
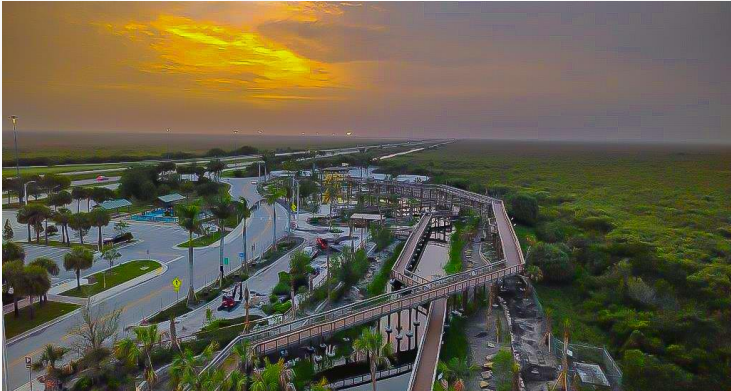


June 19 - 20, 2025  
Hollywood, FL




## I-75 Alligator Alley Rest Area Transformation:

### From a Rest Stop to an Environmental Education Center




Ann Broadwell, District 4  
Kaylee Kildare, District 4

Aaron Wilbur, C&H  
Tyler Furrey, District 4



Transportation Symposium Website



SCAN ME

1

## Presentation Outline



1. Project History
2. Observation Tower/Boardwalk  
Environmental Education and  
Native Vegetation Exhibit
3. Adventures in Construction
4. Recreational Opportunities

**TRANSPORTATION  
SYMPOSIUM**

OVERVIEW

2

2

# Florida Department of Transportation - District 4

## Miles

- 6,016 Lane Miles
- 5,000 Square Miles
- 1,385 Centerline Miles
- **52.4 million miles travelled daily**

## Bridges

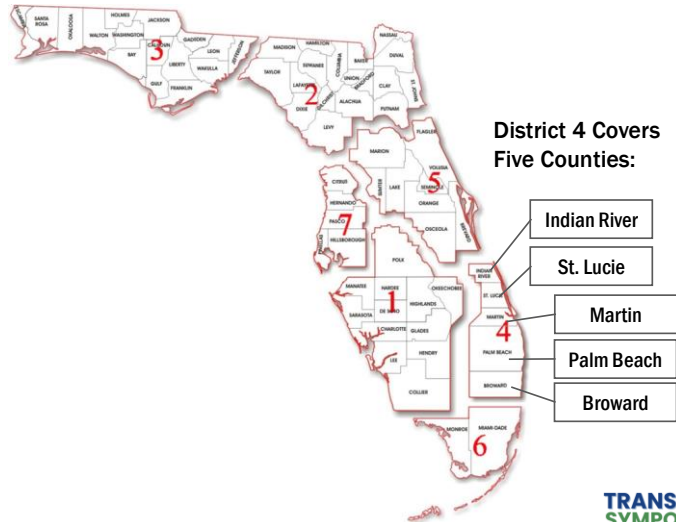
- 663 fixed
- 38 movable

## Population

- **3,615,400 Residents**

## Land, Air, & Sea

- 90 Airports
- 3 Deep Water Ports
- 2 Rail Lines (Freight and Passenger)
- **THE FIRST TUNNEL IN THE STATE**



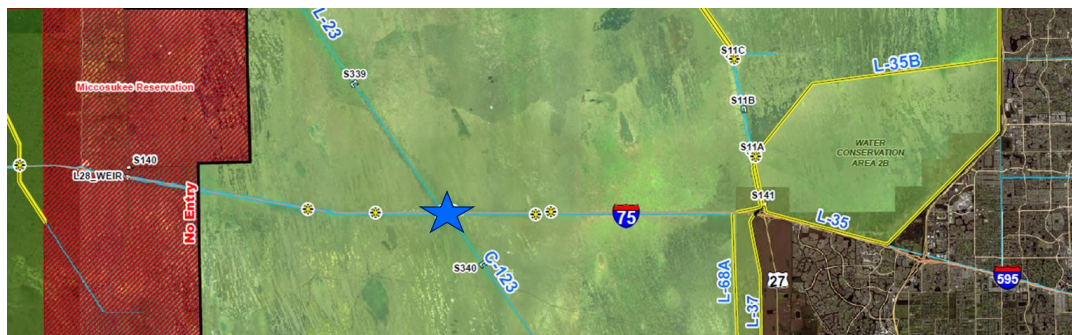
TRANSPORTATION  
SYMPOSIUM

OVERVIEW

3

3

## Project Location



Project is located on the south side of SR 93/ I-75 Alligator Alley  
at Mile Marker 35/ Mile Post 29.910 in Broward County, FL

