Revised Alternative Corridor Evaluation Methodology Memorandum (MM)

I-4 Poinciana Parkway Connector, Project Development and Environment Study, From Interstate 4 to the Greater Poinciana Area FPID: 433693-2-22-01, ETDM No. 13957, Osceola and Polk Counties, Florida

PREPARED BY:	Florida Department of Transportation, District Five
DATE:	August 4, 2014, revised September 2014
SUBJECT:	Revised Alternative Corridor Evaluation Report Methodology Memorandum

The purpose of this Revised Methodology Memorandum (MM) is to document the evaluation methodology to be conducted for the Interstate 4 (I-4) Poinciana Parkway Connector (I-4 Connector) Project Development and Environment (PD&E) Study. The memorandum details the goals of the evaluation, the methodology, how coordination with stakeholders will occur, and the basis for decision-making. This MM was revised in response to comments from the Environmental Technical Advisory Team (ETAT) members received July 18, 2014, after a 30-day minimum comment period. The evaluation of the corridors will be detailed in the Alternative Corridor Evaluation (ACE) Report (ACER). The results in the ACER will identify the reasonable alternatives for National Environmental Policy Act (NEPA) analysis.

1. Background

1.1 Contact Personnel

Amy Sirmans, PE, FDOT Project Manager Florida Department of Transportation (FDOT), District 5 (386) 943-5404 Amy.Sirmans@dot.state.fl.us

Mark Callahan, PE, Consultant Project Manager

CH2M HILL (407) 423-0030 Ext. 52150 Mark.Callahan@ch2m.com

1.2 Project Information

The FDOT, in cooperation with the Federal Highway Administration (FHWA), initiated the I-4 Poinciana Parkway Connector PD&E Study in June 2013. The PD&E Study involves the analysis of a range of alternatives for an enhanced connection between I-4, or the proposed Central Polk Parkway, and the greater Poinciana area. The proposed I-4 Connector is identified in the Osceola County Expressway Authority's (OCX's) *OCX Master Plan 2040* (OCX, 2013) to serve Osceola County's urban growth area.

OCX initiated the Poinciana Parkway Design/Build project for a segment of the beltway system referred to as the Northwest Segment, the Poinciana Parkway Bridge Segment (Bridge Segment), and the Southwest Segment. The Northwest Segment begins at U.S. 17/92 to the north end of the Bridge Segment. The Bridge Segment crosses Reedy Creek to a point just north of the intersection of Marigold Avenue and East Bourne Drive. The Southwest Segment begins at the south end of the Bridge Segment

and runs south along Rhododendron Avenue to Cypress Parkway. In addition, FDOT is conducting an independent PD&E Study for the Southport Connector segment of the Poinciana Parkway from Pleasant Hill Road to the Florida's Turnpike in Osceola County.

1.3 Project Description

The I-4 Connector study area is located in Osceola and Polk Counties and is generally bound by Cypress Parkway (County Road [C.R.] 580) to the south, U.S. 192 to the north, I-4 to the west, and Poinciana Boulevard to the east. The initial range of corridors includes improvements to existing roadways, corridors on a new alignment, corridors on existing roadways, and a new or modified interchange with I-4. The project limits and study area are shown on the project location map in Exhibit 1.

The following goals and objectives are contained in the OCX Master Plan 2040 (OCX, 2013):

Goal 3: Promote a high quality of life for Osceola County residents. Objective 3.1: Reduce delay by providing limited access transportation options. Objective 3.2: Improve capacity with new lineage and transit options.

Therefore, in conformance with the goals and objectives of the OCX Master Plan, the proposed I-4 Connector will be a new limited access facility with transit options.

1.4 Purpose and Need

The purpose and need of the project was screened in the Efficient Transportation Decision Making (ETDM) Programming Screen and accepted by FHWA on December 12, 2013. The purpose of the project is to achieve the following primary goals:

- Improve roadway connection from I-4 to the greater Poinciana area—The majority of the Poinciana area's residents are employed in Orange County. Therefore, a new connection to I-4 will provide an alternative route to jobs and employment centers.
- Enhance mobility—Due to the anticipated population and employment growth in the study area, the proposed facility will play a critical role in accommodating travel demands and improving the movement of goods and people.
- Improve overall traffic operations—The proposed facility would relieve congestion on local roads by separating local and regional traffic.
- Promote regional system linkage—The proposed facility is identified in MetroPlan Orlando's 2030 Long-Range Transportation Plan (MetroPlan Orlando, 2009). The proposed I-4 Connector is part of a planned limited access, high-speed toll facility identified in the OCX Master Plan to serve the Osceola County's urban growth area.

