

**MARTIN COUNTY, FLORIDA**

**PRESERVE AREA MANAGEMENT PLAN**

**For:**

**The Preserve at Park Trace**

**Section 34, Township 38S, Range 41E**

**Prepared by:**

**EW Consultants, Inc.**

**Approved by/Date: \_\_\_\_\_**

**A Preserve Area Management Plan (PAMP) is required of all applicants for development approval on sites which contain wetland or upland preserve areas, pursuant to provisions of Section 4.36.A.1 of the Martin County Land Development Regulations, Martin County Code.**

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## **1.0 GENERAL**

The owner of the lands to be preserved and maintained by this Preserve Area Management Plan (PAMP) and the developer of The Preserve at Park Trace successors and assigns, and their environmental consultants and contractors, will implement and comply with all portions of this PAMP.

Compliance with the terms of this PAMP includes submittal of all Monthly Monitoring Reports on PAMP compliance throughout all phases of project construction and submittal of all Annual Monitoring Reports following completion of project construction, pursuant to Section 10.17 of the Martin County Land Development Regulations. The owner of the lands to be preserved/maintained shall have ultimate responsibility for the submittal of all Monthly and Annual Monitoring Reports, according to the format and schedule requirements of Section 10 of this PAMP.

As noted in Section 9 of this PAMP, the Martin County Environmental Planning Administrator shall be notified in writing within thirty (30) days of transfer of ownership of any lands to be preserved/maintained under the terms of this PAMP. Failure to notify shall be considered as non-compliance with the terms of this PAMP

This PAMP will not be altered or amended by either Martin County or the owner/developer of The Preserve at Park Trace, except by an alteration or amendment agreed to by both the Martin County Environmental Planning Administrator and the owner/developer of The Preserve at Park Trace. Such alterations and amendments shall be inserted into the PAMP and the final revised document shall be recorded by the Martin County Clerk of Courts. The revised PAMP will be labeled with the appropriate O.R. Book and Page Number. Three copies of the revised document shall be provided to the Martin County Environmental Planning Administrator within thirty (30) days of the Recording date.

## **2.0 ENVIRONMENTAL ASSESSMENT**

The Environmental Assessment (EA) includes maps and text which accurately depict the site's location, soils, uplands, listed species, previous impacts, preserve area locations and boundaries, and any other significant environmental features. It is attached to this Preserve Area Management Plan.

**2.1 Location** – A location map is included in the EA.

**2.2 Soils** – Soil types on the property were classified using a Soils Survey of Martin County Area, Florida and a copy of the appropriate map is included as an attachment. Please refer to the attached Environmental Assessment for a detailed description of soils present on the property.

**2.3 Habitats** – Vegetative community classifications were mapped based on the Florida Land Use Cover and Forms Classifications System (FLUCCS), and the Florida Natural Areas Inventory (FNAI). Field Reconnaissance and aerial photograph interpretation were employed in the mapping effort of the vegetative communities on the subject property.

Please refer to the attached Environmental Assessment for a detailed description of the habitats present on the property.

## **2.4 Listed Species Evaluation**

Please refer to the attached Environmental Assessment and associated attachments for a detailed description of the listed species evaluation for this property.

## **2.5 Previous Impacts**

Please refer to the attached Environmental Assessment for a detailed description of the existing land covers and previous impacts.

## **2.6 Agency Correspondence**

A database search of the Department of State's Florida Division of Historical Resources for the subject property. The findings of this request are included in the attached Environmental Assessment.

A database search of the Florida Fish and Wildlife Conservation Commission's online resources has been made for the project site. The findings are included in the attached Environmental Assessment.

A wetland jurisdictional determination (JD) has been performed by the SFWMD for the project site and is included in the Environmental Assessment.

Through the SFWMD ERP process, the Florida Fish & Wildlife Conservation Commission has provided the applicant with advisory comments which have been incorporated into the May 2021 EA and this PAMP.

## **3.0 IDENTIFICATION OF PRESERVE AREAS**

**3.1 Site Plan - All Preserve Areas, right-of-ways and easements are shown on The Preserve at Park Trace Site Plan, a copy of which is included in this PAMP. The Site Plan will contain the notation: "PRESERVE AREAS ARE NOT TO BE ALTERED WITHOUT WRITTEN PERMISSION OF THE MARTIN COUNTY BOARD OF COUNTY COMMISSIONERS."**

**3.2 Legal Recording - The final The Preserve at Park Trace Site Plan will be recorded with the PAMP by the Martin County Clerk of Courts. The Site Plan and the PAMP will be labeled with the appropriate O.R. Book and Page Number and copies of each recorded document will be provided to the Martin County Environmental Planning Administrator within thirty (30) days of the Recording date.**

## **4.0 SURVEYING, MARKING AND BARRICADING REQUIREMENTS**

All Preserve Areas shown on the Site Plan for The Preserve at Park Trace will be surveyed and marked in the field with appropriate survey markers and signage. During the clearing and construction phases of the project, Preserve Area boundaries will be marked by physical barriers. No plant material will be removed from the Preserve Areas to facilitate surveying, fencing or soil boring/sampling without prior permission from the Martin County Environmental Planning Administrator.

- 4.1 Preserve Area Surveying Requirements – Each Preserve Area will be surveyed and marked with permanent monuments at each corner and at other sites necessary for locating the boundary of the Preserve Area. These permanent monuments will be constructed under the supervision of a Registered Land Surveyor and will be shown on the Site Plan. Map coordinates of each Preserve Area will be provided to the Martin County Environmental Planning Administrator, in a form compatible for use in the County’s GIS mapping system.**
- 4.2 Preserve Area Boundary Markers and Signs - Preserve Areas will be posted with permanent signs and boundary markers. Boundary Markers will be placed at the corners of residential lots abutting Preserve Areas. Signs will be at least 11 x 14 inches in size and will be posted in conspicuous locations along the Preserve Area boundary, at a frequency of no less than one (1) sign per 500 feet. All boundary markers and signs will be approved by the Martin County Environmental Planning Administrator and they will be in place prior to issuance of a building permit for construction on the site.**
- 4.3 Barricading Requirements - Prior to clearing, the developer will ensure that all Preserve Areas are protected with physical barriers during all clearing and construction activities in accordance with the following guidelines. Barricades will be inspected by County Environmental Division staff prior to work approval. Removal of the barricade materials will be done upon issuance of the final Certificate of Occupancy with authorization from appropriate County staff.**

**Barricades (not including turbidity screens) will be high-visibility orange safety fence extending from the ground to a height of at least 4 feet. Barricades will not be attached to vegetation.**

**All barricades and turbidity screens will be upright and maintained intact for the duration of construction.**

**Where areas are proposed for clearing (i.e. building envelope, utilities, drainage, road right-of-way, etc.) the bright orange barricades and silt fences will be offset at least 5 feet outside the Preserve Area or placed at the dripline of the canopy trees, whichever is greater.**

**All native vegetation not slated for removal as part of the development plans will be retained in their undisturbed state and will be barricaded at or outside the dripline of the trees.**

**Cut or fill will meet existing grade without encroaching into Preserve Areas.**

**It is the responsibility of the owner and developer of The Preserve at Park Trace to inform all contractors of these Marking and Barricading Requirements. Failure to comply with these Marking and Barricading Requirements will be considered a violation of the Site Plan approval. Further work on the project may be stopped until compliance with the Marking and Barricading Requirements is achieved, and the owner or developer may be required to appear before the Code Enforcement Board.**

## **5.0 USE OF PRESERVE AREAS**

- 5.1 Activities Allowed in Preserve Areas – Activities allowed in preserve areas are bird watching and nature enjoyment.**

- 5.2 Activities Prohibited In Preserve Areas - Activities prohibited in Preserve Areas or easements within Preserve Areas include, but are not limited to: construction or placing of building materials on or above the ground; dumping or placing soil or other substances such as garbage, trash, and cuttings; removal or destruction of native trees, shrubs or other native vegetation; excavation, dredging or removal of soil materials; diking or fencing; vehicular traffic including use by non-motorized vehicles, recreational vehicles and off-road vehicles; permanent irrigation; trimming, pruning, or fertilization; and any other activities detrimental to drainage, flood control, water conservation, erosion control or fish and wildlife conservation and preservation.**

**No hazardous material other than fuel for refueling on-site heavy equipment will be stored during the construction phases. On-site fuel tanks shall not be located within twenty-five (25) feet of any Preserve Areas and shall be removed upon completion of construction work.**

**Buildings proposed to be located adjacent to Preserve Areas shall be set back a minimum of ten (10) feet to allow for construction and maintenance without encroaching into the Preserve Area. All other structures (e.g. pools, sheds, decks, fences) shall be set back a minimum of five (5) feet from the Preserve Area boundary.**

**Development activities such as the construction of building pads for associated structures, swales, or culverts for surface water management shall not alter the hydrology of adjacent Preserve Areas. Nor shall any activities increase non-point source pollution in Preserve Areas.**

## **6.0 RESTORATION AND MAINTENANCE ACTIVITIES**

**Except for approved restoration and maintenance activities, Preserve Areas will be left undisturbed. All maintenance of Preserve Areas will be in accordance with this PAMP for The Preserve at Park Trace. Maintenance and management activities will be performed by or under the supervision of a qualified environmental professional and must be approved by the Martin County Environmental Planning Administrator. The following restoration and maintenance activities may be allowed within Preserve Areas with prior written approval from the Environmental Planning Administrator: exotic plant removal, re-vegetation or planting native vegetation, and removal of dead, diseased, or safety hazard plant material.**

- 6.1 Exotic Vegetation Removal – Exotic vegetation shall be removed from Preserve Areas by the least ecologically-damaging method available. Such methods include hand pulling, hand spading, cutting with hand or chain saws and in-situ treatment with appropriate herbicides. No debris, including dead plants, plant clippings or wood scraps, shall be allowed in Preserve Areas. In addition, all dead plant material and exotic plant debris removed from Preserve Areas shall be disposed of in a County-approved recycling facility.**
- 6.2 Re-vegetation - Any re-vegetation which might be necessary as a result of exotic vegetation removal or site construction activities shall consist of native plant species representative of the existing native plant community. This will ensure that the Preserve Areas maintain indigenous plant associations.**
- 6.3 Vegetation Removal - Dead or diseased plant material shall be removed from Preserve Areas upon approval by the Martin County Environmental Planning Administrator. Re-vegetation may be required for any removed plant material. No debris, including dead**

plants, plant clippings or wood scraps, shall be allowed in Preserve Areas. All dead plant material and debris removed from Preserve Areas shall be disposed of in a County-approved recycling facility.

- 6.4 **Prescribed Burns** - Martin County considers prescribed burns an acceptable habitat management tool. When approved by the Martin County Environmental Planning Administrator, they will be conducted by a certified burn manager who will be responsible for obtaining all appropriate permits from State and local agencies.

It should be noted that the project site is located adjacent to the Atlantic Ridge State Park. As part of the vegetative management of this park, prescribed burns will be performed on a regular basis. The Preserve at Park Trace project is therefore located within the “smoke shed” of the Atlantic Ridge State Park. Residents of the development are to be provided with a copy of this PAMP which raises the awareness of this issue.

- 6.5 **Hydrology** - Previous or potential drainage impacts will be corrected to the extent technically feasible. Wetlands and waterbodies on adjacent properties shall be protected from adverse impacts, as necessary.
- 6.6 **Mitigation Plan** - There are proposed activities on-site which will necessitate wetland mitigating measures (access to upland areas through wetlands). As such, an Environmental Waiver application has been submitted under separate cover which evaluates the proposed impact and the corresponding wetland creation areas (from uplands) as shown on the graphics contained in the waiver application.

## 7.0 PROTECTIVE MEASURES FOR LISTED SPECIES

- 7.1 **Gopher tortoises** have been confirmed on-site. In Florida, gopher tortoises are protected as Threatened. Under Florida law, no person may take, possess, transport or sell a Listed Species. No land clearing or construction shall occur until all tortoises which will be impacted are relocated to upland preservation areas or to off-site receiver areas as permitted by the FFWCC. A gopher tortoise agent registered with the Florida Fish and Wildlife Conservation Commission will supervise clearing in the areas of the gopher tortoise burrows. Tortoises inhabiting burrows in areas to be developed will be captured and relocated following guidelines set forth below. Tortoise burrows may be bucket trapped or excavated using methodology approved by the Florida Fish and Wildlife Conservation Commission and conducted by an authorized gopher tortoise agent possessing a valid relocation permit. During clearing and grubbing operations, equipment operators will be notified of the occurrence of gopher tortoises on-site and instructed to observe for roaming and foraging individuals. Should gopher tortoises be seen during the clearing and grubbing, all equipment operations will be stopped and the gopher tortoises will be captured and relocated into a Preserve Area of the project away from the immediate clearing activities. Once the tortoise(s) have been safely relocated to a Preserve Area and restrained by tortoise fencing, equipment operation can resume.
- 7.2 **Endemic Species** – If necessary, all gopher tortoise relocation efforts will include trapping of protected endemic species that may live in the burrow. These endemic species include but are not limited to the Florida mouse (*Peromyscus floridana*), gopher frog (*Rana aerolata*) and Eastern indigo snake (*Drymarchon corias couperi*).



- 7.3 Relocation of Tortoises - The Martin County Environmental Planning Administrator will be notified and will be provided with a copy of the Gopher Tortoise Relocation Permit from the Florida Fish and Wildlife Conservation Commission. All relocations shall be carried out by a gopher tortoise agent licensed for gopher tortoise relocations. The responsible party shall have access to literature pertaining to gopher tortoise preservation and shall be encouraged to preserve additional areas and to landscape with native vegetation.

## 8.0 MISCELLANEOUS PROVISIONS AND RESTRICTIONS

The project will comply with the Martin County/State of Florida "Firewise" program. The project has been designed to provide a 30' wide defensible space between the upland preserves and the primary structures on lots adjacent to those preserves. The owner/developer and homeowners' association shall ensure that these lots maintain the 30' wide defensible space inclusive of a maximum of 20 feet within the adjacent preserve area. Maintenance of the defensible space shall adhere to the Firewise Program's landscaping guidelines developed by the Florida Forest Service.

After construction is complete, the lot owner and homeowners' association will be responsible for maintaining the buildings and common property in accordance with the Firewise principles.

### Firewise Notes:

- Lots adjacent to forested preserve areas shall maintain a 30' defensible space that will be maintained in accordance with "firewise" principles including the removal of trash and debris and restricting landscape to fire resistant species.
- No primary structure or attached secondary structure shall be constructed within the 30 foot defensible space to preserve areas.
- Homes on lots adjacent to preserve areas shall have Class A asphalt shingle, slate or clay tiles, cement or metal roofing or terra cotta tiles.
- Homes on lots adjacent to preserve areas shall have non-combustible or fire-resistant siding and soffits.

## 9.0 TRANSFER OF RESPONSIBILITIES

The property owner(s) and developers of The Preserve at Park Trace are responsible for implementation of all requirements of this Preserve Area Management Plan until such time as the developer transfers responsibility to the owners or a successor. The Martin County Environmental Planning Administrator will be notified in writing within thirty (30) days of transfer of ownership of any lands to be preserved under this PAMP. Failure to notify will be considered as non-compliance with the terms of this PAMP. At such time as the developer is ready to transfer control of The Preserve at Park Trace to the property owners or another appropriate entity, whether the developer retains ownership of the lots/parcels in the project or not, an environmental professional shall certify, in writing, to the Martin County Environmental Planning Administrator, that the Preserve Areas are in full compliance with this PAMP.

The developer and/or successor will be responsible for maintaining the Preserve Areas in their existing natural condition with the periodic removal of invasive exotic vegetation. After transfer of responsibilities, funding for all maintenance and management programs will be the responsibility of all successors.