TRANSPORTATION  
SYMPOSIUM

OVERVIEW

4

4

# Project Timeline



**PROPOSED REST AREA-RECREATIONAL ACCESS FACILITY**

134

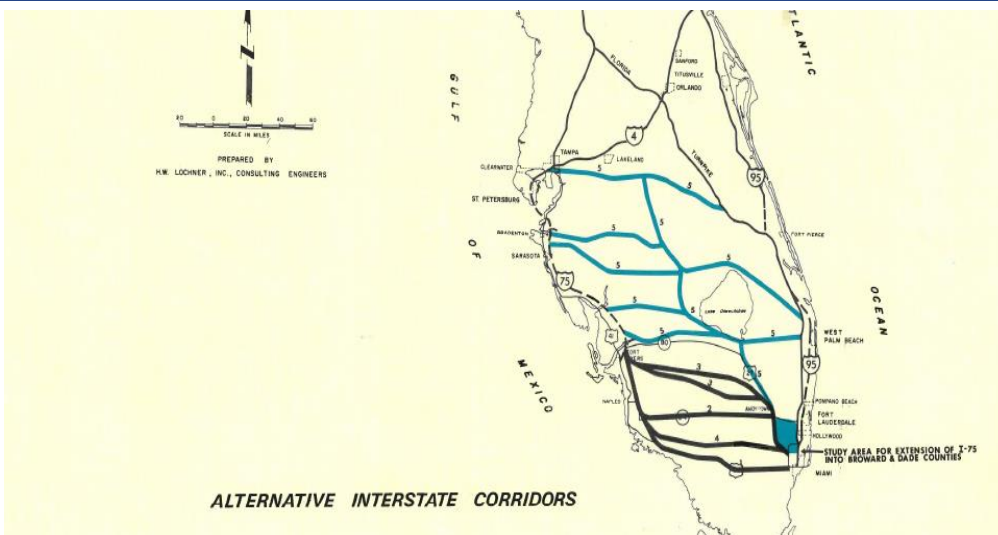
FIGURE 4.9

5

TIMELINE

5

# Project Timeline



**ALTERNATIVE INTERSTATE CORRIDORS**

**TRANSPORTATION  
SYMPOSIUM**

6

TIMELINE

6



# Project Timeline

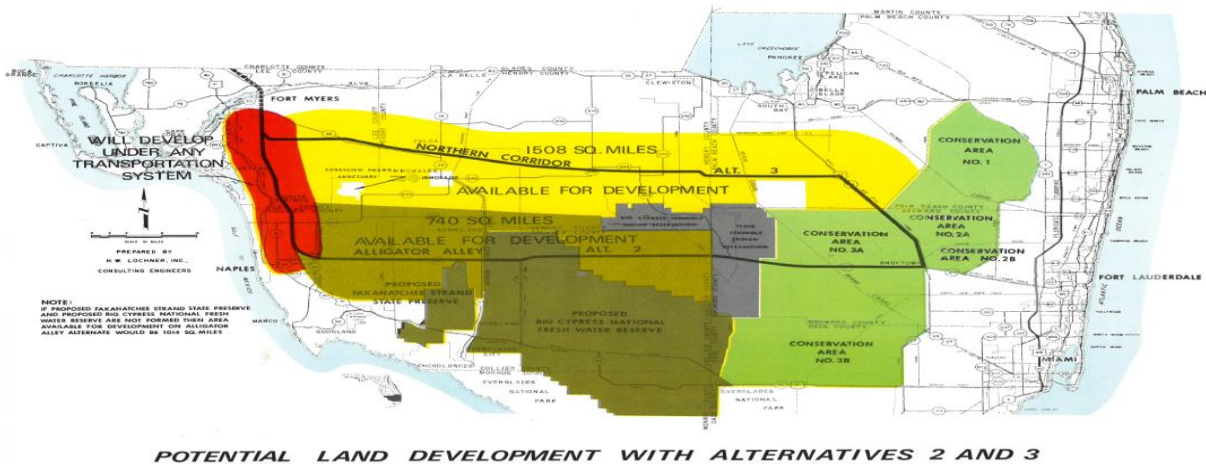


FIGURE 42

93

TIMELINE

7

7

# Project Timeline



Pre-2016

**Phase 1** District Secretary Jim Wolfe, PE  
Educational Panel Installation



2016 - 2024

**Phase 2** Former District 4 Secretary, Gerry O'Reilly, PE's Vision



2024 - Present

**Phase 3** District 4 Secretary Steve Braun, PE  
Ongoing Improvements



Future

**Phase 4** Continued Improvements and Future Vision

**TRANSPORTATION  
SYMPOSIUM**

TIMELINE

8

8

# Environmental Education Panels at REC & Rest Areas

## Project Scope:

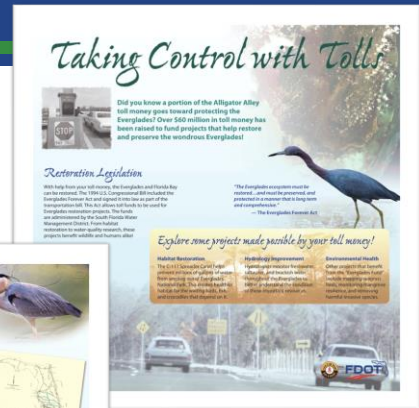
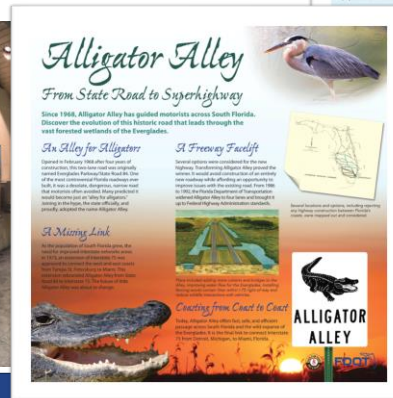
Educational panels, public parking, bathrooms, and a museum with displays from Fish and Wildlife, the Department of Interior, and the Florida Wildlife Conservation Commission and controlled Access areas to the Everglades

## Project Goal:

Educate travelers about the Everglades



PHASE 1



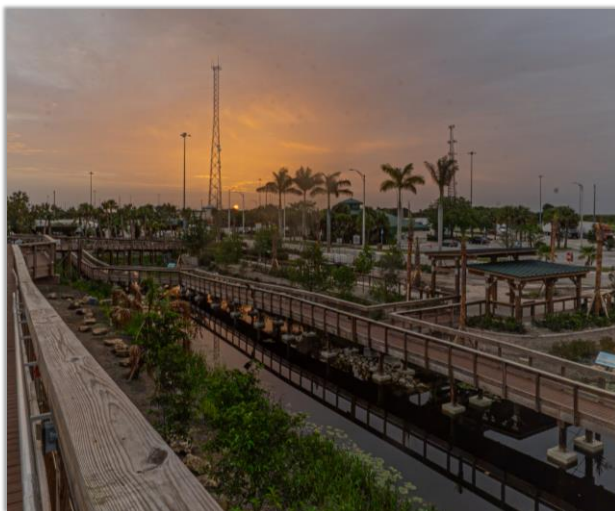
FDOT held a photo contest in the District office to gather artwork, and many of the pictures from the contest were used.

**TRANSPORTATION SYMPOSIUM**

9

9

# Observation Tower, Wetland Exhibit & Alligator Statue



PHASE 2

## Project Goal:

- Under former District 4 secretary, Gerry O' Reilly, the vision was to expand on the environmental education opportunity
- Enhance traveler and user experience at the rest area by constructing environmental educational and recreational themed amenities within the site

## Project Scope:

- Hardscape and landscape improvements consist of educational themed amenities within the site
- Site work reconfiguration of existing parking lots, access roads, drainage structures, utilities, lighting and sidewalks.
- New educational amenities include an observation tower, boardwalks, walkways, wetland exhibits, asphalt trails, pavilions, hardscape (i.e. benches, trash receptacles, drinking fountains), and landscape
- A decorative alligator statue was constructed within environmental educational center limits