Secondary objectives for the project include desirable features that support the purpose of the project. The secondary objectives are to support economic development and enhance emergency response and evacuation. The final purpose and need will be revised based on the travel demand forecasting and will be presented in the ACER.

2. Goals and Objectives of the Alternative Corridor Evaluation

The purpose of the ACE is to document and link planning activities for use in the NEPA environmental analysis in accordance with the Planning and Environment Linkages described in Moving Ahead for Progress in the 21st Century (MAP-21; P.L. 112-141; H.R. 4348). The goals of the ACE are to address ETAT comments and eliminate unreasonable corridors based on factors such as not meeting the purpose and need, travel demand, and disproportionate and/or significant impacts.

2.1 Status in Project Delivery

The ETDM Programming Screen was initiated on September 6, 2013 (ETDM No. 13957, Poinciana Parkway I-4 Segment, https://etdmpub.fla-etat.org). As shown in Exhibit 1, six initial corridors were developed for the purpose of the ETDM Programming Screen. The ETDM Programming Screen review period was extended to allow for additional agency review and was closed on November 20, 2013. An additional extension was granted for the FHWA. Agency representatives input regarding the initial corridors completed the review in December 2013. Before the ETDM Programming Screen, a webinar was held on August 21, 2013, to inform the ETAT members of the project purpose and need, initial corridors to be screened, and a high-level overview of the social, cultural, natural, and physical environments.

The six initial corridors entered in the ETDM Programming Screen were developed using land suitability mapping (LSM). Using the geographic information system (GIS)-based environmental screening tool (EST), the initial corridors were 1,400 feet wide. The corridors were initially developed at a width of 400 feet and, therefore, the impacts were quantified in the EST at a minimum of 1,400 feet (400-foot-wide corridors with a 500-foot buffer distance on each side of the corridor). These initial corridors are the starting point for the ACE process. No additional corridors were identified in the ETDM Programming Screen.

The project purpose and need was screened in the ETDM Programming Screen and accepted by FHWA on December 11, 2013. The purpose and need will be updated to reflect new information regarding traffic analysis and the Poinciana Parkway Design/Build Project (described in Section 1.2).

The draft MM was distributed for ETAT review on June 3, 2014. ETAT members were given until July 18, 2014 to provide comments. The ETAT comments were reviewed, considered, and incorporated into this Revised MM and into the ACE process, as feasible. In coordination with the FHWA), meetings were held on April 23, 2014, between the FDOT and U.S. Fish and Wildlife Service (USFWS) and U.S. Army Corps of Engineers (USACE) to initiate the Dispute Resolution process. Upcoming opportunities for public and agency input include a second Agency Project Advisory Group (APAG) meeting and the second public meeting.

2.2 Intent of Study

The ACE process, as defined in the FDOT's PD&E Manual Part 2, Chapter 6 (FDOT, 2013) and ETDM Manual (FDOT, 2006) meets the intent of the code of Federal Regulations (CFR), Title 23, Part 450 (Planning Regulations) and United State Code (USC) Title 23, Part 168 (Integration of Planning and Environmental Review). The intent of this study is to link planning decisions so they can be directly incorporated into the NEPA process.

2.3 Identify the Decision Points and Milestones

This Revised MM is included in the republished Preliminary Programming Screen Report. The Revised MM and ACE will be documented in the ACER, which will be referenced in the NEPA document. The results of the ACE will determine which corridors are considered unreasonable and should be eliminated

from further study. FHWA, the lead federal agency, then adopts the ACER, which is to be approved by FDOT (per 23 USC 168).

Recommendations made will be recorded in the EST and published in the Final Programming Screen Summary Report for use in the NEPA phase. The PD&E Study will analyze reasonable alternatives that meet the project purpose and need to satisfy federal requirements associated with NEPA.

3. Alternative Corridor Evaluation Methodology

3.1 Data Collection

The data used to further evaluate a corridor's social, cultural, natural, and physical environmental impacts will be derived from GIS, literature, and field reviews where appropriate, and ETAT comments. Various GIS databases within the Florida Geographical Data Library (FGDL), South Florida Water Management District (SFWMD), Southwest Florida Water Management District (SWFWMD), and City and County data sources will be utilized. In addition, field and literature reviews will be performed to verify corridor constraints. A preliminary list of GIS data layers that may be used in the assessment of the project study area is provided in Table 1.