## **10.0 MONITORING, REPORTING AND INSPECTIONS**

**10.1 Monthly Construction Reports –** During construction of *The Preserve at Park Trace*, the developer will be responsible for submitting a monthly report on the progress of *The Preserve at Park Trace*, which will address all aspects of the site construction relative to the Preserve Areas. Information regarding construction and maintenance of the Preserve Areas, such as placement of barriers and signage, removal of exotic vegetation, re-vegetation, prescribed burns, etc. will be described and supported with photographs, where appropriate.

### **10.2 Annual Monitoring Reports -**

Monitoring and reporting will be conducted annually by a qualified environmental professional for a period of five years from the date of completion of the project or project phase encompassing the monitored area. Annual monitoring will be conducted at the end of the wet season (usually by November 30) and a report of the monitoring will be submitted to the Martin County Environmental Planning Administrator within 30 days of the completion of the monitoring.

The Annual Monitoring Reports will document changes in vegetation including encroachment and/or overgrowth of noxious or exotic vegetation. Fixed-point photos of all Preserve Areas will be included in each report. The reports will include recommendations for exotic vegetation removal, re-vegetation, and any additional enhancement activities necessary to maintain the Preserve Area. A timetable for action within 90 days of the report will be prepared and followed.

A copy of the proposed Annual Monitoring Report format is attached to this PAMP as an Appendix. This format may be modified separately from the PAMP, as necessary, upon written approval from the Martin County Environmental Planning Administrator.

Upon request, Martin County Environmental Planning staff may meet with the responsible parties to review the annual monitoring report findings and supply technical assistance and support for stewardship.

The first Annual Monitoring Report due in compliance with this PAMP will be submitted to the Martin County Environmental Planning Administrator no later than \_\_\_\_\_. Subsequent Annual Monitoring Reports will be due on the same date for the next four years.

After the initial five-year monitoring period, the Preserve Areas may be subject to periodic review and, if conditions warrant, will be subject to further monitoring and maintenance to ensure environmental integrity, consistent with the provisions of this Plan.

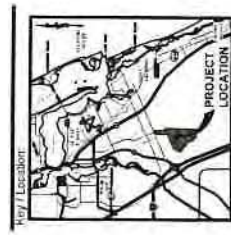
**10.3 Enhanced Wetland Monitoring Program -** As part of an “enhanced wetland monitoring program” developed in conjunction with Martin County Environmental Division staff, two automated water level monitoring devices will be installed on-site; one within W-9A and one within W-10. Both will be located near the east property line on either side of the existing earthen berm which separates the two wetlands as shown on the wetland monitoring map included as part of this August 2021 PAMP as is a typical diagram for these recorders. The purpose of these devices will be to document any significant changes in wetland water levels due to the potential hydrologic changes within the landscape. The recorded water elevations will be charted along with nearby rainfall data, with the wetland bottom elevation and

seasonal high water/normal pool elevations plotted as constants. In this manner, the chart will show the changes in water elevation within each wetland in relation to local rainfall, which will be collected from a public source such as the SFWMD database or from MCU rainfall units in the area. Should any significant changes to the wetlands' hydrology after two (2) years of monitoring, such data will be reviewed with Martin County Environmental Division staff to examine potential causes (whether natural or man-made) and resultant corrective measures that may be necessary and appropriate to restore the wetlands' hydrology. The definition of "significant" will be determined in conjunction with Martin County Environmental Division staff based on generally accepted water level tolerances for the types of freshwater wetlands found on-site.

- 10.4 Inspections - Martin County is authorized to inspect any County regulated site or appurtenance. Duly authorized representatives of Martin County may, at any time, upon presenting proper identification, enter upon and shall be given access to any premises for the purpose of such inspection.**

## **11.0 ENFORCEMENT**

**Martin County shall have the right to enforce the provisions of this PAMP through any available administrative or civil proceeding, which may result in penalties. Restoration of habitat and other remedies, such as fines and fees covering staff time, may be required of any person, corporation or other entity found in violation of any of the provisions of this PAMP or of Article 10 of the Martin County Land Development Regulations.**



Project Team:

- Client: [Name]
- Architect: [Name]
- Engineer: [Name]
- Surveyor: [Name]
- Consultant: [Name]
- Other: [Name]

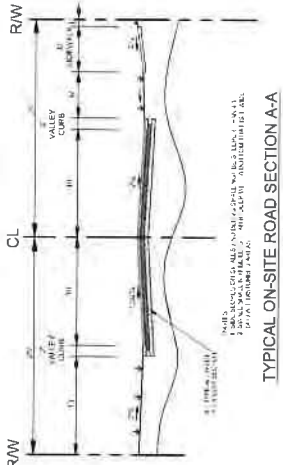
# The Preserve At Park Trace

## PUD Master / Final Site Plan

Date	By	Description
08/01/20	JTS	Site Plan
08/01/20	JTS	Site Plan
08/01/20	JTS	Site Plan
08/01/20	JTS	Site Plan
08/01/20	JTS	Site Plan

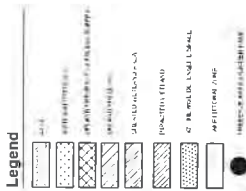


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TYPICAL ON-SITE ROAD SECTION A-A (N.T.S.)

### Typical Lot Layout



### Firewise Notes

- 1. All structures shall be constructed in accordance with the International Building Code (IBC) and the International Fire Code (IFC).
- 2. All structures shall be constructed with fire-resistant materials.
- 3. All structures shall be constructed with fire-resistant roofs.
- 4. All structures shall be constructed with fire-resistant walls.
- 5. All structures shall be constructed with fire-resistant floors.
- 6. All structures shall be constructed with fire-resistant doors.
- 7. All structures shall be constructed with fire-resistant windows.
- 8. All structures shall be constructed with fire-resistant eaves.
- 9. All structures shall be constructed with fire-resistant soffits.
- 10. All structures shall be constructed with fire-resistant gables.

### Density Calculations

Total Site Area:	97.04 AC
Water:	26.20 AC
Wetland:	1.14 AC
Upland:	69.70 AC
Upland Density:	121 units / 69.70 AC
Upland Density:	121 units / 69.70 AC
Upland Density:	121 units / 69.70 AC

### Lake Littoral Zone / Upland Transition Zone Data

Lake Littoral Zone:	4,917 SF
Lake Littoral Zone:	4,917 SF
Lake Littoral Zone:	4,917 SF
Lake Littoral Zone:	4,917 SF

### Lake Upland Buffer Square Footage

Lake Upland Buffer:	4,917 SF
Lake Upland Buffer:	4,917 SF
Lake Upland Buffer:	4,917 SF
Lake Upland Buffer:	4,917 SF

- a. Regular maintenance of all landscaping to be kept alive and in good condition and in a way that presents a healthy, neat, and orderly appearance. All landscaping shall be maintained free from disease, pests, weeds, and litter. Maintenance shall include weeding, watering, pruning, mowing, edging, mulching and other appropriate maintenance practices.
- b. Repair or replacement of mature trees, shrubs, or structures to a structurally sound condition.
- c. Regular maintenance, repair or replacement, where necessary, of any screening or buffering required by the design.
- d. Regular maintenance, repair or replacement, where necessary, of any screening or buffering required by the design.
- e. Replacement of any required landscaping in easement areas that may be disturbed by future maintenance.

### Site Data

Tract No.	62
Tract Area	10.00 AC
Tract Shape	Rectangular
Tract Location	Section 1, Township 1N, Range 1E
Tract Owner	Lucido & Associates, Inc.
Tract Status	Unimproved

Improvement Area:	2,325,172 sq ft
Improvement Area:	2,325,172 sq ft
Improvement Area:	2,325,172 sq ft
Improvement Area:	2,325,172 sq ft

Proposed Area:	1,701,891 sq ft
Proposed Area:	1,701,891 sq ft
Proposed Area:	1,701,891 sq ft
Proposed Area:	1,701,891 sq ft

Parcel ID Numbers:	1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70, 71, 72, 73, 74, 75, 76, 77, 78, 79, 80, 81, 82, 83, 84, 85, 86, 87, 88, 89, 90, 91, 92, 93, 94, 95, 96, 97, 98, 99, 100
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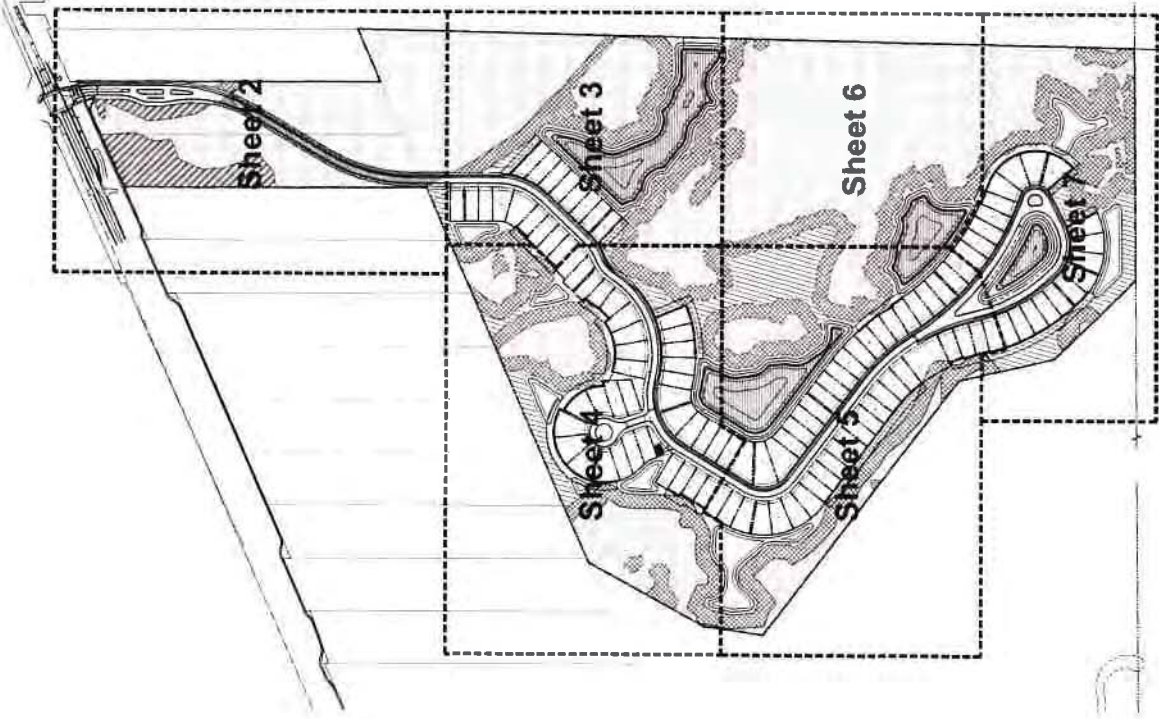
Open Space Data	
Total Site Area:	97.04 acres
Required Open Space:	46.52 acres (48%)
Total Upland Area:	38.80 acres
Required Upland Open Space:	23.56 acres (60%)
Provided Upland Open Space:	38.26 acres (87%)

Building and Lot Data	
Product Type:	Single Family
Required Min. F.F.E.:	18,000 sq ft
Minimum Lot Size:	50 x 100 (5,000 sq ft)
Building Setback:	20% (per lot)
Front:	20'
Side:	10'
Rear:	10' (6' For Accessory Structures)

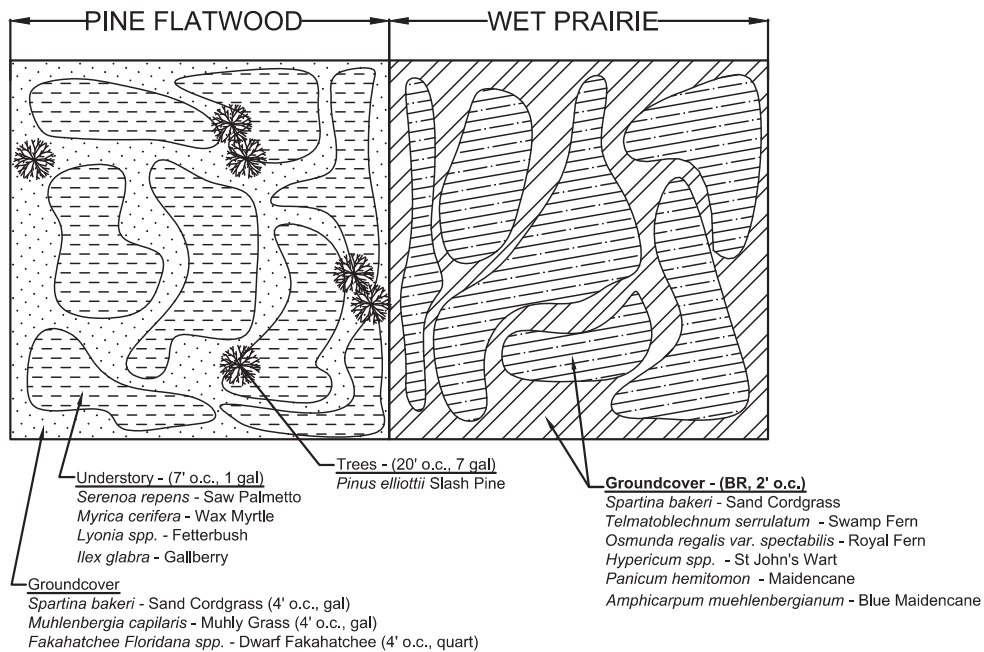
Required Parking per Sublot: 1.524	
2 spaces per unit @ 114 units = 228 spaces	
Parking Provided: 228 spaces	
Includes 2 car garage or driveway	

Upland Prescriptive Calculations	
Lot Area:	1,701,891 sq ft
Lot Area:	1,701,891 sq ft
Lot Area:	1,701,891 sq ft
Lot Area:	1,701,891 sq ft

General Notes	
1. All structures shall be constructed in accordance with the International Building Code (IBC) and the International Fire Code (IFC).	
2. All structures shall be constructed with fire-resistant materials.	
3. All structures shall be constructed with fire-resistant roofs.	
4. All structures shall be constructed with fire-resistant walls.	
5. All structures shall be constructed with fire-resistant floors.	
6. All structures shall be constructed with fire-resistant doors.	
7. All structures shall be constructed with fire-resistant windows.	
8. All structures shall be constructed with fire-resistant eaves.	
9. All structures shall be constructed with fire-resistant soffits.	
10. All structures shall be constructed with fire-resistant gables.	



## PINE FLATWOOD & WET PRAIRIE PLANTING PLAN



QUANTITY OF PLANTS WILL BE DETERMINED BY SIZE OF RESTORATION AREA AND SPACING (O.C.) OF SELECTED PLANTS.

REFERENCED SPECIES MAY BE SUBSTITUTED WITH OTHER APPROPRIATE NATIVE SPECIES BASED ON AVAILABILITY.

NOTE: PLANTS TO BE INSTALLED AS TO MIMIC NATURAL OCCURRENCE.