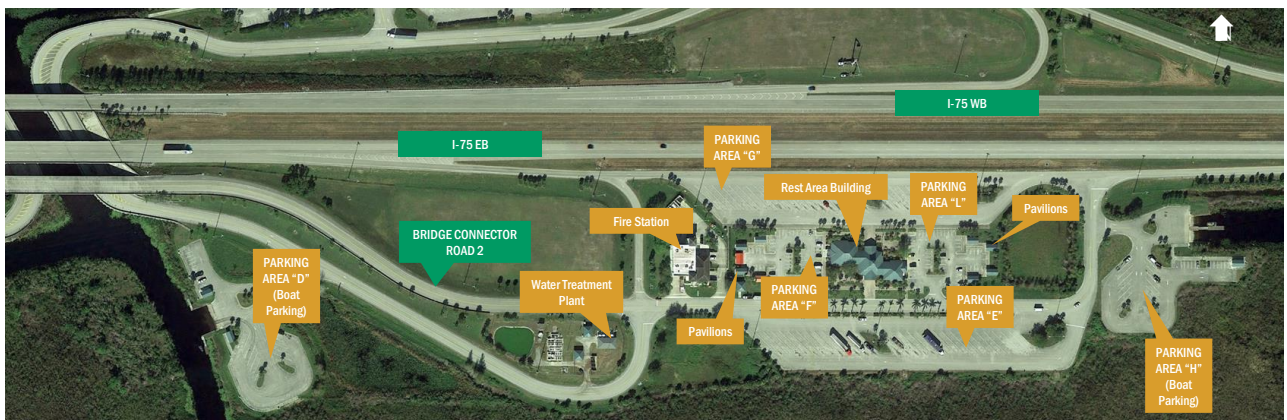
**TRANSPORTATION SYMPOSIUM**

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10



# Master Plan Aerial – Before Construction



- ✓ Main Access Road (2 Lane Two-way Typical Section)
- ✓ Six (6) Existing Parking Lots
  - ✓ Two (2) Truck Parking Areas (E and G) sized for WB-62FL Vehicles

- ✓ Interior Roadways
- ✓ Interior Sidewalks & Walkways
- ✓ Flat Open Grassed Areas
- ✓ Dry Detention Areas

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11

11

# New Site Improvements



- ✓ Modifications to Existing Parking Areas E, F & L
- ✓ Two New Non-Commercial Parking Areas - P & Q
- ✓ One New Truck Parking Area "O" for WB Truck Traffic
  - ✓ 30 Spaces capacity, WB-62FL Design Vehicle

- ✓ Truck parking spaces were not reduced; retained 60 truck parking spots
- ✓ Sidewalk Improvements (@ Parking Area F & L)
- ✓ Site Grading & Drainage Improvements

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12

12

# New Site Improvements



- ✓ Decorative Pavement
- ✓ Roadway/Parking Area Signing & Pavement Markings
- ✓ Parking Area Lighting
- ✓ New Dry Detention Areas for Stormwater Management

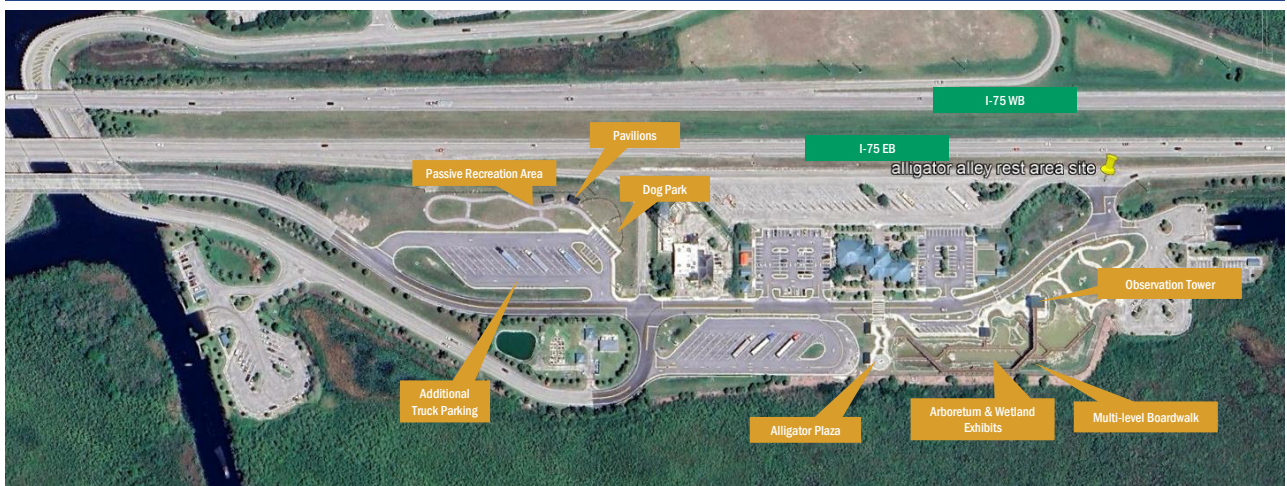
- ✓ New Water Utility Service for Hose Bibs, Water Fountains
- ✓ TPAS Improvements
- ✓ Site Landscaping & Beautification
- ✓ Playground

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13

13

# Master Plan Aerial – After Construction



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14

14



# Master Plan – User Survey



**FDOT**

**Alligator Alley Traveler Questionnaire:**  
Help us create a more enjoyable traveling experience!!!

What day of the week did you stop in? \_\_\_\_\_

What time of day? \_\_\_\_\_

1. What is your main purpose for stopping at the rest area?

- To use the Restroom
- To use the Vending Machines
- To stretch legs/Take a break
- Other (please list) \_\_\_\_\_

2. What is the purpose of your trip along Alligator Alley?

- Business
- Traveling to or from a specific destination for pleasure
- Just a ride to enjoy the outdoors and nature
- Other (please list) \_\_\_\_\_

3. Would you prefer if this rest area offered more recreational and educational activities for travelers to enjoy?

- Yes, both
- Yes, recreational activities
- Yes, educational activities
- No/Indifferent

4. Would you consider utilizing any of the following Recreational/Educational Activities, if they were provided here? (Circle all that apply)

- Shaded walking Trails
- Dog Park
- Open lawn areas with shade trees and picnic tables
- Small Children's Playground
- Older Children's Playground
- Observation Tower, overlooking the Everglades
- Boardwalk into the Everglades
- Shaded Sitting Area with Rocking Chairs
- Biking Trails
- BBO Grills
- Star Gazing
- Farmer's Market
- National American Shapley/Sevens Stand
- Other (please list) \_\_\_\_\_

5. How a great idea? We would love to hear what you think is important!! We want to make this rest stop more usable and enjoyable – the best rest stop in the nation!!

For additional comments or ideas, please feel free to contact Elisabeth Hassett, RLA:  
Elisabeth.Hassett@dot.state.fl.us

2016 User Survey Developed to obtain Data from the traveling public regarding uses they would like to see at the rest area and other information.