GIS Layer	Source (Year)
Social Layers	
Airports	FGDL (2012)
Cemeteries	FGDL (2013)
Churches	FGDL (2009)
Development of Regional Impact (DRI)	FGDL (2009); Osceola County; Polk County
Fire Stations	FGDL (2013); Osceola County; Polk County
Government Buildings	FGDL (2013)
High-Density Residential	SFWMD, SWFWMD, FGDL (2012)
Hospitals	FGDL (2013); Osceola County; Polk County
Law Enforcement	FGDL (2012)
Medium Density Residential	SFWMD, SWFWMD, FGDL (2012)
Planned Unit Development (PUD)	FGDL (2009); Osceola County; Polk County
Schools	FGDL (2012); Osceola County; Polk County
Cultural Layers	
State Parks	FGDL (2011)
FFWCC Managed Lands	FGDL (2010)
Greenways	FGDL (2012); Osceola County; Polk County
Historical Sites	FGDL (2013); Osceola County; Polk County
Indian Parcels	FGDL (2008)
Local Parks	Osceola County; Polk County

TABLE 1 Potential GIS Layers

GIS Layer	Source (Year)
Managed Lands	Florida Natural Area Inventory (FNAI)
Military Lands	FGDL (2010)
Parks and Zones	FGDL (2011); FDEP (2011), SFWMD, SWFWMD
SHPO Structures	FGDL (2013)
SHPO Bridges	FGDL (2013)
SHPO Cemeteries	FGDL (2013)
Florida Site File Archaeological or Historic Sites	FGDL (2013)
Florida Site File Resources Groups	FGDL (2013)
National Register of Historic Places	FGDL (2013)
SWFWMD Lands	SWFWMD, FGDL
SFWMD Lands	SFWMD, FGDL
Wildlife Management Areas	FGDL (2013)
Natural Environment Layers	
Aquatic Preserves	FGDL (2011)
Bear Nuisance	FFWCC
Class 1 Waters	FDEP
Eagle Nests	FFWCC
FDEP Mitigation Banks	SWFWMD; FDEP (2013)
Floodways	FEMA (2013)
Native Scrub	FFWCC
Outstanding Florida Waters (OFW)	FDEP (2011)
Protected Species (multiple layers)	FFWCC
Rookeries	FFWCC
Water Features	SFWMD, SWFWMD, FGDL
Wetlands	FFWCC NWI, SFWMD, SWFWMD, FGDL
Physical Environment Layers	
Brownfields (EPA/FDEP)	FGDL (2013), FDEP
Electrical Power Facilities	FDEP (2011), USEPA (2014)
EPA Pollutant Sites (air, water, RCRA)	FGDL (2011)
Hazardous Materials Sites	FDEP (2013)
Industrial Sites	SFWMD, SWFWMD

TABLE 1 Potential GIS Layers

TABLE 1			
Potential	GIS	Lav	/ers

	GIS Layer	Source (Year)			
Landfills		FGDL (2013)			
Nuclear Sit	res	FDEP (2011)			
Oil and Ga	s Storage	SFWMD, SWFWMD, FDEP (2014)			
Petroleum	Contaminated Sites	FGDL (2013); FDEP (2013)			
Power Plar	nts	Osceola County; Polk County			
Sewer Trea	atment Plants	FDEP (2013); SFWMD, SWFWMD; Osceola County; Polk County			
Sinkholes		FDEP (2004)			
Solid Wast	e Facilities	FGDL (2013)			
Superfund	Sites	FGDL (2012)			
TECO Peop	ole's Gas	Polk County			
Water Trea	atment Plants	FGDL			
Well Field	Protection Zones	Osceola County; Polk County			
Wellhead Protection Zones		Osceola County; Polk County			
EPA FDEP FEMA FFWCC	U.S. Environmental Protection Agency Florida Department of Environmental Protection Federal Emergency Management Agency Florida Fish and Wildlife Conservation Commission				

FGDL Florida Geographical Data Library

NWI National Wetlands Inventory

RCRA Resource Conservation and Recovery Act

SFWMD South Florida Water Management District

SHPO State Historic Preservation Office

SWFWMD Southwest Florida Water Management District

3.2 Identifying Corridor Constraints

The GIS data will be used to identify those corridors that avoid and minimize impacts to sensitive environmental features to the extent possible. The attached series of maps (Exhibits 2, 3, 4, and 5) feature specific database categories showing social, cultural, natural, and physical data. Based on ETAT commentary, several features were identified as important considerations, including, but is not limited to wetland impacts; wildlife crossings; potential Section 4(f) involvement (Lake Marion Creek Management Area Trail, Upper Lakes Basin Watershed Trail, Lake Marion Creek Wildlife Management Area, Lake Wales Ridge Ecosystem Florida Forever BOT Project, Lake Hatchineha Watershed Florida Forever BOT Project, Upper Lakes Basin Watershed, and Lake Wales Ridge National Wildlife Refuge); habitat fragmentation; and water quality impacts.

