2280+00

℄ CONST. SR 91
(TURNPIKE)

TOLL
91
FLORIDA'S TURNPIKE

CYPRESS PARK EAST CONDO

CLASS A INDUSTRIAL

CREWS

JRO TIRES

COMMERCE DEVELOPMENT POND

PENSKE TRUCK LEASING

BEYEL BROTHERS

FTE OWNED

RAMP 201
RAMP 203
RAMP 205
RAMP 302
RAMP 304
RAMP 305
RAMP 308
RAMP 314

POND 1A
POND 1B
POND 1C
POND 1D
POND 3
POND 4

BRIDGE P3
BRIDGE 11 & 12

AUTO AUCTION
TRUCK SERVICES
UTILITY GRID
GOOD YEAR
FACTORY DIRECT INC
AIR LIQUIDE
THE NINTH CIRCLE
FREEMAN
FASTENAL
TRUCK PM PLUS
ROADTEC
ROYAL BRASS & HOSE
COOK COMPOSITES & POLYMERS
THERMO KING OF THE SOUTHEAST
R J KIELTY PLUMBING
JUST QUALITY TRUCK & BUS

General Dr
Rocket Blvd
W Taft Vineland Rd
Bachman Rd
Thorpe Rd

REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

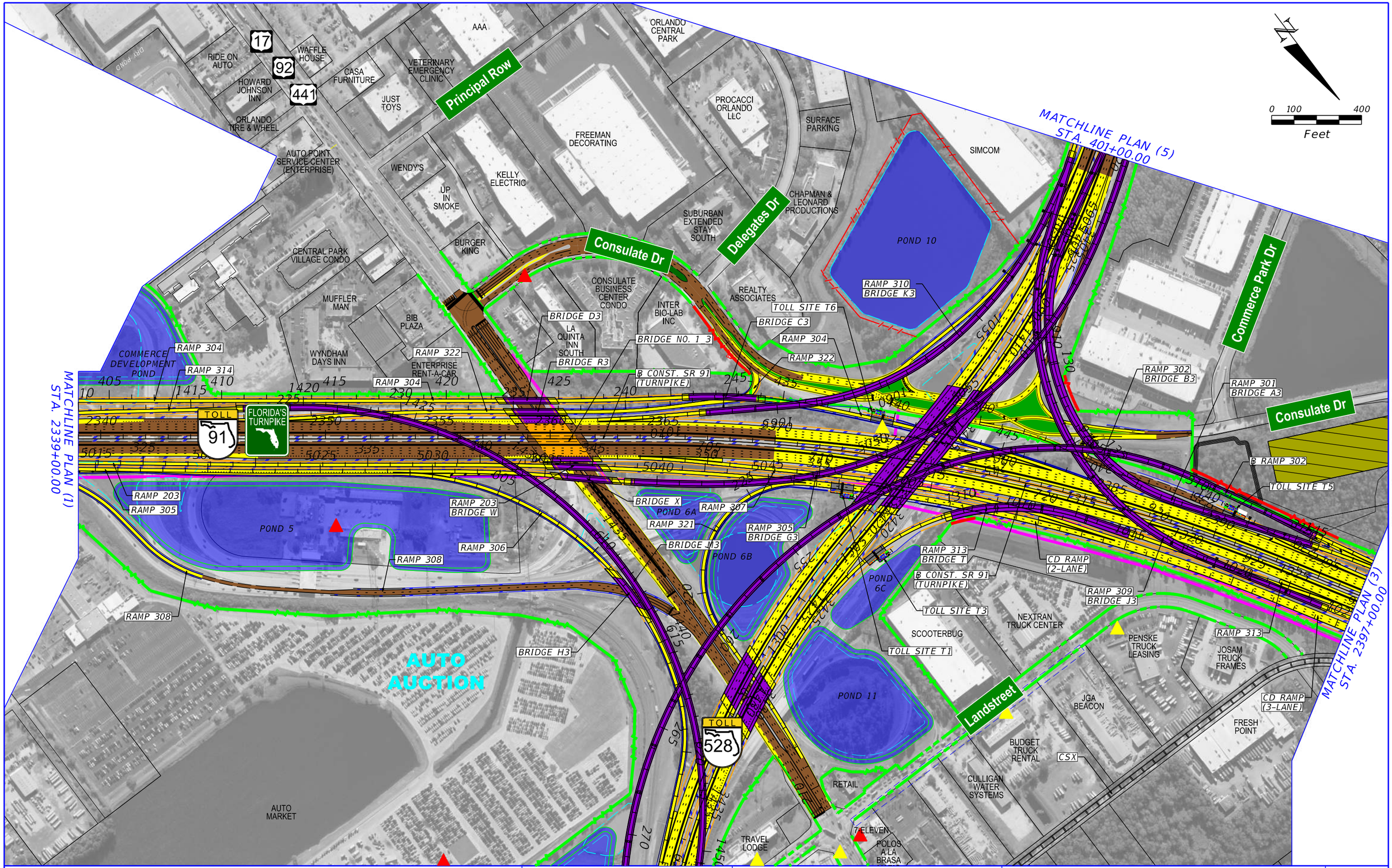
STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
HARDESTY & HANOVER, LLC.
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
CERTIFICATE OF AUTHORIZATION 00029741

STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. 1



REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
HARDESTY & HANOVER, LLC.
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
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STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. 2

Destination Pkwy

SOUTH PARK SHOPPING CENTER

0 100 400
Feet

Consulate Dr

MARRIOTT VACATION CLUB

WALGREENS

LOWES

POND 7

℄ RAMP 302

℄ RAMP 301

TOLL SITE T4

℄ RAMP 302

℄ CONST. SR 91 (TURNPIKE)

RAMP 326

END SB CONSTRUCTION SR 91 STA. 2450+00

MATCHLINE PLAN (2) STA. 2397+00.00

MATCHLINE PLAN (1) STA. 2453+50.00

FLORIDA'S TURNPIKE

TOLL 91

TOLL SITE T2

℄ RAMP 309

RAMP 325

LEADING EDGE LAND SERVICES

AIR PRODUCTS MANUFACTURING

IPANEMA III SERVICE CENTER

TRUSTAR GAS

ORLANDO COGEN

HEAVEN PLAZA I

HEAVEN PLAZA II

FLIR GOVERNMENT SYSTEMS

PATENT CONSTRUCTION SYSTEMS

ORANGE COUNTY UTILITIES CENTER

NEW MISSIONS INC

SCHULLER CONSTRACTORS INC

INTOWN SUITES

SPICE WORLD

WAREHOUSE

HALPERNS'

PARK COMMERCE CENTER

VACANT

Sand Lake Rd

COVSERVA TECHNOLOGY CENTER

ORLANDO CENTRAL PARK

CVS

FAIRWINDS CREDIT UNION

CHANCELLOR SQUARE

482

REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
HARDESTY & HANOVER, LLC.
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
CERTIFICATE OF AUTHORIZATION 00029741

STATE OF FLORIDA
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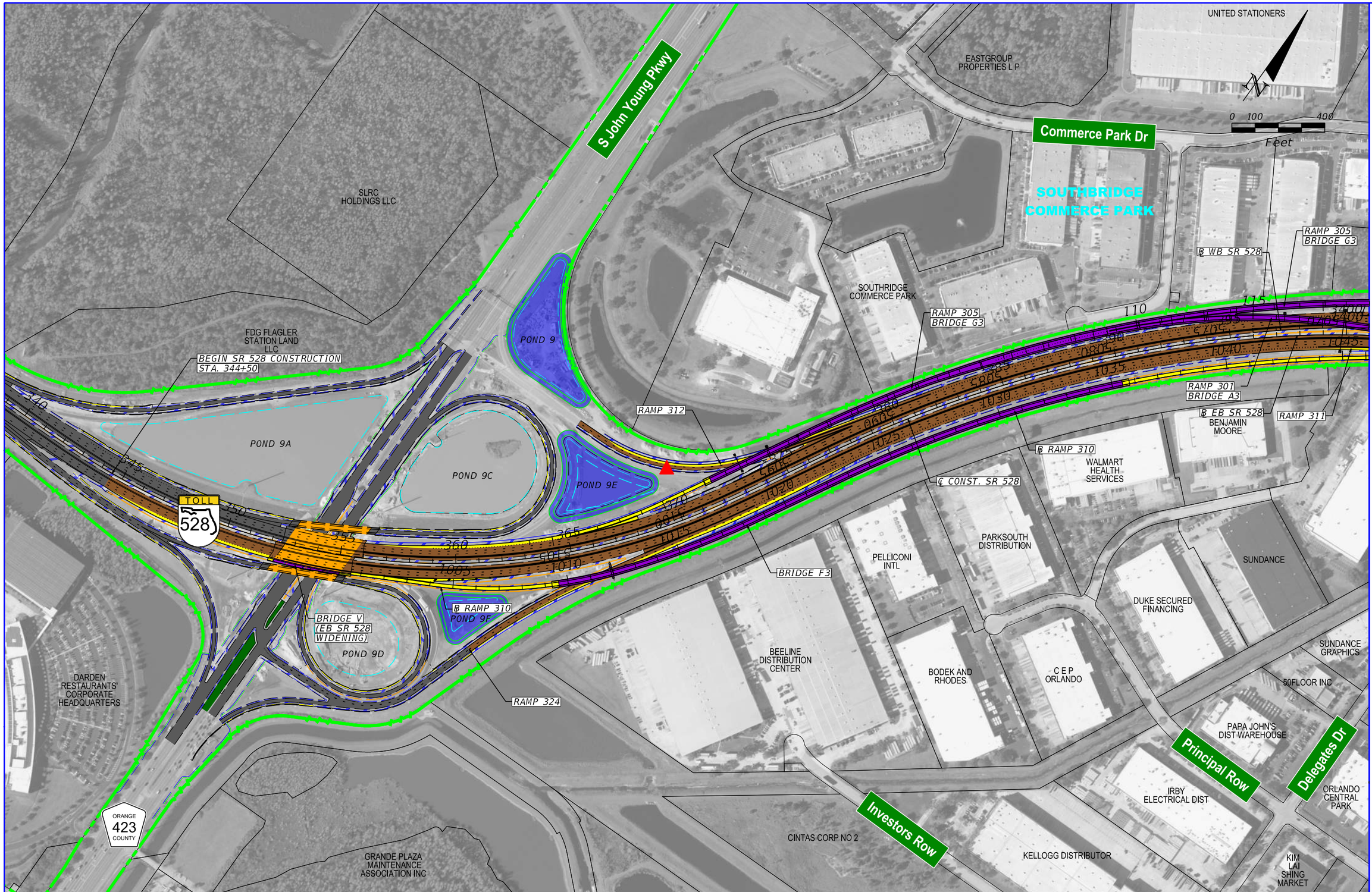
ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. 3



REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
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5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
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STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. 4

MATCHLINE PLAN (4)
STA. 401+00.00

MATCHLINE PLAN (6)
STA. 462+00.00

Consulate Dr
Commerce Park Dr
S Orange Blossom Trail
La Quinta Dr
Delegates Dr
W Landstreet Rd

FRESH POINT
JOSAM TRUCK FRAMES
CSX
VACANT
MECH TECH INSTITUTE
GORDON FOOD SERVICE STORE
WAWA
MCDONALDS
DIVISION OF FORESTRY
VACANT
ARBY'S
DUNKIN DONUTS
LA QUINTA BUSINESS CENTER
HAMPTON INN
TRANSWORLD
FIRE STATION #53
LA QUINTA BUSINESS CENTER II
PENSKE TRUCK LEASING
JGA BEACON
BUDGET TRUCK RENTAL
CULLIGAN WATER SYSTEMS
ECONO LODGE INN AND SUITES
MITSUBISHI MOTORS
SUZUKI
BUICK GMC
ACURA
BAYMONT INN AND SUITES
NEXTRAN TRUCK CENTER
POLOS A LA BRASA MARIO
7-ELEVEN
MASSEY CADILLAC
WAFFLE HOUSE
MOBIL
RETAIL
BLOSSOM PARK CONDOMINIUMS
LA QUINTA DISTRIBUTION CENTER
RYDER
ALL AMERICAN CRATING
TRAVEL LODGE
SUNSHINE RECYCLING
AUTO MARKET
SIMCOM
POND 10
POND 11
POND 6C
POND 6B
POND 6A
POND 12
POND 5
SURFACE PARKING
CHAPMAN & LEONARD PRODUCTIONS
REALTY ASSOCIATES
SUNDANCE GRAPHICS
INTER BIO-LAB INC
SUBURBAN EXTENDED STAY SOUTH
PROCACCI ORLANDO LLC
CONSULATE BUSINESS CENTER CONDO
LA QUINTA INN SOUTH
ORLANDO CENTRAL PARK
FREEMAN DECORATING
AUTO BUY
READY LOGISTICS
MANHEIM AUCTION

RAMP 301
BRIDGE A3
RAMP 305
BRIDGE G3
RAMP 320
BRIDGE T
BRIDGE NO. 3 3
TOLL SITE T3
RAMP 321
BRIDGE NO. 4 3
℄ WB SR 528
BRIDGE J3
RAMP 311
RAMP 310
BRIDGE K3
BRIDGE NO. 2A 3
TOLL SITE T6
TOLL SITE T1
℄ EB SR 528
RAMP 314
BRIDGE M3
BRIDGE NO. 6 3
BRIDGE L3
BRIDGE 14 3
℄ CONST. SR 528
RAMP 302
BRIDGE NO. 15 3
BRIDGE E3
BRIDGE NO. 5 3
BRIDGE NO. 2B 3
RAMP 302
BRIDGE B3

TOLL 528
TOLL 91
FLORIDA'S TURNPIKE

0 100 400
Feet
YRC

REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

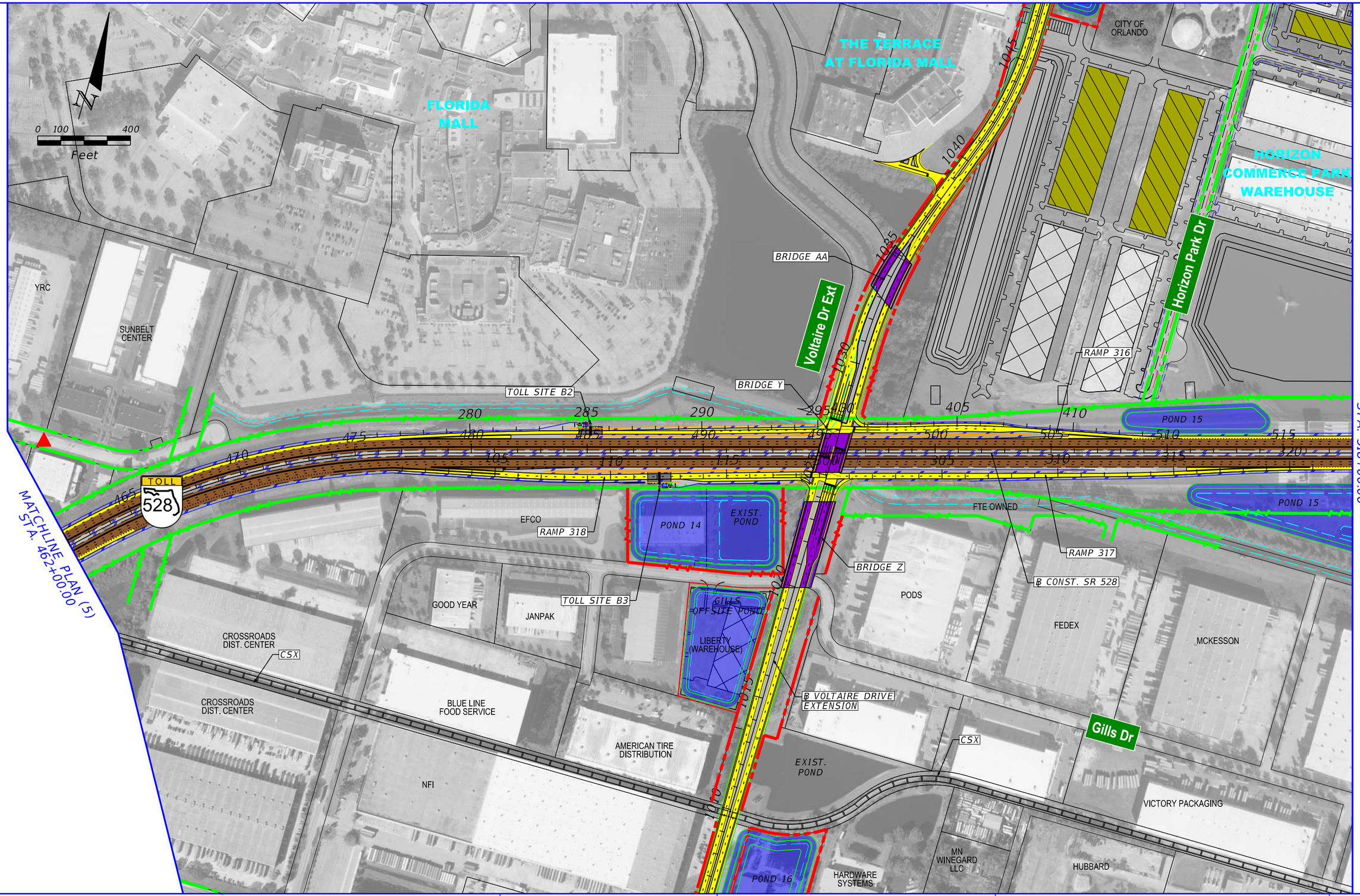
STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
HARDESTY & HANOVER, LLC.
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
CERTIFICATE OF AUTHORIZATION 00029741

STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. 5



REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
HARDESTY & HANOVER, LLC.
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
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STATE OF FLORIDA
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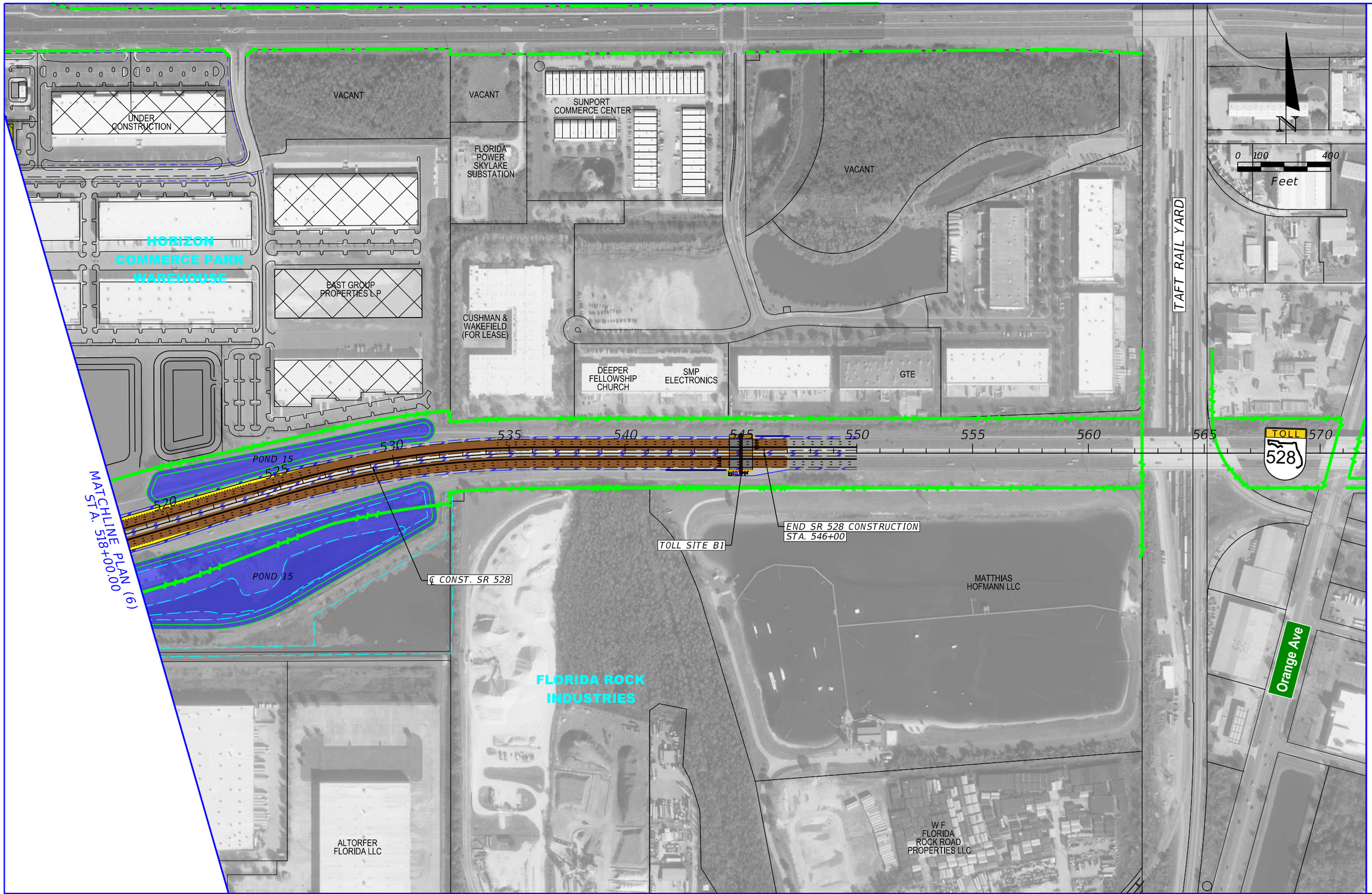
ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. 6



REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
HARDESTY & HANOVER, LLC.
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
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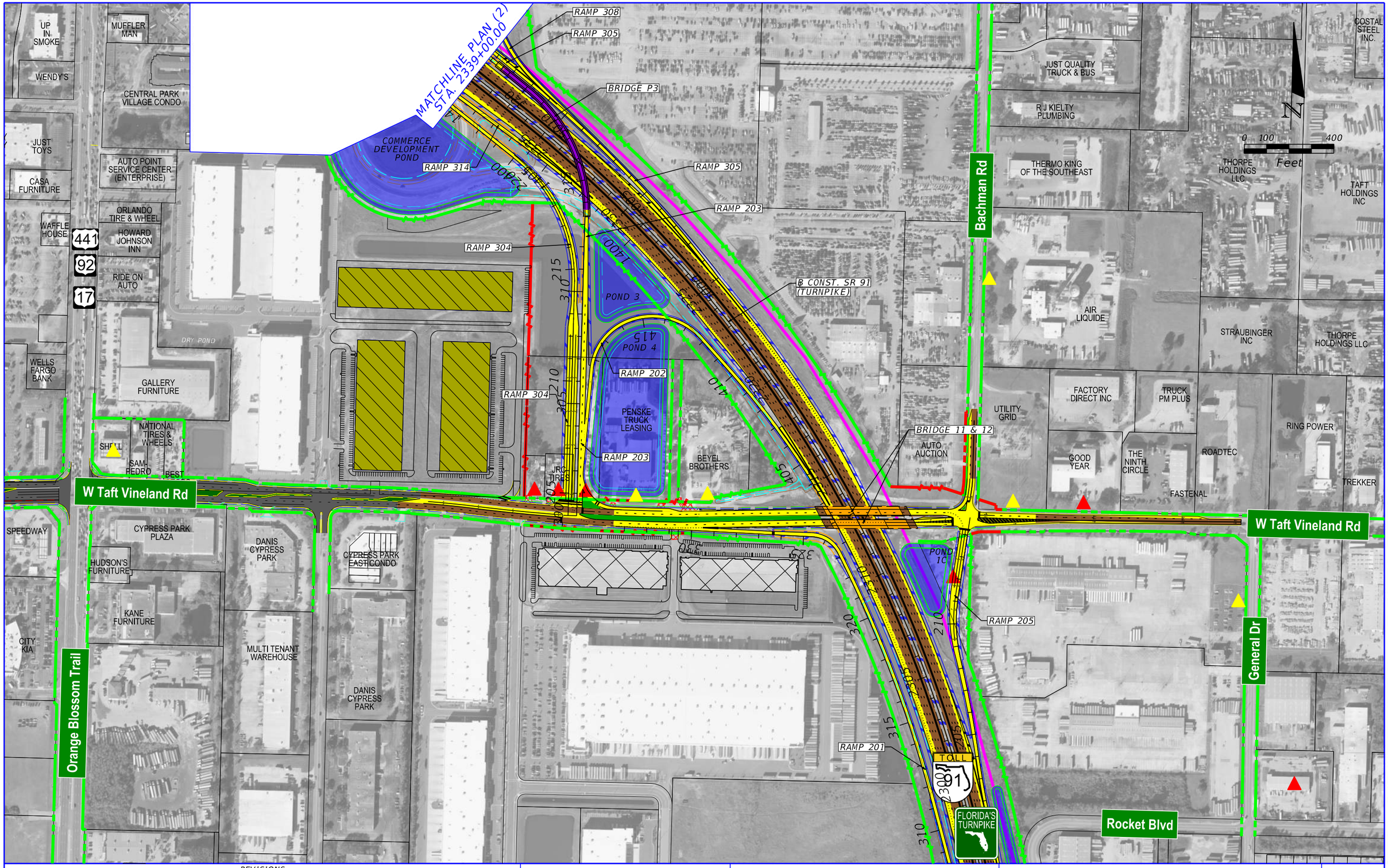
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. 7



REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
HARDESTY & HANOVER, LLC.
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
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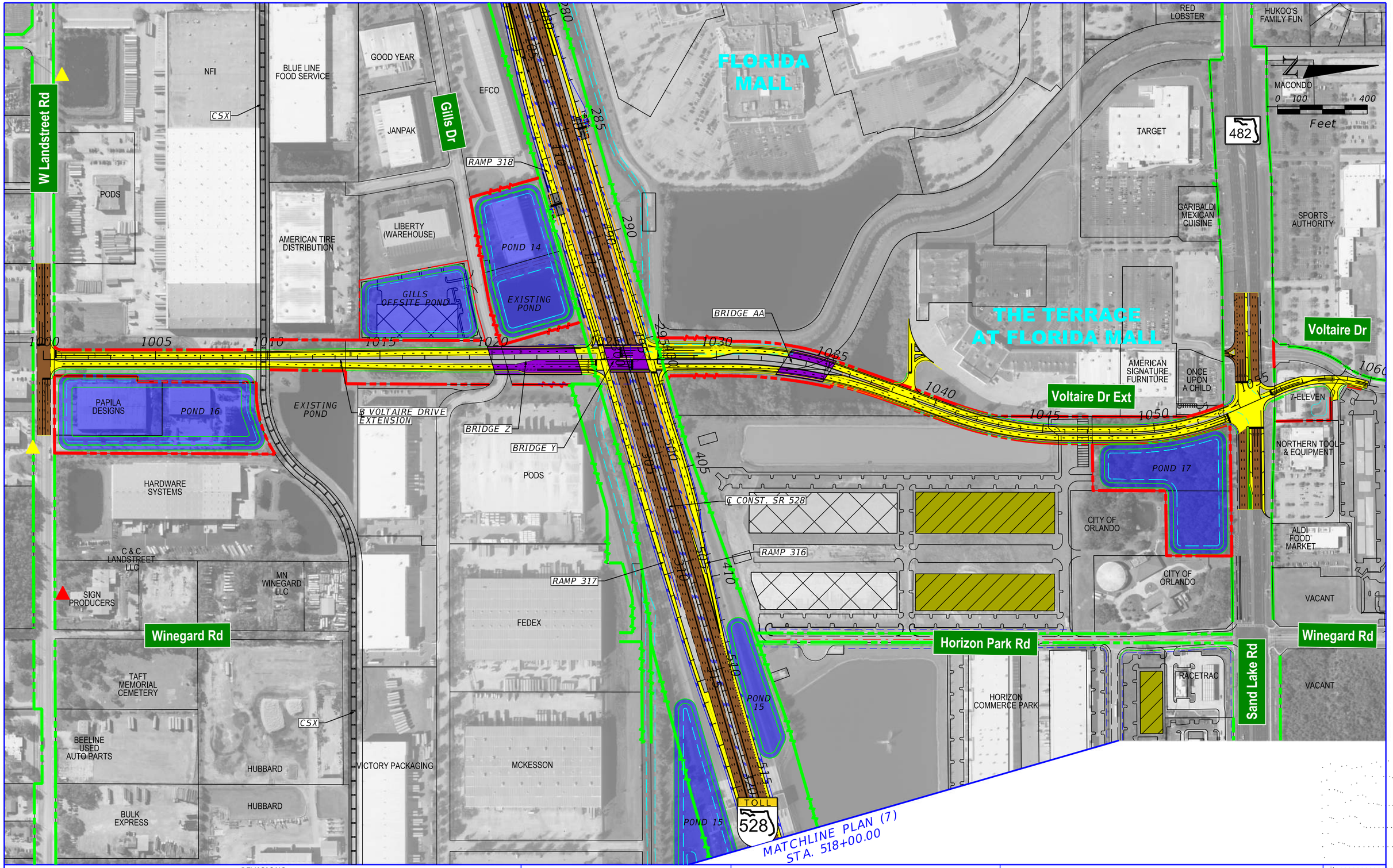
STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. 8



REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

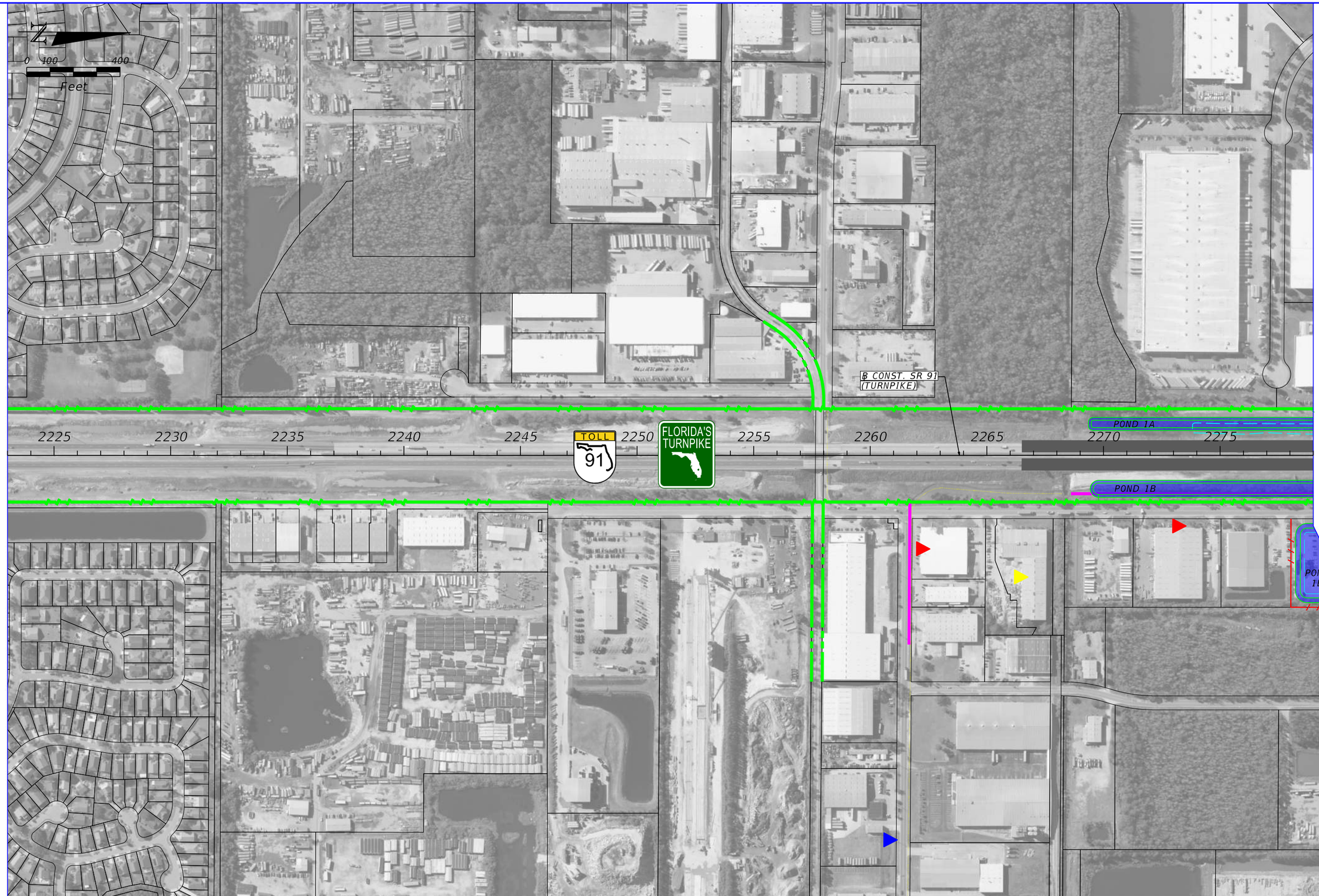
STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
HARDESTY & HANOVER, LLC.
5110 EISENHOWER BOULEVARD, SUITE 310
TAMPA, FL 33634
CERTIFICATE OF AUTHORIZATION 00029741

STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. 9



MATCHLINE PLAN (1)
STA. 2279+00.00

REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
P.E. LICENSE NUMBER 41934
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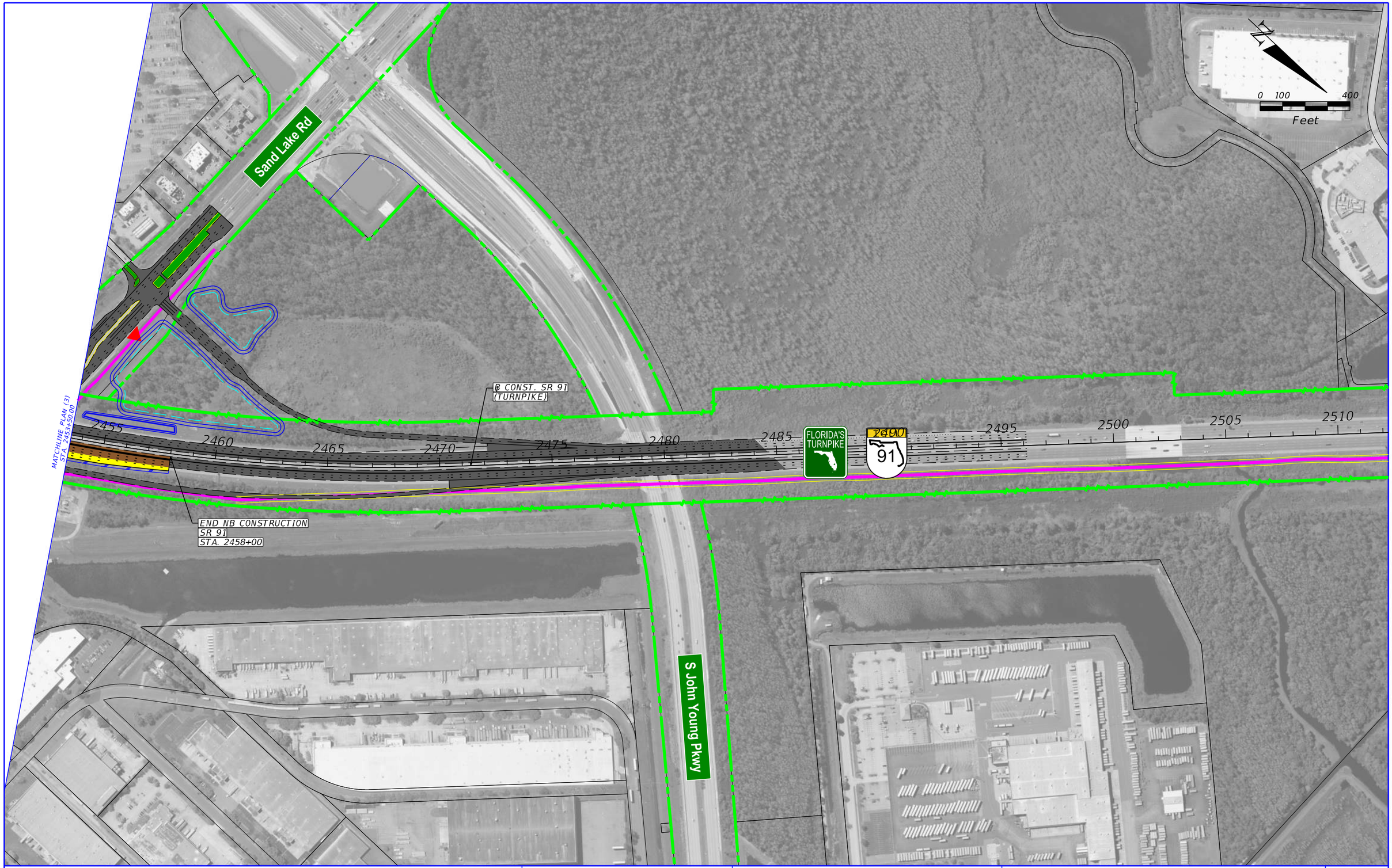
STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. 10



REVISIONS			
DATE	DESCRIPTION	DATE	DESCRIPTION

STEPHAN HEIMBURG, P.E.
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STATE OF FLORIDA
DEPARTMENT OF TRANSPORTATION

ROAD NO.	COUNTY	FINANCIAL PROJECT ID
SR 91/ SR 528	ORANGE	438547-1-22-01

ORLANDO SOUTH ULTIMATE INTERCHANGE BUILD ALT 3

SHEET NO. 11

APPENDIX C

EDTM Programming Summary Report and Agency Comments

Florida Department of Transportation

RON DESANTIS
GOVERNOR

605 Suwannee Street
Tallahassee, FL 32399-0450

KEVIN J. THIBAULT
SECRETARY

ETDM Summary Report

Project #14294 - Orlando South Ultimate Interchange

Programming Screen - Published on 05/05/2017

Printed on: 9/30/2019

Table of Contents

Introduction to Programming Screen Summary Report

The Programming Screen Summary Report shown below is a read-only version of information contained in the Programming Screen Summary Report generated by the ETDM Coordinator for the selected project after completion of the ETAT Programming Screen review. The purpose of the Programming Screen Summary Report is to summarize the results of the ETAT Programming Screen review of the project; provide details concerning agency comments about potential effects to natural, cultural, and community resources; and provide additional documentation of activities related to the Programming Phase for the project. Available information for a Programming Screen Summary Report includes:

- Screening Summary Report chart
- Project Description information (including a summary description of the project, a summary of public comments on the project, and community-desired features identified during public involvement activities)
- Purpose and Need information (including the Purpose and Need Statement and the results of agency reviews of the project Purpose and Need)
- Alternative-specific information, consisting of descriptions of each alternative and associated road segments; an overview of ETAT Programming Screen reviews for each alternative; and agency comments concerning potential effects and degree of effect, by issue, to natural, cultural, and community resources.
- Project Scope information, consisting of general project commitments resulting from the ETAT Programming Screen review, permits, and technical studies required (if any)
- Class of Action determined for the project
- Dispute Resolution Activity Log (if any)

The legend for the Degree of Effect chart is provided in an appendix to the report.

For complete documentation of the project record, also see the GIS Analysis Results Report published on the same date as the Programming Screen Summary Report.

#14294 Orlando South Ultimate Interchange

District: District 5
County: Orange
Planning Organization: Florida's Turnpike Enterprise
Plan ID: Not Available
Federal Involvement: Other Federal Permit

Phase: Programming Screen
From:
To:
Financial Management No.: 438547-1-22-01

Contact Information: Abra E Horne (407) 264-3019 x3019 Abra.Horne@dot.state.fl.us
Snapshot Data From: Project Published 5/05/2017
Issues and Categories are reflective of what was in place at the time of the screening event.

	Social and Economic							Cultural			Natural					Physical					Emergency Response
	Land Use Changes	Social	Relocation Potential	Farmlands	Aesthetic Effects	Economic	Mobility	Section 4(f) Potential	Historic and Archaeological Sites	Recreation Areas	Wetlands and Surface Waters	Water Quality and Quantity	Floodplains	Wildlife and Habitat	Coastal and Marine	Noise	Air Quality	Contamination	Infrastructure	Navigation	Special Designations
Alternative #1 From: SR 528 (MP 4) To: Florida's Turnpike (MP 254) *Published: 05/05/2017 Reviewed from 01/20/2017 to 03/06/2017)*	1	3	2	N/A	2	1	1	N/A	3	0	2	3	3	2	0	2	2	3	2	0	0

Purpose and Need

Purpose and Need

The purpose of the Orlando South Ultimate Interchange improvement is to accommodate future travel demands expected along SR 91 (Florida's Turnpike) and SR 528 (Beachline Expressway) due to increased population, freight demands and employment opportunities expected in Orange County, Florida. The interchange improvements will also provide improved access to tourist centers, Orlando International Airport, Port Canaveral, and the growing industrial region surrounding the project location.

Daily volumes on Florida's Turnpike are projected to increase to 123,500 vehicles per day (vpd) south of the interchange and 138,200 vpd north of the interchange under the No-Build scenario by the design year 2045. For the design year 2045 Build scenario, Florida's Turnpike volumes will range from 115,000 to 131,200 vpd south of the interchange and 131,000 to 134,000 vpd north of the interchange, depending on the improvement alternative. In order to maintain an acceptable Level of Service (LOS D for Florida's Turnpike mainline and LOS E for Turnpike ramps), Florida's Turnpike will need to be widened to 10 lanes by the year 2038 north of the Orlando South Interchange and by the year 2040 to the south of the interchange under the No-Build scenario. Additionally, total freight movements across Orange County are expected to increase by up to 58% by 2040 which will place higher traffic demands on designated Strategic Intermodal System (SIS) corridors like Florida's Turnpike and SR 528.

The Florida Future Corridors Initiative has recommended improvements be made to SR 528 and Florida's Turnpike near Orlando to accommodate future traffic demands. Currently SR 528 is the only limited access roadway that provides a high speed connection between Orlando and Brevard County and is expected to become strained as labor pools and businesses in Orlando and Brevard County become more connected and freight and tourist traffic continues to grow between Port Canaveral and Orlando. The interchange improvements, along with existing plans to widen SR 528 to eight lanes from Interstate 4 (I-4) to McCoy Road (FPID #406090-5 and #437156-1) will address these needs and directly service businesses located in the areas of industrial land use immediately surrounding the interchange. Currently this area is home to SouthPark Center, "Orlando's most successful business park" with over 2.9 million square feet of building space on 176 acres of property. The area also features other smaller industrial parks, individual commercial/industrial properties, and vacant industrial lands, which will allow for the future expansion of industry around the Orlando South Interchange.

Although not directly serviced by the interchange, the Orange County Convention Plaza Overlay District and International Drive are located approximately four miles to the west of the project location. Based on their current planning efforts, Orange County expects the I-Drive corridor to see a significant increase in high density mixed use development in the future. Universal Orlando has also recently acquired approximately 500 acres of vacant land between the project location and I-Drive which has been zoned for theme park use and is expected to be developed as such in the future.

These developments will contribute to increasing traffic volumes on the limited access roadways that connect the area with other parts of the state, such as, Florida's Turnpike, SR 528 and Interstate 4. Improvements on interchanges that surround this area of future growth will relieve congestion and provide efficient access to the new residential development and theme parks from multiple limited access facilities.

Planning Consistency

The Orlando South Interchange Project is supported by MetroPlan Orlando, who is currently amending their 2040 LRTP to include future programmed funding for the project.

Purpose and Need Reviews

FL Department of Agriculture and Consumer Services

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	03/06/2017	Steve Bohl (Steve.Bohl@freshfromflorida.com)	Do not impact the Orlando District Office and Forestry Station operation as a result of this project.

FL Department of Economic Opportunity

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	03/06/2017	Matt Preston (matt.preston@deo.myflorida.com)	No Purpose and Need comments found.

FL Department of Environmental Protection

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	02/10/2017	Suzanne Ray (plan.review@dep.state.fl.us)	No Purpose and Need comments found.

FL Department of State

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	02/20/2017	Ginny Jones (ginny.jones@dos.myflorida.com)	none

FL Fish and Wildlife Conservation Commission

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	02/28/2017	Scott Sanders (scott.sanders@myfwc.com)	No Purpose and Need comments found.

National Marine Fisheries Service

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	02/14/2017	Brandon Howard (Brandon.Howard@noaa.gov)	None

National Park Service

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	03/02/2017	Anita Barnett (anita_barnett@nps.gov)	No Purpose and Need comments found.

Natural Resources Conservation Service

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	02/14/2017	Rick Robbins (rick.a.robbins@fl.usda.gov)	No Purpose and Need comments found.

Saint Johns River Water Management District

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	01/20/2017	Ken Lewis (klewis@sjrwmd.com)	Outside of SJRWMD

South Florida Water Management District

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	02/24/2017	Annette Burkett (aburkett@sfwmd.gov)	No Purpose and Need comments found.

US Army Corps of Engineers

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	02/17/2017	Randy Turner (Randy.L.Turner@usace.army.mil)	No Purpose and Need comments found.

US Coast Guard

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	01/23/2017	Randall Overton (randall.d.overton@uscg.mil)	No Purpose and Need comments found.

US Environmental Protection Agency

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	03/02/2017	Amanetta Somerville (somerville.amanetta@epa.gov)	No comments.

US Fish and Wildlife Service

Acknowledgement	Date Reviewed	Reviewer	Comments
Understood	01/23/2017	Zakia Williams (zakia_williams@fws.gov)	No Purpose and Need comments found.

Project Description Data

Project Description

The Orlando South Ultimate Interchange project is located at SR 528 milepost (MP) 4 (four) and Florida's Turnpike MP 254. The project is approximately four miles east of the western terminus of SR 528 at I-4 in Orange County Florida. Proposed improvements to the interchange could include a layered, three-tiered bridge system which would create a more direct flow of traffic between SR 528, Florida's Turnpike and local roads. The project alternatives will also include ramp improvements at the Orlando South Interchange and potentially, new interchanges.

Summary of Public Comments

Summary of Public Comments is not available at this time.

Justification

A public information meeting and a public hearing is planned for this project. The exact dates have not been determined at this time.

Planning Consistency Status

No information available.

Potential Lead Agencies

- FL Department of Transportation

Exempted Agencies

Agency Name	Justification	Date
Federal Transit Administration	FTA has requested to be exempt from reviewing any non-transit projects.	09/02/2016
US Coast Guard	US Coast Guard has requested to be exempt from reviewing any projects that do not impact navigable waterways.	09/02/2016

Community Desired Features

No desired features have been entered into the database. This does not necessarily imply that none have been identified.

User Defined Communities Within 500 Feet

No user defined communities were found within a 500 ft. buffer distance for this project.

Census Places Within 500 Feet

No census places were found within a 500 ft. buffer distance for this project.

Alternative #1

Alternative Description

Name	From	To	Type	Status	Total Length	Cost	Modes	SIS
Alternative was not named.	SR 528 (MP 4)	Florida's Turnpike (MP 254)	Bridge	ETAT Review Complete	5.92 mi.		Roadway	Y

Segment Description(s)

Location and Length

Segment No.	Name	Beginning Location	Ending Location	Length (mi.)	Roadway Id	BMP	EMP
Unnamed Segment	Unnamed Segment			5.92			

Jurisdiction and Class

Segment No.	Jurisdiction	Urban Service Area	Functional Class
Unnamed Segment			

Base Conditions

Segment No.	Year	AADT	Lanes	Config
Unnamed Segment				

Interim Plan

Segment No.	Year	AADT	Lanes	Config
Unnamed Segment				

Needs Plan

Segment No.	Year	AADT	Lanes	Config
Unnamed Segment				

Cost Feasible Plan

Segment No.	Year	AADT	Lanes	Config
Unnamed Segment				

Funding Sources

No funding sources found.

Project Effects Overview for Alternative #1

Issue	Degree of Effect	Organization	Date Reviewed
Social and Economic			
Land Use Changes	1 Enhanced	FL Department of Economic Opportunity	03/06/2017
Social	2 Minimal	US Environmental Protection Agency	03/06/2017
Farmlands	2 Minimal	Natural Resources Conservation Service	02/14/2017
Economic	1 Enhanced	FL Department of Economic Opportunity	03/06/2017
Cultural			
Historic and Archaeological Sites	3 Moderate	FL Department of State	02/20/2017
Recreation Areas	N/A N/A / No Involvement	National Park Service	03/02/2017
Recreation Areas	0 None	South Florida Water Management District	03/03/2017
Recreation Areas	N/A N/A / No Involvement	Saint Johns River Water Management District	01/20/2017
Natural			
Wetlands and Surface Waters	0 None	National Marine Fisheries Service	02/14/2017

Wetlands and Surface Waters	2 Minimal	US Army Corps of Engineers	02/17/2017
Wetlands and Surface Waters	N/A N/A / No Involvement	FL Department of Environmental Protection	03/03/2017
Wetlands and Surface Waters	2 Minimal	South Florida Water Management District	03/03/2017
Wetlands and Surface Waters	2 Minimal	US Environmental Protection Agency	03/06/2017
Wetlands and Surface Waters	N/A N/A / No Involvement	Saint Johns River Water Management District	02/07/2017
Wetlands and Surface Waters	2 Minimal	US Fish and Wildlife Service	02/24/2017
Water Quality and Quantity	3 Moderate	South Florida Water Management District	03/03/2017
Water Quality and Quantity	N/A N/A / No Involvement	Saint Johns River Water Management District	01/20/2017
Water Quality and Quantity	3 Moderate	US Environmental Protection Agency	03/06/2017
Floodplains	3 Moderate	South Florida Water Management District	03/03/2017
Floodplains	N/A N/A / No Involvement	Saint Johns River Water Management District	01/20/2017
Wildlife and Habitat	2 Minimal	FL Fish and Wildlife Conservation Commission	02/28/2017
Wildlife and Habitat	2 Minimal	US Fish and Wildlife Service	02/24/2017
Wildlife and Habitat	2 Minimal	FL Department of Agriculture and Consumer Services	03/06/2017
Coastal and Marine	N/A N/A / No Involvement	Saint Johns River Water Management District	01/20/2017
Coastal and Marine	0 None	South Florida Water Management District	03/03/2017
Coastal and Marine	0 None	National Marine Fisheries Service	02/14/2017
Physical			
Air Quality	2 Minimal	US Environmental Protection Agency	03/02/2017
Contamination	N/A N/A / No Involvement	Saint Johns River Water Management District	01/20/2017
Contamination	3 Moderate	US Environmental Protection Agency	03/06/2017
Contamination	2 Minimal	South Florida Water Management District	03/03/2017
Navigation	0 None	US Army Corps of Engineers	02/17/2017
Navigation	N/A N/A / No Involvement	US Coast Guard	01/23/2017
Special Designations			
Special Designations	0 None	US Environmental Protection Agency	03/02/2017
Special Designations	0 None	South Florida Water Management District	03/03/2017
Special Designations	N/A N/A / No Involvement	Saint Johns River Water Management District	01/20/2017
Emergency Response			

ETAT Reviews and Coordinator Summary: Social and Economic

Land Use Changes

Project Effects

Coordinator Summary Degree of Effect: 1 *Enhanced* assigned 05/04/2017 by Florida's Turnpike Enterprise

Comments:

The project is compatible with local community development goals and consistent with the Orange County Comprehensive Plan, adopted on January 19, 2017. Proposed improvements could create a more direct flow of traffic between the Orlando International Airport, Florida's Turnpike and theeast coast of Florida.