3. Would you prefer if this rest area offered more recreational and educational activities for travelers to enjoy?

4. Would you consider using any of the following Recreational / Educational Activities if they were provided here?

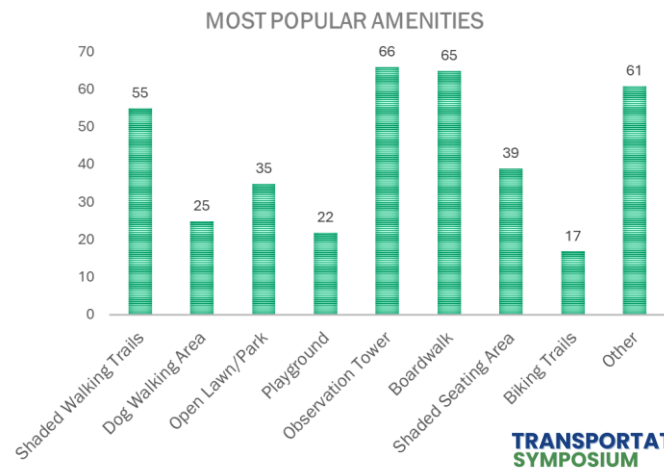
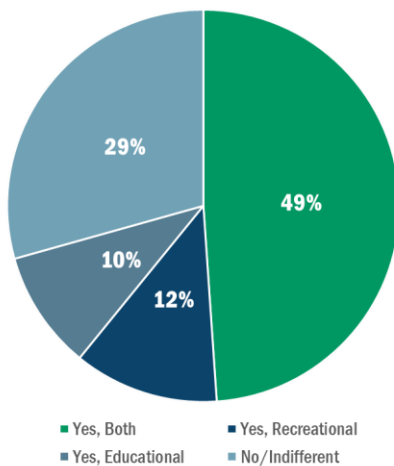
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# Master Plan – Survey Results

✓ **Survey Results** – Helped identify which Amenities were most desired



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16

16

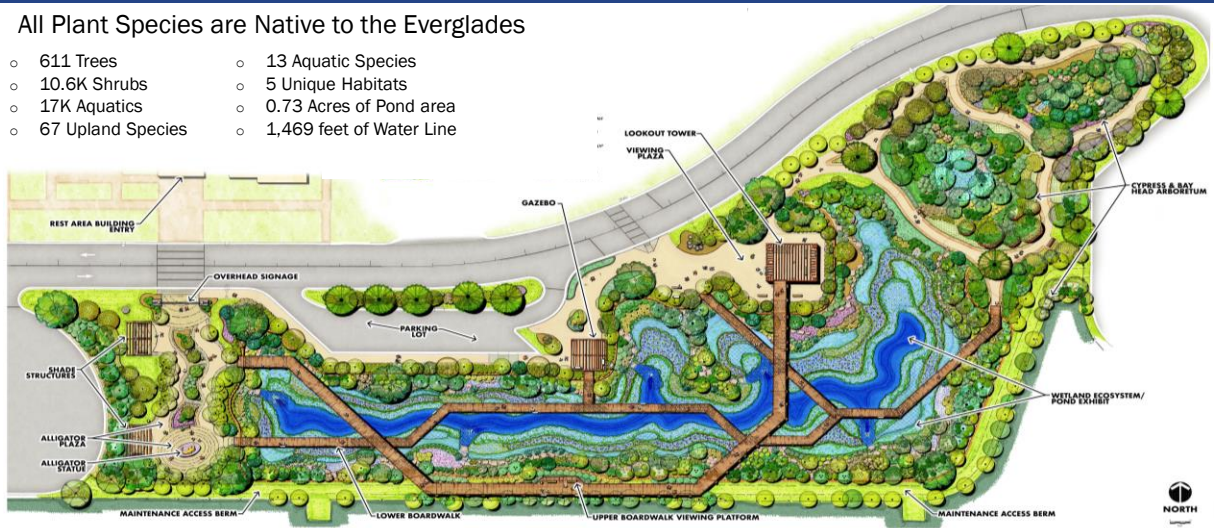




# Wetland/Arboretum Landscape Plan – A "Forest on Steroids"

- All Plant Species are Native to the Everglades

- 611 Trees
- 10.6K Shrubs
- 17K Aquatics
- 67 Upland Species
- 13 Aquatic Species
- 5 Unique Habitats
- 0.73 Acres of Pond area
- 1,469 feet of Water Line

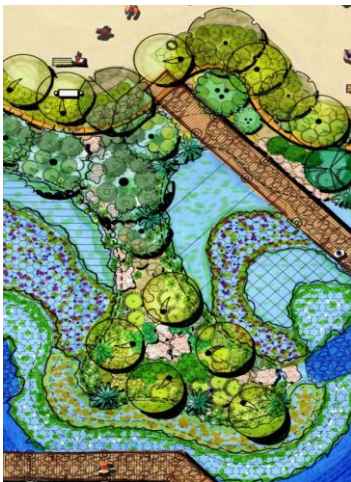


PHASE 2

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## Wetland/Arboretum Landscape Plan – Plan Details



Pond Island/ Peninsula



Alligator Plaza



Cypress Head in the Arboretum

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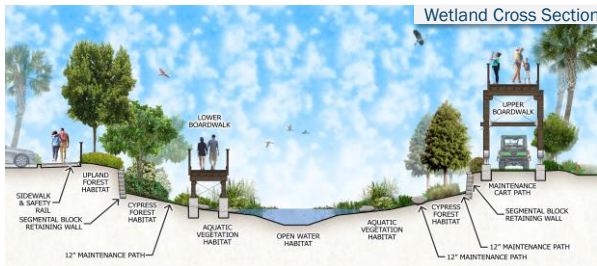
PHASE 2