3.3 Identifying Potential Corridors

Potential corridors were developed that provide a 425-foot width shown in Exhibit 1, based on the following:

- The OCX Master Plan limited access expressway with adjacent corridors for transit and a potential multiuse trail
- Conforming to geometric design criteria and minimize impacts to the identified sociocultural, natural, and physical features
- Preliminary considerations for the anticipated typical section, which will provide for a more accurate representation of potential impacts (social, cultural, natural and physical)

An additional 26 feet was added to allow for flexibility in developing alignments within the corridor. The typical section of the corridor is shown on Exhibit 6. The corridor width varies at interchange locations. Corridors were also refined to avoid publicly owned conservation lands or mitigation banks based on ETAT comments.

3.4 Corridor Analysis and Evaluation Criteria

Corridors will be assessed using project-specific criteria developed as a result of ETAT comments and public input received during the ETDM Programming Screen and the initial scoping activities. The evaluation criteria allow for the comparative assessment of the corridor alternatives. The corridors will be evaluated based on consideration of meeting the project purpose and need, avoidance and minimization of potential impacts to environmental resources, engineering feasibility, a narrative assessment of the corridors, and agency and public input. The analysis and assessment for each of these factors are described below.

3.4.1 Purpose and Needs Evaluation

The purpose and need evaluation assesses how well each corridor satisfies the project purpose and need. For a corridor to meet the project purpose and need, it would need to provide an enhanced connection as compared with the No Build (or No Action) Alternative. The need for enhancement is related to unsatisfactory future operating conditions to be determined in the traffic analysis. In addition, each corridor will be evaluated for regional connectivity, emergency evacuation, and support of economic development. Table 2 below describes the screening criteria related to purpose and need.

3.4.2 Environmental Evaluation

The potential direct, indirect, and cumulative effects on the environment will be considered for each corridor. Table 3 provides a matrix evaluation table that will be populated with data using the GIS layers identified in Table 1 and the corridor shapes for the corridors shown in Exhibit 1. Quantifiable values for social, cultural, natural, and physical environment will be shown in the matrix evaluation table. Nonquantifiable factors will be given a likelihood of impact rating. Corridors with a high density of environmental constraints will be considered to be more likely to involve environmental impacts than those with areas containing a relatively low density of sensitive resources.

		Primary Objectives			Secondary Objectives		
Corridor	Description	Improved connection from I-4 to Poinciana ¹	Enhance Mobility of People and Goods ²	Improved Traffic Operations ³	Promote regional system linkage ⁴	Support Economic Development ⁵	Enhance Emergency and Evacuation ⁶
1	World Drive						
2	S.R. 429						
3	C.R. 532						
4	C.R. 54 /Loughman Road						
5	Ernie Caldwell						
6	Cypress Parkway						
Notes: yes	Notes: yes = highest benefit; moderate = neutral benefit; no = unsatisfactory						
¹ Based on ² Based on	¹ Based on time of travel estimates derived from the project traffic model and corridor length ² Based on typical section design speed, high speed facility, strategic intermodal system criteria						

TABLE 2 Purpose and Need Screening Criteria

³ Based on project traffic model

⁴ Based on planning consistency and intermodal connectivity

⁵ Maximum satisfaction occurs with improved connectivity to I-4

⁶Based on access, safety and design measures

C.R. County Road

I-4 Interstate 4

S.R. State Route

TABLE 3 Environmental Evaluation Criteria

				Pot	ential	Corrid	ors	
Category	Evaluation Criteria	Unit of Measure	1	2	3	4	5	6
Social	Residential Parcels	Number of parcels						
	Nonresidential Parcels	Number of parcels						
	Property Owners	Number of owners						
	Potential Displacements	Number of parcels						
	Community Facilities	Number of sites						
	Parks and Recreational Facilities	Acres						
	Neighborhoods	Number of existing communities						
	Community Cohesion	Effects to residential connectivity and social interaction						
	Socioeconomic Impact to special populations	Potential for disproportionate impacts						