## THE PRESERVE AT PARK TRACE PLANTING PLAN









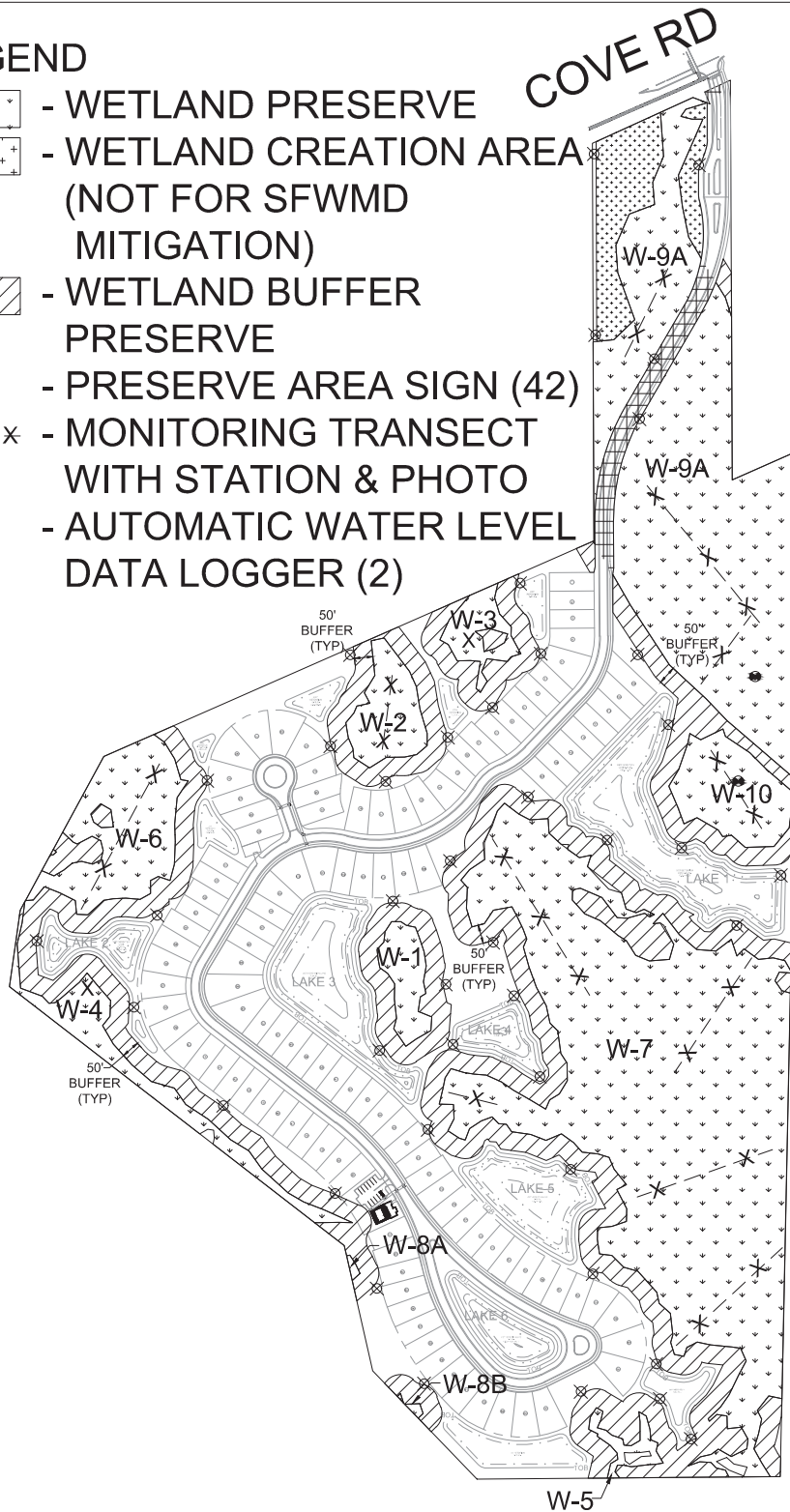
CONSULTANTS, INC. **EW CONSULTANTS, INC.**  
 1000 SE MONTEREY COMMONS BLVD., SUITE 208  
 STUART, FL 34998  
 772-287-8771 FAX 772-287-2988  
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MAY 2021  
FIGURE

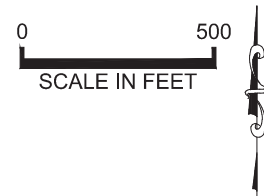


## LEGEND

-  - WETLAND PRESERVE
-  - WETLAND CREATION AREA (NOT FOR SFWMD MITIGATION)
-  - WETLAND BUFFER PRESERVE
-  - PRESERVE AREA SIGN (42)
-  - MONITORING TRANSECT WITH STATION & PHOTO
-  - AUTOMATIC WATER LEVEL DATA LOGGER (2)



## PRESERVE AREA SIGN (TYP)



# THE PRESERVE AT PARK TRACE MONITORING



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STUART, FL 34996

772-287-8771 FAX 772-287-2988

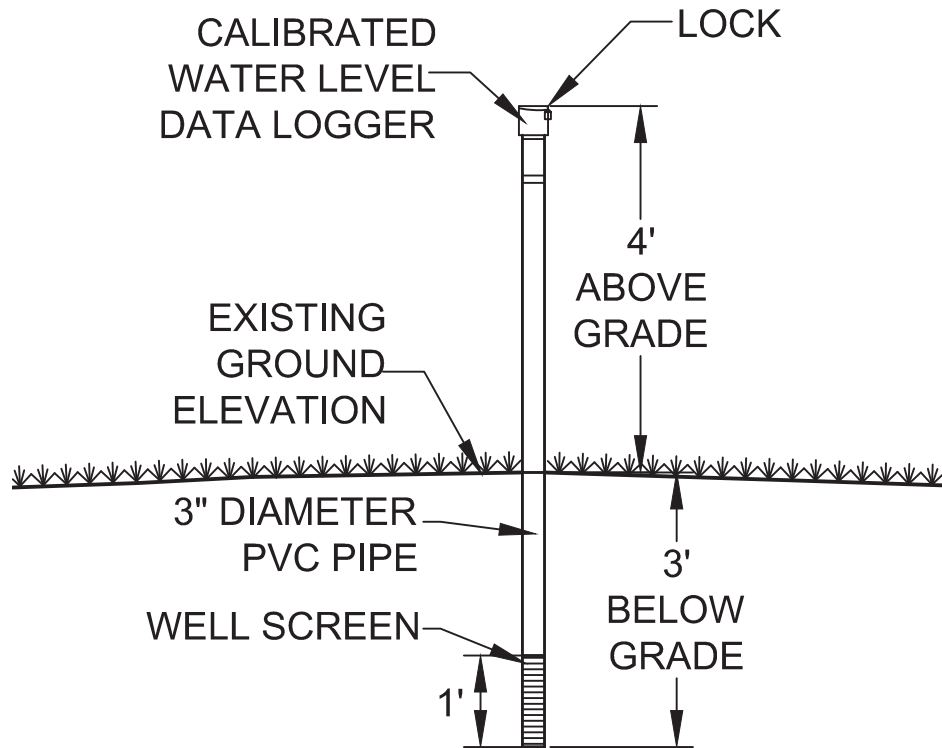
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**AUG 2021**

**FIGURE**

**2**

# TYPICAL



## THE PRESERVE AT PARK TRACE MONITORING WELL DETAIL

WELL\_SECTION.dwg DETAIL 1

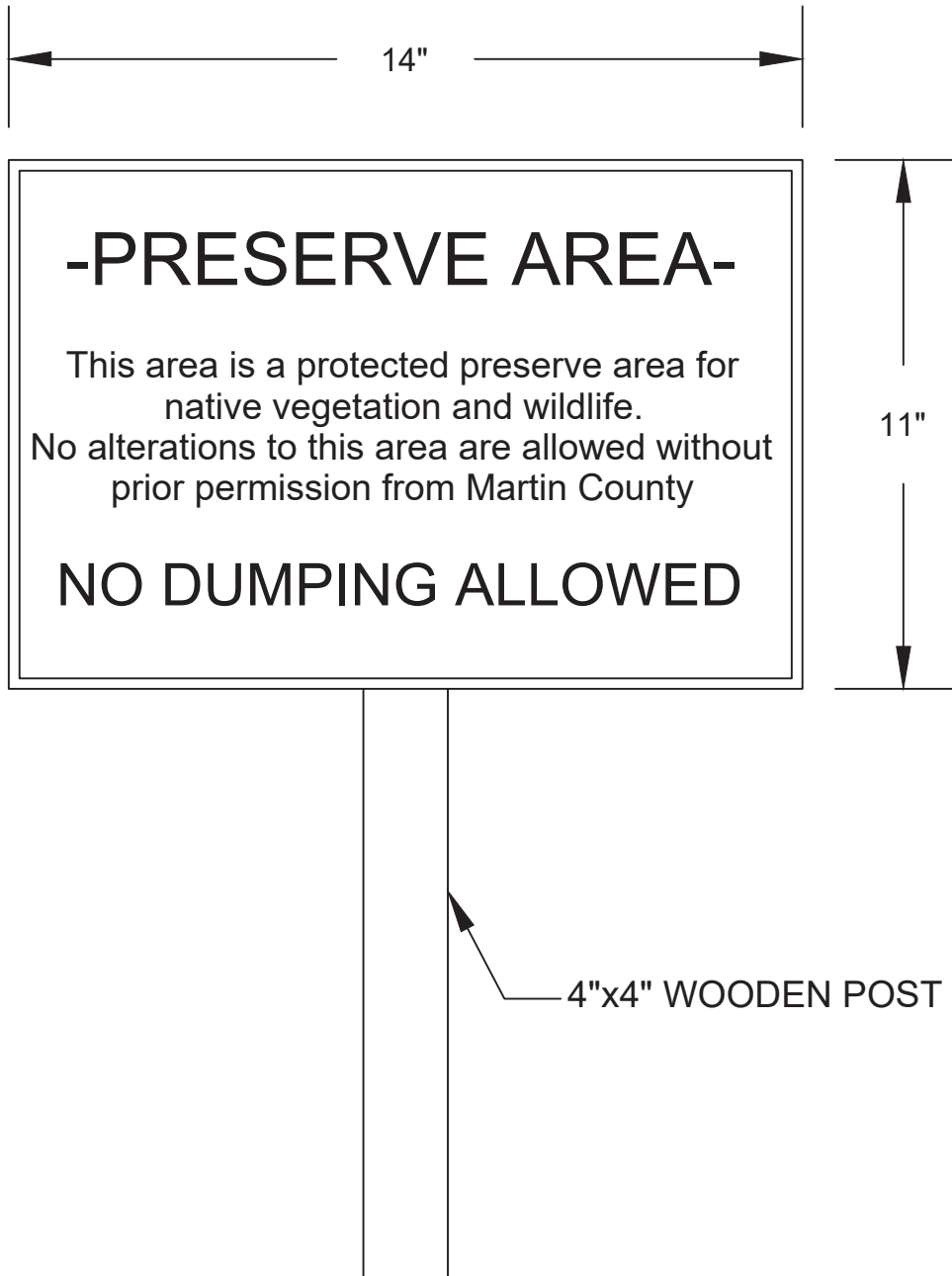


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**AUG 2021**

FIGURE

**3**



## PRESERVE AREA SIGN



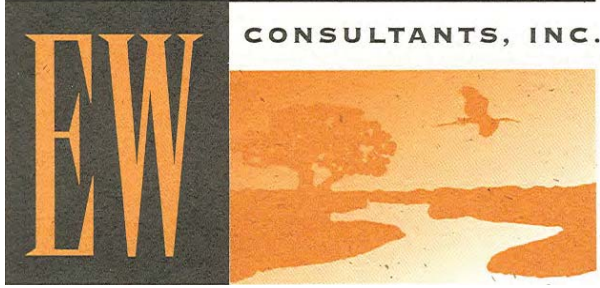
**EW CONSULTANTS, INC.**  
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**OCT 2013**

**FIGURE**



EW Consultants, Inc.  
Natural Resource Management, Wetland, and Environmental Permitting Services



# **ENVIRONMENTAL ASSESSMENT**

## **THE PRESERVE AT PARK TRACE**

### **MARTIN COUNTY, FLORIDA**

**Prepared for:**

**D.R. Horton**

**Prepared by:**

**EW Consultants, Inc.**

**May 2021**

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## **INTRODUCTION -**

The Preserve at Park Trace project site covered by this Environmental Assessment comprises 97+/- acres. The site is located just north of the Atlantic Ridge State Park, east of Ault Avenue, south of Cove Road, and west of the Summerfield development (see Figure 1 in Appendix A, Location Map). The project site is situated in east-central Martin County, FL, in the Section 34, Township 38S, and Range 41 East (see Figure 2 in Appendix A, USGS Quadrangle Map).

## **GENERAL PROPERTY DESCRIPTION -**

The majority of the parcel consists of native pine/mesic flatwoods upland habitat, with a substantial amount of freshwater wetlands, as well. The property is surrounded by vacant wooded lands to the south and west, a golf course to the east, Cove Road and large lot residential parcels and a church to the north (see Figure 3, 2020 Aerial Photograph, in Appendix A for an aerial view of the project site and surroundings).

Current land cover types include native upland and wetland habitats, as well as lands dominated by exotic plant species (both wetland and upland) within the northern “chimney” of the project site along Cove Road. The only visible alterations on-site include a series of rudimentary ditches.

## **SOILS -**

A soils report for the site generated by the USDA/NRCS is included in Appendix B. The soils in this part of Martin County are generally poorly drained sands and depressional sands.

## **NATURAL COMMUNITIES AND LAND COVERS -**

The following is a summary of the land covers and vegetative communities found on the subject site. Land cover and vegetative community classifications were mapped based on the Florida Land Use, Cover and Forms Classification System (FLUCCS) and Florida Natural Areas Inventory (FNAI). The land cover mapping is based on the vegetative site conditions as of March 2020. Please refer to Figure 4 in Appendix A, for the approximate limits of the land cover categories described below.

Land cover categories present on-site include:

**#411: Pine/Mesic Flatwoods** – This common native upland vegetative cover consists of slash pine canopy, with saw palmetto, gallberry, fetterbush and wax myrtle in the understory, with wiregrasses in the groundcover layer. Native vines are also present such as wild grape and

greenbrier. This land cover type is suitable habitat for the state threatened gopher tortoise, and evidence of their presence was observed during recent site visits.

**#422: Brazilian Pepper** - This upland land cover includes wooded areas in the chimney portion of the project site south of and adjacent to Cove Road. This land cover is dominated by the invasive exotic Brazilian pepper tree. The exotic schefflera tree, as well as exotic grasses such as guinea grass and rose natal grass are also present within this land cover type. Numerous vines are also present such as wild grape and greenbrier. This land cover provides very little wildlife utilization potential.

**#643: Wet Prairie** – The east-central, northwestern and chimney portion of the project site consists of freshwater wetlands. Such areas are dominated by desirable native wetland plants such as St. John's wort, corkwood, maidencane, bog buttons and hatpins. Wetlands along the western property line as well as the wetland in the chimney contain a significant (greater than 75%) coverage of the exotic melaleuca tree. The wetlands on-site provide foraging and nesting habitat opportunities for a variety of common and listed wildlife species, in particular wading birds. The landward extents of the wetlands on-site have been verified by the SFWMD (see Exhibit 1).

### **PREVIOUS IMPACTS -**

Minimal impacts to the site have occurred over the past decades most likely due to its remote nature and inaccessibility from major roadways. Invasion of exotic plant species is evident along Cove Road, as are rudimentary ditches throughout the site.

### **AGENCY COORDINATION AND RECOMMENDATIONS –**

With the databases of the U.S. Fish and Wildlife Service (FWS) and the Florida Fish and Wildlife Conservation Commission (FWC) readily available on-line, Figures 5 and 6 represent the database downloads for these agencies. The landward extents of the wetlands on-site have been verified by the SFWMD (see Exhibit 1).

Discussions with staff from the Florida Fish and Wildlife Conservation Commission (FWC) during the SFWMD Environmental Resource Permit (ERP) process led to the following recommendations for the project site based on the habitats present:

- 1) Survey, permitting, and relocation of the state threatened gopher tortoise
- 2) Survey of the deepwater areas within on-site wetlands for nesting sandhill cranes and other wading birds during the recognized nesting season
- 3) Making observations for least tern nesting during construction activities since this listed species has been known to nest on newly-cleared sites with fresh sand

- 4) Posting of informational signage and training for site contractors regarding the identification and stoppage of work procedures for the Florida pine snake and Eastern Indigo snake.
- 5) Including language in the recorded Preserve Area Management Plan informing residents of the project of the adjacent Atlantic Ridge State Park and the frequency of prescribed burns along with the potential for occasional smoke associated with those burns.

As a result of these recommendations, the May 2021 PAMP has been updated accordingly.