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20



# Cross Sections



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PHASE 2

21

21

# Habitats and Ecosystems



**Open Water:**  
EL. 3.0 to 5.0

**Aquatic Vegetation:**  
EL. 6.5 to 9.0

**Cypress Forest:**  
EL. 9.0 to 11.0

**Bayhead Forest:**  
EL. 9.5 to 12.0

**Upland Forest:**  
EL. 12.0 to 15.0

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22

22



# Educational Signage

## Plant ID Signs



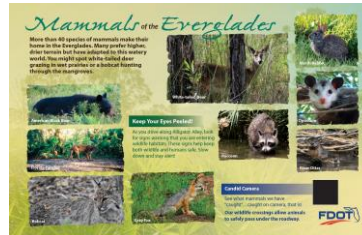
**Bald Cypress**



**Wild Mustie**



**Dwarf Cypripedium**



## Educational Signs

## TRANSPORTATION SYMPOSIUM

23

23

# The Alligator



## TRANSPORTATION SYMPOSIUM

24

24

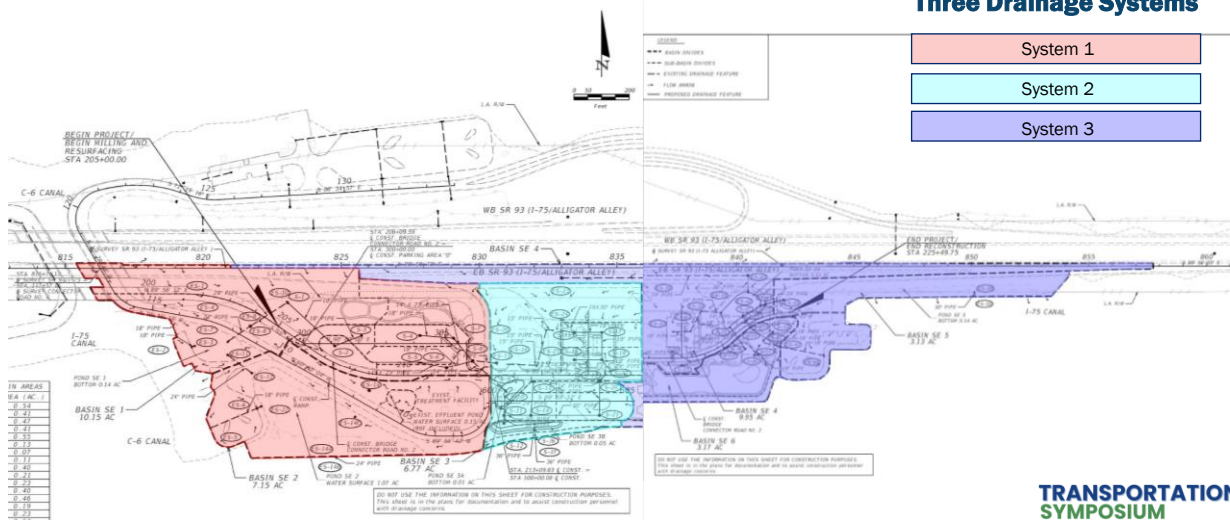
# Site Improvements – Stormwater Management

## Three Drainage Systems

System 1

System 2

System 3



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SYMPOSIUM**

PHASE 2

25

25

# Site Improvements - Stormwater Management



System 1

Stormwater runoff from these areas is collected by existing and new inlets and conveyed to existing Detention Areas SE 1 & SE 2.

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PHASE 2

26

26



## Site Improvements – Stormwater Management



### System 2

Stormwater runoff is collected by existing and new inlets and conveyed to new Dry Retention areas SE 3A and SE 3B.

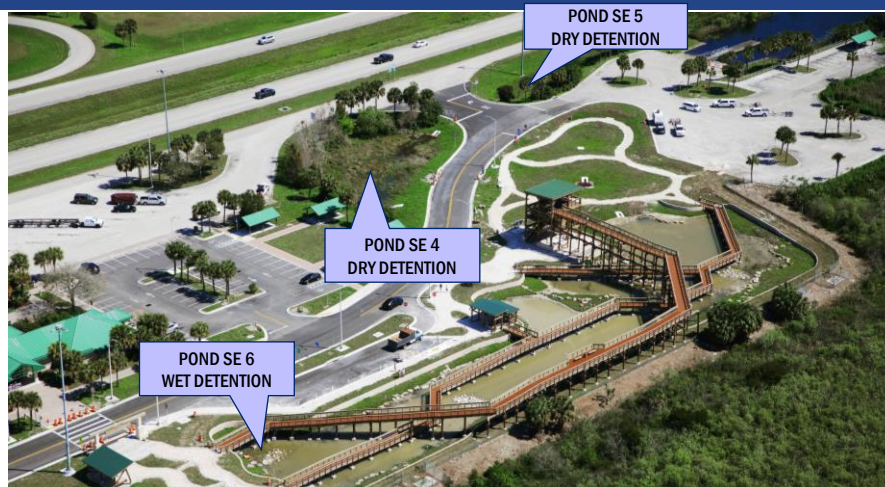
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27

27

## Site Improvements – Stormwater Management



### System 3

Main access road was realigned impacting the existing Dry Retention SE 4. Dry Retention SE 4 was reshaped to fit the new access road

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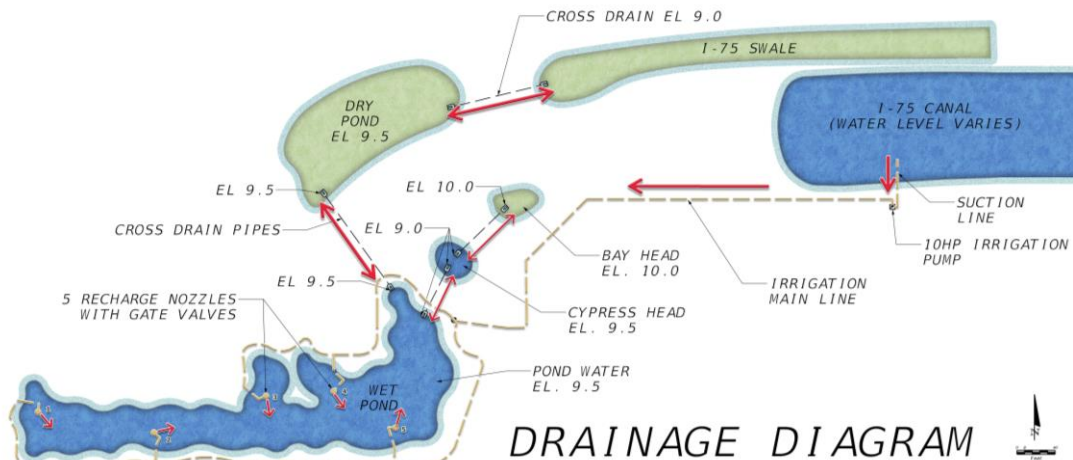
PHASE 2

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28



## Drainage Design within Native Plant Exhibit Area



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29

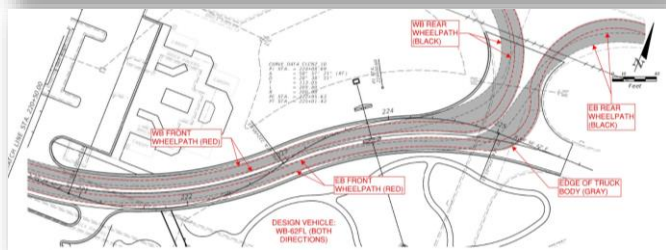
29

## Site Improvements – Vehicular Movement Analysis



### Truck Parking Maneuverability

Vehicle used was a Florida Interstate  
Semitrailer WB-62 FL per FDOT  
Design Manual (FDM) 201.6.2