Degree of Effect: 1 *Enhanced* assigned 03/06/2017 by Matt Preston, FL Department of Economic Opportunity

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comprehensive Plan(s) Reviewed:

Orange County Comprehensive Plan, adopted on January 19, 2017; and, *City of Orlando Comprehensive Plan,* amended March 14, 2016 (adjacent jurisdiction).

Comments on Effects to Resources:

Compatibility with Community Development Goals and Comprehensive Plan:

According to Brian Sanders, with Orange County Transportation Planning, the project is compatible withcommunity development goals and consistent with the *Orange County Comprehensive Plan.*

T3.4.13 Orange County shall continue to support the planning and construction of Interstate 4 improvements, including the "I-4 Ultimate" configuration through metro Orlando and the development of "Beyond the Ultimate" I-4 improvements with six (6) General Use Lanes and four (4) Managed Express Lanes from US 27 in Polk County to SR 472 in Volusia
County. (Added 06/15, Ord. 2015-07).

Future Transportation Map:

Adoption of proposed comprehensive plan amendment 17-2ESR is in process. The proposed amendment revises the 2030 LRTP to show the Ultimate I -4 and Beyond the Ultimate projects.

Land Uses:

Future Land Use Map categories surrounding the project, include: Industrial and Commercial.

Parks:

No County parks within close proximity to the project have been identified.

Area of Critical State Concern (ACSC), Coastal High Hazard Area (CHHA), and Military Bases:

The project is not located within an Area of Critical State Concern, or the CHHA; nor does it encroach on any military bases.

Other Planning-Related Items:

The Orlando South Ultimate Interchange project is located approximately 4 miles east of the western terminus of SR 528 (a/k/a Beachline Expressway), at I-4 and the Florida Turnpike. The Beachline Expressway (E/W corridor) connects the airport to the Turnpike (N/S corridor). Proposed improvements could create a more direct flow of traffic between the Orlando International Airport, Florida's Turnpike and the west coast of Florida.

Contact Information:

Brian Sanders (Orange County) - Email Address: Brian.Sanders@ocfl.net

Additional Comments (optional):

CLC Commitments and Recommendations:

Social

Project Effects

Coordinator Summary Degree of Effect: 3 *Moderate* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

The proposed project could directly result in right-of-way acquisition from surrounding properties, business relocations, increased noise and vibration, alterations of travel patterns during construction and increased traffic volumes. Local communities will be included in the public involvement activities that take place during future phases of the project, including design and construction. Florida's Turnpike Enterprise will attempt to minimize all social impacts to the greatest extent possible during subsequent phases of this project. A Sociocultural Effects Evaluation will be conducted during the Project Development and Environment (PD&E) phase.

Degree of Effect: 2 *Minimal* assigned 03/06/2017 by Amanetta Somerville, US Environmental Protection Agency

Coordination Document: To Be Determined: Further Coordination Required

Direct Effects

Identified Resources and Level of Importance:

Resources

Social impacts to residential populations, residential communities, schools, commercial businesses, and other cultural resources such as social, economic, mobility, land use, and aesthetics.

Comments on Effects to Resources:

The proposed project will include a layered, three-tiered bridge system which creates a more direct flow of traffic between SR 582, Florida's Turnpike and local roads. Additionally, the project will include ramp improvements. The EPA reviewed both the information provided in the EST and maps of the proposed and project and there does not appear to be any residential districts located near the proposed project location. Additionally, the proposed improvements to the Orlando South Interchange will require additional right-of-way from surrounding properties. The roadway expansion could result in direct social impacts such as property and business relocations, increased noise and roadway vibration, construction detours and travel pattern disruptions, and increased traffic volumes. Involvement from the local and surrounding communities is recommended and public involvement activities should be a part of future project programming and project development phases. Public involvement should continue throughout design and construction as well. The project should avoid or minimize social impacts to the greatest extent practicable. The EPA is assigning a moderate degree of effect to this issue and recommends that this issue is reevaluated as the project length is finalized.

Additional Comments (optional):

CLC Commitments and Recommendations:

Relocation Potential

Project Effects

Coordinator Summary Degree of Effect: 2 *Minimal* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

No ETAT reviews were submitted for this issue. However, the proposed project could directly result in right-of-way acquisition from surrounding properties and business relocations. A Conceptual Stage Relocation Plan will be prepared for this project, in the Design Phase, if right-of-way acquisition results in the need for relocations. Alternatives will be prepared to avoid and minimize right-of-way and relocation effects.

None found

Farmlands

Project Effects

Coordinator Summary Degree of Effect: N/A *N/A / No Involvement* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

This project is being completed without a federal agency or financial or technical assistance from a federal agency. The documentation for this project is a State Environmental Impact Report (SEIR). Pursuant to Part 2, Chapter 28 of the FDOT PD&E Manual, the project is not subject to the provisions of the Farmland Protection Policy Act of 1981, 7 CFR Part 658. If impacts to farmlands are anticipated, a GIS shapefile depicting these farmlands will be provided to the Natural Resources Conservation Service (NRCS).

Degree of Effect: 2 *Minimal* assigned 02/14/2017 by Rick Allen Robbins, Natural Resources Conservation Service

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

The USDA-NRCS considers soil map units with important soil properties for agricultural uses to be Prime Farmland (Important Farmland soils). Prime Farmland (as defined in ETDM) is classified in several different categories based on specific criteria. **Prime Farmland** must meet specific soil-related criteria, as defined by the USDA-Natural Resources Conservation Service. **Farmland of Unique Importance** is based on the ability of the soil to grow very specific crops, such as citrus, vegetables, sugar cane, and other high-value specialty crops. It is also based on the extent that a soil is used for these crops within a specific county. Therefore, a soil in one county may be Unique Farmland, but not in an adjacent county. **Farmland of Local Importance** is classified as being important to the local entities (counties) and worthy of special consideration. Locally Important Farmland soils were designated by local governance (Soil and Water Conservation Districts).

Nationally, there has been a reduction in the overall amount of Prime, Locally Important, and Unique Farmlands through conversion to non-farm uses. This trend has the possibility of impacting the nation's food supply and exporting capabilities.

Comments on Effects to Resources:

There are no Important Farmland soils (Prime, Unique, or Local) within the scope of this project. There are a few acres of agricultural land within the 500 foot buffer width. Therefore, Minimal Effects to Farmland resources.

Additional Comments (optional):

CLC Commitments and Recommendations:

Aesthetic Effects

Project Effects

Coordinator Summary Degree of Effect: 2 *Minimal* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

No ETAT reviews were submitted for this issue. The project is not likely to create any adverse impacts to aesthetics. Public involvement will solicit public opinion on project effects and general design concepts related to aesthetics.

None found

Economic

Project Effects

Coordinator Summary Degree of Effect: 1 *Enhanced* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

The proposed improvements have some potential to enhance new development and generate additional employment opportunities.

Degree of Effect: 1 *Enhanced* assigned 03/06/2017 by Matt Preston, FL Department of Economic Opportunity

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comprehensive Plan(s) Reviewed:

Orange County Comprehensive Plan, adopted on January 19, 2017; and, *City of Orlando Comprehensive Plan,* amended March 14, 2016 (adjacent jurisdiction).

Comments on Effects to Resources:

The project *is not* located within a Rural Area of Opportunity.

The project has some potential to attract/enhance new development and to generate additional employment opportunities.

Additional Comments (optional):

CLC Commitments and Recommendations:

Mobility

Project Effects

Coordinator Summary Degree of Effect: 1 *Enhanced* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

No ETAT reviews were submitted for this issue. The project will increase roadway capacity at this congested interchange and create the potential for increased economic activity in the areas surrounding the project.

None found

ETAT Reviews and Coordinator Summary: Cultural

Section 4(f) Potential

Project Effects

Coordinator Summary Degree of Effect: N/A *N/A / No Involvement* assigned 05/03/2017 by FDOT District 5

Comments:

No ETAT reviews were submitted for this issue. Section 4(f) is not applicable on state funded projects.

None found

Historic and Archaeological Sites

Project Effects

Coordinator Summary Degree of Effect: 3 *Moderate* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

Since the area has not been previously surveyed, a comprehensive survey of the project area should be conducted to assess all potential cultural resources in the area for National Register of Historic Places (NRHP) eligibility. A Cultural Resources Assessment Survey (CRAS) will be prepared and coordinated with the State Historic Preservation Office (SHPO).

Degree of Effect: 3 *Moderate* assigned 02/20/2017 by Ginny Leigh Jones, FL Department of State

Coordination Document: PD&E Support Document As Per PD&E Manual
Coordination Document Comments:

Since the project area has not been comprehensively surveyed, a survey should be conducted for this project. All cultural resources, including potential historic districts, within the area of potential effect should be documented and assessed for NRHP eligibility. The resultant survey report shall conform to the specifications set forth in Chapter 1A-46 Florida Administrative Code, FDOT PD&E Manual Part 2, Chapter 12and will need to be forwarded to this agency (or the appropriate Federal Agency) for review and comment.

It should be noted that even if there are no federal funds utilized for this project, any federal permitting or permissions will require the fulfillment of federal law, National Historic Preservation Act (Section 106) in consultation with this office. If there are no federal funds or permissions required by the project, then state law, Chapter 267 will still need to be fulfilled.

Direct Effects

Identified Resources and Level of Importance:

As reported in the PED, there are a few standing structures recorded near the southern part of the proposed project corridor. However, these resources have not been evaluated for eligibility for the NRHP.

Since the project will require some new ROW, there is a possibility there are unrecorded cultural resources in the proposed project area.

Comments on Effects to Resources:

Archaeological sites are vulnerable to damage from ground disturbance. The addition of new roadway and resultingchange in environment has the potential to impact above-ground resources.

Additional Comments (optional):

Since the project area has not been comprehensively surveyed, a survey should be conducted for this project. All cultural resources, including potential

historic districts, within the area of potential effect should be documented and assessed for NRHP eligibility. The resultant survey report shall conform to the specifications set forth in Chapter 1A-46 Florida Administrative Code, FDOT PD&E Manual Part 2, Chapter 12and will need to be forwarded to this agency (or the appropriate Federal Agency) for review and comment.

It should be noted that even if there are no federal funds utilized for this project, any federal permitting or permissions will require the fulfillment of federal law, National Historic Preservation Act (Section 106) in consultation with this office. If there are no federal funds or permissions required by the project, then state law, Chapter 267 will still need to be fulfilled.

CLC Commitments and Recommendations:

Recreation Areas

Project Effects

Coordinator Summary Degree of Effect: 0 *None* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

The geographic information systems (GIS) analysis provided in the Environmental Screening Tool (EST) did not identify any recreational lands within the 500-foot buffer. Impacts to recreational areas are unlikely.

Degree of Effect: N/A *N/A / No Involvement* assigned 03/02/2017 by Anita Barnett, National Park Service

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: 0 *None* assigned 03/03/2017 by Mindy Parrott, South Florida Water Management District

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: N/A *N/A / No Involvement* assigned 01/20/2017 by Ken Lewis, Saint Johns River Water Management District

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

ETAT Reviews and Coordinator Summary: Natural

Wetlands and Surface Waters

Project Effects

Coordinator Summary Degree of Effect: 2 *Minimal* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

During the PD&E phase, a wetland evaluation will be conducted as part of the Natural Resource Evaluation (NRE) report, in accordance with Part 2, Chapter 18 of the FDOT PD&E Manual, to determine the potential adverse impacts to wetlands. All necessary measures will be taken to avoid and/or minimize impacts to wetlands to the greatest extent feasible during project design. Should avoidance and/or minimization not be feasible, a mitigation plan will be prepared.

Florida's Turnpike Enterprise will continue to coordinate with the United States Army Corps of Engineers (USACE), United States Fish and Wildlife Service (USFWS), Florida Fish and Wildlife Conservation Commission (FWC) and the South Florida Water Management District (SFWMD) during the PD&E and Design phases of the project.

Degree of Effect: 0 *None* assigned 02/14/2017 by Brandon Howard, National Marine Fisheries Service

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

None

Comments on Effects to Resources:

None

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: 2 *Minimal* assigned 02/17/2017 by Randy Turner, US Army Corps of Engineers

Coordination Document: Permit Required

Coordination Document Comments:

The project as proposed, should qualify for the Department of the Army's Regional General Permit (RGP) - 92 for impacts to any proposed impacts to waters of the U.S. (wetlands or surface waters). If the wetland impacts are 0.5 acre or below, the Corps recommends using the Nationwide Permit 14 (NWP-14) for any proposed impacts to waters of the U.S. (Wetlands or surface waters).

Direct Effects

Identified Resources and Level of Importance:

A review of the EST revealed the presence of approximately 18.33 acres of palustrine and 1.34 acres of lacustrine wetlands within a 500 foot buffer; 2.55 acres of palustrine wetlands within a 200 foot buffer; and, 0.33 acre of palustrine wetlands within a 100 foot buffer. Any palustrine wetland impacts would most likely be palustrine forested (cypress) wetlands associated with Shingle Creek. The level of importance would be minimal.

Comments on Effects to Resources:

Any palustrine wetlands in the project area deemed to be jurisdictional within this major interchange roadway already have been secondarily impacted so a functional assessment should reveal a lower quality of wetlands. Given the dispersed wetland locations surrounded by roadways, any wetland impacts to jurisdictional wetlands would be minimal.

Additional Comments (optional):

The project as proposed, should qualify for the Department of the Army's Regional General Permit (RGP) - 92 for impacts to any proposed impacts to waters of the U.S. (wetlands or surface waters). If the wetland impacts are 0.5 acre or below, the Corps recommends using the Nationwide Permit 14 (NWP-14) for any proposed impacts to waters of the U.S. (Wetlands or surface waters).

CLC Commitments and Recommendations:

Degree of Effect: N/A *N/A / No Involvement* assigned 03/03/2017 by Suzanne E. Ray, FL Department of Environmental Protection

Coordination Document: PD&E Support Document As Per PD&E Manual

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: 2 *Minimal* assigned 03/03/2017 by Mindy Parrott, South Florida Water Management District

Coordination Document: Permit Required
Coordination Document Comments:
Modification of existing Environmental Resource Permit(s)48-01443-Pfor Florida's Turnpike and/or Permit48-00633-S forSR 528 is required.

Direct Effects
Identified Resources and Level of Importance:
There are few wetlands within and adjacent to the project area.

Comments on Effects to Resources:
There is a potential for wetland and surface water impacts, however the area of the project is urbanized. The project must meet the criteria in ERP Applicant's Handbook Volume I, including elimination and reduction and mitigation requirements.

Additional Comments (optional):
Modification of existing Environmental Resource Permit(s)48-01443-Pfor Florida's Turnpike and/or Permit48-00633-S forSR 528 is required.

CLC Commitments and Recommendations:

Degree of Effect: 2 *Minimal* assigned 03/06/2017 by Amanetta Somerville, US Environmental Protection Agency

Coordination Document: To Be Determined: Further Coordination Required

Direct Effects
Identified Resources and Level of Importance:

Resources
Wetlands, wetlands habitat, water quality

Level of importance
Wetlands are a high level of importance as they are a critical natural resource and serve several functions including filtration/treatment of surface water runoff, flood control, erosion control, groundwater recharge/discharge, wildlife and species habitat, and recreation and tourism opportunities.

Comments on Effects to Resources:
The proposed project will include a layered, three-tiered bridge system which creates a more direct flow of traffic between SR 582, Florida's Turnpike and local roads. Additionally, the project will include ramp improvements. Approximately 17 acres of palustrine and 1 acre of Lacustrine wetlands are within a 500 foot buffer. Although, the surrounding project area is mainly all commercial developments, the project falls within the Core Foraging Area (CFA) of at least one nesting colony of the endangered wood stork. Storks are birds of freshwater and estuarine wetlands, primarily nesting in cypress or mangrove swamps. They feed in freshwater marshes, narrow tidal creeks, or flooded tidal pools. The EPA recommends that direct impacts should be avoided.

The proposed project may have direct, indirect, and cumulative effects on wetlands, wetlands habitat and water quality in the area. Potential impacts include, but are not limited to, loss of wetlands function, loss of wildlife habitat, degradation of water quality in wetlands, degradation of water quality in surface waters, and reduction in flood storage and capacity. With an increase in the impervious surface area, the project area is expected to experience an increase in stormwater runoff and the increase of pollutants into surface waters and wetlands as a result of the project. Every effort should be made to maximize the collection and treatment of stormwater. Stormwater runoff should be diverted from the bayou, streams, and creeks. Best management practices should be implemented during construction, including the installation and regular maintenance of erosion control structures. Additionally, stormwater collection and treatment mechanisms should be designed to protect the function of surrounding wetlands, floodplains, and surface water feature that have already experienced secondary impacts from roadway runoff.

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: N/A *N/A / No Involvement* assigned 02/07/2017 by Lee A. Kissick, Saint Johns River Water Management District

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Not applicable. No part of this project is jurisdictional to SJRWMD.

Comments on Effects to Resources:

Not applicable. No part of this project is jurisdictional to SJRWMD.

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: 2 *Minimal* assigned 02/24/2017 by Zakia Williams, US Fish and Wildlife Service

Coordination Document: PD&E Support Document As Per PD&E Manual

Direct Effects

Identified Resources and Level of Importance:

Wood Stork *(Mycteria americana)*

The surrounding area is mainly all commercial developments. The project falls within the Core Foraging Area (CFA) of at least one nesting colony of the endangered wood stork. Direct impacts should be avoided.

Sand Skink *(Neoseps reynoldsi)*

The potential for sand skinks *(Neoseps reynoldsi)* within this proposed corridor is very low.

Florida scrub-jay

The potential for the Florida scrub jay (*Aphelocoma coerulescens)* within this proposed corridor is unlikely. There is no suitable habitat to support the species.

Coordination with the Office of Migratory birds will be needed for an eagle nest located within 200 feet of corridor.

Surveys for all federally listed plants found inOrange county (the list can be found on our website northflorida.fws.gov) should be conducted by a trained botanist during the appropriate time of year.

Wetlands

Wetlands provide important habitat for fish and wildlife. Data provided in the Environmental Screening Tool indicate that wetlands occur within the project area.

Comments on Effects to Resources:

Wood Stork *(Mycteria americana)*

The Service has determined that the loss of wetlands within a CFA due to an action could result in the loss of foraging habitat for the wood stork. To minimize adverse effects to the wood stork and other wetland dependent species, we recommend that impacts to suitable foraging habitat be avoided. If avoidance is not possible, minimization measure should be employed and best management practices to avoid further degradation of the site. Mitigation for wetland impacts should be discussed with USFWS and will require further coordination. Please refer to the North Florida Field Office website for WOST colony locations. http://www.fws.gov/northflorida

Sand Skink *(Neoseps reynoldsi)*

Any areas that do meet the current soils and elevation criteria should be submitted to USFWS for further coordination and possible field review.

Wetlands

Best Management Practices (BMPs) should be used to prevent degradation of wetland and other aquatic resources from erosion, siltation, and nutrient discharges associated with the project site. We recommend that the project be designed to avoid these valuable resources to the greatest extent practicable. If impacts to wetlands are unavoidable, we recommend that the FDOT provides mitigation that fully compensates for the loss of wetland resources.

Dependent upon the alternative(s) selected, the proposed project is expected to result in minimal to moderate involvement with wildlife and habitat resources. If it is determined the project will affect and federally listed species and/or their habitat, the Department will initiate consultation with FWS during the Project Development process.

Additional Comments (optional):

CLC Commitments and Recommendations:

Water Quality and Quantity

Project Effects

Coordinator Summary Degree of Effect: 3 *Moderate* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

The PD&E study will include a Water Quality Impact Evaluation (WQIE) in accordance with Part 2, Chapter 20 of the FDOT PD&E Manual which will identify potential effects on the surface and groundwater resources, identify the impaired waters and other waterbody classifications (Class I, II, Outstanding Florida Waters (OFW), etc.) that could be affected by this project. In addition, a pond siting evaluation will be conducted to identify alternatives for stormwater management and treatment. The effects on water quality and means to avoid, minimize and mitigate impacts will be evaluated during the study based on the project specific effects from the alternatives developed during the study. Florida's Turnpike Enterprise will continue to coordinate with the United States Environmental Protection Agency (USEPA), South Florida Water Management District (SFWMD) and Florida Department of Environmental Protection (FDEP) during PD&E and Design phases of the project.

Degree of Effect: 3 *Moderate* assigned 03/03/2017 by Mindy Parrott, South Florida Water Management District

Coordination Document: Permit Required

Coordination Document Comments:

Modification of existing Environmental Resource Permit(s)48-01443-Pfor Florida's Turnpike and/or Permit48-00633-S forSR 528 is required.

Direct Effects

Identified Resources and Level of Importance:

As described in the preliminary comments.

Comments on Effects to Resources:

Applicant's Handbook Volume IIwater quality and quantity criteria must be met, including provisions for Impaired Waters in Appendix E.Water quality calculations will be required for all newly-added impervious area. Any existing water quality treatment provided will need to be included in the redesign if the corresponding storm water management pond is impacted by the improvements. Water quantity needs to be addressed in the form of pre- versus post-; however, numerous existing permits in the area have already established allowable discharge rates which should be adhered to. Any improvements with the Orlando Central Park master area, if kept under 80 percent impervious coverage within the basin, already meets allowable discharge rates in the area and will not require a water quantity analysis.

Additional Comments (optional):

Modification of existing Environmental Resource Permit(s)48-01443-Pfor Florida's Turnpike and/or Permit48-00633-S forSR 528 is required.

CLC Commitments and Recommendations:

Degree of Effect: N/A *N/A / No Involvement* assigned 01/20/2017 by Ken Lewis, Saint Johns River Water Management District

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: 3 *Moderate* assigned 03/06/2017 by Amanetta Somerville, US Environmental Protection Agency

Coordination Document: To Be Determined: Further Coordination Required

Direct Effects

Identified Resources and Level of Importance:

Resources
Surface water, ground water

Level of Importance
These resources are of a high level of importance in the State of Florida. Water quality within the project area and within the State of Florida are of a high level of importance. Stormwater runoff from the roadway may alter adjacent surface waters through increased pollutant loading.

Comments on Effects to Resources:

The proposed project will include a layered, three-tiered bridge system which creates a more direct flow of traffic between SR 582, Florida's Turnpike and local roads. Additionally, the project will include ramp improvements as well. Two waterbodies, Shingle Creek and Boggy Creek (WBID 3168B) are located within the 500-ft project buffer. Boggy Creek is a designated Verified Impaired Florida Waters for fecal coliform. The project is located within the Upper Kissimme sub-watershed and is a part of the Lake Okeechobee Basin Management Action Plan. With an increase in the impervious surface area, the project area is expected to experience an increase in stormwater runoff and the increase of pollutants into surface waters and wetlands as a result of the project. Stormwater runoff from urban sources, including roadways, carries pollutants such as volatile organics, petroleum hydrocarbons, heavy metals, and pesticides/herbicides. Every effort should be made to maximize the collection and treatment of stormwater. Stormwater runoff should be diverted from the river, streams, and creeks especially because the discharge from the Upper Kissimmee watershed contributes approximately 35% of the total discharges to Lake Okeechobee.

Best management practices should be implemented during construction, including the installation and regular maintenance of erosion control structures. Stormwater collection and treatment mechanisms should be designed to protect the function of surrounding wetlands, floodplains, and surface water feature that have already experienced secondary impacts from roadway runoff. Furthermore, indirect and cumulative effects on water quality should be evaluated to identify and quantify incremental and cumulative impacts on natural resources (water quality) as a result of the past, present, and reasonably foreseeable actions, including the proposed project and other land use actions.

Additional Comments (optional):

CLC Commitments and Recommendations:

Floodplains

Project Effects

Coordinator Summary Degree of Effect: 3 *Moderate* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

Improvements to the Orlando South Ultimate Interchange may result in impacts to floodplains. An analysis of the potential floodplain effects will be conducted, in accordance with the FDOT PD&E Manual, Part 2, Chapter 24, Drainage and Floodplains. All new floodplain impacts and previously permitted floodplain impacts will be adequately mitigated for, in accordance with the South Florida Water Management District (SFWMD) Applicants Handbook Volume II. A Location Hydraulics Report (LHR) will be prepared during the PD&E phase to determine potential impacts to area floodplains.

Degree of Effect: 3 *Moderate* assigned 03/03/2017 by Mindy Parrott, South Florida Water Management District

Coordination Document: Permit Required

Direct Effects

Identified Resources and Level of Importance:
As described in the preliminary comments.