### **LISTED FLORA AND FAUNA -**

Due the various types of habitats found on-site, listed wildlife species may utilize the pine flatwoods and wetlands for nesting and foraging opportunities.

A search of the FWC water bird colonies database is shown on Figure 5. The data reveal that several colonies within 20 miles of the project site have been documented. Since the foraging range of a wood stork is generally recognized as 18.6 miles from its colony, the project site is located within a wood stork foraging area. However, only minimal impacts to the on-site wetlands are proposed within the exotic-infested areas of the wetlands along Cove Road. Therefore, there will be no anticipated impacts to listed wading bird populations.

Although the bald eagle has been removed from the Endangered Species Act list, it remains protected under the Bald and Golden Eagle Protection Act. The subject property contains numerous mature slash pines that could provide potential nesting opportunities for bald eagles and is located within a few miles of major foraging areas, such as the Indian River Lagoon, St. Lucie River, and numerous local waterways. A mature bald eagle was observed just off-site along the eastern boundary with the Summerfield project. No bald eagle nest trees were observed on-site during the past year of field visits. The closest eagle nest is located to the southeast of the site (MT010 in the Atlantic Ridge State Park). A map showing FWC documented bald eagle nest locations is attached as Figure 6 in Appendix A.

As mentioned previously, the state threatened gopher tortoise has been observed on-site. It is recommended that a full survey be conducted within the development footprint no more than 90 days prior to land operations. As for the listed wading birds observed on-site, it is recommended that systematic surveys be conducted within the on-site wetlands in accordance with FWC guidelines at the appropriate times of year prior to and during site development activities.

Figure 7 in Appendix A shows the locations of the observations made for listed species over the past year, as well as a survey loop through the upland portions of the site for gopher tortoise burrows. This survey loop represents approximately a 10% survey of the upland areas for gopher tortoise burrows. Table 1 below is the current list of state and federally protected fauna in Florida with those species likely to occur on-site highlighted.

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In addition, federally listed plant species within Florida are shown on Table 2 below. No such species on this list was observed during the site visits or expected to occur on-site based on the habitat types present. It should be noted that other protected plants listed by FDACS are not provided in Table 2 since they are considered the property of the landowner under Chapter 5B-40, F.A.C., and are protected from un-permitted commercial exploitation, which is not applicable to the project site.

<b>TABLE 1</b>				
<b>PRESERVE AT PARK TRACE</b>				
<b>POTENTIAL LISTED FAUNAL SPECIES</b>				
<b>USFWS/FWC 12/2018 OFFICIAL LIST</b>				
<b>RECOMMENDED SURVEY</b>				
<b>VERTEBRATES</b>			<b>Potential</b>	
<b>FISH</b>			<b>Occurrence</b>	<b>Comment</b>
<b>Common Name</b>	<b>Scientific Name</b>	<b>Status</b>		
Atlantic sturgeon	<i>Acipenser oxyrinchus</i>	FE	N/A	Not found in Martin County
Blackmouth shiner	<i>Notropis melanostomus</i>	ST	N/A	Not found in Martin County
Bluenose shiner	<i>Pteronotropis welaka</i>	ST	N/A	Not found in Martin County
Crystal darter	<i>Crystallaria asprella</i>	ST	N/A	Not found in Martin County
Giant manta ray	<i>Manta birostris</i>	FT	N/A	No appropriate habitat found on-site
Gulf sturgeon	<i>Acipenser oxyrinchus desotoi</i>	FT-1	N/A	Not found in Martin County
Key silverside	<i>Menidia conchorum</i>	ST	N/A	Not found in Martin County
Okaloosa darter	<i>Etheostoma okaloosae</i>	FT	N/A	Not found in Martin County
Saltmarsh topminnow	<i>Fundulus jenkinsi</i>	ST	N/A	Not found in Martin County
Shortnose sturgeon	<i>Acipenser brevirostrum</i>	FE-1	N/A	Not found in Martin County
Smalltooth sawfish	<i>Pristis pectinate</i>	FE	N/A	No appropriate habitat found on-site
Southern tessellated darter	<i>Etheostoma olmstedii maculaticeps</i>	ST	N/A	Not found in Martin County
<b>AMPHIBIANS</b>				
<b>Common Name</b>	<b>Scientific Name</b>	<b>Status</b>		
Florida bog frog	<i>Lithobates okaloosae</i>	ST	N/A	Not found in Martin County
Frosted flatwoods salamander	<i>Ambystoma cingulatum</i>	FT	N/A	Not found in Martin County
Georgia blind salamander	<i>Haideotriton wallacei</i>	ST	N/A	Not found in Martin County
Reticulated flatwoods salamander	<i>Ambystoma bishopi</i>	FE	N/A	Not found in Martin County
<b>REPTILES</b>				
<b>Common Name</b>	<b>Scientific Name</b>	<b>Status</b>		
American alligator	<i>Alligator mississippiensis</i>	FT(S/A)	Minimal	May occur in ditches and wetlands
American crocodile	<i>Crocodylus acutus</i>	FT	N/A	Not found in Martin County
Atlantic salt marsh snake	<i>Nerodia clarkii taeniata</i>	FT	N/A	Not found in Martin County
Barbour's map turtle	<i>Graptemys barbouri</i>	ST	N/A	Not found in Martin County
Bluetail mole skink	<i>Eumeces egregius lividus</i>	FT	N/A	Not found in Martin County

Eastern indigo snake	<i>Drymarchon corais couperi</i>	FT	Minimal	May occur in pine flatwoods
Florida brownsnake (1)	<i>Storeria victa</i>	ST-3	N/A	Lower Keys population only
Florida Keys mole skink	<i>Eumeces egregius egregius</i>	ST	N/A	Not found in Martin County
Florida pine snake	<i>Pituophis melanoleucus mugitus</i>	ST	Moderate	May occur in pine flatwoods
Gopher tortoise	<i>Gopherus polyphemus</i>	ST	Confirmed	Burrow observed on-site
Green sea turtle	<i>Chelonia mydas</i>	FE-1	N/A	No appropriate habitat found on-site
Hawksbill sea turtle	<i>Eretmochelys imbricata</i>	FE-1	N/A	No appropriate habitat found on-site
Kemp's ridley sea turtle	<i>Lepidochelys kempii</i>	FE-1	N/A	No appropriate habitat found on-site
Key ringneck snake	<i>Diadophis punctatus acricus</i>	ST	N/A	Not found in Martin County
Leatherback sea turtle	<i>Dermochelys coriacea</i>	FE-1	N/A	No appropriate habitat found on-site
Loggerhead sea turtle	<i>Caretta caretta</i>	FE-1	N/A	No appropriate habitat found on-site
Rim rock crowned snake	<i>Tantilla oolitica</i>	ST	N/A	Not found in Martin County
Sand skink	<i>Neoseps reynoldsi</i>	FT	N/A	Not found in Martin County
Short-tailed snake	<i>Stilosoma extenuatum</i>	ST	N/A	Not found in Martin County
<b>BIRDS</b>				
<b>Common Name</b>	<b>Scientific Name</b>	<b>Status</b>		
American oystercatcher	<i>Haematopus palliatus</i>	ST	N/A	No appropriate habitat found on-site
Audubon's crested caracara	<i>Polyborus plancus audubonii</i>	FT	N/A	No appropriate habitat found on-site
Bachman's wood warbler	<i>Vermivora bachmanii</i>	FE	N/A	Not found in Martin County
Black skimmer	<i>Rynchops niger</i>	ST	N/A	No appropriate habitat found on-site
Cape Sable seaside sparrow	<i>Ammodramus maritimus mirabilis</i>	FE	N/A	Not found in Martin County
Eskimo curlew	<i>Numenius borealis</i>	FE	N/A	Not found in Martin County
Everglade snail kite	<i>Rostrhamus sociabilis plumbeus</i>	FE	N/A	No appropriate habitat found on-site
Florida burrowing owl	<i>Athene cunicularia floridana</i>	ST	N/A	No appropriate habitat found on-site
Florida grasshopper sparrow	<i>Ammodramus savannarum floridanus</i>	FE	N/A	No appropriate habitat found on-site
Florida sandhill crane	<i>Grus canadensis pratensis</i>	ST	High	Observed foraging in wetlands on-site
Florida scrub-jay	<i>Aphelocoma coerulescens</i>	FT	N/A	No appropriate habitat found on-site
Ivory-billed woodpecker	<i>Campephilus principalis</i>	FE	N/A	Not found in Martin County
Kirtland's wood warbler	<i>Dendroica kirtlandii</i> ( <i>Setophaga kirtlandii</i> )	FE	N/A	Not found in Martin County
Least tern*	<i>Sterna antillarum</i>	ST	N/A	No appropriate habitat found on-site
Little blue heron	<i>Egretta caerulea</i>	ST	High	Confirmed foraging in wetlands on-site
Marian's marsh wren	<i>Cistothorus palustris marianae</i>	ST	N/A	Not found in Martin County
Piping plover	<i>Charadrius melodus</i>	FT	N/A	No appropriate habitat found on-site
Red-cockaded woodpecker	<i>Picoides borealis</i>	FE	N/A	No appropriate habitat found on-site
Reddish egret	<i>Egretta rufescens</i>	ST	High	May use aquatic resources on-site
Roseate spoonbill	<i>Platalea ajaja</i>	ST	High	May use aquatic resources on-site
Roseate tern	<i>Sterna dougallii dougallii</i>	FT	N/A	No appropriate habitat found on-site
Rufa red knot	<i>Calidris cantus rufa</i>	FT	N/A	No appropriate habitat found on-site

Scott's seaside sparrow	<i>Ammodramus maritimus peninsulae</i>	ST	N/A	Not found in Martin County
Snowy plover	<i>Charadrius nivosus(Charadrius alexandrinus)</i>	ST	N/A	No appropriate habitat found on-site
Southeastern American kestrel	<i>Falco sparverius paulus</i>	ST	N/A	No appropriate habitat found on-site
Tricolored heron	<i>Egretta tricolor</i>	ST	High	May use aquatic resources on-site
Wakulla seaside sparrow	<i>Ammodramus maritimus juncicola</i>	ST	N/A	Not found in Martin County
White-crowned pigeon	<i>Patagioenas leucocephala</i>	ST	N/A	Not found in Martin County
Whooping crane	<i>Grus americana</i>	FXN	N/A	Extreme western Martin County only
Worthington's marsh wren	<i>Cistothorus palustris griseus</i>	ST	N/A	Not found in Martin County
Wood stork	<i>Mycteria americana</i>	FT	High	May use aquatic resources on-site
<b>MAMMALS</b>				
<b>Common Name</b>	<b>Scientific Name</b>	<b>Status</b>		
Anastasia Island beach mouse	<i>Peromyscus polionotus phasma</i>	FE	N/A	Not found in Martin County
Big Cypress fox squirrel	<i>Sciurus niger avicennia</i>	ST	N/A	Not found in Martin County
Choctawhatchee beach mouse	<i>Peromyscus polionotus allophrys</i>	FE	N/A	Not found in Martin County
Everglades mink	<i>Neovison vison evergladensis</i>	ST	N/A	Not found in Martin County
Finback whale	<i>Balaenoptera physalus</i>	FE-1	N/A	No appropriate habitat found on-site
Florida bonneted (mastiff) bat	<i>Eumops [=glaucinus] floridanus</i>	FE	N/A	Not documented north of Broward County
Florida panther	<i>Puma [=Felis] concolor coryi</i>	FE	N/A	Not found in Martin County
Florida salt marsh vole	<i>Microtus pennsylvanicus dukecampbelli</i>	FE	N/A	Not found in Martin County
Gray bat	<i>Myotis grisescens</i>	FE	N/A	Not found in Martin County
Gray wolf	<i>Canis lupus</i>	FE-2	N/A	Not found in Martin County
Humpback whale	<i>Megaptera novaeangliae</i>	FE-1	N/A	No appropriate habitat found on-site
Indiana bat	<i>Myotis sodalis</i>	FE	N/A	Not found in Martin County
Key deer	<i>Odocoileus virginianus clavium</i>	FE	N/A	Not found in Martin County
Key Largo cotton mouse	<i>Peromyscus gossypinus allapaticola</i>	FE	N/A	Not found in Martin County
Key Largo woodrat	<i>Neotoma floridana smalli</i>	FE	N/A	Not found in Martin County
Lower Keys rabbit	<i>Sylvilagus palustris hefneri</i>	FE	N/A	Not found in Martin County
North Atlantic right whale	<i>Eubalaena glacialis</i>	FE-1	N/A	No appropriate habitat found on-site
Perdido Key beach mouse	<i>Peromyscus polionotus trissyllepsis</i>	FE	N/A	Not found in Martin County
Red wolf	<i>Canis rufus</i>	FE	N/A	Not found in Martin County
Rice rat	<i>Oryzomys palustris natator</i>	FE-3	N/A	Not found in Martin County
Sanibel Island rice rat	<i>Oryzomys palustris sanibeli</i>	ST	N/A	Not found in Martin County
Sei whale	<i>Balaenoptera borealis</i>	FE-1	N/A	No appropriate habitat found on-site
Sherman's short-tailed shrew	<i>Blarina [=carolinensis] shermani</i>	ST	N/A	Not found in Martin County
Southeastern beach mouse	<i>Peromyscus polionotus niveiventris</i>	FT	N/A	No appropriate habitat on-site
Sperm whale	<i>Physeter catodon [=macrocephalus]</i>	FE-1	N/A	No appropriate habitat found on-site
St. Andrew beach mouse	<i>Peromyscus polionotus peninsularis</i>	FE	N/A	Not found in Martin County
West Indian manatee	<i>Trichechus manatus(Trichechus manatus latirostris)</i>	FE-1	N/A	No appropriate habitat found on-site



<b>INVERTEBRATES</b>				
<b>CORALS</b>				
<b>Common Name</b>	<b>Scientific Name</b>	<b>Status</b>		
Boulder star coral	<i>Orbicella franksi</i>	FT	N/A	No appropriate habitat on-site
Elkhorn coral	<i>Acropora palmata</i>	FT	N/A	No appropriate habitat on-site
Lobed star coral	<i>Orbicella annularis</i>	FT	N/A	No appropriate habitat on-site
Mountainous star coral	<i>Orbicella faveolata</i>	FT	N/A	No appropriate habitat on-site
Pillar coral	<i>Dendrogyra cylindricus</i>	ST	N/A	No appropriate habitat on-site
Rough cactus coral	<i>Mycetophyllia ferox</i>	FT	N/A	No appropriate habitat on-site
Staghorn coral	<i>Acropora cervicornis</i>	FT	N/A	No appropriate habitat on-site
<b>CRUSTACEANS</b>				
<b>Common Name</b>	<b>Scientific Name</b>	<b>Status</b>		
Black Creek crayfish	<i>Procambarus pictus</i>	ST	N/A	Not found in Martin County
Panama City crayfish	<i>Procambarus econfinae</i>	SSC	N/A	Not found in Martin County
Santa Fe Cave crayfish	<i>Procambarus erythropus</i>	ST	N/A	Not found in Martin County
Squirrel Chimney Cave shrimp	<i>Palaemonetes cummingi</i>	FT	N/A	Not found in Martin County
<b>INSECTS</b>				
<b>Common Name</b>	<b>Scientific Name</b>	<b>Status</b>		
American burying beetle	<i>Nicrophorus americanus</i>	FE	N/A	Not found in Martin County
Bartram's scrub-hairstreak	<i>Strymon acisbartrami</i>	FE	N/A	Not found in Martin County
Cassius blue butterfly	<i>Leptotes cassius theonus</i>	FT(S/A)	N/A	Listed as similar to Miami blue butterfly
Ceraunus blue butterfly	<i>Hemiargus ceraunus antibubastus</i>	FT(S/A)	N/A	Listed as similar to Miami blue butterfly
Miami blue butterfly	<i>Cyclargus thomasi bethunebakeri</i>	FE	N/A	Not found in Martin County
Nickerbean blue butterfly	<i>Cyclargus ammon</i>	FT(S/A)	N/A	Listed as similar to Miami blue butterfly
Schaus' swallowtail butterfly	<i>Heraclides aristodemus ponceanus</i>	FE	N/A	Not found in Martin County
<b>MOLLUSKS</b>				
<b>Common Name</b>	<b>Scientific Name</b>	<b>Status</b>		
Chipola slabshell (mussel)	<i>Elliptio chiplolaensis</i>	FT	N/A	Not found in Martin County
Choctaw bean	<i>Villosa choctawensis</i>	FE	N/A	Not found in Martin County
Fat threeridge (mussel)	<i>Amblema neislerii</i>	FE	N/A	Not found in Martin County
Fuzzy pigtoe	<i>Pleurobema strodeanum</i>	FT	N/A	Not found in Martin County
Gulf moccasinshell (mussel)	<i>Medionidus penicillatus</i>	FE	N/A	Not found in Martin County
Narrow pigtoe	<i>Fusconai escambia</i>	FT	N/A	Not found in Martin County
Ochlockonee moccasinshell(mussel)	<i>Medionidus simpsonianus</i>	FE	N/A	Not found in Martin County
Oval pigtoe (mussel)	<i>Pleurobema pyriforme</i>	FE	N/A	Not found in Martin County