### Site Access Roadway Maneuverability

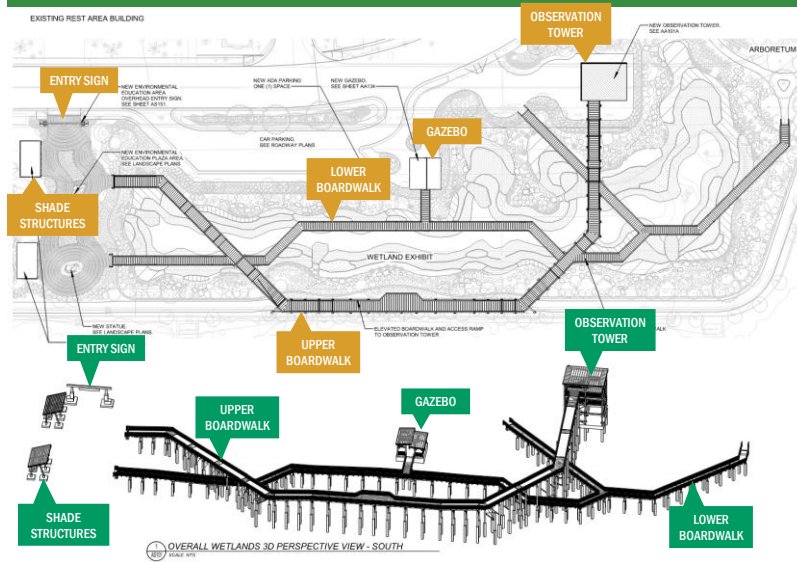
TRANSPORTATION  
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PHASE 2

30

30

# Architecture - Scope and Purpose



## Architectural Scope

- Overhead Entry Sign
- (2) Shade Structures
- Lower Boardwalk
- Upper Boardwalk
- Gazebo
- (2) Picnic Pavilions (not shown)
- Observation Tower

## Architectural Purpose

*Provide the infrastructure to bring visitors to the edge of the Everglades, allowing them to experience a seamless blend of built and natural environments*

- Ensure visitor safety
- Use long-lasting materials
- Design aesthetic that blends in
- Enrich the experience with variety of vantage points

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31

31

# Architecture – Site Overview



Overhead View Looking East



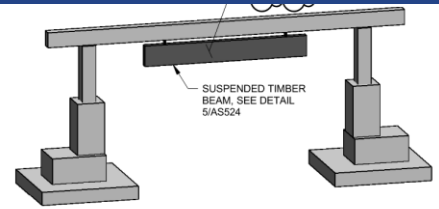
View Looking Southwest

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32

32

## Architecture – Environmental Education Area Entrance Sign



2 ENTRY SIGN - 3D PERSPECTIVE  
AS181 SCALE: NTS

- Monumental entrance with 27 ft span timber beam
- Stepped pilasters with oolite stone cladding
- Visitors walk underneath suspended welcome sign

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33

PHASE 2

33

## Architecture – Boardwalks



View from crossover underpass



View looking down on crossover

- All boardwalks cross each other at 45° angle, offering unique views of structure with pond
- Lower boardwalk allows visitors to engage closely with the Everglades
- Upper boardwalk provides an elevated broader perspective
- Both offer direct interaction with the natural environment

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34

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34



## Architecture - Observation Tower



Roof of observation tower designed with minimal structure interference to maximize view of the Everglades:

- Omitted southeast corner column, cantilevered roof beams
- Knee braces used instead of full height x-braces for remaining columns at this level

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PHASE 2

35

35

## Architecture - Observation Tower



Uninterrupted views of natural beauty of Everglades from 30 ft above the ground

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PHASE 2

36

36

## Architecture - Amenities



Architectural amenities protect visitors from the harsh south Florida sun:

- Roofs provide shade
- Open sides for breeze
- Benches and picnic tables

Unique design features:

- Cantilevers
- Slanted columns
- Overlapping roofs



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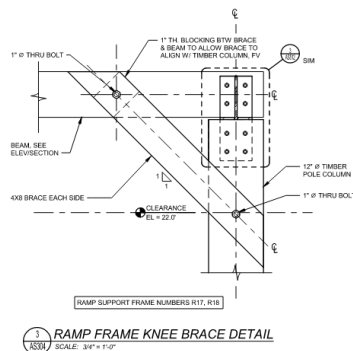
37

37

## Architecture - Maintenance Vehicle Path Innovation



- Challenge: Limited space at south side of property for maintenance
- Solution: Modified structural bracing design to accommodate landscaping maintenance vehicle access
- Utilized during construction phase



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38

38

# Permitting & Approval Jurisdictions



- Florida Department of Transportation
- Broward Sheriff Fire Rescue Station 106
- South Florida Water Management District (SFWMD)
- Florida Department of Environmental Protection (FDEP)
- Broward County Building Department

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SYMPOSIUM

PHASE 2

39

39

# Construction – Contracts

- Roadway/Structures Contract (FPID #437934-2)
  - Reconfigured the existing Rest Area parking lots to accommodate the wetland exhibit
  - Constructed a two-level ADA boardwalk, segmental wall, and a 4-story observation tower
  - Constructed a dog park, asphalt walking trail, and arboretum
  - Installed educational signage, gazebos, and shade structures
  - Improved existing drainage and lighting systems
- Landscaping Contract (FPID #437934-3)
  - Installed wetland species to mimic the adjacent Everglades ecosystem
  - Installed additional landscaping features around the rest area facility

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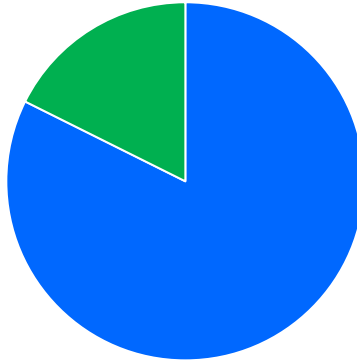
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## Construction – Financials

Total Cost Breakdown

- Roadway (\$9.8M)
- Landscape (\$2.4M)