TABLE 3

Environmental Evaluation Criteria

				Pot	ential	Corrid	ors	
Category	Evaluation Criteria	Unit of Measure	1	2	3	4	5	6
Cultural	Potential Section 106 Resources	Number of affected historic and archaeological resources						
	Section 4(f) Conservation Lands	Acres (existing)						
	Approved Conservation Lands	Acres (future acquisition)						
Natural	Wetlands							
	Forested wetlands	Acres 1						
	Nonforested wetlands	Acres						
	Water features	Acres						
	Flood Hazard Areas	Acres						
	Threatened and Endangered Species							
	Integrated Wildlife Habitat Ranking	L/M/H ²						
	Xeric soil Habitat (sand skinks, gopher tortoise)	Acres						
	Scrub-jay Habitat	Acres						
	Eagle Nest Buffer Zones	Yes/No						
	Wood Stork Core Foraging Areas near study area	Yes/No						
	Mitigation Banks/Public Lands/Conservation Easements	Acres						
	Conservation easement within Reedy Creek Improvement District	Acres						
Physical	Floodplain	Acres (percentage of corridor acreage)						
	Potential Contamination Sites	Number of sites						
	Noise	Number of impacted noise sensitive sites						
	Railroad involvement	Number of potential crossings						

Notes:

¹ Acres are based on a corridor width of 425 feet

² Low = ranking 0 to 3; Medium = ranking 4 to 7; High = ranking 8 to 10 (to be determined)

3.4.3 Engineering Considerations

The engineering considerations used to screen corridors are listed in Table 4. Engineering factors such as utility conflicts, right-of-way needs, interchange spacing, and the effect of the corridors on adjacent roadways, such as I-4 or the proposed Central Polk Parkway, are included. Drainage issues may not be able to be measured; for instance, a corridor may either be located in an area with flooding issues or it may not. Those corridors with technical feasibility concerns are likely to have high construction costs. Construction costs will be based on general FDOT long-range estimates for roadway and structures using the length of the project and the four-lane typical section shown in Exhibit 6. The typical section in Exhibit 6 shows a limited access expressway conforming to strategic intermodal system (SIS) design criteria for a 70-miles-per-hour design speed and includes a multiuse trail and a transit corridor. Roadway and structures cost estimates will provide provision for transit and trail components. Wetland mitigation costs will be based on typical mitigation bank credit costs. Due to the extensive scope of work required to estimate drainage and right-of-way costs for all of the corridor alternatives (in excess of 1,000 parcels), and as these costs may not be a major engineering consideration for comparative purposes, FDOT will provide drainage and right-of-way cost estimates during the PD&E phase.

Enginee	ering Screening Criteria						
Corridor	Description	Construction Costs	Major Utility Conflicts	Right-of-way Needs	Drainage Issues	Interchange Spacing	Effects to Traffic Operations on I-4 or proposed Central Polk Parkway
1	World Drive						
2	S.R. 429						
3	C.R. 532						
4	C.R. 54/ Loughman Road						
5	Ernie Caldwell						
6	Cypress Parkway						

TABLE 4 Engineering Screening Criteria

3.4.4 Narrative of Assessment

Based on the corridor evaluations described above, a narrative discussion and assessment of each corridor will be prepared in compliance with elements and issues contained in 23 USC 168(c). This narrative will discuss the affected environment and advantages and limitations of each corridor and highlight any specific factors that may result in an unreasonable corridor. Public and agency input (consideration of input received from the ETAT, Agency Project Advisory Group [APAG], project stakeholders and the general public) will be summarized in the narrative.

3.4.5 Public and Agency Considerations

Public, agency, and ETAT members input received during the ETDM Programming Screen will be used to refine the project purpose and need, corridor constraints, and evaluation criteria to evaluate the corridors. A complete description of the opportunities for public input into the corridor evaluation

process is in Section 4. The results documented in the ACER will be made available to the stakeholders through the EST for a 30-calendar-day period. If meetings are needed to explain the results of the ACER, then they will be scheduled as necessary. Notification of the public meetings will be distributed to all individuals on the project mailing list, including local officials, agencies and appropriate Native American tribes, stakeholders, special interest groups, and property owners within the affected study area.

3.5 Approach to Eliminating Unreasonable Alternatives

Any corridor that does not meet the project purpose and need is considered unreasonable and will be eliminated from further consideration. The corridors considered reasonable for detailed study as a result of the purpose and need evaluation will be compared using the evaluation criteria described in Section 3.4. The corridor evaluation will involve both quantitative and qualitative comparisons of the evaluation criteria. The comparative analysis will include rating the following:

- Environmental impacts and construction cost estimates—quantitative
- Engineering factors (technical feasibility)—qualitative
- Narrative assessment (advantages and limitations)—qualitative

This rating process is discussed further in Sections 3.5.1 and 3.5.2. Upon completion of this assessment and FHWA approval, remaining reasonable corridors will be carried forward in the PD&E Study.