Purple bankclimber (mussel)	<i>Elliptioideus slootianus</i>	FT	N/A	Not found in Martin County
Round ebonyshell	<i>Fusconaia rotulata</i>	FE	N/A	Not found in Martin County
Shinyrayed pocketbook(mussel)	<i>Lampsilis subangulata</i>	FE	N/A	Not found in Martin County
Southern kidneyshell	<i>Ptychobranthus jonesi</i>	FE	N/A	Not found in Martin County
Southern sandshell	<i>Hamiota australis</i>	FT	N/A	Not found in Martin County
Stock Island tree snail	<i>Orthalicus reses [not incl. nesodryas]</i>	FT	N/A	Not found in Martin County
Tapered pigtoe	<i>Fusconaia burki</i>	FT	N/A	Not found in Martin County
<b>KEY TO ABBREVIATIONS AND NOTATIONS</b>				
FWC = Florida Fish and Wildlife Conservation Commission				
FE = Federally Endangered				
FT = Federally Threatened				
SE = State Endangered				
ST = State Threatened				
SSC = Species of Special Concern				
FXN = Federal Experimental Non-Essential Population				
1 - A species for which FWC does not have constitutional authority				
2 - Not documented in Florida				
3 - Lower Keys population only				
* - Least Tern may appear during clearing activities				

TABLE 2		Preserve at Park Trace					
FEDERALLY ENDANGERED AND THREATENED PLANT SPECIES							
fdacs.gov, 2021 website download							
Plant Species	(FE) Federal Endangered (FT) Federal Threatened	Common Name	Recent Synonyms	Plant Family	Habitat	Distribution in Florida	NOTES
<i>Amorpha crenulata</i> Rydberg	FE	Miami lead plant	<i>A. herbacea</i> Walter var. <i>crenulata</i> (Rydb.) Isely	Leguminosae/Fabaceae (Legume Family)	pine rocklands, marl prairies	Miami-Dade County (endemic to FL)	Not found in Martin County
<i>Asimina tetramera</i> Small	FE	four-petal pawpaw	none	Annonaceae (Custard-apple Family)	scrub	Martin and Palm Beach counties (endemic to FL)	No appropriate habitat on-site
<i>Brickellia mosieri</i> (Small) Shinnery	FE	Brickell-bush	<i>B. eupatorioides</i> L. var. <i>floridana</i> (Long) Turner; <i>Kuhnia eupatorioides</i> L. var. <i>gracilis</i> Torrey & Gray	Compositae/ Asteraceae (Daisy Family)	pine rocklands, sandy soil over limestone	Miami-Dade County (endemic to FL)	Not found in Martin County
<i>Campanula robinisiae</i> Small (EF)	FE	Chinsegut bellflower	none	Campanulaceae (Bellflower Family)	edge of ponds, wet hammocks	Hernando and Hillsborough counties (endemic to FL)	Not found in Martin County
<i>Pilosocereus robinii</i> (Lem.) Byles and Rowley	FE	Keys tree cactus	<i>P. polygonus</i> (Lam.) Byles and Rowley	Cactaceae (Cactus Family)	rockland hammocks	Monroe (Keys only) County	Not found in Martin County
<i>Chamaesyce deltoidea</i> (Engelm. ex Chapm.) Small (FE, as <i>Euphorbia</i> )	FE	rockland spurge	<i>Euphorbia deltoidea</i> Engelm. ex Chapm.	Euphorbiaceae (Spurge Family)	pine rocklands	Miami-Dade and Monroe counties (endemic to FL)	Not found in Martin County
<i>Chionanthus pygmaeus</i> Small	FE	Pygmy fringe-tree	none	Oleaceae (Olive Family)	scrub	DeSoto, Highlands, Hillsborough, Lake, Manatee, Osceola, Polk, Sarasota and Seminole counties (endemic to FL)	Not found in Martin County

<i>Chrysopsis floridana</i> Small	FE	Florida golden-aster	none	Compositae/Asteraceae (Daisy Family)	sand pine scrub	Hardee, Hillsborough, Manatee and Pinellas counties (endemic to FL)	Not found in Martin County
<i>Cladonia perforata</i> Evans	FE	Florida perforate lichen	none	Cladoniaceae (Reindeer Lichen Family)	sandhills	Highlands, Manatee, Martin, Okaloosa, Palm Beach and Polk counties (endemic to FL)	No appropriate habitat on-site
<i>Conradina brevifolia</i> Shinners	FE	short-leaved rosemary	usually included in <i>C. canescens</i> Gray	Labiatae/Lamiaceae (Mint Family)	sand pine scrub	Hernando, Highlands and Polk counties (endemic to FL)	Not found in Martin County
<i>Conradina etonia</i> Kral & McCartney	FE	Etonia rosemary	none	Labiatae/Lamiaceae (Mint Family)	clearings in sand pine scrub	Putnam County (endemic to FL)	Not found in Martin County
<i>Conradina glabra</i> Shinners	FE	Apalachicola rosemary	none	Labiatae/Lamiaceae (Mint Family)	sandhills	Liberty and Santa Rosa counties (endemic to FL)	Not found in Martin County
<i>Crotalaria avonensis</i> K.R. Delaney & Wunderlin	FE	Avon Park harebells	none	Leguminosae/Fabaceae (Legume Family)	white sand scrub	Highlands and Polk counties (endemic to FL)	Not found in Martin County
<i>Cucurbita okeechobeensis</i> (Small) Bailey	FE	Okeechobee gourd	none	Cucurbitaceae (Gourd Family)	wet hammocks, ditch banks	Glades, Lake, Palm Beach, Seminole and Volusia counties (endemic to FL)	Not found in Martin County
<i>Deeringothamnus pulchellus</i> Small	FE	white squirrel-banana	<i>D. rugelii</i> (B.L. Robinson) Small var. <i>pulchellus</i> (Small) D.B. Ward	Annonaceae (Custard-apple Family)	grassy flatwoods	Charlotte, Lee and Orange counties (endemic to FL)	Not found in Martin County
<i>Deeringothamnus rugelii</i> (B.L. Robinson) Small	FE	yellow squirrel-banana	<i>Asimina rugelii</i>	Annonaceae (Custard-apple Family)	wet pine flatwoods	Volusia County (endemic to FL)	Not found in Martin County
<i>Dicerandra christmanii</i> Huck & Judd	FE	Christman's mint	none	Labiatae/Lamiaceae (Mint Family)	oak scrub	Highlands County (endemic to FL)	Not found in Martin County

<b><i>Dicerandra cornutissima</i></b> Huck	FE	Robin's mint	none	Labiatae/Lamiaceae (Mint Family)	sand pine scrub, oak scrub, sandhills	Marion and Sumter counties (endemic to FL)	Not found in Martin County
<b><i>Dicerandra frutescens</i></b> Shinnars	FE	Lloyd's mint	none	Labiatae/Lamiaceae (Mint Family)	sand pine scrub	Highlands and Polk counties (endemic to FL)	Not found in Martin County
<b><i>Dicerandra immaculata</i></b> Lakela	FE	Olga's mint	none	Labiatae/Lamiaceae (Mint Family)	sand pine scrub	Indian River and St. Lucie counties (endemic to FL)	Not found in Martin County
<b><i>Eryngium cuneifolium</i></b> Small	FE	scrub eryngium	none	Umbelliferae/Apiaceae (Carrot Family)	sand pine scrub	Highlands County (endemic to FL)	Not found in Martin County
<b><i>Eupatorium frustatum</i></b> B.L. Robinson	FE	Cape Sable thoroughwort	listed in Federal Register as <i>Chromolaena frustrata</i> (B.L. Robinson) King and H. Robinson	Compositae/Asteraceae (Daisy Family)	coastal hammocks	Monroe County (endemic to FL)	Not found in Martin County
<b><i>Galactia smallii</i></b> H.F. Rogers ex Herndon	FE	Small's milkpea	sometimes lumped into <i>G. regularis</i> (L.) Britton <i>et. al</i>	Leguminosae/Fabaceae (Legume Family)	pine rocklands	Miami-Dade County (endemic to FL)	Not found in Martin County
<b><i>Harperocalis flava</i></b> McDaniel	FE	Harper's beauty	none	Tofieldiaceae (False Asphodel Family) or Liliaceae (Lily Family)	bogs, edges of swamps, roadsides	Franklin and Liberty counties (endemic to FL)	Not found in Martin County
<b><i>Harrisia eriophora</i></b> (Pfeiffer) Britton	FE	Indian River prickly-apple	<i>Harrisia fragrans</i> Small; listed in Federal Register as <i>Cereus eriophorus</i> Pfeiffer var. <i>fragrans</i> (Small) Benson	Cactaceae (Cactus Family)	coastal hammocks, scrubby flatwoods	Brevard, Indian River, St. Lucie and Volusia counties	Not found in Martin County

<b><i>Harrisia gracilis</i></b> (Miller) Britton	FE	West Coast prickly-apple	listed in Federal Register as <i>H. aboriginum</i> Small ex Britton. Now recognized to be 2 species: <i>H. aboriginum</i> Small ex Britton and Rose and <i>H. simpsonii</i> Small ex Britton and Rose	Cactaceae (Cactus Family)	Shell middens, maritime hammocks	Brevard, Indian River, Lee, Manatee, Miami-Dade, Monroe and St. Lucie counties (endemic to FL)	Not found in Martin County
<b><i>Hypericum cumulicola</i></b> (Small) Adams	FE	Highlands scrub hypericum	none	Guttiferae/Clusiaceae (Garcinia Family)	sand pine scrub	Highlands and Polk counties (endemic to FL)	Not found in Martin County
<b><i>Jacquemontia reclinata</i></b> House	FE	beach clustervine	none	Convolvulaceae (Morning-glory Family)	beach dunes, strand openings	Broward, Martin, Miami-Dade and Palm Beach counties (endemic to FL)	No appropriate habitat on-site
<b><i>Justicia cooleyi</i></b> Monachino & Leonard	FE	Cooley's water-willow	none	Acanthaceae (Acanthus Family)	moist to seasonally wet rocky woods	Hernando, Lake and Sumter counties (endemic to FL)	Not found in Martin County
<b><i>Liatis ohlingerae</i></b> (Blake) B.L. Robinson	FE	scrub blazing-star	none	Compositae/Asteraceae (Daisy Family)	sand pine scrub	Highlands and Polk counties (endemic to FL)	Not found in Martin County
<b><i>Lindera melissifolia</i></b> (Walter) Blume	FE	pondberry	none	Lauraceae (Laurel Family)	limestone sinks, moist, shallow depressions	Gadsden County	Not found in Martin County
<b><i>Linum carteri</i></b> Small	FE	Everglades flax	two varieties are recognized: var. <i>carteri</i> and var. <i>smallii</i> Rogers	Linaceae (Flax Family)	pine rocklands, roadsides	Collier, Hendry, Miami-Dade and Monroe counties (endemic to FL)	Not found in Martin County
<b><i>Lupinus aridorum</i></b> McFarlin ex Beckner	FE	McFarlin's lupine	<i>L. westianus</i> Small var. <i>aridorum</i> (McFarlin ex Beckner) Isely	Leguminosae/Fabaceae (Legume Family)	sand pine scrub	Orange, Osceola and Polk counties (endemic to FL)	Not found in Martin County

<b><i>Nolina brittoniana</i></b> Nash	FE	Britton's bear-grass	none	Agavaceae (Agave Family) or Ruscaceae (Butcher's-broom Family)	dry pinewoods, sand pine scrub	Hernando Highlands, Lake, Marion, Orange, Osceola, Pasco and Polk counties (endemic to FL)	Not found in Martin County
<b><i>Opuntia corallicola</i></b> (Small) Werdemann in Backeberg	FE	semaphore cactus	listed in Federal Register as <i>Consolea corallicola</i> Small; <i>O. spinosissima</i> (Martyn) P. Miller; <i>Consolea corallicola</i> Small	Cactaceae (Cactus Family)	rocky hammocks	Miami-Dade and Monroe (Keys only) counties	Not found in Martin County
<b><i>Polygala lewtonii</i></b> Small	FE	Lewton's polygala	none	Polygalaceae (Milkwort Family)	white sand scrub	Brevard, Highlands, Lake, Marion, Orange, Osceola and Polk counties (endemic to FL)	Not found in Martin County
<b><i>Polygala smallii</i></b> R.R. Sm. & Ward	FE	tiny polygala	none	Polygalaceae (Milkwort Family)	pine rocklands, rosemary scrub, sandhills	Broward, Martin, Miami-Dade, Palm Beach and St. Lucie counties (endemic to FL)	No appropriate habitat on-site
<b><i>Polygonella basiramia</i></b> (Small) Nesom & Bates	FE	tufted wireweed	<i>P. ciliata</i> Meisner var. <i>basiramea</i> (Small) Horton	Polygonaceae (Buckwheat Family)	sand pine scrub, rosemary scrub	Highlands and Polk counties (endemic to FL)	Not found in Martin County
<b><i>Polygonella myriophylla</i></b> (Small) Horton	FE	sandlace	none	Polygonaceae (Buckwheat Family)	scrub	Highlands, Orange, Osceola and Polk counties (endemic to FL)	Not found in Martin County
<b><i>Prunus geniculata</i></b> Harper	FE	scrub plum	none	Rosaceae (Rose Family)	sand pine scrub	Highlands, Lake, Orange and Polk counties (endemic to FL)	Not found in Martin County
<b><i>Rhododendron chapmanii</i></b> Gray	FE	Chapman's rhododendron	<i>R. minus</i> Michaux var. <i>chapmanii</i> (Gray) Duncan and Pullen	Ericaceae (Heath Family)	pine flatwoods, edges of swamps	Clay, Gadsden, Franklin, Gulf, Leon and Liberty counties (endemic to FL)	Not found in Martin County
<b><i>Rhus michauxii</i></b> Sargent	FE	Michaux's sumac	none	Anacardiaceae (Cashew Family)	sandy or rocky open woods	Alachua County (not recently seen)	Not found in Martin County