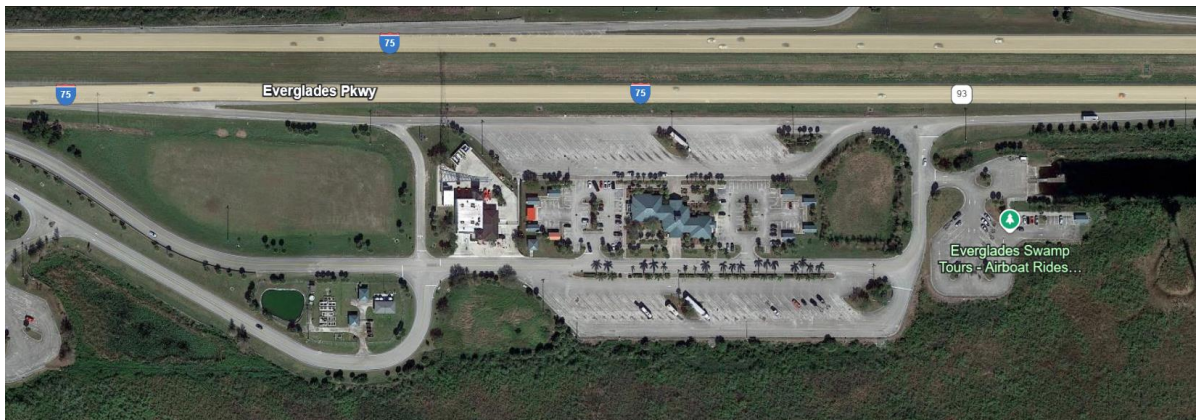
TRANSPORTATION  
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PHASE 2

41

41

## Construction – December 2020 Aerial View



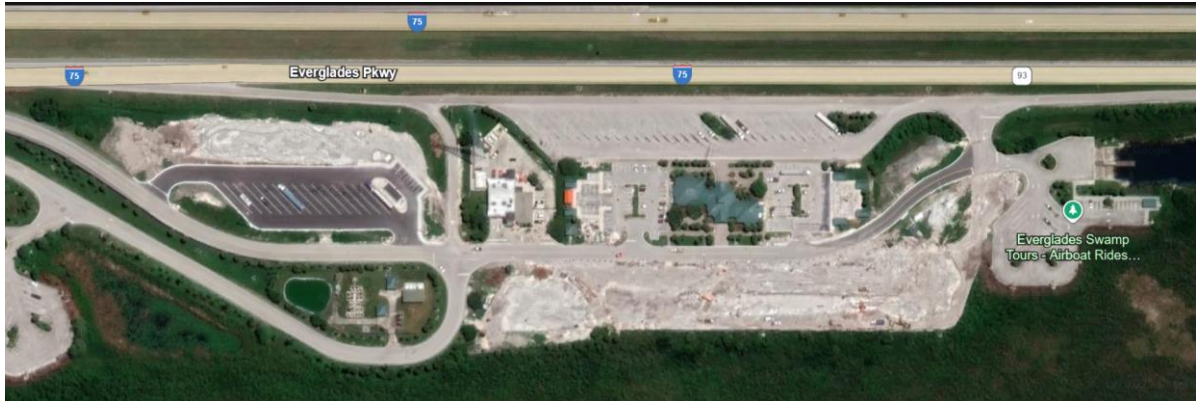
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PHASE 2

42

42

## Construction – May 2022 Aerial View



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43

PHASE 2

43

## Construction – April 2024 Aerial View



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44

PHASE 2

44

## Construction – Photos



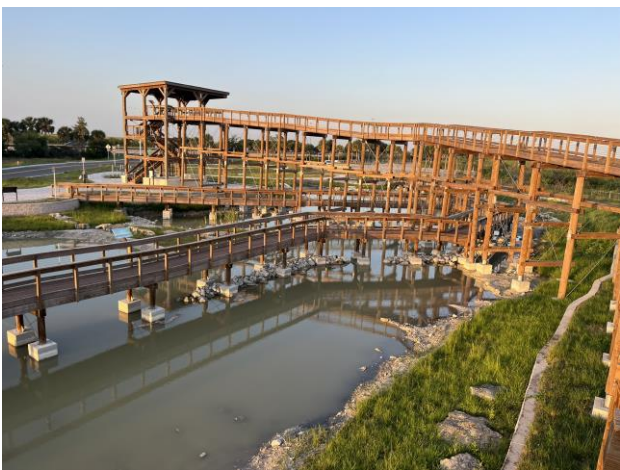
TRANSPORTATION  
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PHASE 2

45

45

## Construction – Photos



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PHASE 2

46

46



## Construction – Photos



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PHASE 2

47

47

## Construction – Photos



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PHASE 2

48

48

## Construction – Photos



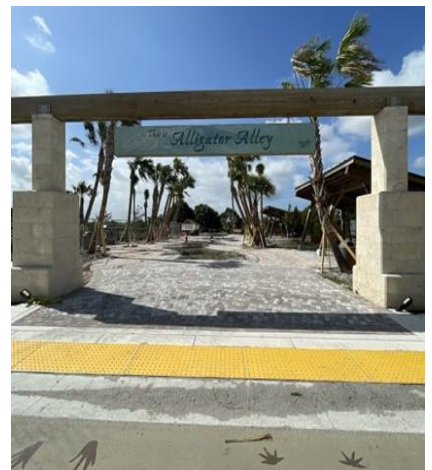
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PHASE 2

49

49

## Construction – Photos



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PHASE 2

50

50



## Construction – Photos



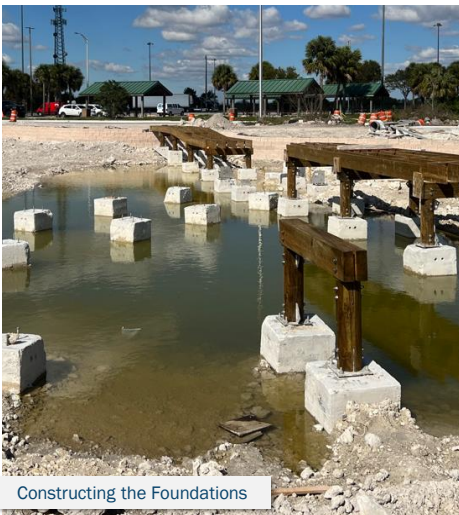
TRANSPORTATION  
SYMPOSIUM

PHASE 2

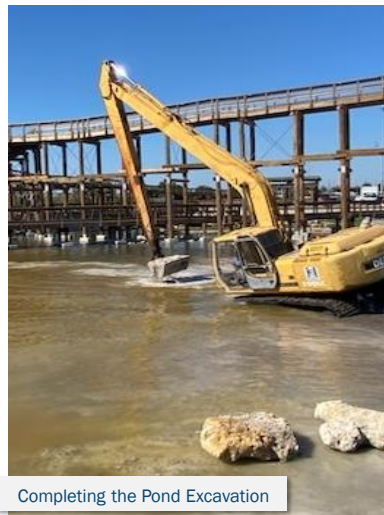
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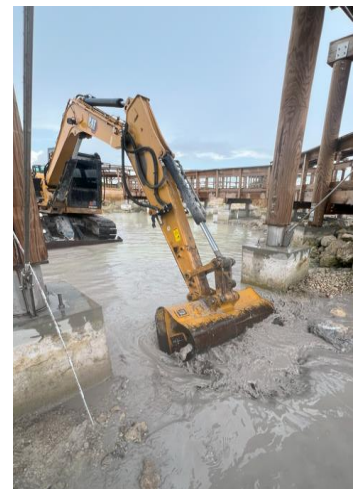
## Challenges in the Everglades – Creating an Ecosystem in a Parking Lot