Comments on Effects to Resources:
There maybe floodplain impacts resulting from improvements to the ramps at this interchange. There are also previously permitted floodplain impacts and floodplain compensating storage in permits for State Road 528, State Road 91 (Florida Turnpike) and Orlando Central Parkin the vicinity of the project. All new floodplain impacts and previously permitted floodplain impacts must be adequately mitigated for and included in any redesign for this interchange.

The project must meet the requirements in Applicant's Handbook Volume II.

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: N/A *N/A / No Involvement* assigned 01/20/2017 by Ken Lewis, Saint Johns River Water Management District

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

Wildlife and Habitat

Project Effects

Coordinator Summary Degree of Effect: 2 *Minimal* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

A Natural Resources Evaluation (NRE) will be prepared in accordance with Part 2, Chapter 27, of the FDOT PD&E Manual. Surveys will be conducted for listed species potentially occurring in the study area and the effects on the listed species will be evaluated. Avoidance, minimization and mitigation for unavoidable impacts will be assessed during the alternatives development. Impacts to Orlando District Office and Forestry Station Operations will be avoided and/or minimized to the greatest extent feasible. Florida's Turnpike Enterprise will continue to coordinate with the Florida Department of Agriculture and Consumer Services (FDACS), Florida Fish and Wildlife Conservation Commission (FWC) and United States Fish and Wildlife Service (USFWS) during the PD&E phase.

Degree of Effect: 2 *Minimal* assigned 02/28/2017 by Scott Sanders, FL Fish and Wildlife Conservation Commission

Coordination Document: To Be Determined: Further Coordination Required

Direct Effects

Identified Resources and Level of Importance:

No significant fish, wildlife or habitat resources were identified in the project vicinity.

Comments on Effects to Resources:

Minimal impacts to fish or wildlife resources are anticipated to result from this project.

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: 2 *Minimal* assigned 02/24/2017 by Zakia Williams, US Fish and Wildlife Service

Coordination Document: PD&E Support Document As Per PD&E Manual

Direct Effects

Identified Resources and Level of Importance:

Wood Stork *(Mycteria americana)*

The surrounding area is mainly all commercial developments. The project falls within the Core Foraging Area (CFA) of at least one nesting colony of the endangered wood stork. Direct impacts should be avoided.

Sand Skink *(Neoseps reynoldsi)*

The potential for sand skinks *(Neoseps reynoldsi)* within this proposed corridor is very low.

Florida scrub-jay

The potential for the Florida scrub jay (*Aphelocoma coerulescens)* within this proposed corridor is unlikely. There is no suitable habitat to support the species.

Coordination with the Office of Migratory birds will be needed for an eagle nest located within 200 feet of corridor.

Surveys for all federally listed plants found inOrange county (the list can be found on our website northflorida.fws.gov) should be conducted by a trained botanist during the appropriate time of year.

Wetlands
Wetlands provide important habitat for fish and wildlife. Data provided in the Environmental Screening Tool indicate that wetlands occur within the project area.

Comments on Effects to Resources:
Wood Stork *(Mycteria americana)*
The Service has determined that the loss of wetlands within a CFA due to an action could result in the loss of foraging habitat for the wood stork. To minimize adverse effects to the wood stork and other wetland dependent species, we recommend that impacts to suitable foraging habitat be avoided. If avoidance is not possible, minimization measure should be employed and best management practices to avoid further degradation of the site. Mitigation for wetland impacts should be discussed with USFWS and will require further coordination. Please refer to the North Florida Field Office website for WOST colony locations. http://www.fws.gov/northflorida
Sand Skink *(Neoseps reynoldsi)*
Any areas that do meet the current soils and elevation criteria should be submitted to USFWS for further coordination and possible field review.

Wetlands
Best Management Practices (BMPs) should be used to prevent degradation of wetland and other aquatic resources from erosion, siltation, and nutrient discharges associated with the project site. We recommend that the project be designed to avoid these valuable resources to the greatest extent practicable. If impacts to wetlands are unavoidable, we recommend that the FDOT provides mitigation that fully compensates for the loss of wetland resources.

Dependent upon the alternative(s) selected, the proposed project is expected to result in minimal to moderate involvement with wildlife and habitat resources. If it is determined the project will affect and federally listed species and/or their habitat, the Department will initiate consultation with FWS during the Project Development process.

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: 2 *Minimal* assigned 03/06/2017 by Steve Bohl, FL Department of Agriculture and Consumer Services

Coordination Document: No Involvement

Direct Effects
Identified Resources and Level of Importance:
The Orlando District Office and Forestry Station.

Comments on Effects to Resources:
Do not impact Orlando District Office and Forestry Station operations.

Additional Comments (optional):

CLC Commitments and Recommendations:

Coastal and Marine

Project Effects

Coordinator Summary Degree of Effect: 0 *None* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:
This project is subject to Coastal Zone Consistency Determination, as required by Code of Federal Regulations (CFR) Title 15 930 (15 CFR 930). This project is not located in a coastal county; therefore, Coastal Barrier Resources Act does not apply. This project will not require any additional coordination with the National Marine Fisheries Service.

Degree of Effect: N/A *N/A / No Involvement* assigned 01/20/2017 by Ken Lewis, Saint Johns River Water Management District

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: 0 *None* assigned 03/03/2017 by Mindy Parrott, South Florida Water Management District

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: 0 *None* assigned 02/14/2017 by Brandon Howard, National Marine Fisheries Service

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

None

Comments on Effects to Resources:

None

Additional Comments (optional):

CLC Commitments and Recommendations:

ETAT Reviews and Coordinator Summary: Physical

Noise

Project Effects

Coordinator Summary Degree of Effect: 2 *Minimal* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

No ETAT reviews were submitted for this issue. A noise study will be conducted as part of the PD&E study, in accordance with Part 2, Chapter 17 of the PD&E Manual.

None found

Air Quality

Project Effects

Coordinator Summary Degree of Effect: 2 *Minimal* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

An air quality screening evaluation will be conducted in accordance with Part 2, Chapter 16 of the FDOT PD&E Manual.

Degree of Effect: 2 *Minimal* assigned 03/02/2017 by Amanetta Somerville, US Environmental Protection Agency

Coordination Document: To Be Determined: Further Coordination Required

Direct Effects

Identified Resources and Level of Importance:

Resources: Air Quality

Comments on Effects to Resources:

The portion of Orange County and the area surrounding the proposed project have not been designated non-attainment or maintenance for the ozone, carbon monoxide (CO), or particulate matter (PM) National Ambient Air Quality Standards under the Clean Air Act. However, the proposed project is located within a one mile buffer of heavy industrial land use and the Orlando Cogen Power Plant. Therefore the EPA recommends that an air quality screening analysis is conducted during future development phases.

Additional Comments (optional):

CLC Commitments and Recommendations:

Contamination

Project Effects

Coordinator Summary Degree of Effect: 3 *Moderate* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

Data from the Environmental Screening Tool (EST) identified the following contaminated sites within the 500-foot buffer of the project:

- one (1) United States Environmental Protection Agency (USEPA)Resource Conservation and Recovery Act (RCRA) Regulated Facility,
- seven (7) Hazardous Waste Facilities,
- nine (9) Super Act Risk Sources,
- 13 Petroleum Contamination MonitoringSites,
- 16 Storage Tank Contamination Monitoring Sites

A Contamination Screening Evaluation Report (CSER) will be prepared, as part of the PD&E study in accordance with Part 2, Chapter 22 of the FDOT PD&E Manual.

Degree of Effect: N/A *N/A / No Involvement* assigned 01/20/2017 by Ken Lewis, Saint Johns River Water Management District

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: 3 *Moderate* assigned 03/06/2017 by Amanetta Somerville, US Environmental Protection Agency

Coordination Document: To Be Determined: Further Coordination Required

Direct Effects

Identified Resources and Level of Importance:

Resources

Soils, groundwater, surface water which have the potential to be negatively affected by contaminated site features such as underground petroleum

storage tanks, industrial or commercial facilities with onsite storage of hazardous materials, solid waste facilities, hazardous waste facilities, USEPA RCRA facilities, etc.

Level of Importance

A moderate degree of effect is being assigned to this issue for the proposed project. EPA utilized the 500-foot buffer distance for location and identification of contaminated site features which could be impacted by the project.

Comments on Effects to Resources:

The proposed project will include a layered, three-tiered bridge system which creates a more direct flow of traffic between SR 582, Florida's Turnpike and local roads. Additionally, the project will include ramp improvements. The following contaminated site features are listed in the GIS analysis data as being located within the 500-foot buffer distance:

- 7 Hazardous Waste Facilities
- 13 Petroleum Contamination Monitoring Sites
- 16 Storage Tank Contamination Monitoring Sites
- 9 Super Act Risk Sources
- 1 US EPA RCRA Regulated Facilities

Potential issues relating to contaminated sites include leaking underground petroleum storage tanks, leaking above ground storage tanks, improper storage and/or disposal of hazardous materials, spills and/or leaks from transportation vehicles (trucks, trains, etc.). Direct and indirect impacts resulting from these issues include contamination of soils, groundwater, and surface water. If any petroleum storage tanks are to be impacted or removed during the construction phase of the project, sampling and analysis of soils and groundwater should be conducted to determine if petroleum and hydrocarbon pollutants are present above regulatory levels. If high levels of pollutants are identified, remediation of soils and/or groundwater may be required prior to commencement of construction of the project. Additionally, if other contaminated site features, such as Hazardous Waste Sites, Solid Waste Sites, and USEPA RCRA Sites, involve other types of hazardous and solid wastes remediation of soils and/or groundwater may be required prior to commencement of construction of the project as well.

The environmental review (PD&E study) should include at least a Phase I and possibly a Phase II contamination site assessment. During the assessment, a survey of the area to identify any contaminated site features not listed in the GIS analysis data which may have been or are currently located in the project alternative buffer distances should be conducted, as well as an assessment of known sites and features. Furthermore, the Contamination Screening Evaluation should outline specific procedures that would be followed by the applicant in the event that drums, waste, tanks, or potentially contaminated soils are encountered during construction.

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: 2 *Minimal* assigned 03/03/2017 by Mindy Parrott, South Florida Water Management District

Coordination Document: To Be Determined: Further Coordination Required
Coordination Document Comments:
If dewatering is necessary, a water use permit may be required. A general permit is available in rule 40E-2.061(2), FAC. Projects that do not qualify for the general permit will require a water use permit from SFWMD.

Direct Effects

Identified Resources and Level of Importance:
Surface and ground water

Comments on Effects to Resources:
Construction methodologies, such as dewatering, must be designed to minimize movement of contaminant plumes.

Additional Comments (optional):
If dewatering is necessary, a water use permit may be required. A general permit is available in rule 40E-2.061(2), FAC. Projects that do not qualify for the general permit will require a water use permit from SFWMD.

CLC Commitments and Recommendations:

Infrastructure

Project Effects

Coordinator Summary Degree of Effect: 2 *Minimal* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

There were no ETAT comments submitted for this issue. Within the 500-foot buffer of the project there are two at-grade railroad crossings, two wireless antenna structures and a portion of the CSX rail line.

None found

Navigation

Project Effects

Coordinator Summary Degree of Effect: 0 *None* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

The project will not impact any navigable waters of the United States that are protected under Section 10 of the Rivers and Harbors Act. Therefore, the project will have no effect on Navigation. The United States Coast Guard has confirmed no involvement on the project.

Degree of Effect: 0 *None* assigned 02/17/2017 by Randy Turner, US Army Corps of Engineers

Coordination Document: Permit Required

Coordination Document Comments:

There are nowaters of the U.S. (navigable waters) that are jurisdictional under Section 10 of the Rivers and Harbors Act, however, the proposed project would require a Department of the Army (DA) authorization for impacts to any waters of the U.S. (wetlands) under Section 404 of the Clean Water Act. The project as proposed, should qualify for the Department of the Army's Regional General Permit (RGP) - 92 for impacts to any proposed impacts to waters of the U.S. (wetlands or surface waters). If the wetland impacts are 0.5 acre or below, the Corps recommends using the Nationwide Permit 14 (NWP-14) for any proposed impacts to waters of the U.S. (Wetlands or surface waters).

Direct Effects

Identified Resources and Level of Importance:

None. No navigational resources exist within the proposed project area.

Comments on Effects to Resources:

N/A

Additional Comments (optional):

There are nowaters of the U.S. (navigable waters) that are jurisdictional under Section 10 of the Rivers and Harbors Act, however, the proposed project would require a Department of the Army (DA) authorization for impacts to any waters of the U.S. (wetlands) under Section 404 of the Clean Water Act. The project as proposed, should qualify for the Department of the Army's Regional General Permit (RGP) - 92 for impacts to any proposed impacts to waters of the U.S. (wetlands or surface waters). If the wetland impacts are 0.5 acre or below, the Corps recommends using the Nationwide Permit 14 (NWP-14) for any proposed impacts to waters of the U.S. (Wetlands or surface waters).

CLC Commitments and Recommendations:

Degree of Effect: N/A *N/A / No Involvement* assigned 01/23/2017 by Randall D Overton, US Coast Guard

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

ETAT Reviews and Coordinator Summary: Special Designations

Special Designations

Project Effects

Coordinator Summary Degree of Effect: 0 *None* assigned 05/03/2017 by Florida's Turnpike Enterprise

Comments:

There are no Outstanding Florida Waters (OFW), Aquatic Preserves, Florida Scenic Highways, or Wild and Scenic Rivers affected by the project.

Degree of Effect: 0 *None* assigned 03/02/2017 by Amanetta Somerville, US Environmental Protection Agency

Coordination Document: To Be Determined: Further Coordination Required

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: 0 *None* assigned 03/03/2017 by Mindy Parrott, South Florida Water Management District

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

Degree of Effect: N/A *N/A / No Involvement* assigned 01/20/2017 by Ken Lewis, Saint Johns River Water Management District

Coordination Document: No Involvement

Direct Effects

Identified Resources and Level of Importance:

Comments on Effects to Resources:

Additional Comments (optional):

CLC Commitments and Recommendations:

ETAT Reviews and Coordinator Summary: Emergency Response

Eliminated Alternatives

There are no eliminated alternatives for this project.

Project Scope

General Project Recommendations

There are no general project recommendations identified for this project in the EST.

Anticipated Permits

Permit	Type	Conditions	Review Org	Review Date
National Pollutant Discharge Eliminated System	FDEP		Florida's Turnpike Enterprise	12/13/16
Section 404 - Individual or General	USACE		Florida's Turnpike Enterprise	12/13/16
SFWMD Environmental Resource Permit	Water		Florida's Turnpike Enterprise	12/13/16

Anticipated Technical Studies

Technical Study Name	Type	Conditions	Review Org	Review Date
Location Hydraulics Report	ENGINEERING		Florida's Turnpike Enterprise	12/13/2016
Drainage/Pond Siting Report	ENGINEERING		Florida's Turnpike Enterprise	12/13/2016
Geotechnical Report	ENGINEERING		Florida's Turnpike Enterprise	12/13/2016
Bridge Hydraulic Report	ENGINEERING		Florida's Turnpike Enterprise	12/13/2016
Noise Study Report	ENVIRONMENTAL		Florida's Turnpike Enterprise	12/13/2016
Air Quality Report	ENVIRONMENTAL		Florida's Turnpike Enterprise	12/13/2016
Contamination Screening Evaluation Report	ENVIRONMENTAL		Florida's Turnpike Enterprise	12/13/2016
Conceptual Stage Relocation Plan	ENVIRONMENTAL		Florida's Turnpike Enterprise	12/13/2016
Sociocultural Effects Evaluation	Other		Florida's Turnpike Enterprise	12/13/2016
Preliminary Engineering Report	ENGINEERING		Florida's Turnpike Enterprise	12/13/2016
Interchange Justification Report	ENGINEERING		Florida's Turnpike Enterprise	12/13/2016
Endangered Species Biological Assessment Technical Memorandum	ENVIRONMENTAL		Florida's Turnpike Enterprise	12/13/2016
Water Quality Impact Evaluation	ENVIRONMENTAL		Florida's Turnpike Enterprise	12/13/2016
Cultural Resource Assessment Survey	ENVIRONMENTAL		Florida's Turnpike Enterprise	12/13/2016
Utility Assessment Technical Memorandum	ENGINEERING		Florida's Turnpike Enterprise	12/13/2016
Bridge Analysis Report	ENGINEERING		Florida's Turnpike Enterprise	12/13/2016
Natural Resources Evaluation (NRE)	ENVIRONMENTAL		Florida's Turnpike Enterprise	12/13/2016
ITS Technical Memorandum	ENGINEERING		Florida's Turnpike Enterprise	12/14/2016

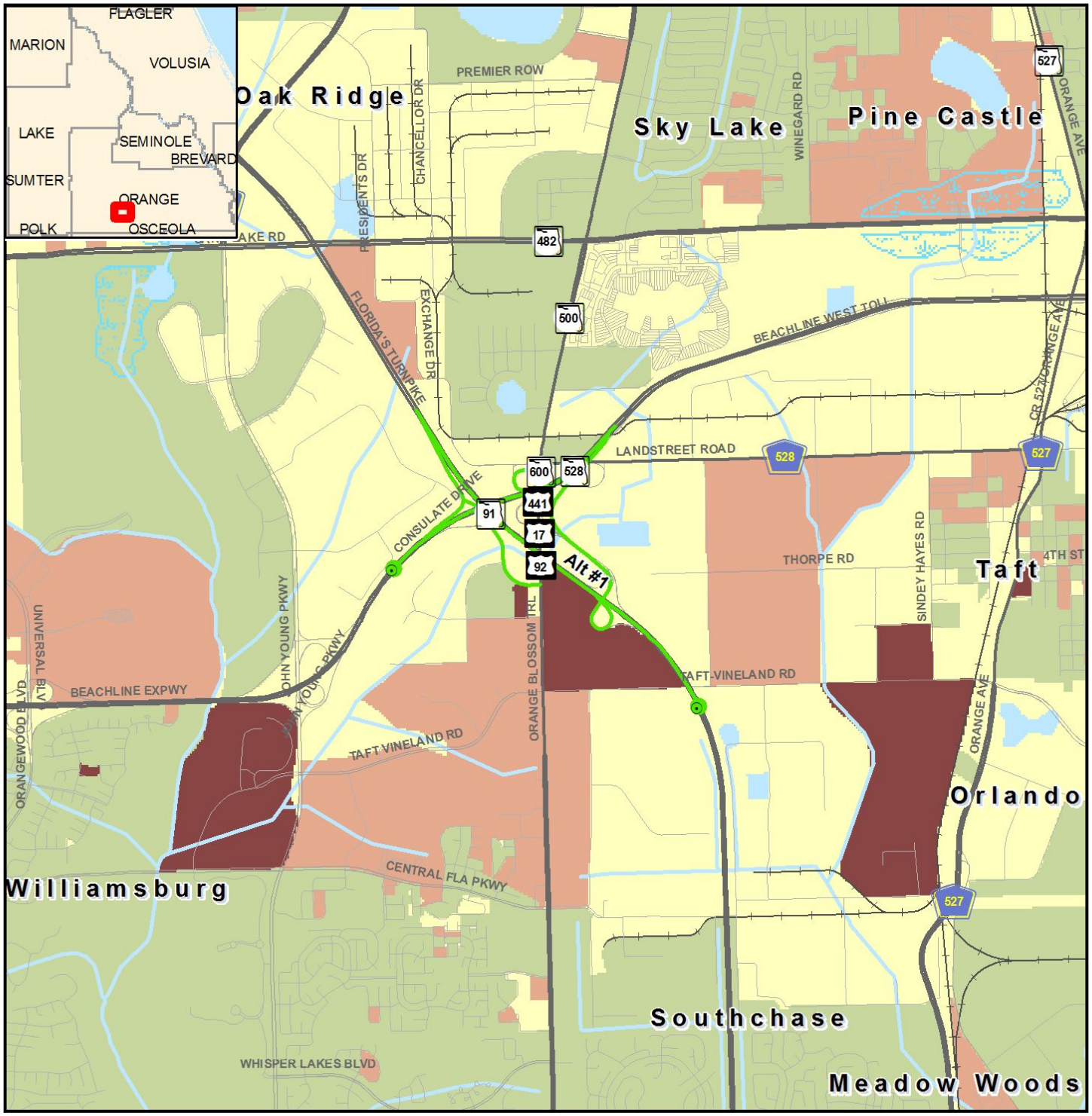
Dispute Resolution Activity Log

There are no dispute actions identified for this project in the EST.

Hardcopy Maps: Alternative #1

14294 Orlando South Ultimate Interchange, Alternative #1

SR 528 (MP 4) to Florida's Turnpike (MP 254)



Age Distribution Map

ETDM Alternative
ETDM Alternative Terminus
Major Road
Local Road or Trail

Median Age
0 - 18
18 - 30
30 - 65
> 65

Data Sources:
US Geological Survey
FL Department of Transportation
NAVTEQ
US Census Bureau (2010)

0 0.15 0.3 0.6 Miles

N

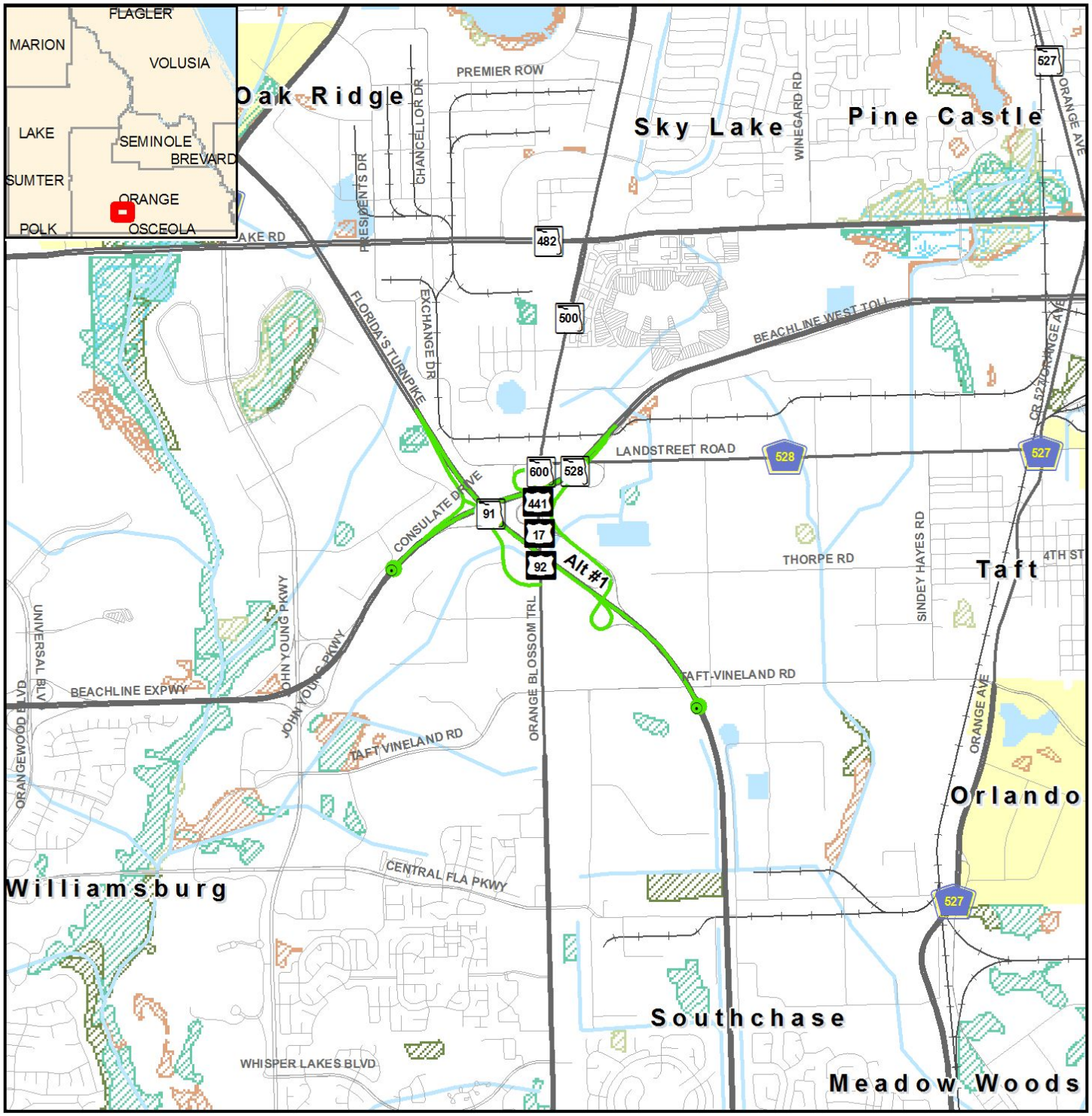
1/12/2017

etdm Environmental Screening Tool

FDOT

14294 Orlando South Ultimate Interchange, Alternative #1

SR 528 (MP 4) to Florida's Turnpike (MP 254)



Coastal and Marine Map

- ETDM Alternative
- ETDM Alternative Terminus
- City Limits
- Navigable Water Way
- Swamp or Marsh
- Exposed Rocky Platform
- Sand Beach
- Gravel Beach/Riprap
- Exposed Tidal Flat
- Sheltered Tidal Flat
- Mixed Sand And Gravel Beach
- Sheltered Rock/Seawall/Vegetated
- Exposed Vertical Rocky Shore/Seawall
- Coastal Barrier Resource Area
- Continuous Seagrass
- Discontinuous Seagrass
- Aquatic Preserve
- Non-vegetated Wetland
- Vegetated Non-forested Wetland
- Wetland Forested Mixed
- Wetland Coniferous Forest
- Wetland Hardwood Forest