<i>Schwalbea americana</i> L.	FE	chaff-seed	none	Orobanchaceae (Broomrape Family) or Scrophulariaceae (Figwort Family)	savannas, pinelands	Brevard, Duval, Gadsden, Highlands, Levy, Manatee, Polk, Putnam and Volusia counties	Not found in Martin County
<i>Silene polypetala</i> (Walter) Fernald & Schubert	FE	fringed pink	<i>S. catesbaei</i> Walter	Caryophyllaceae (Pink Family)	rich bluffs	Gadsden and Jackson counties	Not found in Martin County
<i>Spigelia gentianoides</i> Chapman	FE	gentian pinkroot	none	Strychnaceae (Strychnine Family) or Loganiaceae (Logania Family)	oak-pine woods	Calhoun, Jackson and Washington counties	Not found in Martin County
<i>Thalictrum cooleyi</i> Ahles	FE	Cooley's meadow-rue	none	Ranunculaceae (Buttercup Family)	savannas, bogs	Walton County	Not found in Martin County
<i>Torreya taxifolia</i> Arnott	FE	Florida torreyia	none	Taxaceae (Yew Family)	rich wooded slopes of ravines and bluffs	Gadsden, Jackson and Liberty counties	Not found in Martin County
<i>Warea amplexifolia</i> (Nuttall) Small	FE	clasping warea	none	Cruciferae/Brassicaceae (Mustard Family)	dry pinelands, sandhills	Lake, Orange, Osceola and Polk counties (endemic to FL)	Not found in Martin County
<i>Warea carteri</i> Small	FE	Carter's mustard	none	Cruciferae/Brassicaceae (Mustard Family)	pinelands, scrub, sandhills	Brevard, Glades, Highlands, Miami-Dade and Polk counties (endemic to FL)	Not found in Martin County
<i>Ziziphus celata</i> Judd & D.W. Hall	FE	scrub ziziphus	none	Rhamnaceae (Buckthorn Family)	sand pine scrub	Highlands and Polk counties (endemic to FL)	Not found in Martin County
<i>Bonamia grandiflora</i> (Gray) Haller f.	FT	Florida bonamia	none	Convolvulaceae (Morning-glory Family)	Sandy soil, scrub	Highlands, Hillsborough, Lake, Manatee, Marion, Orange, Polk and Sarasota counties (endemic to Florida)	Not found in Martin County
<i>Chamaesyce garberi</i> (Engelm. ex Chapm.) Small (FT, as Euphorbia)	FT	Garber's spurge	<i>Euphorbia garberi</i> Engelm. ex Chapm.	Euphorbiaceae (Spurge Family)	pine rocklands, coastal grassland	Miami-Dade and Monroe counties (endemic to FL)	Not found in Martin County



<i>Clitoria fragrans</i> Small	FT	pigeon wings	none	Leguminosae/Fabaceae (Legume Family)	sandhills, scrub, scrubby flatwoods	Highlands, Lake, Orange and Polk counties (endemic to FL)	Not found in Martin County
<i>Eriogonum longifolium</i> Nuttall var. <i>gnaphalifolium</i> Gandog	FT	scrub buckwheat	none	Polygonaceae (Buckwheat Family)	sandhills, scrub	Highlands, Lake, Marion, Orange, Osceola, Polk, Putnam, Seminole and Sumter counties (endemic to FL)	Not found in Martin County
<i>Euphorbia telephioides</i> Chapman	FT	Telephus spurge	none	Euphorbiaceae (Spurge Family)	wet flatwoods	Bay, Franklin and Gulf counties (endemic to FL)	Not found in Martin County
<i>Macbridea alba</i> Chapmann	FT	white birds-in-a-nest	none	Labiatae/Lamiaceae (Mint Family)	wet flatwoods, savannahs	Bay, Franklin, Gulf and Liberty counties (endemic to FL)	Not found in Martin County
<i>Paronychia chartacea</i> Fernald	FT	papery whitlow-wort	none	Caryophyllaceae (Pink Family)	scrub	Bay, Highlands, Lake, Orange, Osceola, Polk and Washington counties (endemic to FL)	Not found in Martin County
<i>Pinguicula ionantha</i> Godfrey	FT	Panhandle butterwort	none	Lentibulariaceae (Bladderwort Family)	flatwoods, bogs	Bay, Franklin, Gulf, Liberty and Wakulla counties (endemic to FL)	Not found in Martin County
<i>Scutellaria floridana</i> Chapman	FT	Florida skullcap	none	Labiatae/Lamiaceae (Mint Family)	wet flatwoods	Franklin, Gulf and Liberty counties (endemic to FL)	Not found in Martin County

<i>Sideroxylon reclinatum</i> Michx. subsp. <b>austrofloridense</b> (Whetstone)Kartesz & Gandhi	<b>FT</b>	Florida bully	none	Sapotaceae (Sapote Family)	calcareous glades	Miami-Dade and Monroe counties	Not found in Martin County
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## APPENDIX A

Figure 1 – Location Map

Figure 2 – USGS Quadrangle Map

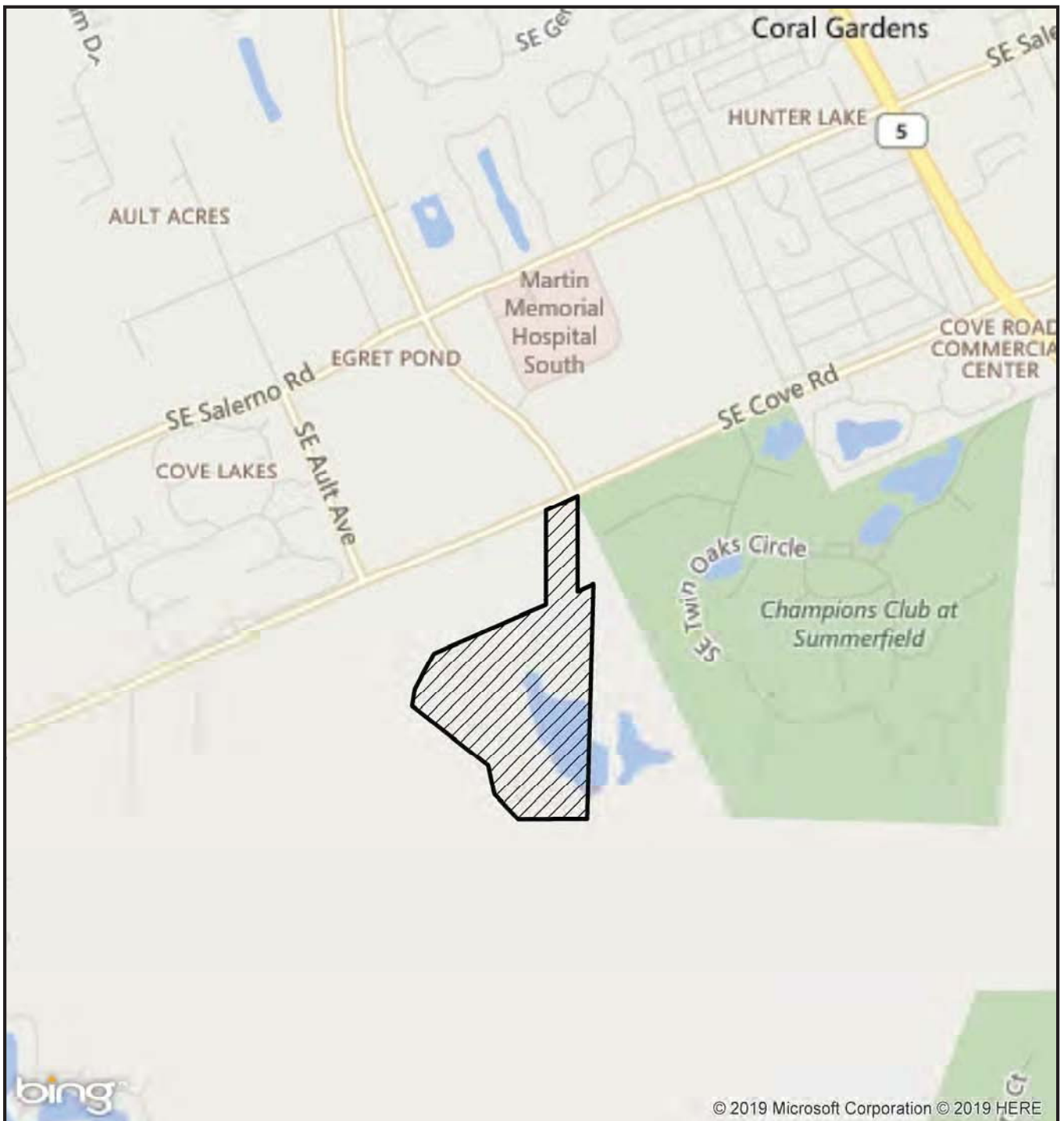
Figure 3 – 2020 Aerial Photograph

Figure 4 – FLUCCS/FNAI Land Cover Map

Figures 5 – FFWCC Wading Bird Colonies

Figure 6 – FFWCC Eagle Nest Locations

Figure 7 – Listed Species Observations



# LEGEND

 - SITE (97.0+/- AC)

0 2,000 Feet

## THE PRESERVE AT PARK TRACE LOCATION MAP

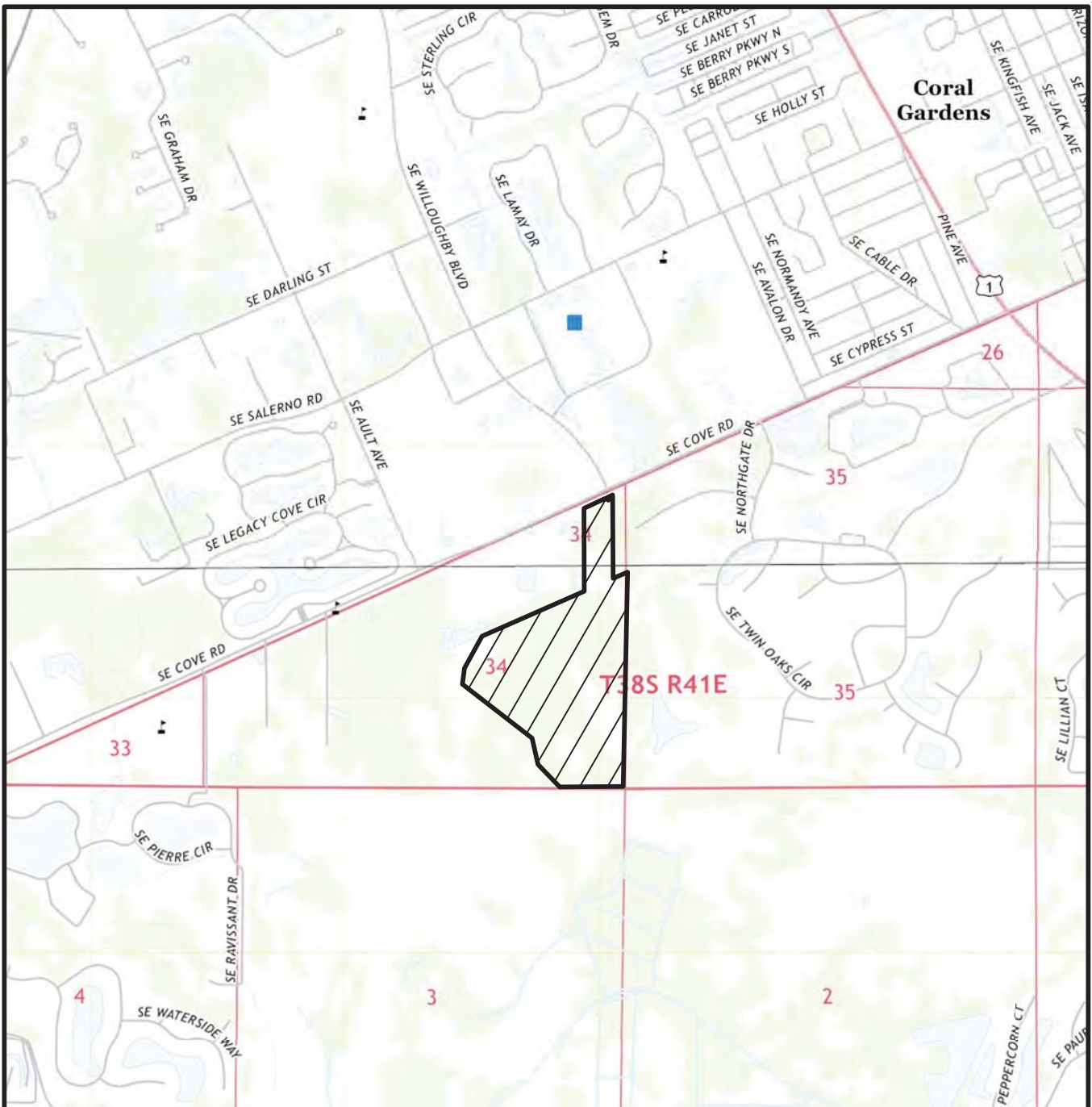


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STUART, FL 34996  
772-287-8771 FAX 772-287-2988  
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MAY 2020

FIGURE

1



USGS QUAD MAP "ST LUCIE INLET" SECTION 34, TOWNSHIP 38 SOUTH, RANGE 41 EAST, STUART, MARTIN COUNTY, FLORIDA, LATITUDE 27°07'16.16" LONGITUDE -80°13'29.82"

### LEGEND

 - SITE (97.0± AC)

0 2000  
SCALE IN FEET



## THE PRESERVE AT PARK TRACE QUAD



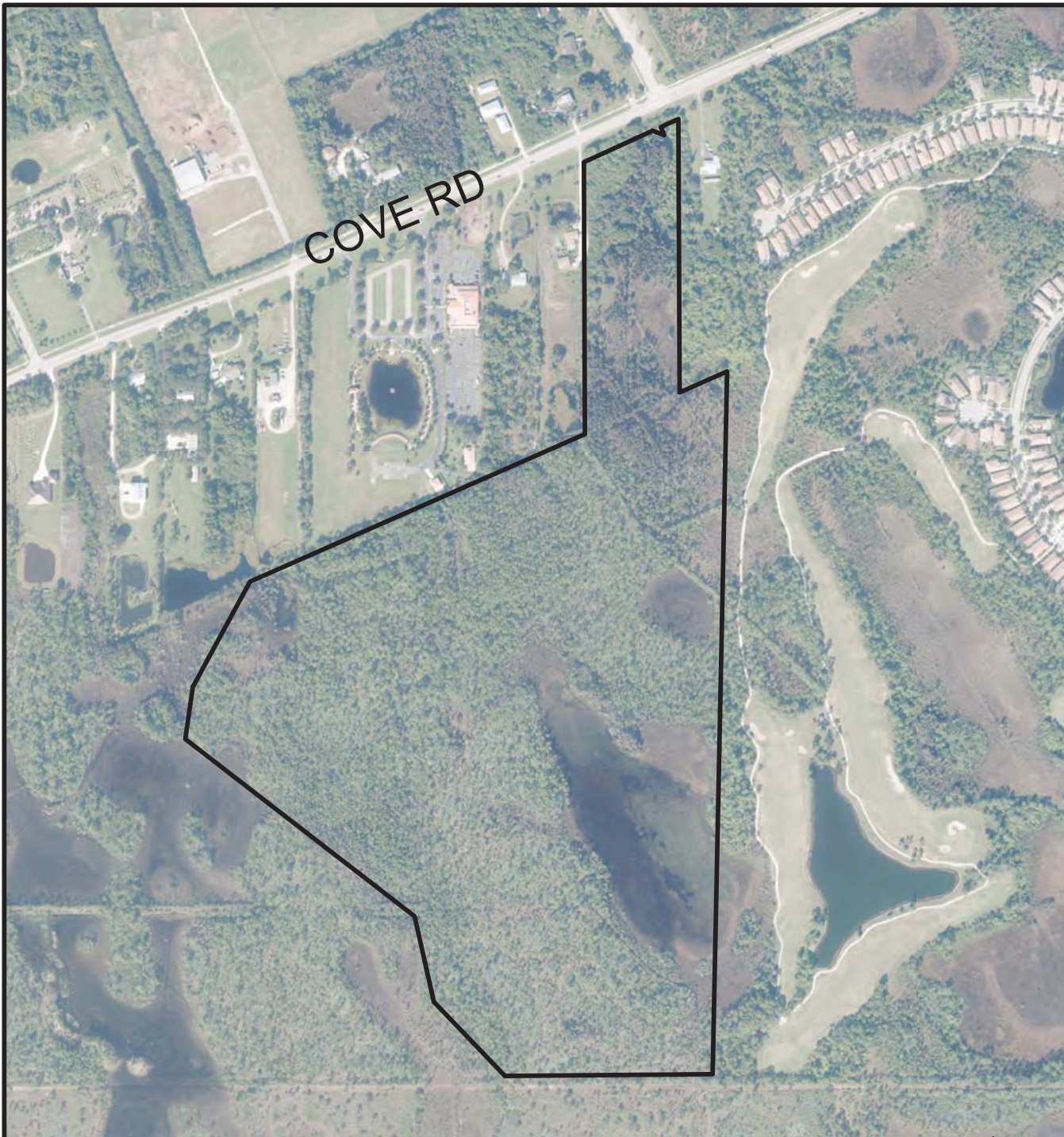
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**FIGURE**