Constructing the Foundations



Completing the Pond Excavation



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PHASE 2

52

52

## Challenges in the Everglades – Dewatering the Pond for Construction



Placing Aquatic Soil Layer



One of the Many Springs in  
the Pond Bottom where  
Water Would Return

Pumping Down the Water Level

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PHASE 2

53

53

## Challenges in the Everglades - Access



- Maintenance of Traffic
- Permitting

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54

54



## Challenges in the Everglades – Invasive Species Invasion



Black Iguana



Tropical Soda Apple



Cattails



Boa Constrictor



Hydrilla

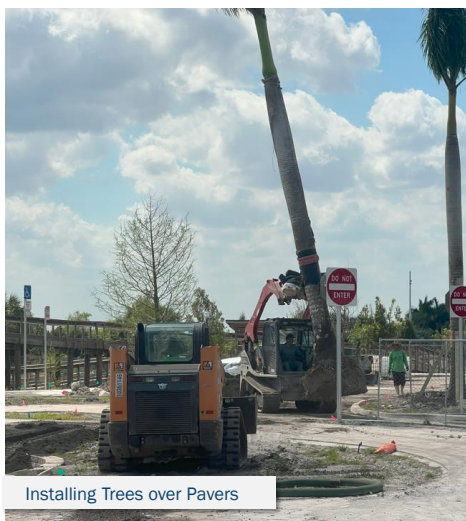
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PHASE 2

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## Challenges in the Everglades – Separation Into Two Projects



Installing Trees over Pavers



Creating Soil Ramps over the Retaining Wall

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SYMPOSIUM**

PHASE 2

56

56

## Phase 3 — Ongoing Improvements



### Project Goal:

Continue to Enhance traveler and user experience at the rest area by adding recreational amenities and playground

### Play Area Project Scope:

Part I: Provide an outdoor interactive play area before the inauguration date, including:

- Play Set with low risk and low maintenance due to limited space availability, including shade
- Pour-in-Place flooring with Everglades design
- Interactive standalone panels
- Benches
- Fence with multiple entry gates to match the boardwalk handrails

Part 2: Provide upgrades to the Play Area post-inauguration date:

- Additional canopy structures
- Additional themed chairs
- Add exercise stations with signs along walk paths

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SYMPOSIUM**

PHASE 3

57

57

## Phase 3 — Ongoing Improvements



### Play Area Project Scope:

Part I:

- Play Set with low risk and low maintenance due to limited space availability, including shade
- Pour-in-Place flooring with Everglades design
- Interactive standalone panels
- Benches
- Fence with multiple entry gates to match the boardwalk handrails

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SYMPOSIUM**

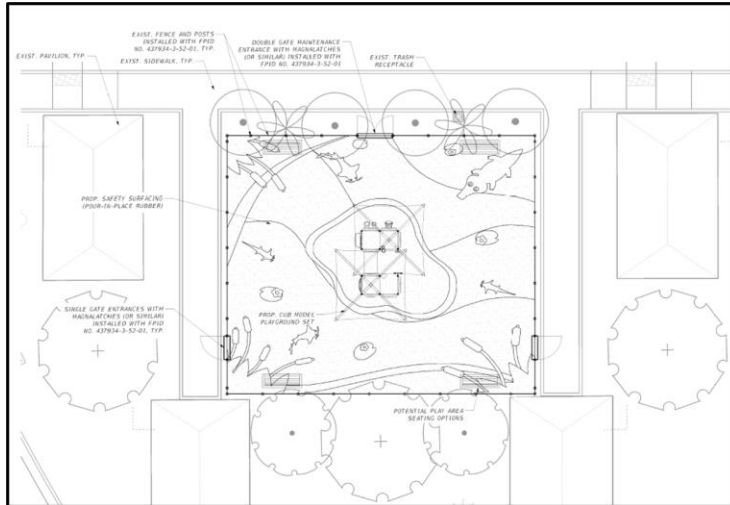
PHASE 3

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58



## Phase 3 — Ongoing Improvements



### Play Area Project Scope:

#### Part I:

- Play Set with low risk and low maintenance due to limited space availability, including shade
- Pour-in-Place flooring with Everglades design
- Interactive standalone panels
- Benches
- Fence with multiple entry gates to match the boardwalk handrails

TRANSPORTATION  
SYMPOSIUM

PHASE 3

59

59

## Phase 3 — Ongoing Improvements



### Play Area Project Scope:

#### Part I:

- Play Set with low risk and low maintenance due to limited space availability, including shade
- Pour-in-Place flooring with Everglades design
- Interactive standalone panels
- Benches
- Fence with multiple entry gates to match the boardwalk handrails

TRANSPORTATION  
SYMPOSIUM

PHASE 3

60

60

## Phase 3 — Ongoing Improvements



### Play Area Project Scope:

#### Part I:

- Play Set with low risk and low maintenance due to limited space availability, including shade
- Pour-in-Place flooring with Everglades design
- Interactive standalone panels
- Benches
- Fence with multiple entry gates to match the boardwalk handrails

TRANSPORTATION  
SYMPOSIUM

PHASE 3

61

61

## Phase 3 — Ongoing Improvements



### Play Area Project Scope:

#### Part 2:

- Additional canopy structures
- Additional themed chairs
- Add exercise stations with signs along walk paths



TRANSPORTATION  
SYMPOSIUM

PHASE 3

62

62



## Phase 4 — Future Vision



**Project Goal:**

Boat Ramp projects and renovation of the existing rest area building

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SYMPOSIUM

PHASE 4

63

63

## Safety Message



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SYMPOSIUM

64

64

## Contact Us

**Ann Broadwell, FDOT - District 4**  
**District Environmental Manager**  
 Ann.Boardwell@dot.state.fl.us  
 954-777-4325

**Kaylee Kildare, FDOT - District 4**  
**District Landscape Manager**  
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## Questions?






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 June 19 - 20, 2025  
 Hollywood, FL

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Please be sure to **certify your attendance** before leaving this event or no later than **Monday, June 30**, in order to receive PDH/CEC. Detailed instructions are available on the Transportation Symposium website.

Transportation Symposium  
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67