0 0.15 0.3 0.6 Miles

N

1/12/2017

Data Sources: NAVTEQ; US Geological Survey; Florida Marine Research Institute; Florida Department of Transportation; Florida Department of Environmental Protection; National Oceanic and Atmospheric Association; Florida Water Management Districts

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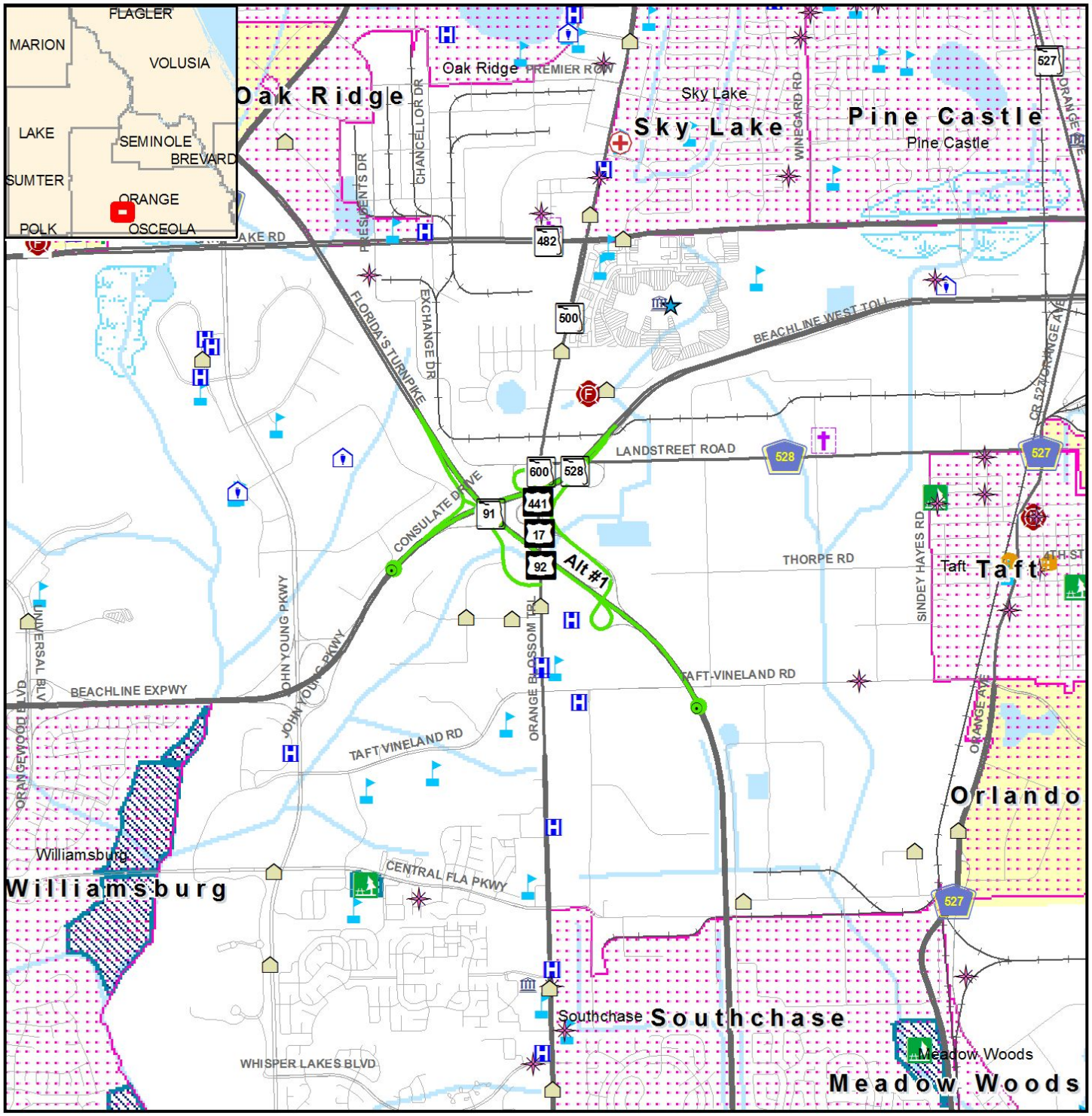

Community Services Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail
- City Limits
- Government
- Civic Center
- Cemetery
- Social Service
- Community Center
- Law Enforcement
- Health Care
- Recreational Trail
- Place of Worship
- School
- Community Boundary
- Cultural Center
- Park
- Conservation or Recreation Area
- Fire Station

Data Sources:
US Geological Survey; FL Department of Transportation; NAVTEQ; FL Property Appraisers; FL Natural Areas Inventory

0 0.15 0.3 0.6 Miles

N

1/12/2017

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14294 Orlando South Ultimate Interchange, Alternative #1

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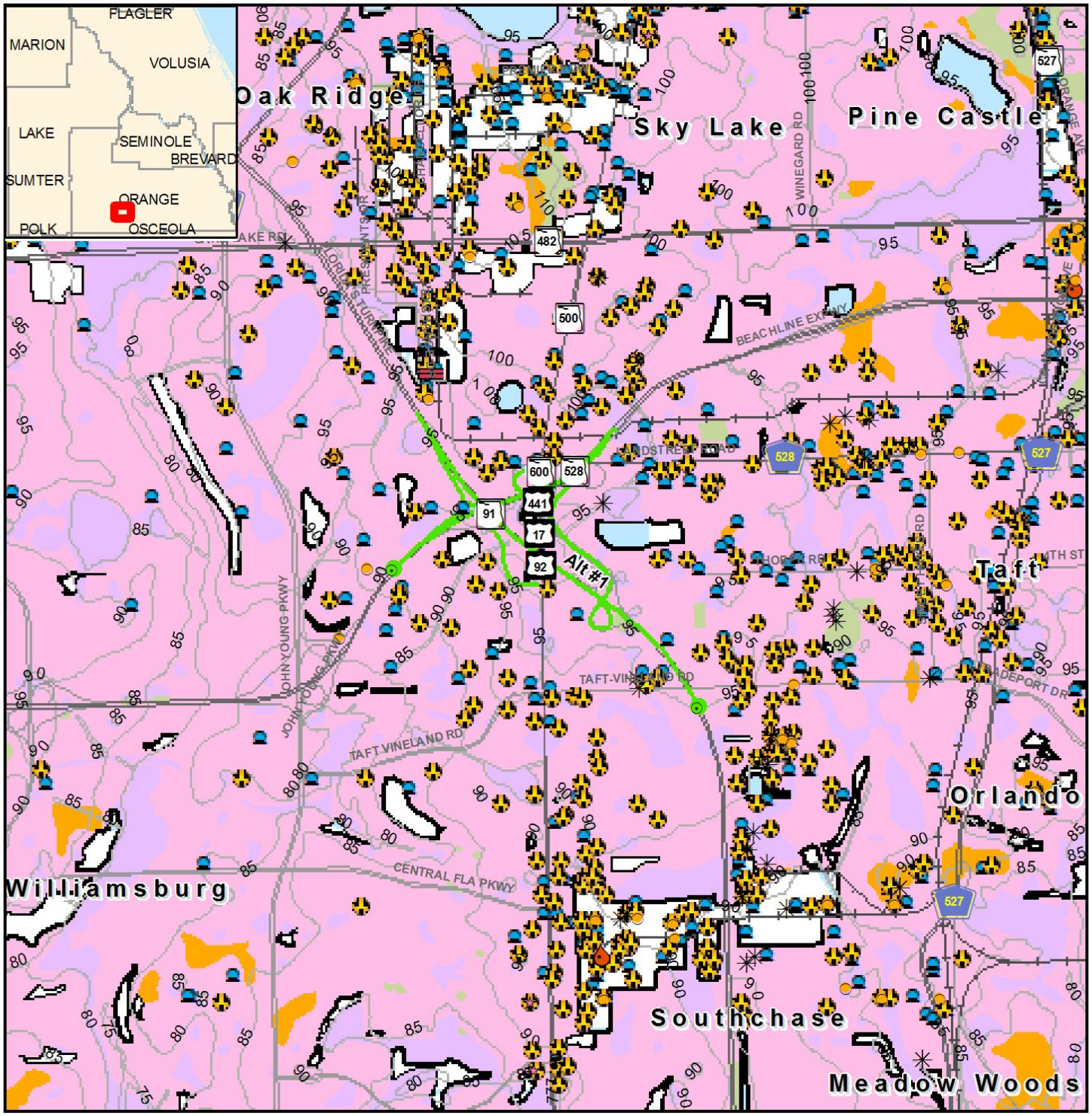

Contamination Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail
- Toxic Release Inventory
- Dry Cleaning Facility
- Solid Waste Facility
- Hazardous Material Site
- Power Plant
- Superfund Site
- Nuclear Site
- FDEP Tanks
- 5 FT Contour
- NPL Remediation Site
- Brownfield Area

Soil Drainage

- Excessively Drained
- Well Drained
- Somewhat Excessively Drained
- Moderately Well Drained
- Somewhat Poorly Drained
- Poorly Drained
- Very Poorly Drained
- Unclassified

0 0.2 0.4 0.8 Miles

N

1/12/2017

Data Sources:NAVTEQ; US Geological Survey; FL Department of Transportation; FL Department of Environmental Protection; FL Water Management Districts; US Environmental Protection Agency; Natural Resource Conservation Service

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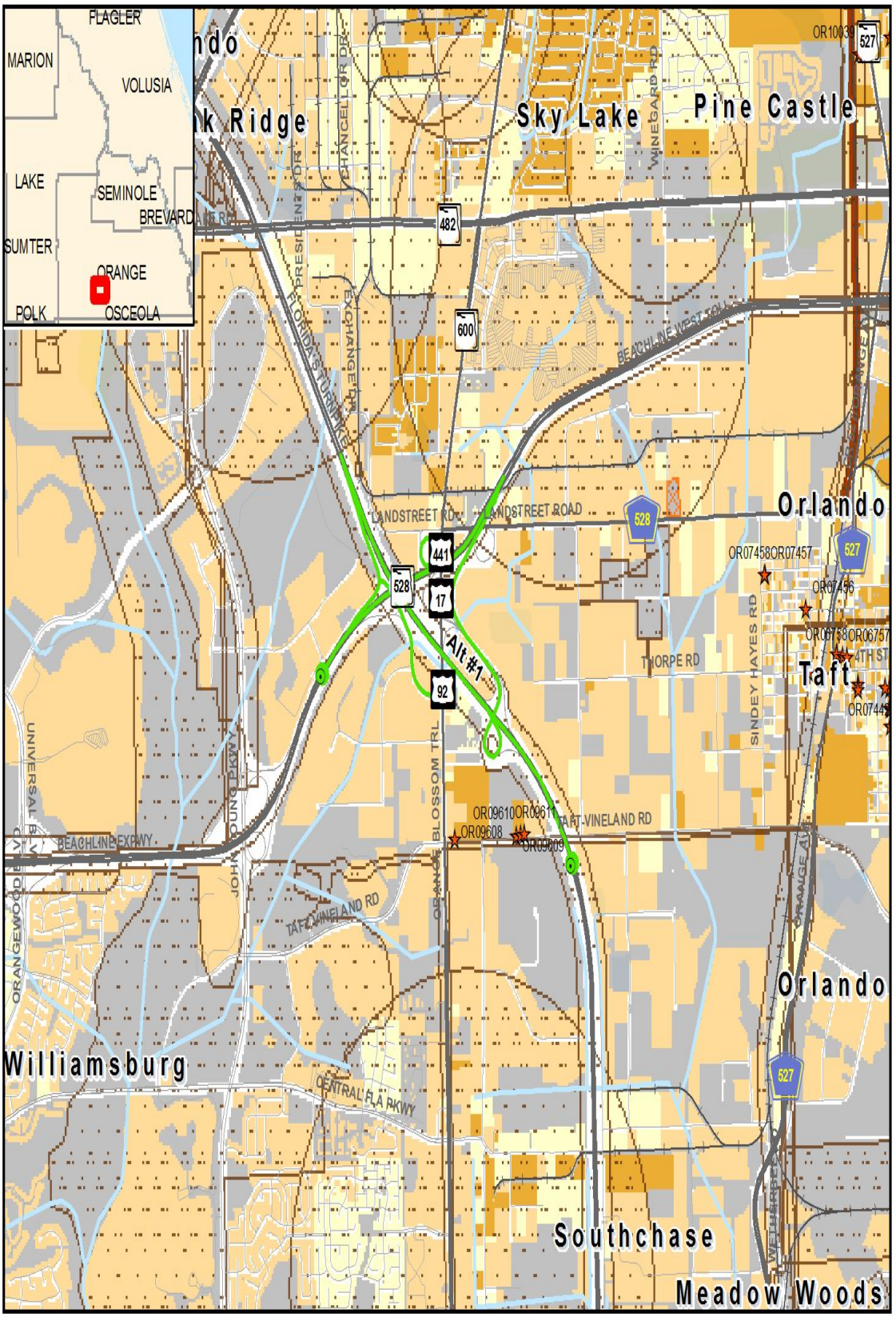
Cultural Resources Data Map



- ETDM Alternative
- Major Road
- Local Road or Trail
- Historic Structure
- Historic Bridge
- State Historic Highway
- Historic Cemetery
- Historic Resource Group
- Cultural Resource Field Survey Area
- ETDM Alternative

Year Built

- Pre 1970
- Post 1980
- 1970 - 1979
- Parcels w/ no values

N

0 0.1 0.2 0.4 Miles

etdm Environmental Screening Tool

FDOT

Data Sources:
NAVTEQ
US Geological Survey
Florida Department of Transportation
Florida Department of State,
Bureau of Archaeological Research

This map and its content is made available by the Florida Department of Transportation on an "as is," "as available" basis without warranties of any kind, express or implied.
Note: Historic properties depicted on this map represent resources listed in the Florida Master Site File excluding archeological site locations, which, pursuant to Chapter 267.135, Florida Statutes, may be exempt from public record (Chapter 119.07, Florida Statutes). Absence of features on the map does not necessarily indicate an absence of resources in the project vicinity.

1/13/2017

14294 Orlando South Ultimate Interchange, Alternative #1

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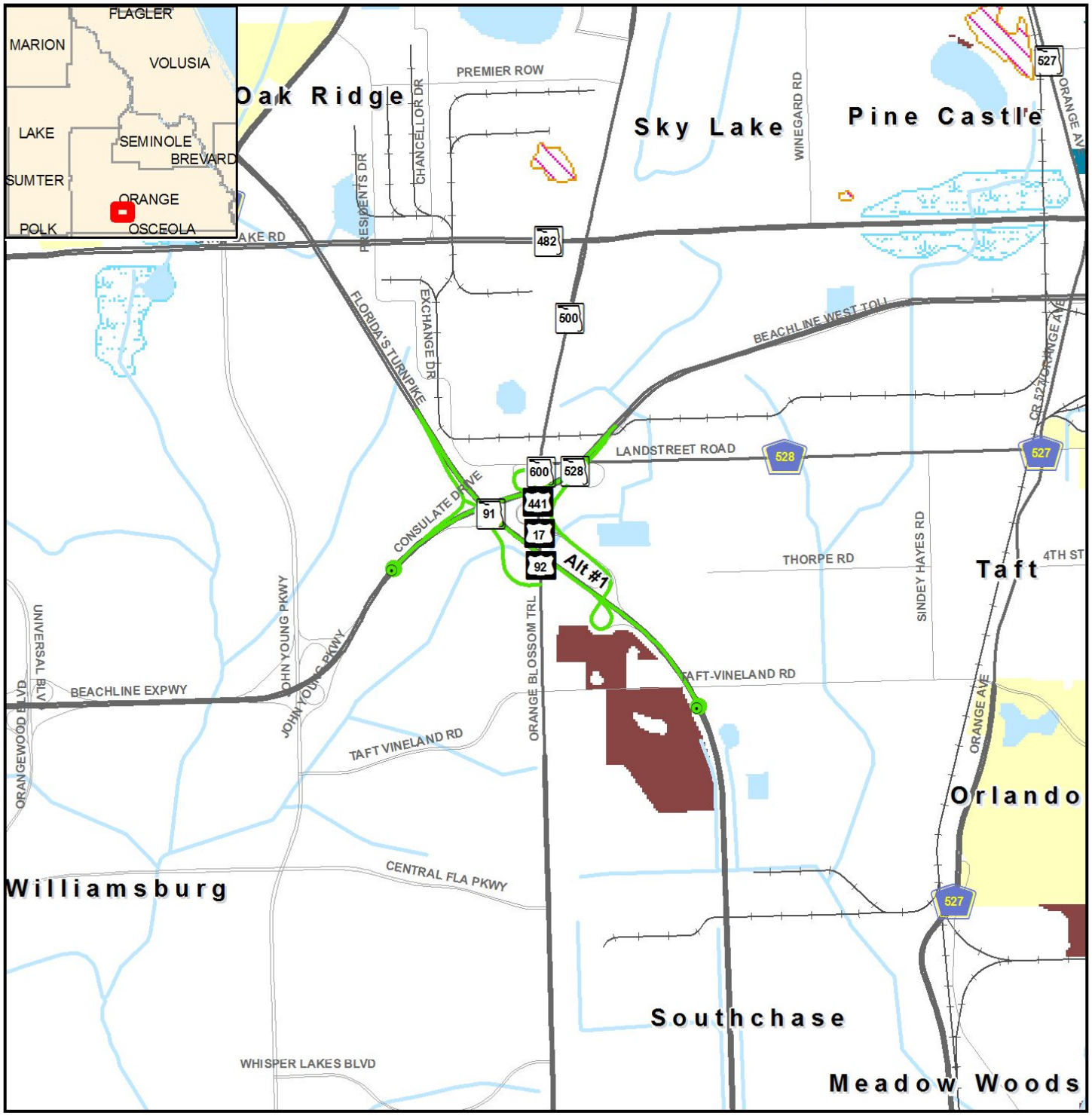

Farmlands Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail
- City Limits
- Cropland/Pastureland
- Nurseries/Vineyards
- Specialty Farms
- Tree Crops
- Rural Open Lands
- Prime Farmland Soils

Data Sources:
NAVTEQ
Florida Water Management Districts
US Geological Survey
Natural Resources Conseration Services

0 0.2 0.4 0.8 Miles

N

1/12/2017

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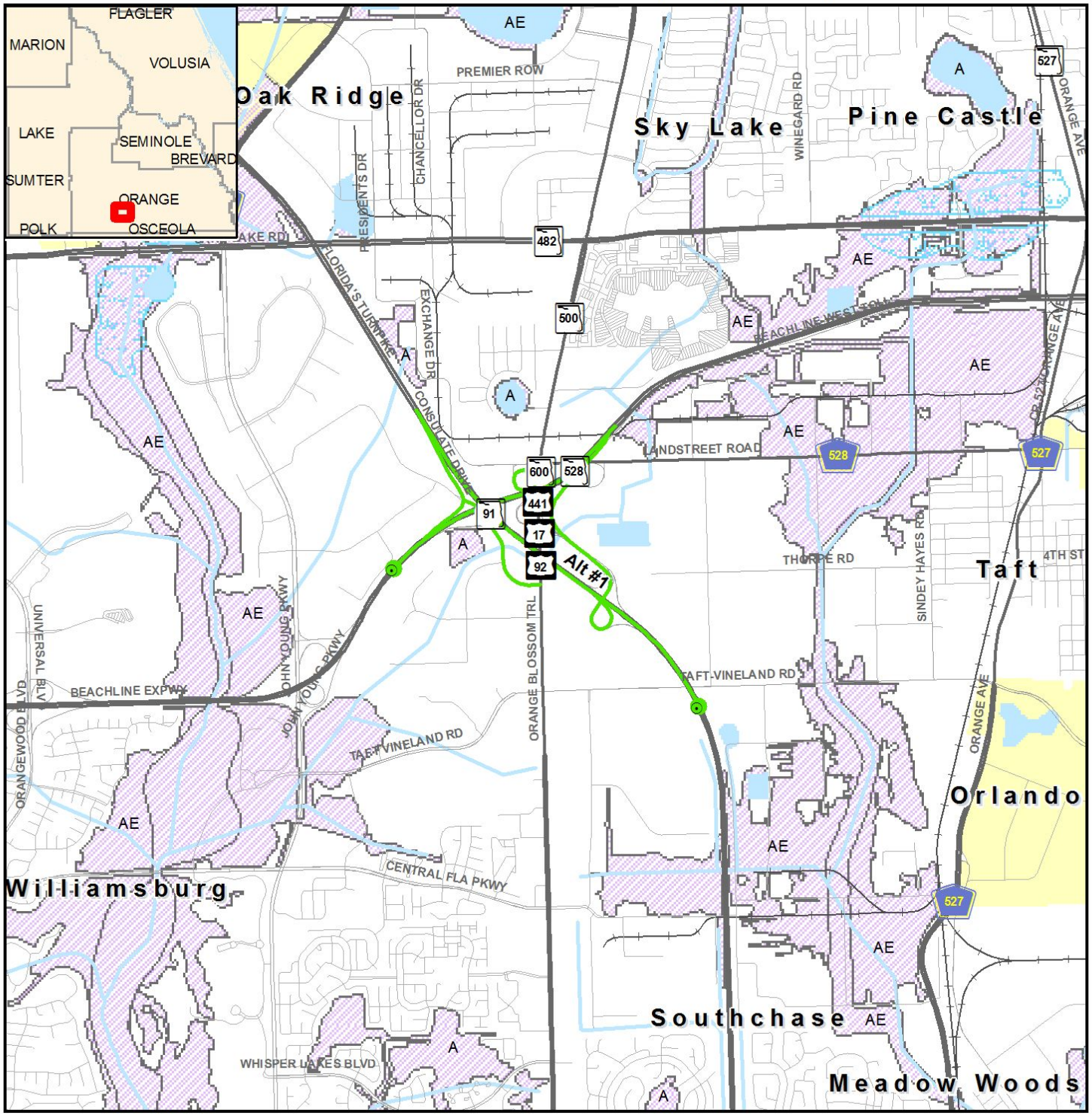
FDOT

14294 Orlando South Ultimate Interchange, Alternative #1

SR 528 (MP 4) to Florida's Turnpike (MP 254)



Floodplains Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail
- City Limits
- Special Flood Hazard Area

Data Sources:
NAVTEQ
US Geological Survey
Federal Emergency Management Agency

0 0.2 0.4 0.8 Miles

N

1/12/2017

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FDOT

14294 Orlando South Ultimate Interchange, Alternative #1

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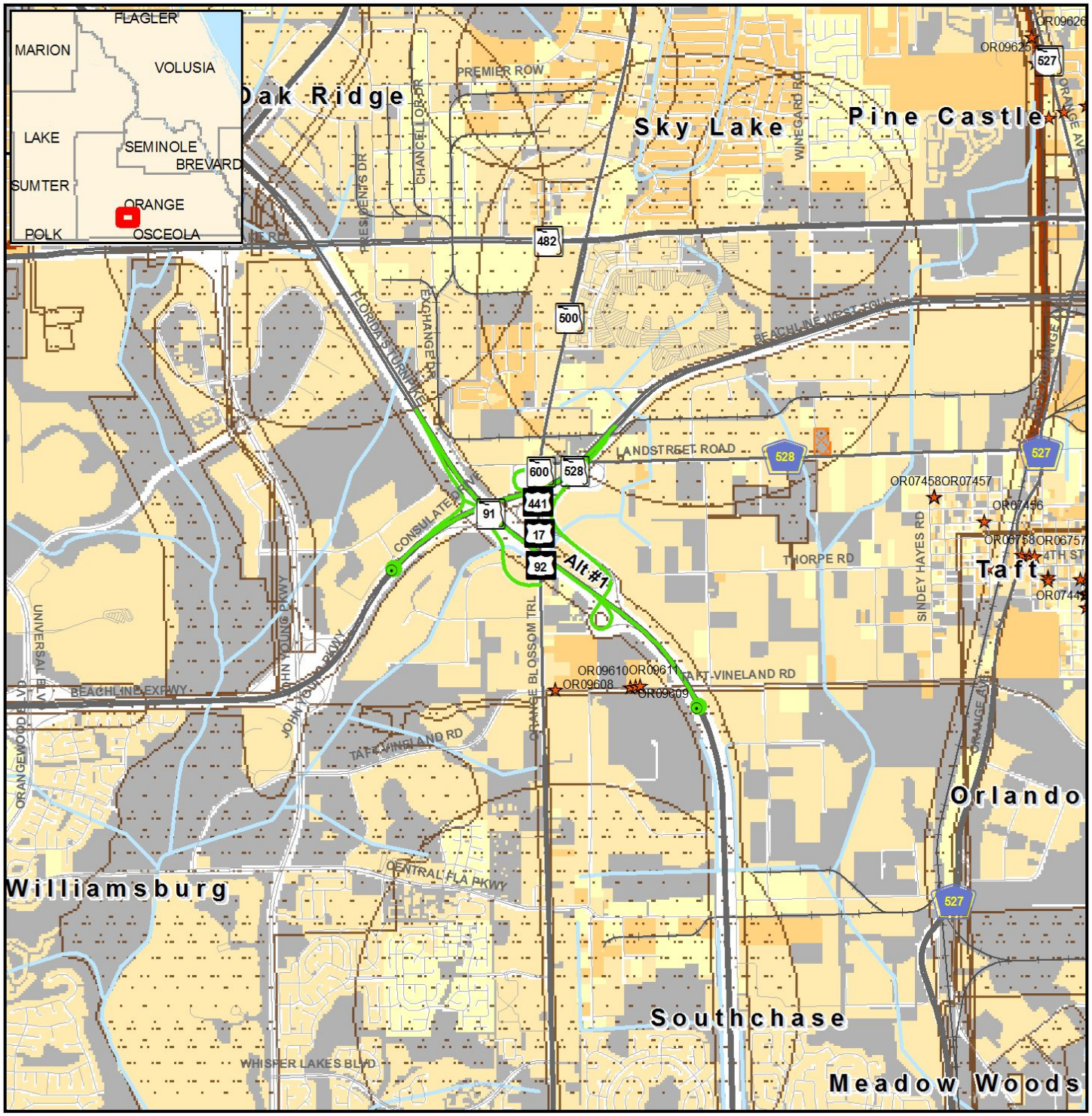

Historic Resource Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail

Year Built
- Pre 1970
- Post 1980
- 1970 - 1979
- Parcels w/ no values

- Historic Structure
- Historic Bridge
- State Historic Highway
- Historic Cemetery
- Historic Resource Group
- Cultural Resource Field Survey Area

Data Sources:
NAVTEQ
US Geological Survey
Florida Department of Transportation
Florida Department of State,
Bureau of Archaeological Research

Note: Historic properties depicted on this map represent resources listed in the Florida Master Site File excluding archeological site locations, which, pursuant to Chapter 267.135, Florida Statutes, may be exempt from public record (Chapter 119.07, Florida Statutes). Absence of features on the map does not necessarily indicate an absence of resources in the project vicinity.