**2**





COVE RD

MARTIN COUNTY AERIAL DATED 2020

0 600  
SCALE IN FEET



# THE PRESERVE AT PARK TRACE AERIAL



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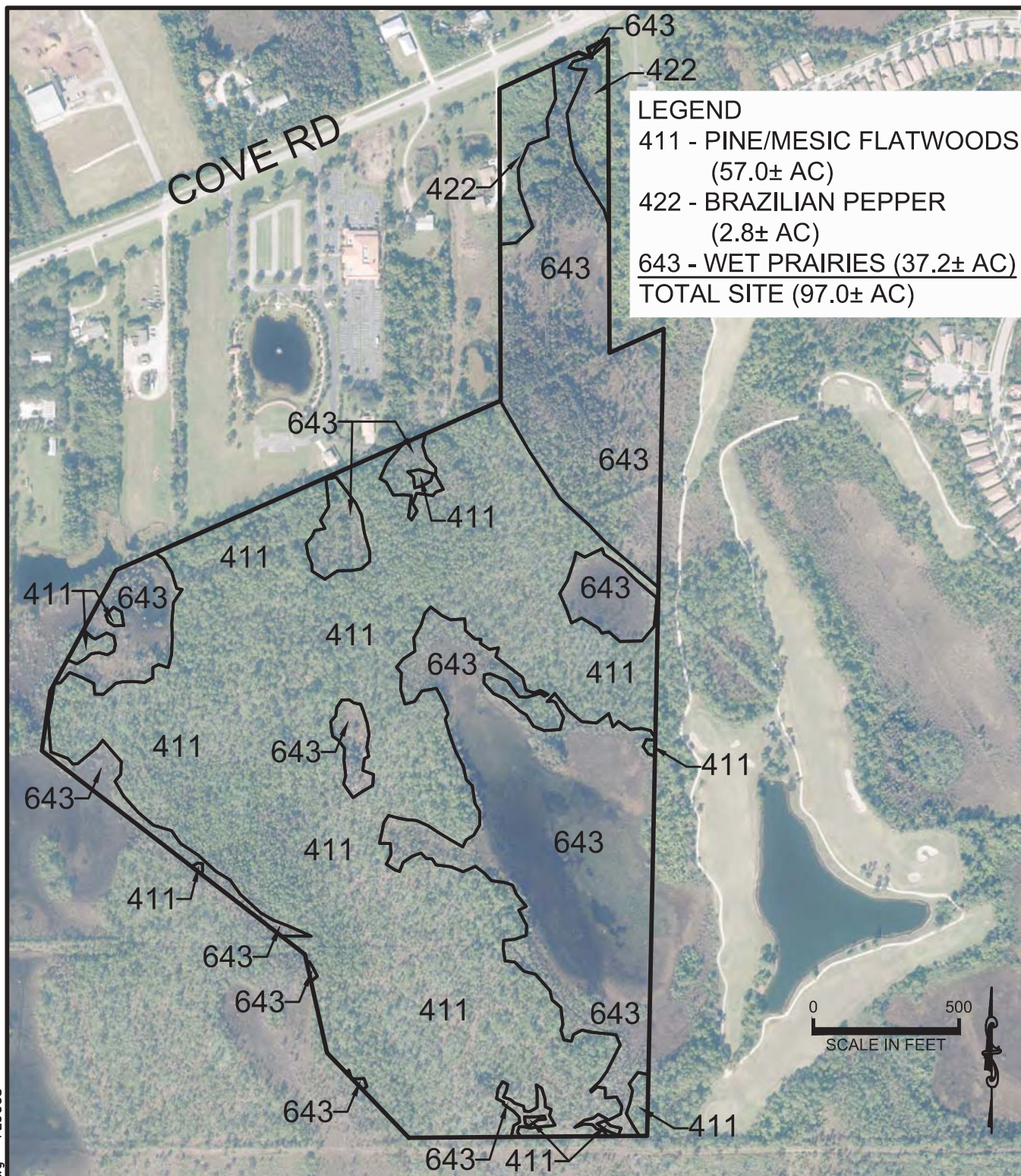
**MAY 2020**

**FIGURE**

**3**



D R Horton The Preserve at Park Trace.dwg FLUCCS



MARTIN COUNTY AERIAL DATED 2020

## THE PRESERVE AT PARK TRACE FLUCCS



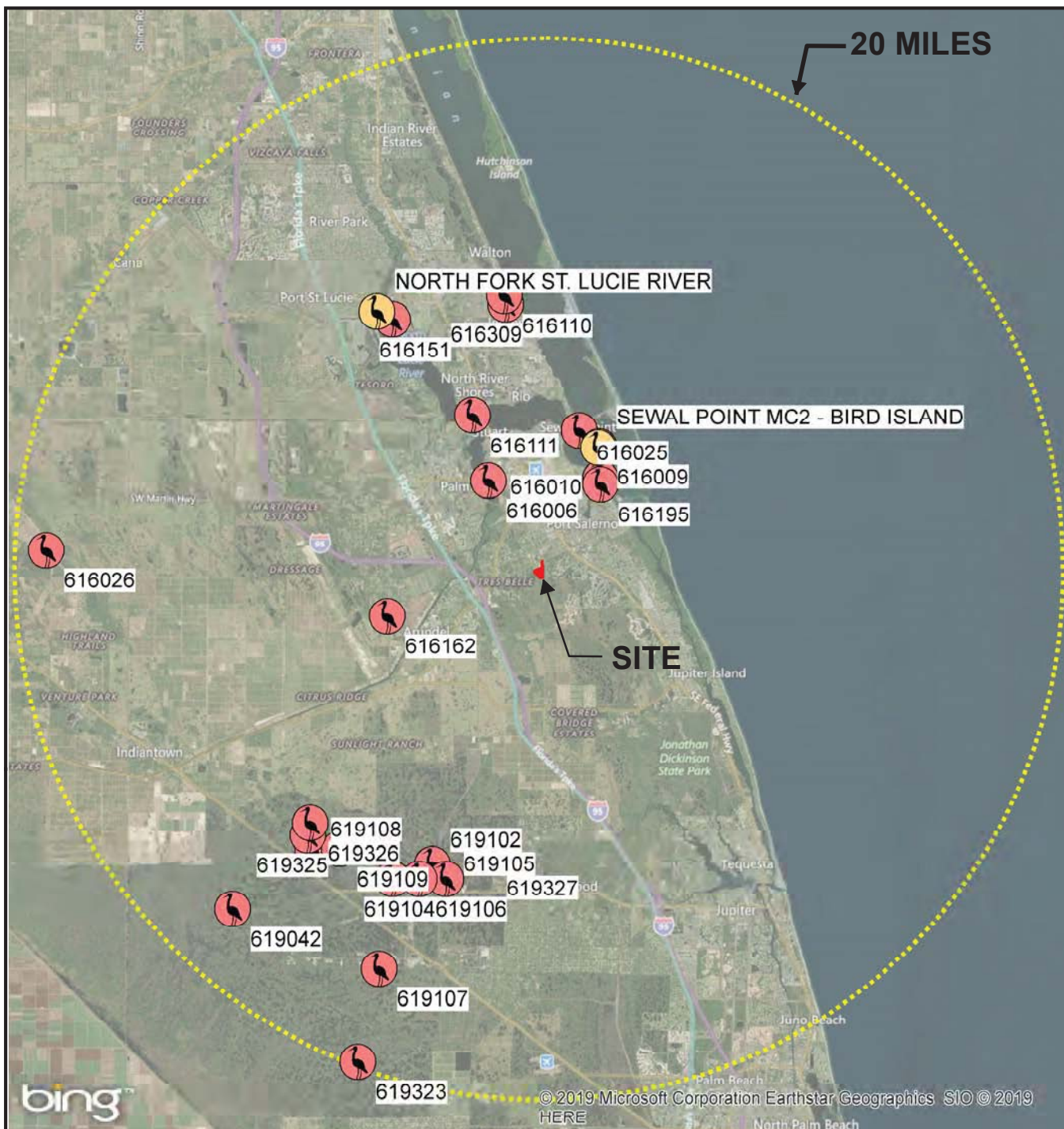
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**FIGURE**

**4**





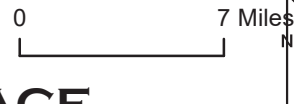
### LEGEND



WOST COLONIES ACTIVE 2008-2017



WADING BIRD ROOKERIES 1999



## THE PRESERVE AT PARK TRACE WOODSTORK & WADING BIRDS



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FIGURE

**5**





# LEGEND



FFWC EAGLE NESTING 2016

0 3 Miles



## THE PRESERVE AT PARK TRACE EAGLE NESTING MAP



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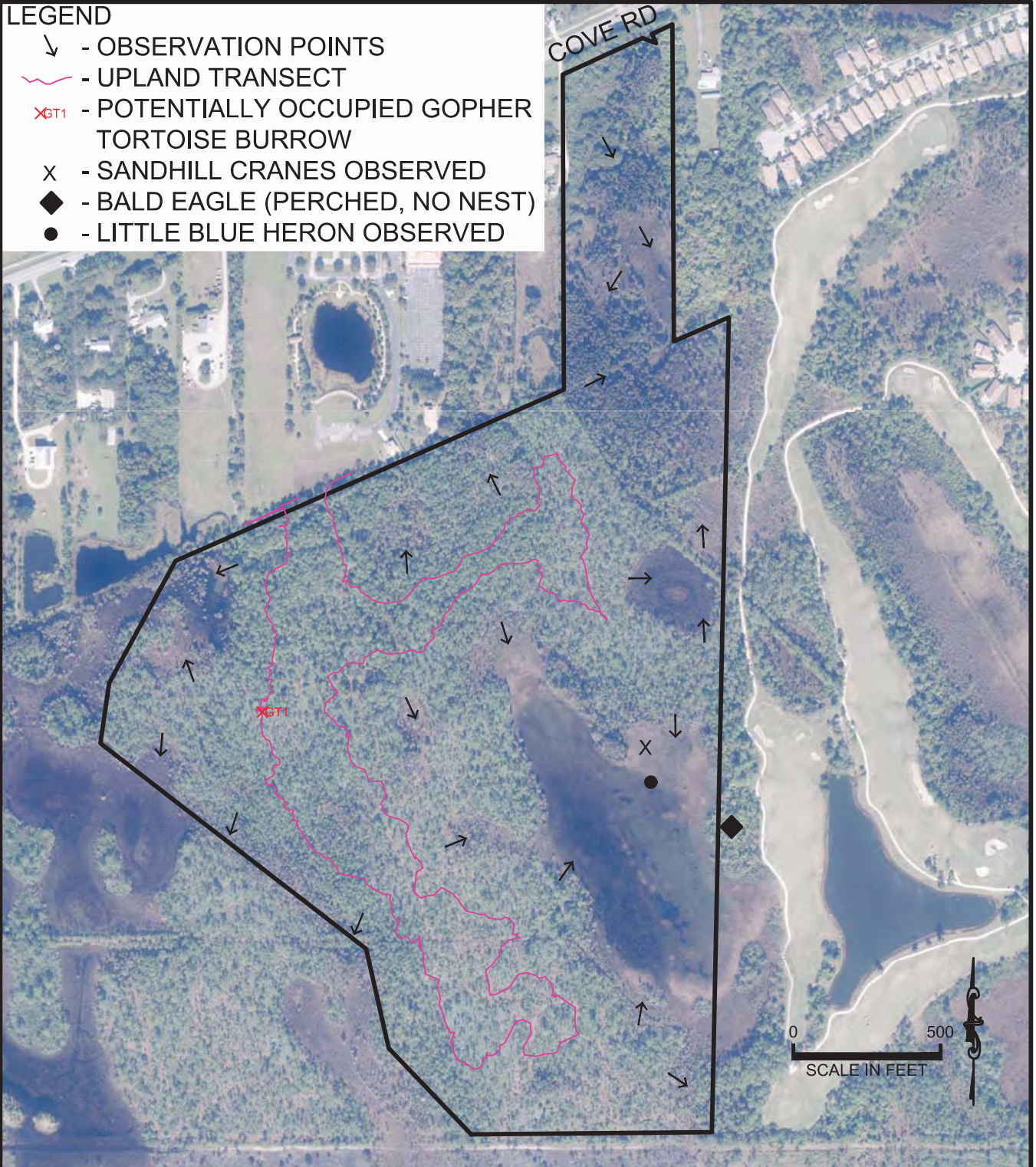
FIGURE

**6**



# LEGEND

- ↓ - OBSERVATION POINTS
- ~ - UPLAND TRANSECT
- XGT1 - POTENTIALLY OCCUPIED GOPHER TORTOISE BURROW
- X - SANDHILL CRANES OBSERVED
- ◆ - BALD EAGLE (PERCHED, NO NEST)
- - LITTLE BLUE HERON OBSERVED



MARTIN COUNTY AERIAL DATED 2021

## THE PRESERVE AT PARK TRACE LISTED SPECIES OBSERVATIONS 2020-2021



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**FIGURE**

**7**

# APPENDIX B

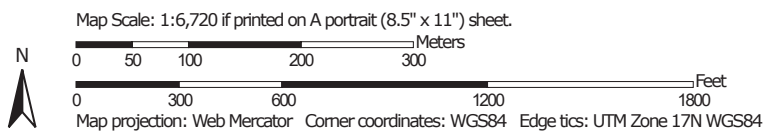
USDA/NRCS Soils Report



Soil Map—Martin County, Florida  
(THE PRESERVE AT PARK TRACE)



Soil Map may not be valid at this scale.



**Natural Resources  
Conservation Service**


Web Soil Survey  
National Cooperative Soil Survey

5/27/2020  
Page 1 of 3

Soil Map—Martin County, Florida  
(THE PRESERVE AT PARK TRACE)

## MAP LEGEND

### Area of Interest (AOI)

 Area of Interest (AOI)


### Soils


 Soil Map Unit Polygons

 Soil Map Unit Lines

 Soil Map Unit Points

### Special Point Features

 Blowout

 Borrow Pit

 Clay Spot

 Closed Depression

 Gravel Pit

 Gravelly Spot

 Landfill

 Lava Flow

 Marsh or swamp

 Mine or Quarry

 Miscellaneous Water

 Perennial Water

 Rock Outcrop

 Saline Spot

 Sandy Spot

 Severely Eroded Spot

 Sinkhole

 Slide or Slip

 Sodic Spot

 Spoil Area

 Stony Spot

 Very Stony Spot

 Wet Spot

 Other

 Special Line Features

### Transportation

 Rails

 Interstate Highways

 US Routes

 Major Roads

 Local Roads

### Background

 Aerial Photography

## MAP INFORMATION

The soil surveys that comprise your AOI were mapped at 1:20,000.

Warning: Soil Map may not be valid at this scale.

Enlargement of maps beyond the scale of mapping can cause misunderstanding of the detail of mapping and accuracy of soil line placement. The maps do not show the small areas of contrasting soils that could have been shown at a more detailed scale.

Please rely on the bar scale on each map sheet for map measurements.