The PD&E Study project documentation will be prepared in accordance with the PD&E Manual and will, therefore, be in compliance with all applicable state and federal laws, executive orders, and regulations. In compliance with the ETDM Master Agreement (FDOT, 2003a), agency involvement regarding project needs, issues, evaluation criteria, avoidance, minimization, decisions, and preliminary mitigation concepts will be a continuous effort throughout the ETDM and ACE processes. The evaluation criteria and units of measure used to evaluate and compare alternatives will include resources issues that are consistent and acceptable to each respective resource agency. The ACE process ensures that all alternatives are evaluated consistently.

3.5.1 Environmental Impacts and Construction Costs

The evaluation process includes developing an evaluation matrix to facilitate comparison of corridors. The evaluation matrix will identify the buffer width used, quantify potential impacts, and list the source of the data. The potential impacts for each criterion will be provided for the entire corridor and summarized in a matrix similar to Table 5. For each evaluation criteria, a comparison will be made using a standard deviation method to compare corridors 1 through 6. Red will be assigned to potential impacts greater than one standard deviation above the mean, yellow will be assigned to evaluation criteria within one standard deviation of the mean, and green will be assigned to evaluation criteria with zero or greater than one standard deviation below the mean. Potential impacts of each corridor will be assigned a color code and number based on the standard deviation for the evaluation criteria results. Red indicates that the potential impacts are substantially higher than average when compared to the other alternatives. Green indicates that the potential impacts are substantially lower than average when compared to the other alternatives. For each evaluation category, the total score is based on summing the individual criteria rankings.

3.5.2 Summary of Corridor Ratings

The evaluation factors will be summarized in a format similar to Table 6, including the ratings from the environmental impact and cost rating summary (quantitative data) and ratings from the engineering, public, and agency input (qualitative data).

Example of C									
Evaluation	Buffer Width	Measurement				Altern	atives		
Criteria	Centerline)	Screening Buffer	Source	1	2	3	4	5	6
Recreational Lands (Parks)	200	Number of Parks	University of Florida GeoPlan Parcel-Derived Parks						

TABLE 5 Example of Comparative Matrix for Environmental Impacts & Costs

TABLE 6 Corridor Evaluation Summary

			Purnose and	Evaluation	Recommended	
Corridor	Location	Existing I-4 Access	Need Satisfaction	Environmental Impacts	Engineering Factors	for Further Consideration
1	New	World Drive				
2	New	S.R. 429				
3	C.R. 532	C.R. 532				
4	C.R. 54	None				
5	New	None				
6	Cypress	None				
C R	County Road					

C.R. County Road

I-4 Interstate 4

S.R. State Route

3.6 Alternative Corridor Evaluation Report

The results of the analysis described above will be summarized in a Final ACER. This report will be submitted to the ETAT and interested stakeholders through the EST for 30-calendar day period. Once comments are addressed, a corridor public workshop will be held to allow the public and agencies to provide input.

The appropriate decision making matrices (i.e., the evaluation matrices similar to Tables 2, 3, and 4 and a corridor evaluation summary similar to Table 6) will be included in the ACER to substantiate findings, and provide the reasons for eliminating corridors, and identify corridors that will be carried forward into the PD&E phase. The ACER will be included in the republished Preliminary Programming Screen Report. The NEPA class of action determination (i.e., Environmental Assessment or Environmental Impact Statement), degree of effect, summary of public comments, and dispute resolution issues will be addressed in the Preliminary Programming Screen Report.

4. Opportunities for Agency and Public Input

Continuous public outreach during the initial stages of the project has and will be used to engage stakeholders to identify community values and concerns that may affect corridor development and evaluation. Table 7 lists the public and agency events that were conducted to date; Table 8 summarizes ETAT comments; and Table 9 summarizes near-term outreach that will occur in conjunction with, and following, the MM/ACER process.