0 0.2 0.4 0.8 Miles

N

1/12/2017

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14294 Orlando South Ultimate Interchange, Alternative #1

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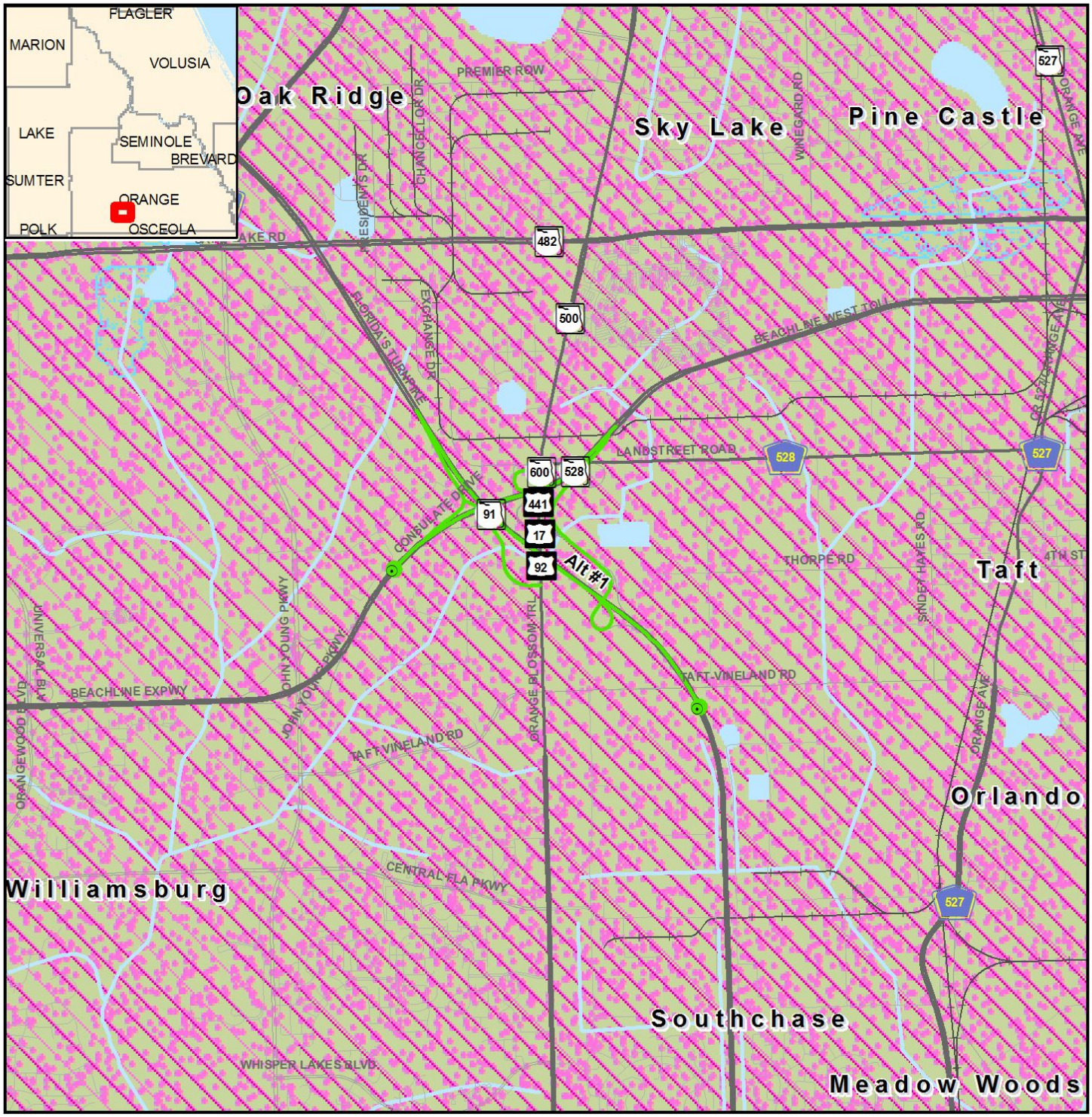

Hydrogeology Map

ETDM Alternative
ETDM Alternative Terminus
Major Road
Local Road or Trail
City Limits

N

0 0.2 0.4 0.8 Miles

Recharge Areas of the Floridan Aquifer
Discharge 1 to 5
Discharge > 5
Disharge < 1
Recharge 1 to 10
Recharge > 10
Recharge < 1

Surface Geology
Eocene
Miocene
Miocene/Pliocene
Oligocene
Oligocene/Miocene
Pleistocene
Holocene
Pleistocene/Holocene
Pliocene
Pliocene/Pleistocene

Data Sources: NAVTEQ; US Geological Survey
Florida Department of Transportation
South West Florida Water Management District
Florida Geological Survey

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14294 Orlando South Ultimate Interchange, Alternative #1

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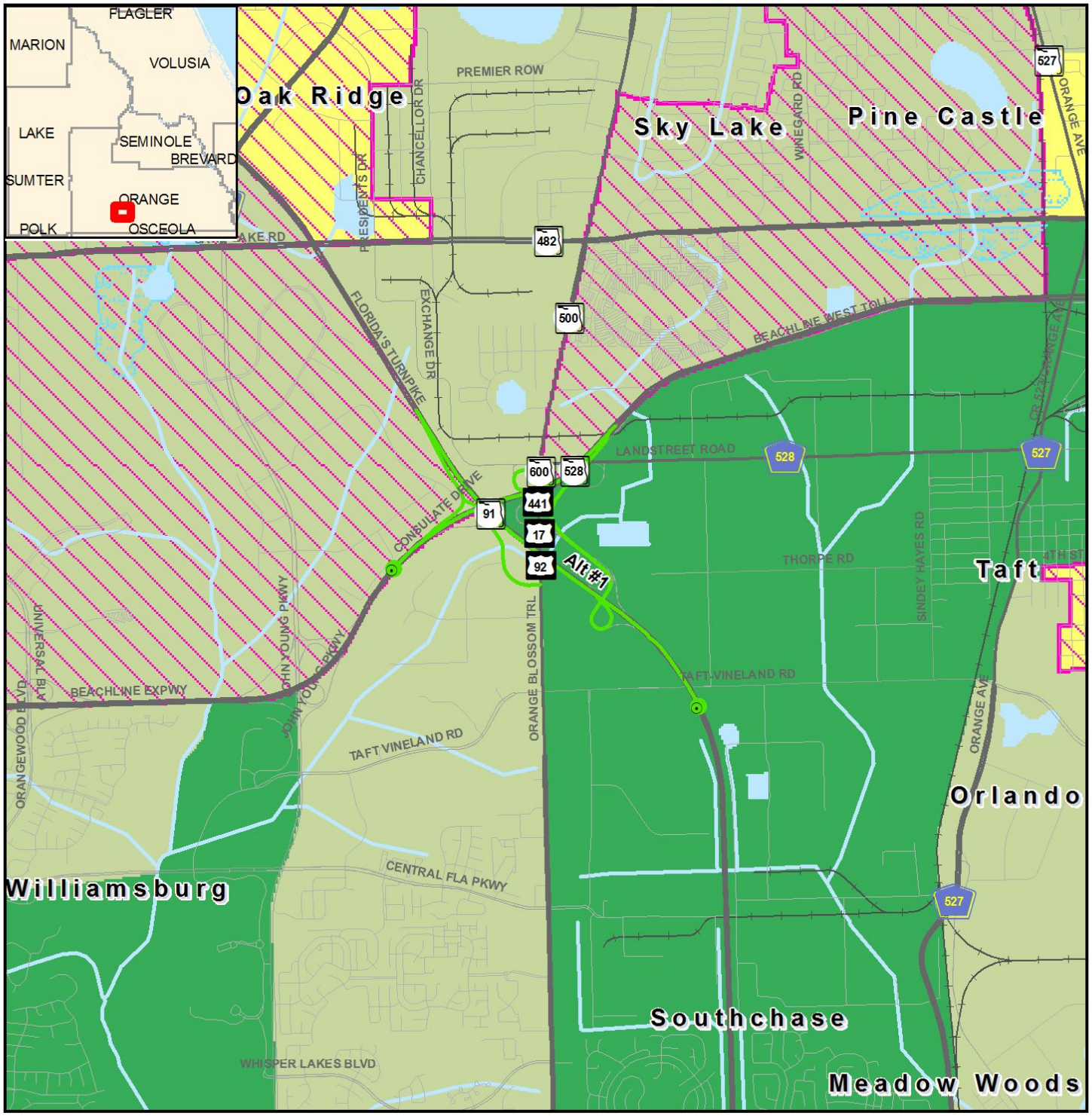

Income Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail
- > 20% Below Poverty

Median Household Income

- 0 - 10,000
- 10,001 - 29,999
- 30,000 - 49,999
- 50,000 - 79,999
- 80,000 - 125,000
- > 125,000

0 0.2 0.4 0.8 Miles

N

1/12/2017

Data Sources:
US Geological Survey
FL Department of Transportation
NAVTEQ
US Census Bureau (2010)

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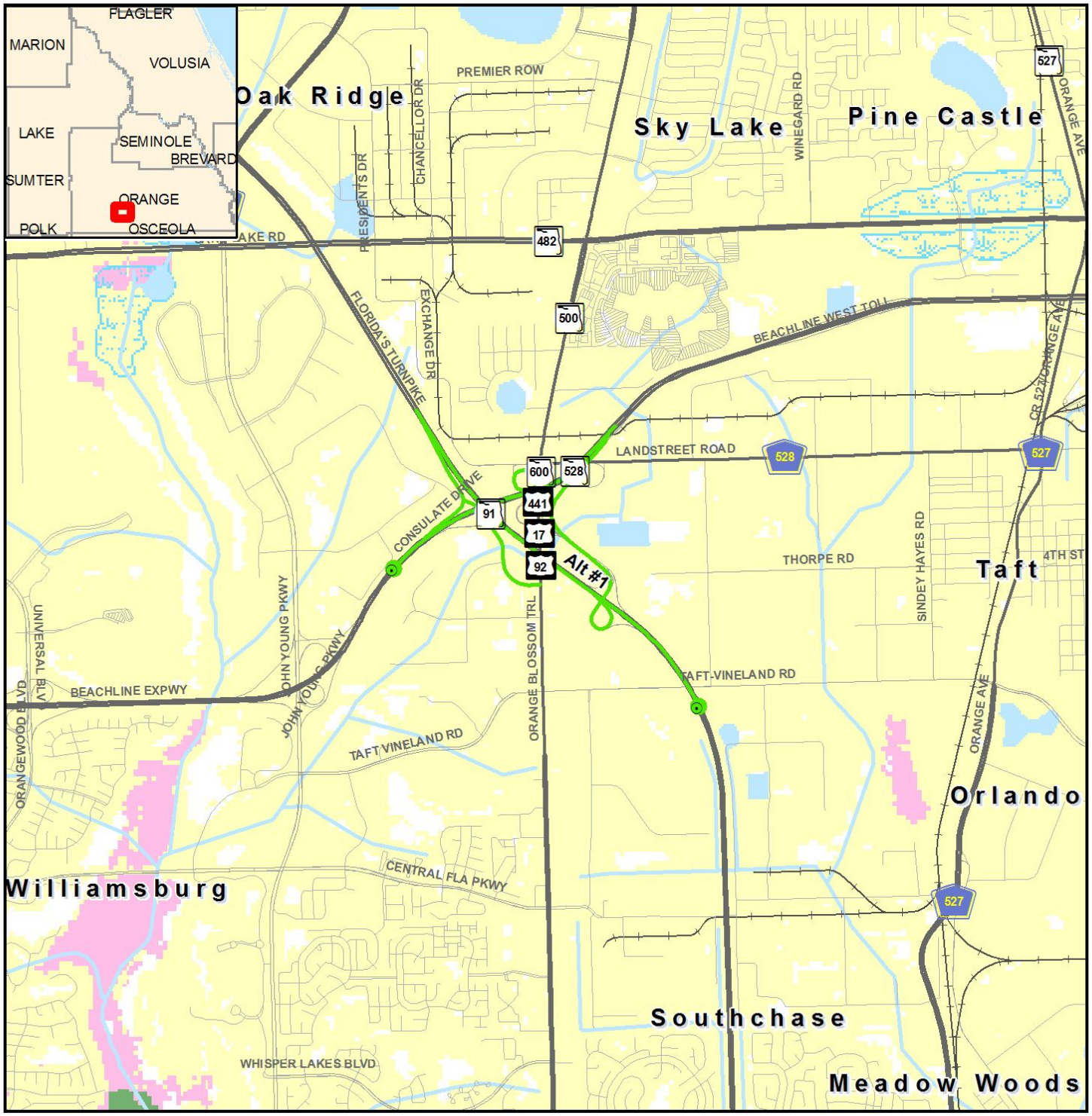

Integrated Wildlife Model Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail
- Low Habitat Quality
- Medium Habitat Quality
- High Habitat Quality

Data Sources:
NAVTEQ
US Geological Survey
Florida Department of Transportation
Florida Fish & Wildlife Conservation Commission

0 0.2 0.4 0.8 Miles

N

1/12/2017

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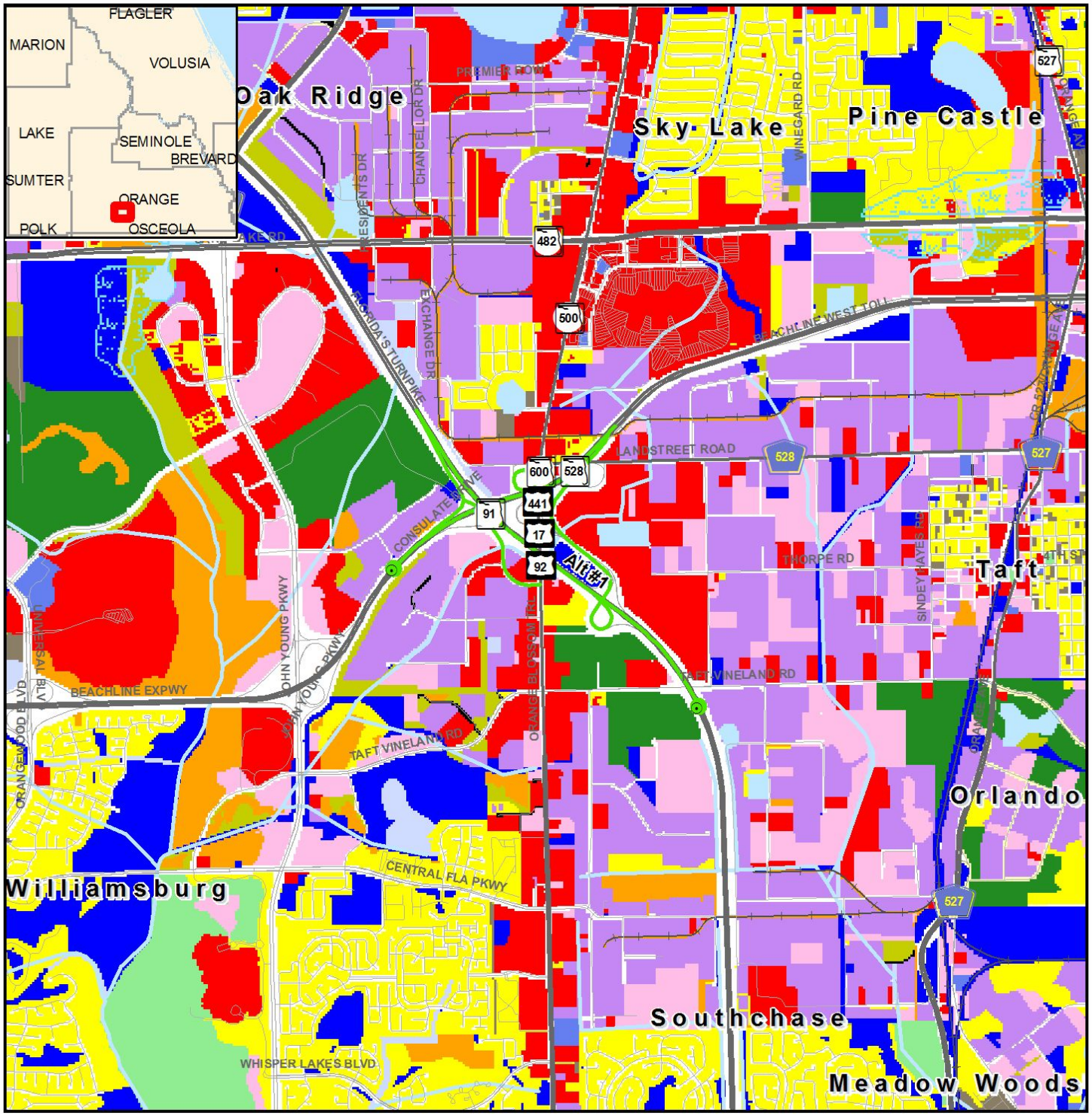

Land Use Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail
- Agricultural
- Industrial
- Institutional
- Mining
- Open (Not Agricultural)
- Other
- Public
- Right-of-Way
- Recreational
- Residential
- Retail/Office
- Vacant (Residential)
- Vacant (Nonresidential)
- Water
- No Data

Data Sources:
NAVTEQ
US Geological Survey
Florida Department of Revenue
Florida Department of Transportation
Florida County Property Appraiser Offices

0 0.2 0.4 0.8 Miles

N

1/12/2017

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FDOT

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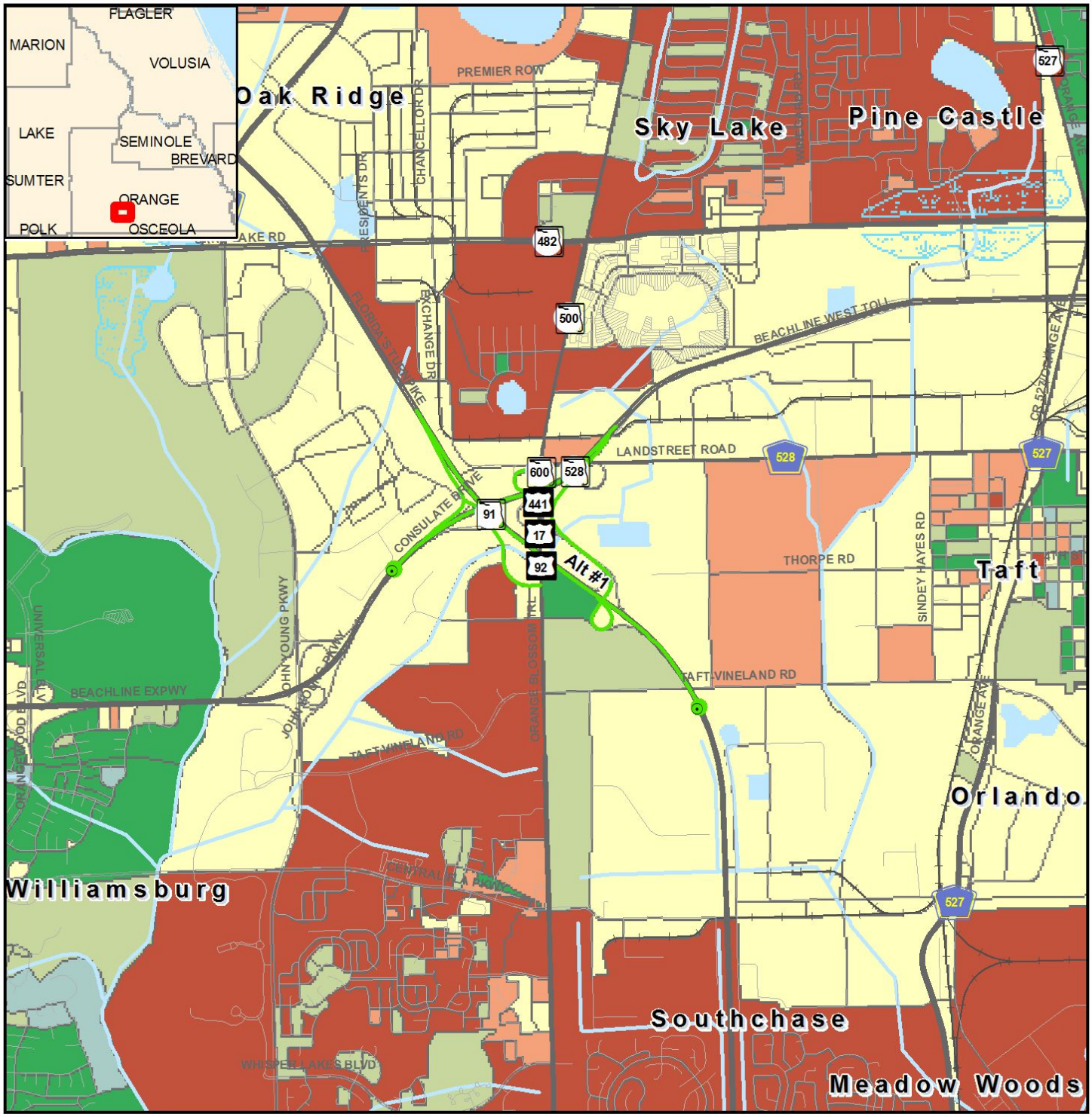

Minority Population Map

ETDM Alternative
ETDM Alternative Terminus
Major Road
Local Road or Trail

Percent Minority Population (2010)

0 - 6 | 7 - 20 | 21 - 40 | 41 - 60 | 61 - 85 | 86 - 100

Data Sources:
US Geological Survey
FL Department of Transportation
NAVTEQ
US Census Bureau (2010)

0 0.2 0.4 0.8 Miles

N

1/12/2017

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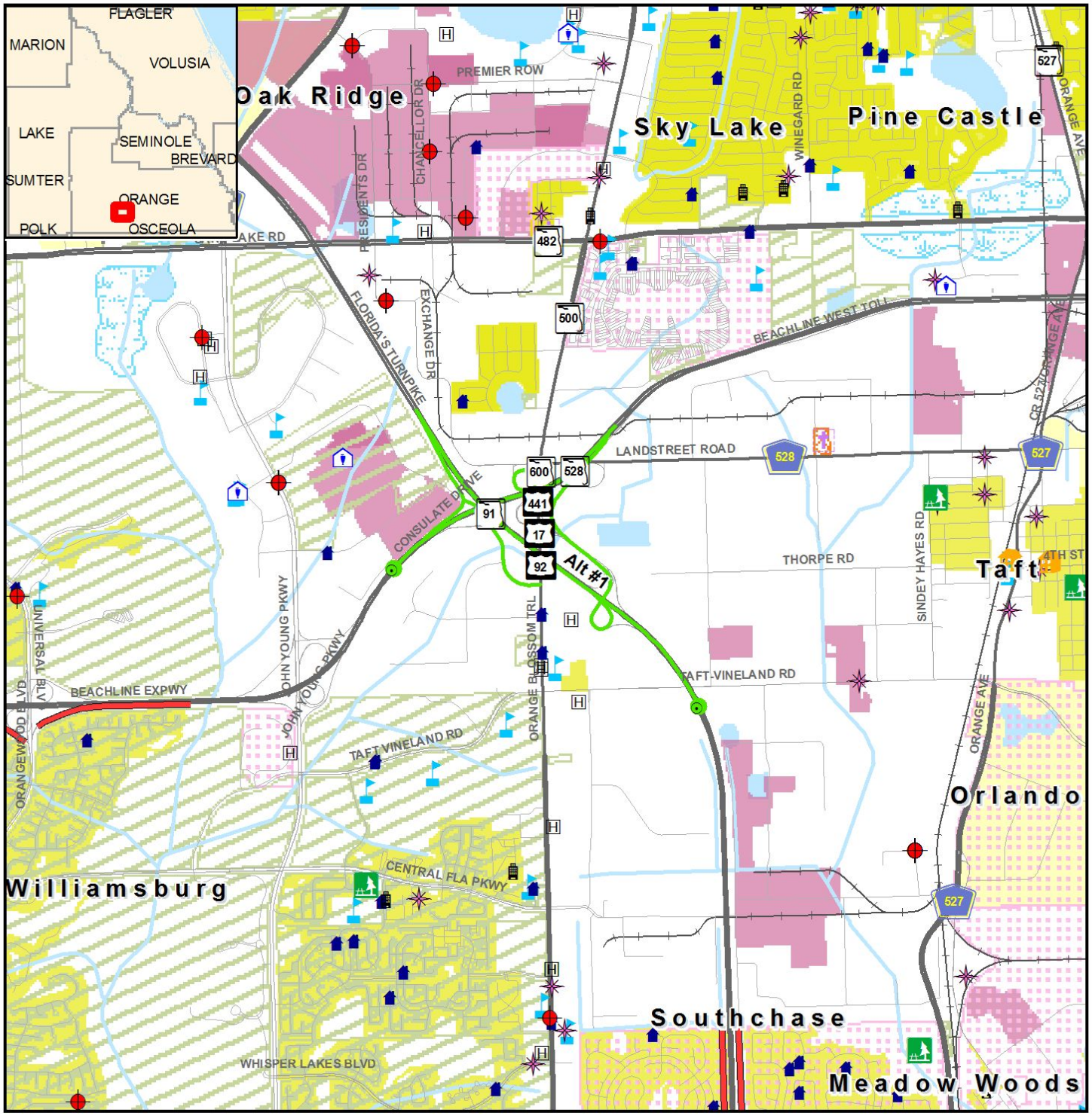
FDOT

14294 Orlando South Ultimate Interchange, Alternative #1

SR 528 (MP 4) to Florida's Turnpike (MP 254)



Noise Map

- ETDM Alternative
- ETDM Alternative Terminus
- City Limits
- Noise Barriers
- Existing Trails
- Condo Owners Associations
- Hospitals
- Laser On-site
- Group Care Facilities
- Cemetery
- Community Center
- Cultural Center
- Health Care
- Park
- Place of Worship
- School
- Historic Cemetery
- Planned Unit Developments
- Wildlife Refuges
- National Parks
- National Park Projects
- Marine Sanctuaries
- Military Installations
- ETAT.LU_NW_INDUSTRIAL_13
- ETAT.LU_NW_RESIDENT_13
- HUD Renewal
- Nat'l Estuarine Reserves
- Enterprise Zones
- DRI

0 0.2 0.4 0.8 Miles

N

1/12/2017

Data Sources:
GeoPlan Center, US Geological Survey, US Census Bureau, HUD, Florida DOT, US Fish and Wildlife, National Park Service, NOAA, National Estuarine Research, Enterprise Florida

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FDOT

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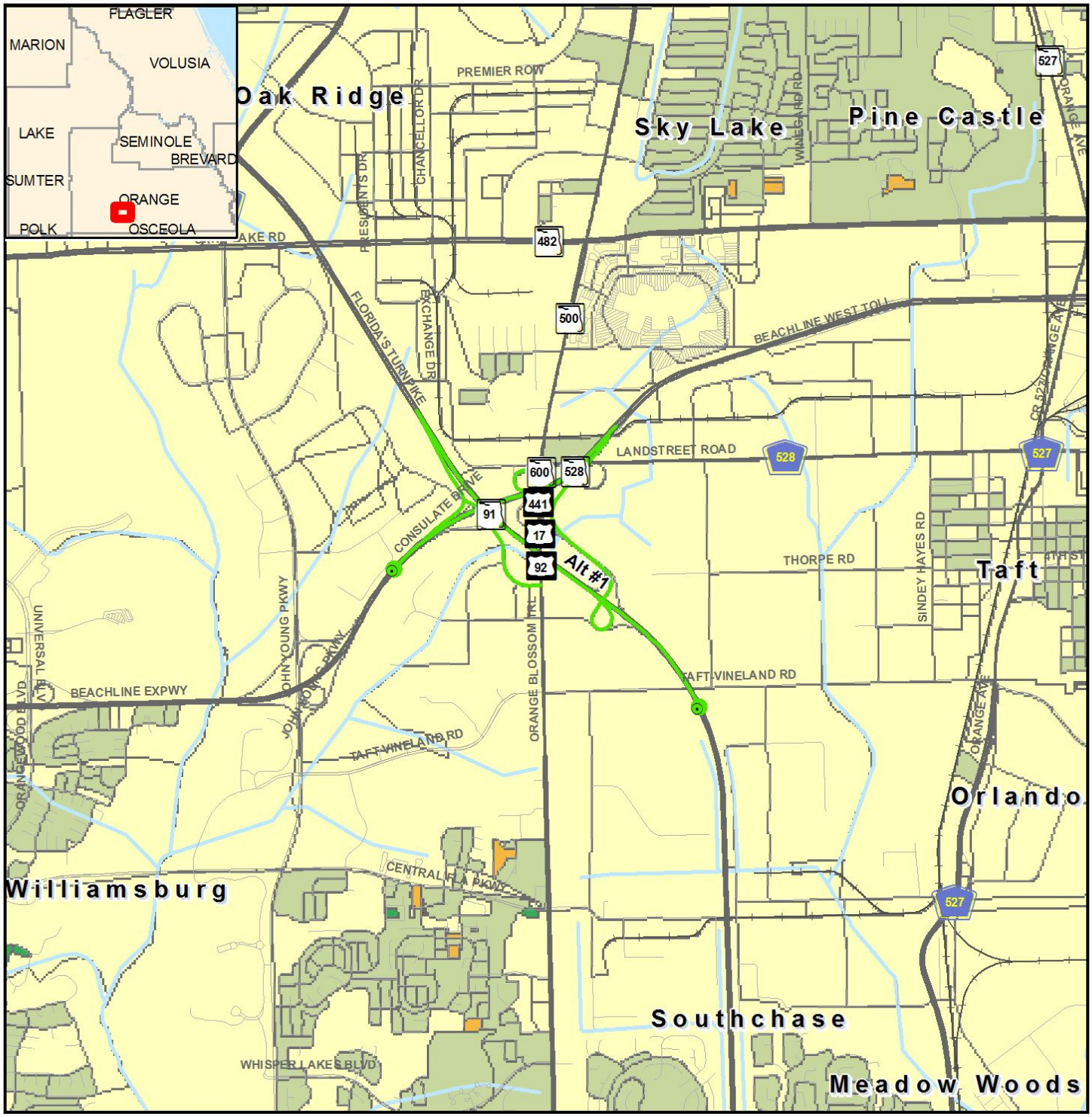

Population Density Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail

Population Per Acre (2010)

0 - 4.9 | 5 - 29.9 | 30 - 99.9 | 100 - 349.9 | 350 - 800 | > 800

Data Sources:
US Geological Survey
FL Department of Transportation
NAVTEQ
US Census Bureau (2010)

0 0.2 0.4 0.8 Miles

N

1/12/2017

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FDOT

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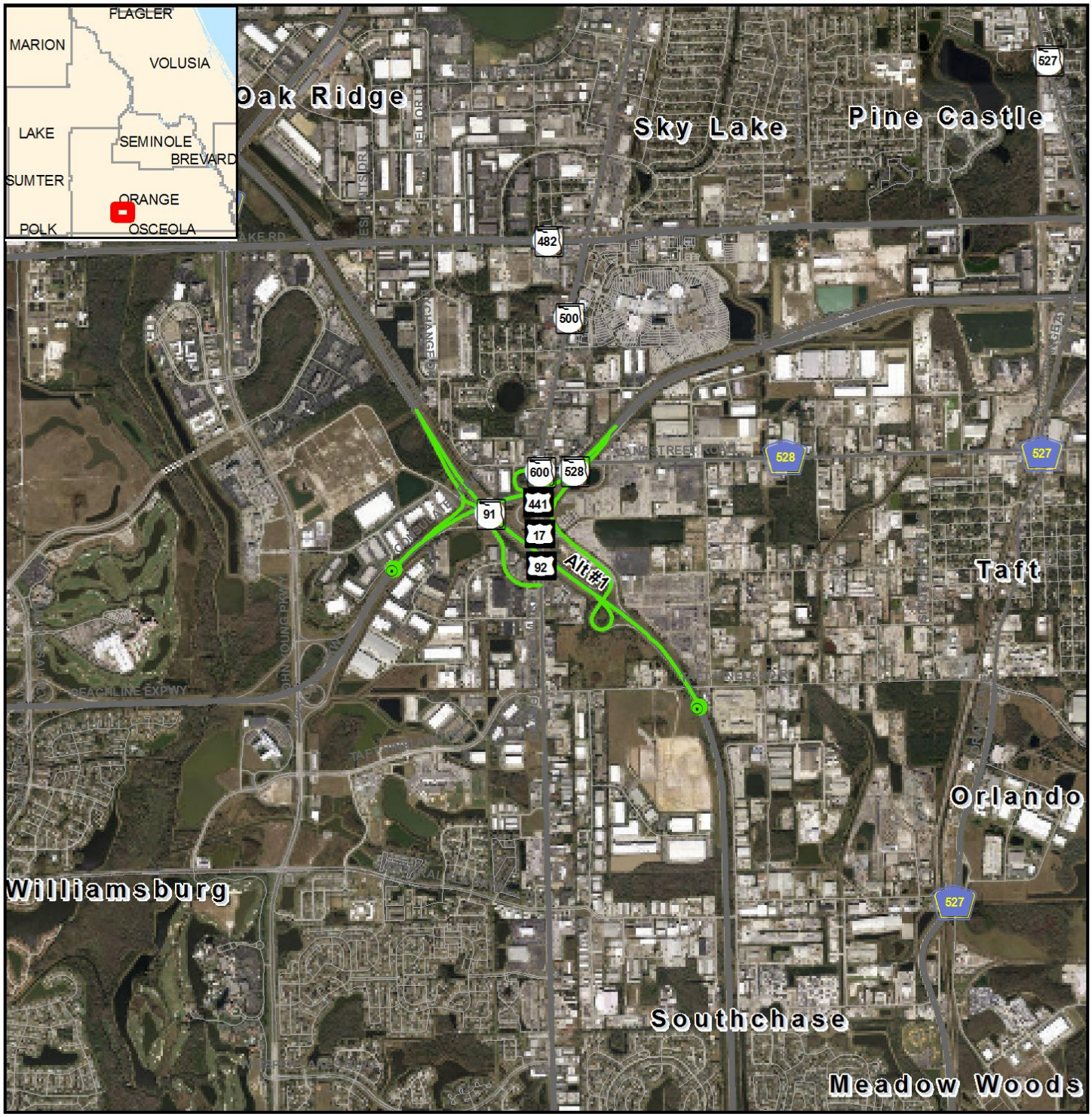

Project Aerial Map

ETDM Alternative
ETDM Alternative Terminus
Major Road
Local Road or Trail

Data Sources:
Highways - NAVTEQ
Digital Orthophotograph - ArcGIS Online

0 0.2 0.4 0.8 Miles

N

9/29/2016

14294 Orlando South Ultimate Interchange, Alternative #1

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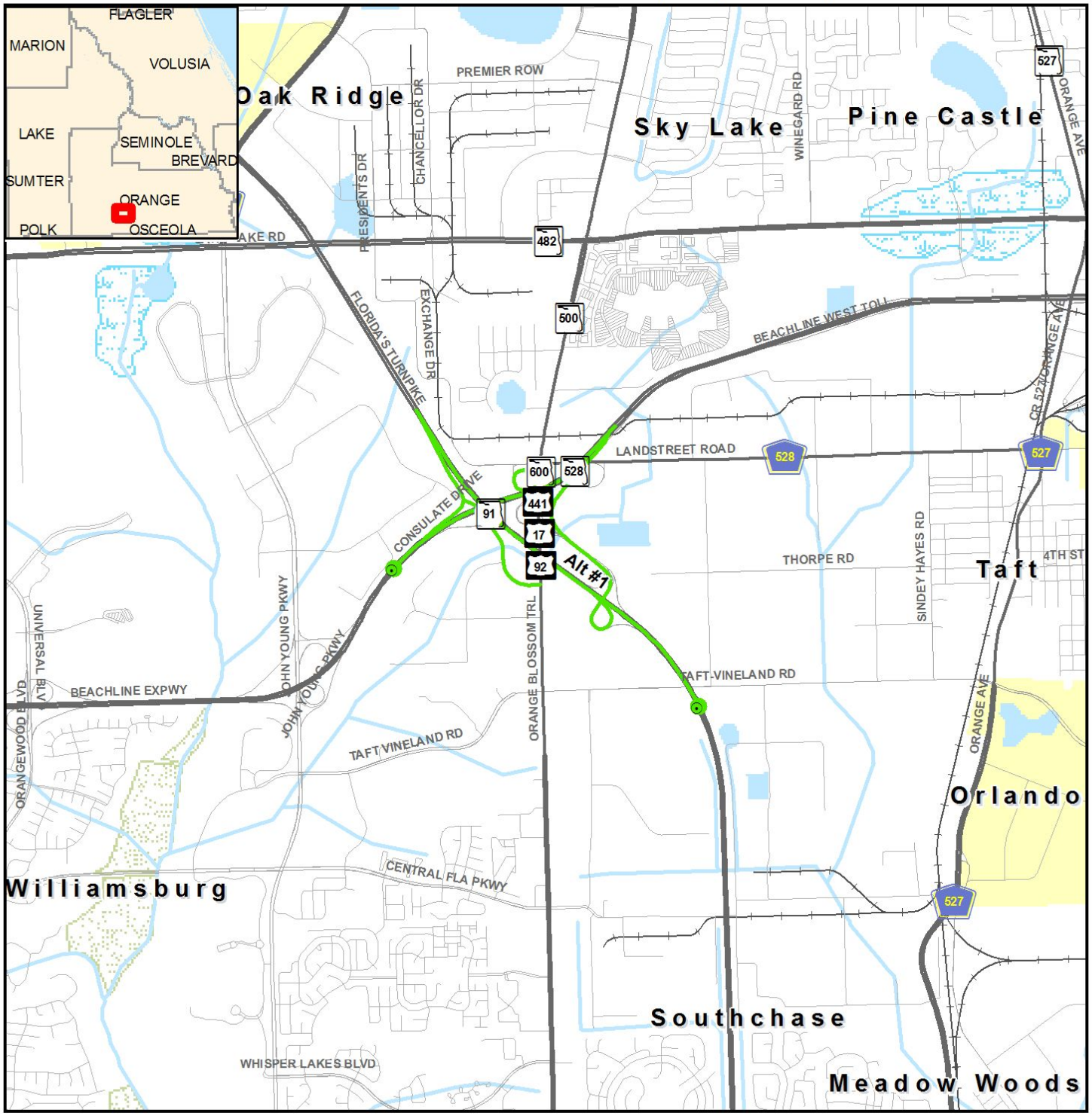

Project Base Map

- ETDM Alternative
- ETDM Alternative Terminus
- Local Road or Trail
- Major Road
- City Limits
- Managed Conservation Lands

Data Sources:
NAVTEQ
US Geological Survey
US Census Bureau
County Property Appraisers
Florida Natural Areas Inventory

0 0.15 0.3 0.6 Miles

N

1/12/2017

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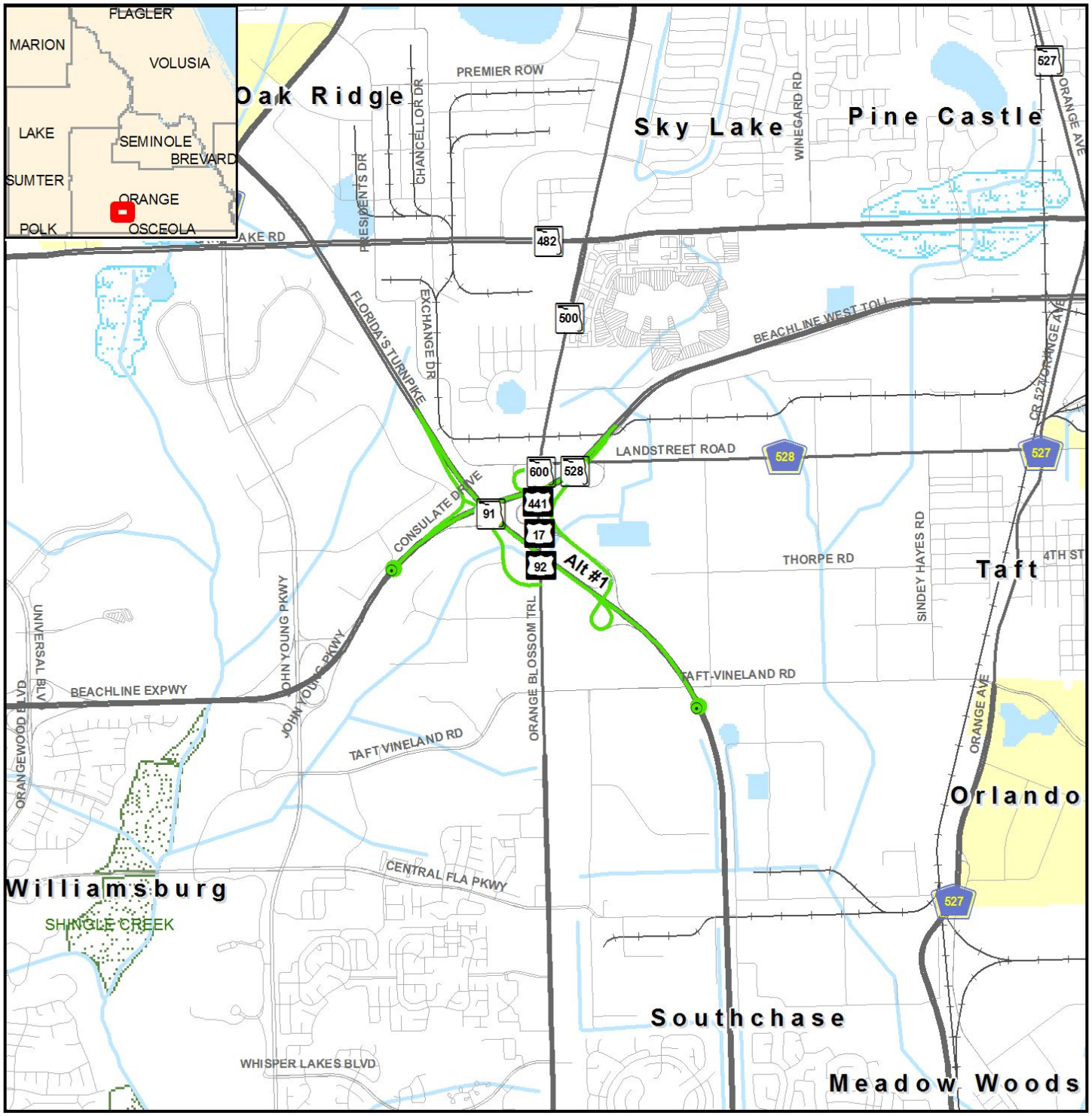

Recreational Areas Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail
- City Limits
- Conservation or Recreation Area

Data Sources:
NAVTEQ
US Geological Survey
Florida Natural Areas Inventory

0 0.2 0.4 0.8 Miles

N

1/12/2017

etdm Environmental Screening Tool

FDOT

14294 Orlando South Ultimate Interchange, Alternative #1

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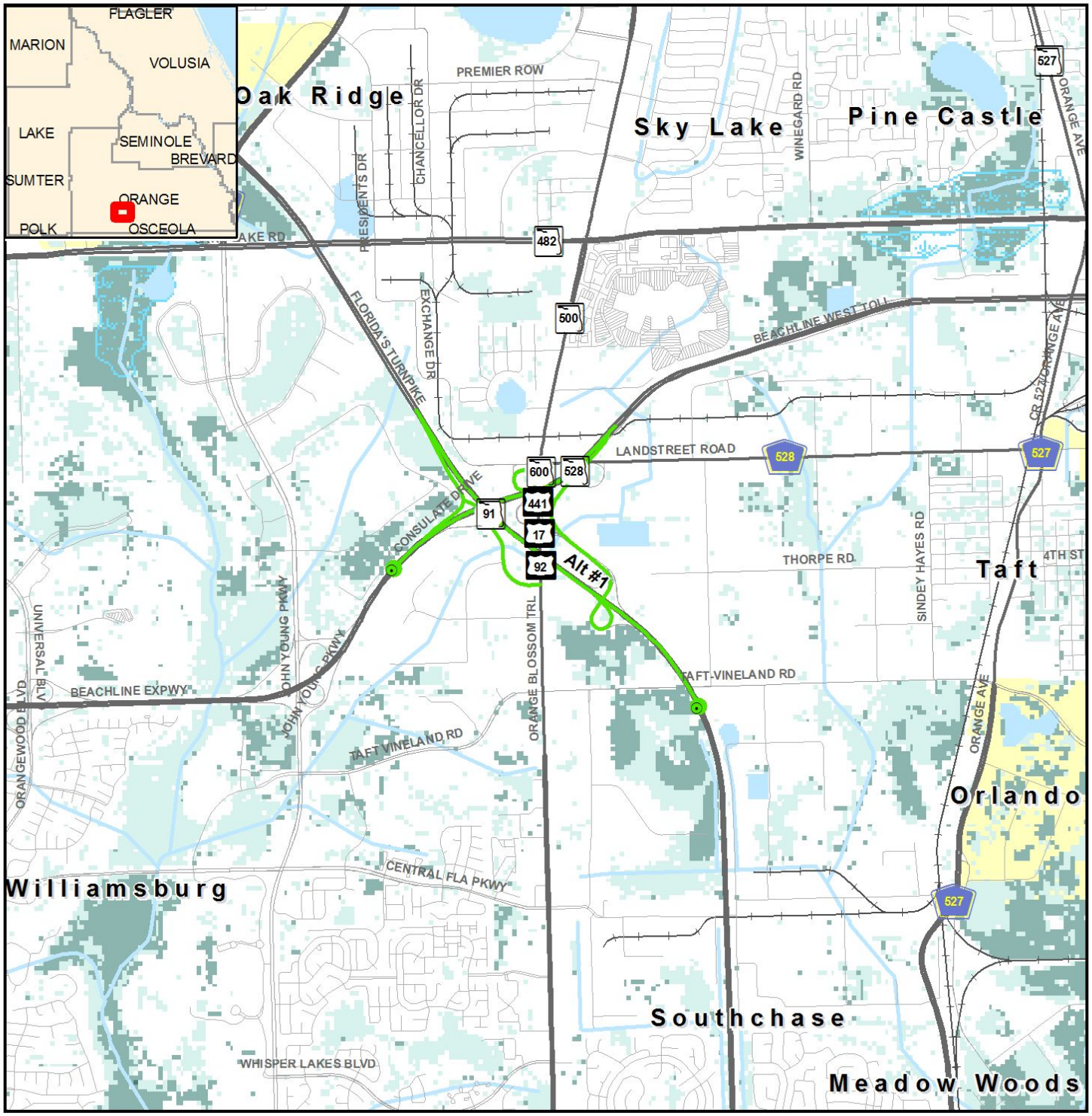

Species Potential Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail
- City Limits

Potential Habitat Richness

1 - 2 Species | 3 - 5 Species | 6 - 8 Species | 9 - 10 Species | 11 - 13 Species

Data Sources:
NAVTEQ
US Geological Survey
Florida Department of Transportation
Florida Fish & Wildlife Conservation Commission

0 0.2 0.4 0.8 Miles

N

1/12/2017

etdm Environmental Screening Tool

FDOT

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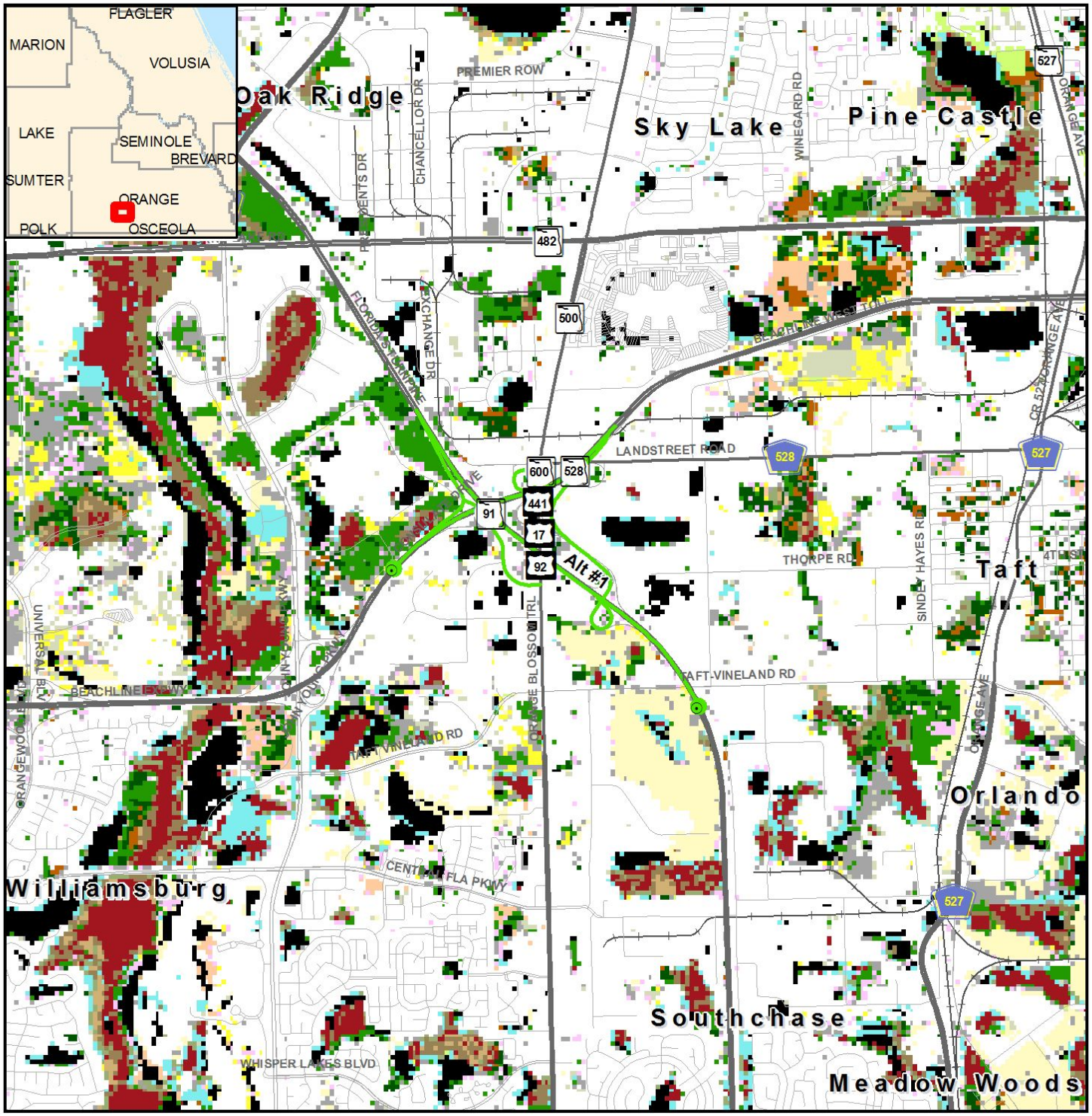