Item	Description	Date
Webinar with ETAT	The webinar introduced the project and provided an opportunity for input into the project's purpose and need and on the initial corridors.	August 21, 2013
AN Package	The AN Package was sent to the State Clearing House (Florida Department of Environmental Protection), participating agencies, nonparticipating agencies and organizations, and special interest groups electronically and via hard copies to agencies as requested. The AN Package is also on the ETDM public access site at https://etdmpub.fla-etat.org.	January 8, 2014
Project Website: www.i4PoincianaConnector.com	The Website includes meeting information and report summaries that will be available for viewing and downloading and provides opportunity for public comment. The website is updated monthly and on an as-need basis.	September 13, 2013
First APAG Meeting	The APAG consists of representatives from The Nature Conservancy, Audubon Society, Sierra Club, Reedy Creek Improvement District, ETAT members, FDOT District One and Five, OCX, Osceola County, Walt Disney World, Florida's Turnpike Enterprise, water management districts, community groups, and others. The members of the APAG are anticipated to meet biannually and will receive monthly status e-mail updates.	October 30, 2013
ETDM Comments	The most significant degrees of effect for each issue category, the ETAT organization that provided that comment, and draft responses are summarized in Table 8.	From September to November 2013
Public Meetings	Two public meetings were held: one at the Providence Golf Club in Davenport and one at the Association of Poinciana Villages Community Center in Poinciana. These meetings were scheduled to inform local officials and the general public of the potential corridors being brought to the area	December 10 and 12, 2013
AN Advance Notification	Group	

TABLE 7 Public and Agency Coordination Conducted to Date

APAG Agency Project Advisory Group

ETAT Environmental Technical Advisory Team

ETDM Efficient Transportation Decision Making

FDOT Florida Department of Transportation

OCX Osceola County Expressway Authority

Issue	Degree of Effect	Organization	FDOT Responses to ETAT Comments
Land Use Changes	None	Florida DEO	Planning consistency will be coordinated and documented during the PD&E Study including coordination with Polk and Osceola Counties.
Social	Minimal	EPA	A sociocultural effect evaluation will be prepared during the PD&E Study.
Farmlands	Minimal to Moderate	NRCS	Direct and indirect effects of the project on farmlands and listed species that utilize farmlands will be evaluated.
Economic	None	Florida DEO	Effects of the project alternatives on the area's economy will be evaluated in a sociocultural effects study as part of the PD&E Study.
Historic and Archaeological Sites	Moderate	Seminole Tribe of Florida; Florida DOS	A cultural resources assessment survey (CRAS) will be prepared during the PD&E Study and provided to the affected tribes. Impacts to archaeological sites will be minimized and avoided to the greatest extent practicable.
Recreation Areas	Substantial	FDEP; EPA	Section 4(f) applicability will be evaluated during the study. Impacts to Section 4(f) resources will be minimized and avoided to the greatest extent practicable. An evaluation will be performed to analyze any direct or constructive use of these resources. Section 6(f) potential will be coordinated with.
Wetlands	Moderate to Dispute Resolution	SFWMD; SWFWMD; USACE; USFWS	Wetland impacts will be avoided and minimized to the greatest extent practicable. Based on the ACE and ETAT input, unreasonable alternatives may be eliminated from further consideration. Wetlands within the project area will be delineated and functional analyses will be performed for viable alternatives during the PD&E Study.
Water Quality and Quantity	Moderate to Substantial	SFWMD; SWFWMD; EPA	Impacts to water quality and quantity will be avoided through pollutant treatment of proposed and existing roadways within the impacted basins.
Floodplains	Moderate to Substantial	SFWMD; SWFWMD; EPA	Floodplain impacts will be avoided and minimized to the greatest extend practicable. Compensation will be provided for unavoidable loss of floodplain volume and conveyance structures will be sized to prevent an increase in flood elevations.
Wildlife and Habitat	Moderate to Dispute Resolution	SFWMD; SWFWMD; USFWS	Impacts to mitigation banks will be avoided and minimized to the greatest extent practicable. Wildlife surveys for the biological assessment to be conducted during the PD&E Study will evaluate the presence of listed species and their habitat and evaluate potential impacts. Impacts to listed species and their habitats will be avoided and minimized to the greatest extent practicable. Based on the ACE evaluation and ETAT input, unreasonable alternatives may be eliminated from further consideration. The proposed Central Polk Parkway is an integral part of this project. The interrelationship of the two projects will be addressed as part of the purpose and need discussion in the ACER.
Coastal and Marine	None	SWFWMD	There will be no involvement with coastal or marine resources.