Vegetation Map

ETDM Alternative	Dry Prairie	Cattail Marsh	Bottomland Hardwood Forest	Bare Soil/Clearcut	Australian Pine
ETDM Alternative Terminus	Mixed Hardwood-pine Forest	Shrub Swamp	Salt Marsh	Improved Pasture	Melaleuca
Not Classified	Hardwood Hammocks and Forests	Bay Swamp	Mangrove Swamp	Unimproved Pasture	Brazilian Pepper
Coastal Strand	Pinelands	Cypress Swamp	Scrub Mangrove	Sugarcane	High Impact Urban
Sand/Beach	Cabbage Palm-live Oak Hammock	Cypress/Pine/Cabbage Palm	Tidal Flats	Citrus	Low Impact Urban
Xeric Oak Scrub	Tropical Hardwood Hammock	Mixed Wetland Forest	Open Water	Row and Field Crops	Extractive
Sand Pine Scrub	Freshwater Marsh and Wet Prairie	Hardwood Swamp	Shrub and Brushland	Other Agriculture	
Sandhill	Sawgrass Marsh	Hydric Hammock	Grassland	Exotic Plants	

0 0.2 0.4 0.8 Miles

N

Data Sources: NAVTEQ; Florida Department of Transportation; Florida Fish and Wildlife Conservation Commission

etdm Environmental Screening Tool

FDOT

9/29/2016

14294 Orlando South Ultimate Interchange, Alternative #1

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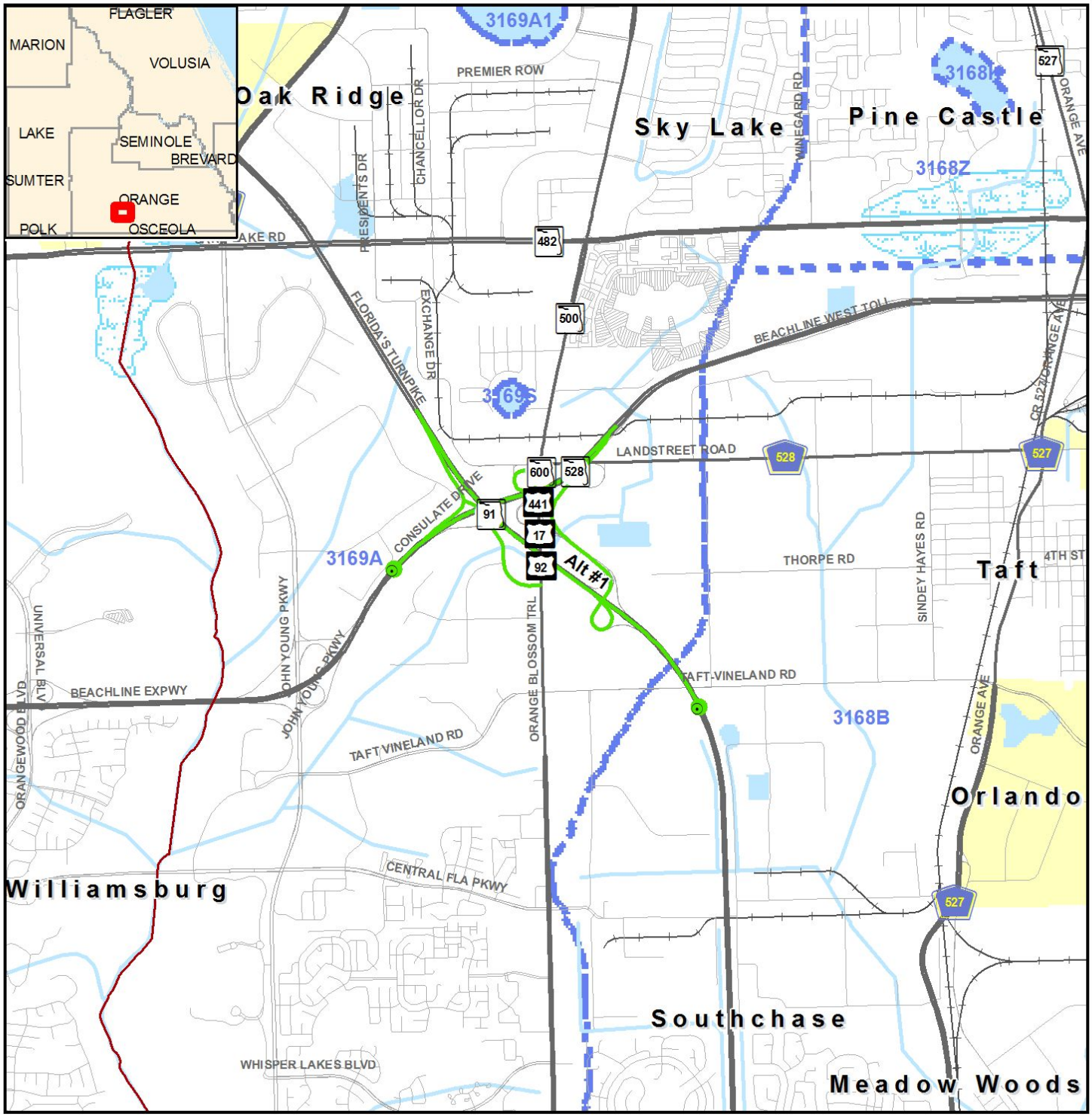

Water Resource Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail
- City Limits
- 1st Magnitude Spring
- River, Stream or Canal
- Navigable Water Way
- SFWMD Canals
- Drainage Basin
- Outstanding Florida Water
- Surface Water Class I
- Surface Water Class II
- Water Body
- Swamp/Marsh

Data Sources:
NAVTEQ
US Geological Survey
Florida Department of Transportation
Florida Department of Environmental Protection
Florida Geological Survey
US Bureau of Transportation Statistics

0 0.2 0.4 0.8 Miles

N

1/12/2017

etdm Environmental Screening Tool

FDOT

14294 Orlando South Ultimate Interchange, Alternative #1

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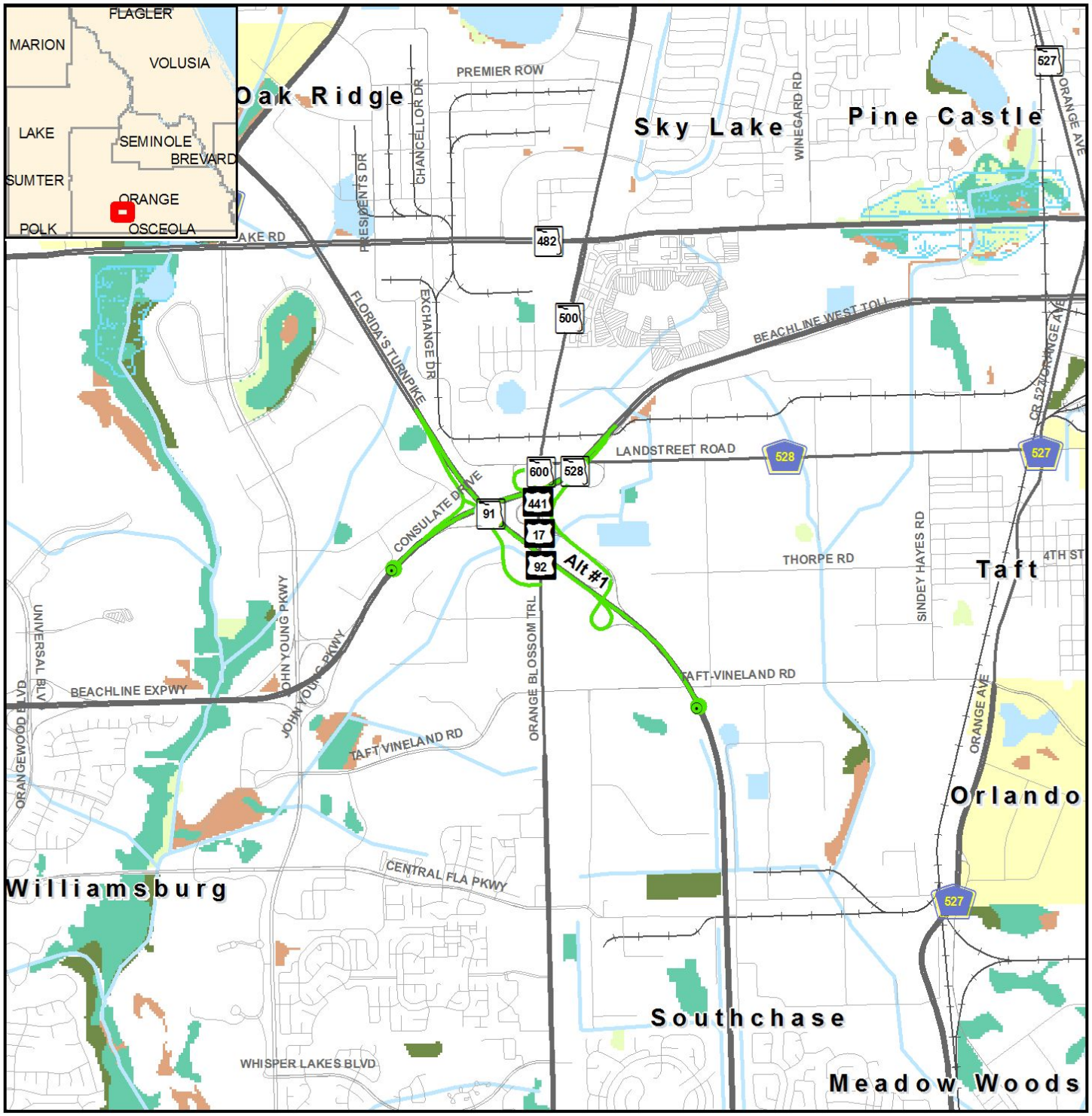

Wetlands and Surface Waters Map

- ETDM Alternative
- ETDM Alternative Terminus
- Major Road
- Local Road or Trail
- City Limits
- River, Stream or Canal
- Water Body
- Swamp/Marsh
- Non-vegetated Wetland
- Vegetated Non-forested Wetland
- Wetland Forested Mixed
- Wetland Coniferous Forest
- Wetland Hardwood Forest

Data Sources:
NAVTEQ
Florida Water Management Districts
US Geological Survey

0 0.2 0.4 0.8 Miles

N

1/12/2017

etdm Environmental Screening Tool

FDOT

Appendices

PED Comments

Advance Notification Comments

US Environmental Protection Agency Comment --
EPA does not have any additional comments.

--Amanetta Somerville, 3/2/2017

Response --

--, $tools.date.format("M/d/yyyy",$comment.responseTimestamp)

FL Department of State Comment --
none

--Ginny Leigh Jones, 2/20/2017

Response --

--, $tools.date.format("M/d/yyyy",$comment.responseTimestamp)

US Army Corps of Engineers Comment --
The Corps has no issues with the Advance Notification Package and concurs with the initial assessment of Wetlands and Surface Water and Navigation issues. Further comments on project effects are provided in the Review Project tool.

--Randy Turner, 2/17/2017

Response --

--, $tools.date.format("M/d/yyyy",$comment.responseTimestamp)

Saint Johns River Water Management District Comment --
Outside of SJRWMD

--Ken Lewis, 1/20/2017

Response --

--, $tools.date.format("M/d/yyyy",$comment.responseTimestamp)

GIS Analyses

Since there are so many GIS Analyses available for Project #14294 - Orlando South Ultimate Interchange, they have not been included in this ETDM Summary Report. GIS Analyses, however, are always available for this project on the Public ETDM Website. Please click on the link below (or copy this link into your Web Browser) in order to view detailed GIS tabular information for this project:

http://etdmpub.fla-etat.org/est/index.jsp?tpID=14294&startPageName=GIS%20Analysis%20Results

Special Note: Please be sure that when the GIS Analysis Results page loads, the **Project Published 5/05/2017Milestone** is selected. GIS Analyses snapshots have been taken for Project #14294 at various points throughout the project's life-cycle, so it is important that you view the correct snapshot.

Project Attachments

There are no attachments for this project.

Degree of Effect Legend

Color Code	Meaning	ETAT	Public Involvement
N/A	Not Applicable / No Involvement	There is no presence of the issue in relationship to the project, or the issue is irrelevant in relationship to the proposed transportation action.	
0	None (after 12/5/2005)	The issue is present, but the project will have no impact on the issue; project has no adverse effect on ETAT resources; permit issuance or consultation involves routine interaction with the agency. The *None* degree of effect is new as of 12/5/2005.	No community opposition to the planned project. No adverse effect on the community.
1	Enhanced	Project has positive effect on the ETAT resource or can reverse a previous adverse effect leading to environmental improvement.	Affected community supports the proposed project. Project has positive effect.
2	Minimal	Project has little adverse effect on ETAT resources. Permit issuance or consultation involves routine interaction with the agency. Low cost options are available to address concerns.	Minimum community opposition to the planned project. Minimum adverse effect on the community.
2	Minimal to None (assigned prior to 12/5/2005)	Project has little adverse effect on ETAT resources. Permit issuance or consultation involves routine interaction with the agency. Low cost options are available to address concerns.	Minimum community opposition to the planned project. Minimum adverse effect on the community.
3	Moderate	Agency resources are affected by the proposed project, but avoidance and minimization options are available and can be addressed during development with a moderated amount of agency involvement and moderate cost impact.	Project has adverse effect on elements of the affected community. Public Involvement is needed to seek alternatives more acceptable to the community. Moderate community interaction will be required during project development.
4	Substantial	The project has substantial adverse effects but ETAT understands the project need and will be able to seek avoidance and minimization or mitigation options during project development. Substantial interaction will be required during project development and permitting.	Project has substantial adverse effects on the community and faces substantial community opposition. Intensive community interaction with focused Public Involvement will be required during project development to address community concerns.
5	Potential Dispute (Planning Screen)	Project may not conform to agency statutory requirements and may not be permitted. Project modification or evaluation of alternatives is required before advancing to the LRTP Programming Screen.	Community strongly opposes the project. Project is not in conformity with local comprehensive plan and has severe negative impact on the affected community.
5	Dispute Resolution (Programming Screen)	Project does not conform to agency statutory requirements and will not be permitted. Dispute resolution is required before the project proceeds to programming.	Community strongly opposes the project. Project is not in conformity with local comprehensive plan and has severe negative impact on the affected community.
	No ETAT Consensus	ETAT members from different agencies assigned a different degree of effect to this project, and the ETDM coordinator has not assigned a summary degree of effect.	
	No ETAT Reviews	No ETAT members have reviewed the corresponding issue for this project, and the ETDM coordinator has not assigned a summary degree of effect.	

APPENDIX D

SHPO Concurrence Letter

FDOT

Florida Department of Transportation

RON DESANTIS
GOVERNOR

Florida's Turnpike Enterprise
P.O. Box 613069
Ocoee, FL 34761

KEVIN J. THIBAULT, P.E.
SECRETARY

November 25, 2019

Timothy A. Parsons, Ph.D.
Director, Division of Historical Resources and
State Historic Preservation Officer
R.A. Gray Building
500 South Bronough Street
Tallahassee, Florida 32399-0250

Re: Cultural Resource Assessment Survey of the Orlando South Ultimate Interchange Florida's Turnpike (SR 91) at Mile Post (MP) 254 and Beachline Expressway (SR 528) at MP 4 in Orange County, Florida (FPID No.: 438547-1-22-01).

Attention: Jason Aldridge, Compliance and Review Supervisor and Deputy State Historic Preservation Officer

Dear Dr. Parsons:

Florida's Turnpike Enterprise (FTE) is pleased to submit the enclosed *Cultural Resource Assessment Survey of the Orlando South Ultimate Interchange Florida's Turnpike (SR 91) at Mile Post (MP) 254 and Beachline Expressway (SR 528) at MP 4 in Orange County, Florida* (FPID No.: 43857-1-22-01). The objective of this survey was to identify cultural resources within the project area of potential effect (APE) for the mainline improvements and assess their eligibility for listing in the *National Register of Historic Places* (National Register) according to criteria set forth in 36 Code of Federal Regulations (CFR) Section 60.4.

Included in this report are the results of the CRAS for the improvements associated with Florida's Turnpike mainline as well as the results of the desktop analysis of the preferred and alternative pond sites. An archeological and historic resource survey will be completed once the final pond sites are determined and an addendum report documenting the results of the survey will be submitted to your office upon completion of the survey.

This assessment complies with the revised Chapter 267, *Florida Statutes (F.S.)*; and standards embodied in the FDHR's *Cultural Resource Management Standards and Operational Manual* (February 2003), and Chapter 1A-46 (*Archaeological and Historical Report Standards and Guidelines*), *Florida Administrative Code*. In addition, this report was prepared in conformity with

standards set forth in Part 2, Chapter 8 (*Archaeological and Historical Resources*) of the FDOT *Project Development and Environment Manual* (effective January 14, 2019). All work also conforms to professional guidelines set forth in the *Secretary of Interior's Standards and Guidelines for Archaeology and Historic Preservation* (48 FR 44716, as amended and annotated). Principal Investigators meet the Secretary of the Interior's Professional Qualification Standards (48 FR 44716) for archaeology, history, architecture, architectural history, or historic architecture.

No archaeological sites were identified within the archaeological APE. Subsurface testing was not feasible within most of the archaeological APE due to presence of existing at-grade roadways, elevated highways, drainage and water management features, buildings, underground utilities, and ongoing construction. The pedestrian survey of the archaeological APE confirmed the developed nature of the project corridor and a low potential for intact archaeological sites.

The CRAS identified nine historic resources within the project APE including five structures, two bridges, and two linear resources. Three of the structures (8OR9609–8OR9611) were previously recorded and determined National Register–ineligible by SHPO. All six newly recorded resources including two bridges (8OR11512 and 8OR11513), two historic structures (8OR11514 and 8OR11515), a historic roadway segment (8OR11516), and a historic railroad spur (8OR11517) are considered National Register–ineligible.

No previously recorded archaeological sites were identified within or adjacent to the Preferred or Alternative pond siting alternatives. The proposed ponds have not been subjected to previous subsurface testing. Based on the former environmental setting of the archaeological APE, as well as the current level of development, the proposed ponds exhibit low archaeological site potential. Two historic linear resources (8OR11516 and 8OR11517), two historic bridges (8OR11512 and 8OR11513), and three historic buildings (8OR9610, 8OR9611, and 8OR11515) are located within the historic resources APE for the Preferred Ponds. One of these historic linear resources (8OR11517) and two of these historic buildings (8OR9610 and 8OR9611) are also located within the historic resources APE for the Alternative Ponds. All of the historic resources within the historic resources APE for the proposed ponds have either been previously determined by the SHPO to be National Register–ineligible, or were considered to be ineligible for listing in the National Register individually and as part of a district as a result of the current survey work.

Based on the results of this CRAS, there are no historic properties within the APE for the proposed improvements to the Florida's Turnpike mainline. Additional coordination with the SHPO/FDHR and further investigations of the final pond site will be conducted when final pond sites are selected.

We respectfully request that this letter and document are reviewed, and concurrence is provided by your office. If you have any questions regarding the subject project, please contact me at philip.stein@dot.state.fl.us or (407) 264-3301.

Sincerely,

Philip Stein
Environmental Administrator
Florida's Turnpike Enterprise

Cc: Stephan Heimberg, Hardesty & Hanover
Kathleen Hoffman, Janus Research

The Florida Division of Historical Resources finds the attached document complete and sufficient and ☑ concurs/ ☐ does not concur with the recommendations and findings provided in this cover letter for SHPO/FDHR Project File Number 2017-0726-B

Comments: We look forward to continued consultation once final pond (s) sites are determined as a few of the preferred and alternate proposed ponds represents the least disturbed areas of the project area.

Timothy A. Parsons, Ph.D., Director, and
State Historic Preservation Officer
Florida Division of Historical Resources

[DATE]

for Deputy SHPO
1/8/2020

APPENDIX E

Delegation Letter

From: Colon, Christina
To: Stults, Jennifer
Cc: Pinzon, Henry
Subject: FW: SEIR Approval Delegation
Date: Thursday, September 10, 2020 11:01:21 AM

I discussed with Nicola and we agree to delegate State Environmental Impact Report (SEIR) approvals to the Planning and Environmental Management Office (PLEMO) Administrator, Jennifer Stults.

Thanks,

Christina N. Colón, P.E.
Director of Transportation Development

Florida's Turnpike Enterprise
Florida Department of Transportation
Mile Post 263, Building 5315, Ocoee, FL 34761
Tel (407) 264-3603 / **Mobile** (407) 457-1024

From: Colon, Christina
Sent: Friday, September 4, 2020 3:46 PM
To: Liquori, Nicola <Nicola.Liquori@dot.state.fl.us>
Cc: Carrier, Denise <Denise.Carrier@dot.state.fl.us>
Subject: FW: SEIR Approval Delegation

Nicola,

Jennifer Stults and I discussed this topic today and she has provided details below. BLUF – For our PD&E projects, you are now able to delegate State Environmental Impact Report (SEIR) approvals to either me or Jennifer's role. We can explore other options if you prefer but CO would like it to be a managerial position at or above PLEMO Administrator. Currently, all District Secretaries except for District 1 have delegated these SEIR approvals to the PLEMO Administrators. Whoever you decide, CO has advised that the approver will need SWEPT (StateWide Environmental Project Tracker) credentials and some training to navigate the program. I'm told it can be done with very minimal training and not the 5-7 hr training they've been holding. Jennifer has already completed it so it would only apply to me or you.

Please let me know your preference and we'll proceed accordingly with CO on next steps for the SWEPT access and training. My understanding is they would like to get an assessment of who needs the setup/training within the next week or two so they can coordinate calendars and put together an efficient implementation plan.

Thanks,

Christina N. Colón, P.E.
Director of Transportation Development

Florida's Turnpike Enterprise
Florida Department of Transportation
Mile Post 263, Building 5315, Ocoee, FL 34761
Tel (407) 264-3603 / **Mobile** (407) 457-1024

From: Stults, Jennifer <Jennifer.Stults@dot.state.fl.us>
Sent: Friday, September 4, 2020 12:48 PM
To: Colon, Christina <Christina.Colon@dot.state.fl.us>
Subject: SEIR Approval Delegation

Christina,

To follow up on our recent discussion, Central Office has advised that we are able to delegate State Environmental Impact Report (SEIR) approvals. Typically, District Secretaries have approved these documents, which are the state versions of a federal Project Development & Environment (PD&E) document. Currently, all District Secretaries except for District 1 have delegated these SEIR approvals to the PLEMO Administrators.

Part of this is also the move to electronic documents to improve efficiency and consistency statewide. The SEIR approvals will now take place within the SWEPT system, making it available to EDMS and other FDOT electronic document database systems. This should be helpful to Design and other subsequent phases who may need to access this information. Central Office has advised that the approver will need SWEPT credentials but can set this up with minimal training.

We have several options here: Turnpike Secretary/CEO Nicola Liquori retains approval authority, Secretary Liquori delegates authority to Transportation Development Director Christina Colon, or Secretary Liquori delegates authority to Planning and Environmental Management Office (PLEMO) Administrator Jennifer Stults. We can also explore other options if you prefer. I am happy to accept this delegation if that is the decision. I completed the training in November, 2016, with subsequent required courses in 2017 as part of NEPA Assignment. Can you let me know of any preference, and I will proceed accordingly with necessary approvals and working with Central Office to get this set up in SWEPT?

Thanks,

Jennifer A. Stults, AICP CTP, CPM, FCCM
Planning & Environmental Mgmt. Administrator

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