TABLE 8 Summary of ETAT Comments (ETDM No. 13957)

Issue	Degree of Effect	Organization	FDOT Responses to ETAT Comments
Air Quality	Minimal	EPA	The proposed project is expected to have minimal impact on air quality. The project is located in an attainment area; therefore, an air quality screening analysis will likely not be necessary.
Contamination	Minimal to Moderate	EPA; FDEP; SWFWMD	A contamination screening evaluation report will be prepared during the PD&E Study.
Infrastructure	None to Moderate	SWFWMD	Any public land corner or benchmark within the limits of construction will be protected. The SWFWMD's Data Collection Bureau (Brooksville) will be informed of potential impacts during the design phase. Preapplication file PA#400506 will be referenced.
Navigation	None	USACE	There will be no involvement with navigable waterways within the project limits.
Special Designations	None to Substantial	EPA; SWFWMD	Section 4(f) applicability will be evaluated during the study. Impacts to Section 4(f) resources will be minimized and avoided to the greatest extent practicable. An evaluation will be performed to analyze any direct or constructive use of these resources. An evaluation of Prime Farmland, Save Our Rivers Lands, and Sole Source Aquifers will be included in the PD&E Study.
Indirect and Cumulative Effects	Varies by resource	Multiple agencies	Opportunities to avoid and or minimize impacts and fragmentation to environmentally sensitive resources will be evaluated and considered to the greatest extent practicable. Future development in the study area could have indirect and cumulative impacts on resources. A cumulative effects analysis will be prepared for the PD&E Study.

TABLE 8 Summary of ETAT Comments (ETDM No. 13957)

Note: Comments from FHWA are not included in this summary.

ACE	Alternative Corridor Evaluation
CRAS	cultural resources assessment survey
DEO	Florida Department of Economic Opportunity
DOS	Florida Department of State
EPA	U.S. Environmental Protection Agency
ETAT	Environmental Technical Advisory Team
ETDM	Efficient Transportation Decision Making
FDEP	Florida Department of Environmental Protection
FDOT	Florida Department of Transportation
FHWA	Federal Highway Administration
NRCS	Natural Resources Conservation Service
PD&E	Project Development and Environment
SFWMD	South Florida Water Management District
SWFWMD	Southwest Florida Water Management District
USACE	U.S. Army Corps of Engineers
USFWS	U.S. Fish and Wildlife Service

Item	Description	Date	
MM Process	The MM will be used as a tool during the Dispute Resolution process and to inform the ETAT and other stakeholders of the revised impacts based on the ACE.	Draft submitted June 2, 2014	
Dispute Resolution	Meetings will be conducted with agencies as part of the Dispute Resolution process but also as requested to discuss the results of methodology.	Ongoing	
Second APAG Meeting	This meeting will be held to discuss the results and recommendations for eliminating unreasonable alternatives.	To be determined	
ACE Alternative Corridor Evaluation			

TABLE 9 **Future Public and Agency Coordination**

ACE Alternative Corridor Evaluation

APAG Agency Project Advisory Group

ETAT **Environmental Technical Advisory Team**

Methodology Memorandum MM

5. Conclusion

In conclusion, the purpose of this Revised ACE MM is to document the ACE methodology to be conducted for the I-4 Poinciana Parkway Connector PD&E Study. The MM details the goals of the evaluation, the methodology, how coordination with stakeholders will occur, and the basis for decisionmaking. The evaluation of the corridors will be detailed in the ACER, and the results will identify the reasonable alternatives for NEPA analysis.

6. Works Cited

Florida Department of Transportation (FDOT). 2013a. Project Development and Environment Manual. Part 2: Analysis and Documentation, Chapter 6: Alternatives. Available at http://www.dot.state.fl.us/emo/pubs/pdeman/pdeman1.shtm. October 16.

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Florida Department of Transportation. 2003a. Master Agreement Implementing the Efficient Transportation Decision Making Process in Florida. Available at http://www.environment.transportation.org/. January 15.

MetroPlan Orlando. 2009. 2030 Long-Range Transportation Plan. Available at http://www.metroplanorlando.com/plans/long-range-transportation-plan/technical-reports/.

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Exhibits

List of Exhibits		
Exhibit Number	Title	
1	Initial Corridors	
2A and 2B	Social Features	
3A and 3B	Cultural Features	
4A and 4B	Natural Features	
5A and 5B	Physical Features	
6	Draft Corridor Typical Section	

Attachments

INITIAL CORRIDORS



NORTH DISPLAY - SOCIAL FEATURES







EXHIBIT 3A





I-4 Poinciana Parkway Connector Project Development and Environment (PD&E) Study

EXHIBIT 4A

SOUTH DISPLAY - NATURAL FEATURES







Corridor Typical Section

- Consistent with OCX Master Plan typical section width
- Proposed 4 lanes are expandable to 6 lanes
- Includes potential future transit
- Use 425-foot wide corridor for analysis