Source of Map: Natural Resources Conservation Service

Web Soil Survey URL:

Coordinate System: Web Mercator (EPSG:3857)

Maps from the Web Soil Survey are based on the Web Mercator projection, which preserves direction and shape but distorts distance and area. A projection that preserves area, such as the Albers equal-area conic projection, should be used if more accurate calculations of distance or area are required.

This product is generated from the USDA-NRCS certified data as of the version date(s) listed below.

Soil Survey Area: Martin County, Florida

Survey Area Data: Version 18, Sep 17, 2019

Soil map units are labeled (as space allows) for map scales 1:50,000 or larger.

Date(s) aerial images were photographed: Mar 8, 2019—Mar 28, 2019

The orthophoto or other base map on which the soil lines were compiled and digitized probably differs from the background imagery displayed on these maps. As a result, some minor shifting of map unit boundaries may be evident.

## Map Unit Legend

Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
2	Lawnwood and Myakka fine sands	54.1	55.8%
4	Waveland and Immokalee fine sands	14.6	15.1%
5	Waveland and Lawnwood fine sands, depressional	28.3	29.1%
<b>Totals for Area of Interest</b>		<b>97.0</b>	<b>100.0%</b>

# EXHIBIT 1

SFWMD Wetland Determination



## SOUTH FLORIDA WATER MANAGEMENT DISTRICT

February 18, 2020

*\* Delivered via email*

John Maiucci \*  
55 SE Osceola Street  
Stuart, FL 34994

**Subject: Via Claudia**  
**Application No. 191112-2285**  
**Informal Wetland Determination No. 43-102922-P**  
**Martin County**

Dear Mr. Maiucci:

The District reviewed your request for an informal determination of the jurisdictional wetland and other surface water boundaries within the subject property, which is located as shown on the attached Exhibit 1. A joint site inspection was conducted on December 5, 2019.

Based on the information provided and the results of the site inspection, jurisdictional wetlands and other surface waters as defined in Chapter 62-340, Florida Administrative Code, exist on the property. Exhibit 2, attached, identifies the boundaries of the property inspected and the approximate landward limits of the wetlands and other surface waters.

This correspondence is an informal jurisdictional wetland determination pursuant to Section 373.421(6), Florida Statutes, and Section 7.3 of Environmental Resource Permit Applicant's Handbook Volume I. It does not bind the District, its agents or employees, nor does it convey any legal rights, expressed or implied. Persons obtaining this informal jurisdictional determination are not entitled to rely upon it for purposes of compliance with provision of law or District rules.

Sincerely,

A handwritten signature in black ink that reads "Barbara Conmy".

Barbara Conmy  
Section Leader

c: Paul Ezzo \*

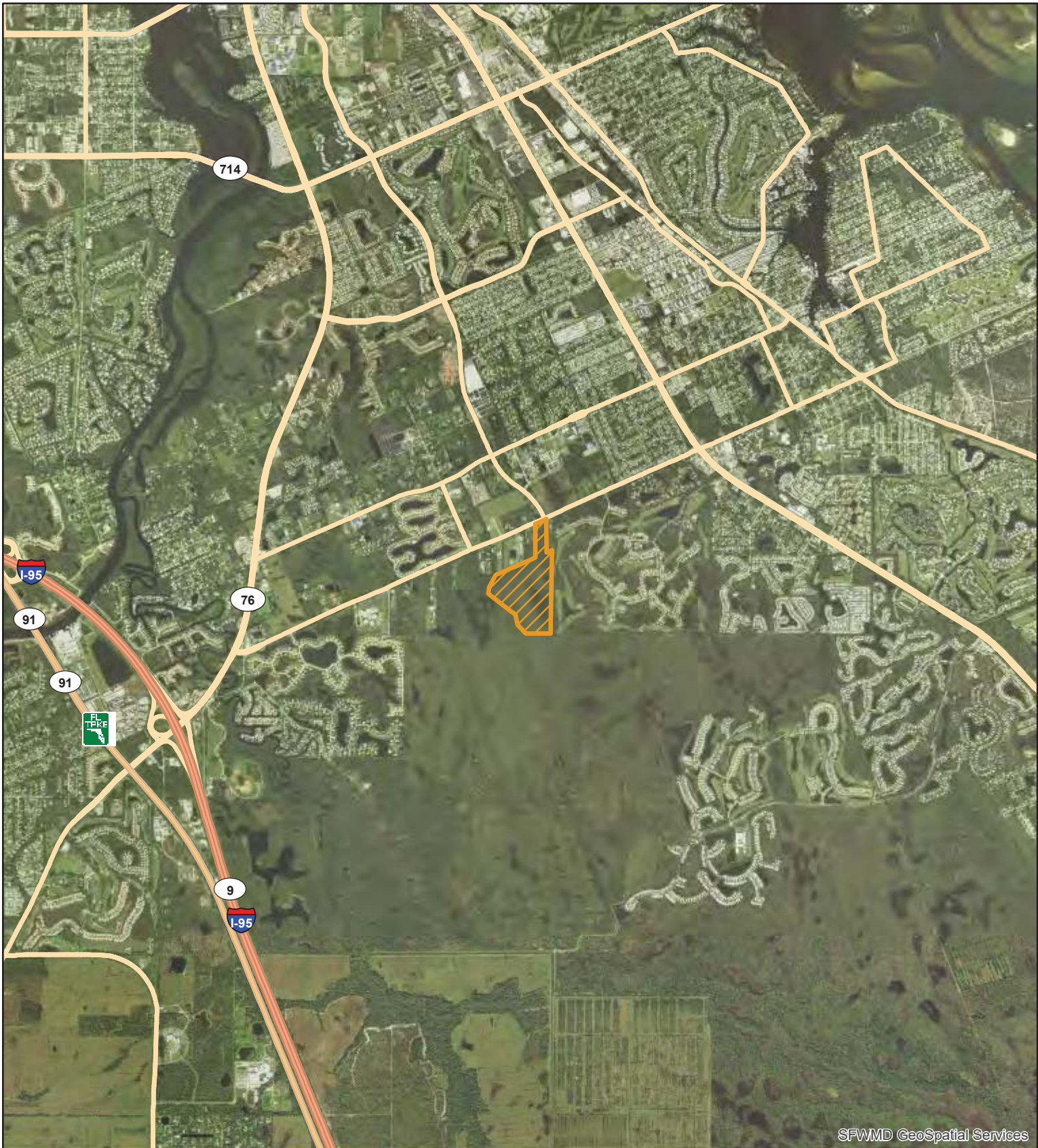


### **Exhibits**





The following exhibits to this permit are incorporated by reference. The exhibits can be viewed by clicking on the links below or by visiting the District's ePermitting website (<http://my.sfwmd.gov/ePermitting>) and searching under this application number 191112-2285 .

[Exhibit No. 1.0 Location Map](#)

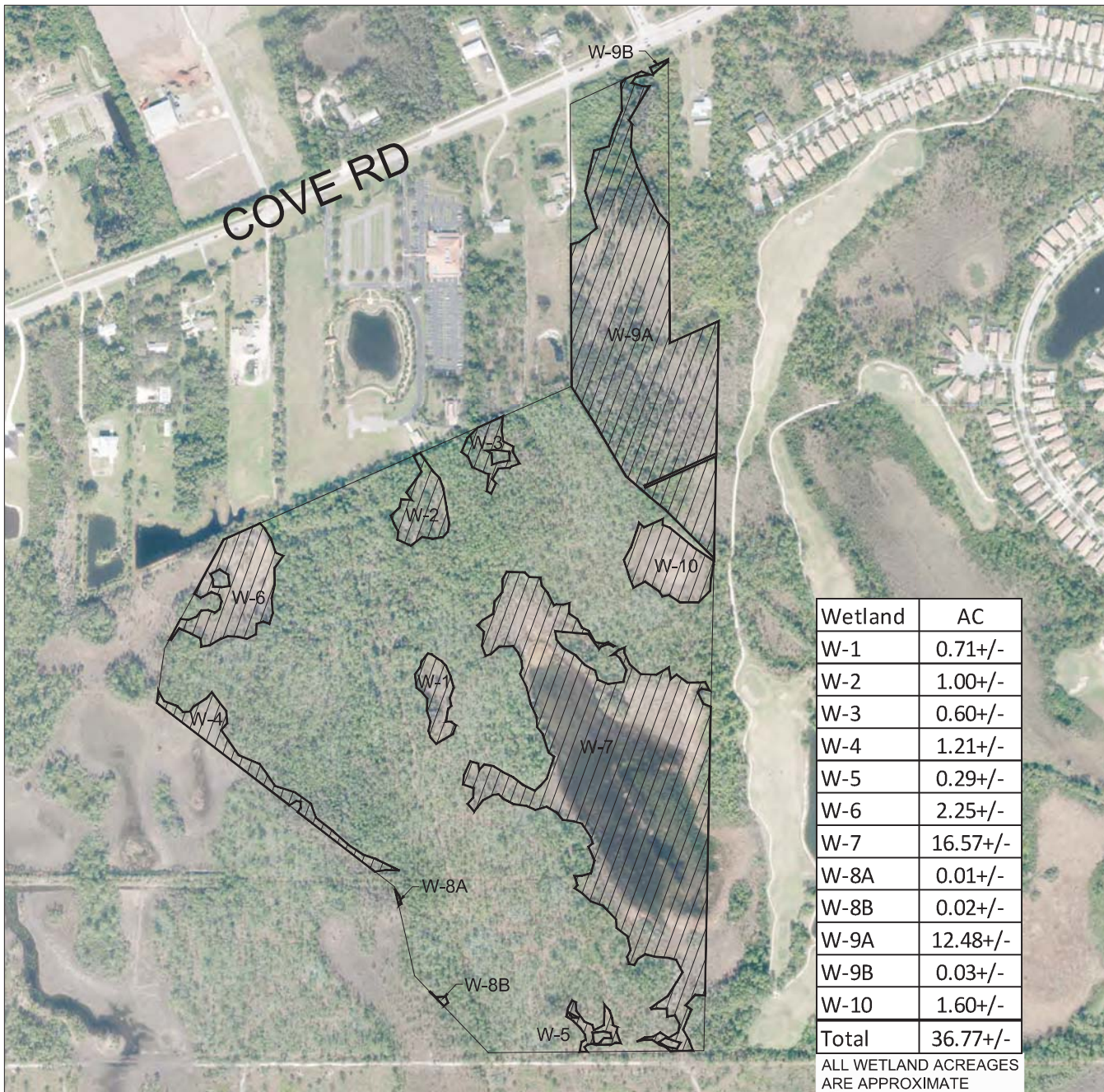
[Exhibit No. 2.0 Wetland Boundary Map](#)



SFWMD GeoSpatial Services

Exhibit No:1.0	Exhibit Created On: 2019-11-20	MARTIN COUNTY, FL	<div> Application</div> <div></div> <div>Application Number: 191112-2285</div>
<div><div></div><div>REGULATION DIVISION Project Name: Via Claudia</div><div><div><div>0</div><div>4,050</div><div>8,100</div></div><div><div></div><div></div></div><div>Feet</div></div><div><div>N</div></div></div>			





MARTIN COUNTY AERIAL  
DATED 2019

## LEGEND



- WETLAND (36.77± AC)

NOTE:  
THE LANDWARD EXTENT OF THE WETLAND AREAS DEPICTED ON THIS GRAPHIC WERE RECORDED USING A HAND-HELP GPS DEVICE. THIS GRAPHIC DOES NOT REPRESENT A SURVEY PREPARED BY A FLORIDA REGISTERED PROFESSIONAL SURVEYOR AND MAPPER.

0 600  
SCALE IN FEET



# D R HORTON - VIA CLAUDIA VERIFIED WETLANDS



**EW CONSULTANTS, INC.**  
1000 SE MONTEREY COMMONS BLVD., SUITE 208  
STUART, FL 34996  
772-287-8771 FAX 772-287-2988  
WWW.EWCONSULTANTS.COM

**FEB 2020**

**FIGURE**

D R Horton Via Claudia.dwg VERIFIED WETLAND



# **ATTENTION:**

## **THREATENED EASTERN INDIGO SNAKES MAY BE PRESENT ON THIS SITE!!!**

### **IF YOU SEE A LIVE EASTERN INDIGO SNAKE ON THE SITE:**

- Cease clearing activities and allow the eastern indigo snake sufficient time to move away from the site without interference.
- Personnel must NOT attempt to touch or handle snake due to protected status.
- Take photographs of the snake, if possible, for identification and documentation purposes.
- Immediately notify supervisor or the applicant's designated agent, **and** the appropriate U.S. Fish and Wildlife Service (USFWS) office, with the location information and condition of the snake.
- If the snake is located in a vicinity where continuation of the clearing or construction activities will cause harm to the snake, the activities must halt until such time that a representative of the USFWS returns the call (within one day) with further guidance as to when activities may resume.

### **IF YOU SEE A DEAD EASTERN INDIGO SNAKE ON THE SITE:**

- Cease clearing activities and immediately notify supervisor or the applicant's designated agent, **and** the appropriate USFWS office, with the location information and condition of the snake.
- Take photographs of the snake, if possible, for identification and documentation purposes.
- Thoroughly soak the dead snake in water and then freeze the specimen. The appropriate wildlife agency will retrieve the dead snake.

### **USFWS Florida Field Offices to be contacted if a live or dead eastern indigo snake is encountered:**

**North Florida Field Office – (904) 731-3336**

**Panama City Field Office – (850) 769-0552**

**South Florida Field Office – (772) 562-3909**

### **Killing, harming, or harassing indigo snakes is strictly prohibited and punishable under State and Federal Law.**

DESCRIPTION:	The eastern indigo snake is one of the largest non-venomous snakes in North America, with individuals often reaching up to 8 feet in length. They derive their name from the glossy, blue-black color of their scales above and uniformly slate blue below. Frequently, they have orange to coral reddish coloration in the throat area, yet some specimens have been reported to only have cream coloration on the throat. These snakes are not typically aggressive and will attempt to crawl away when disturbed. Though indigo snakes rarely bite, they should NOT be handled.
SIMILAR SNAKES:	The black racer is the only other solid black snake resembling the eastern indigo snake. However, black racers have a white or cream chin, thinner bodies, and WILL BITE if handled.
LIFE HISTORY:	The eastern indigo snake occurs in a wide variety of terrestrial habitat types throughout Florida. Although they have a preference for uplands, they also utilize some wetlands and agricultural areas. Eastern indigo snakes will often seek shelter inside gopher tortoise burrows and other below- and above-ground refugia, such as other animal burrows, stumps, roots, and debris piles. Females may lay from 4 - 12 white eggs as early as April through June, with young hatching in late July through October.
PROTECTION:	The eastern indigo snake is classified as a Threatened species by both the USFWS and the Florida Fish and Wildlife Conservation Commission. "Taking" of eastern indigo snakes is prohibited by the Endangered Species Act without a permit. "Take" is defined by the USFWS as an attempt to kill, harm, harass, pursue, hunt, shoot, wound, trap, capture, collect, or engage in any such conduct. Penalties include a maximum fine of \$25,000 for civil violations and up to \$50,000 and/or imprisonment for criminal offenses, if convicted.

Only individuals currently authorized through an issued Incidental Take Statement in association with a USFWS Biological Opinion, or by a Section 10(a)(1)(A) permit issued by the USFWS, to handle an eastern indigo snake are allowed to do so.



**IF YOU SEE A LIVE EASTERN  
INDIGO SNAKE ON THE SITE:**

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August 12, 2013

**ATTENTION:**  
THREATENED EASTERN INDIGO  
SNAKES MAY BE PRESENT ON  
THIS SITE!!!



Please read the following information provided by the U.S. Fish and Wildlife Service to become familiar with standard protection measures for the eastern indigo snake.



# **THE PRESERVE AT PARK TRACE**

## **LAKE AREA MANAGEMENT PLAN**

**Martin County, Florida**  
**May, 2020**

The following Lake Area Management Plan is provided for the wet retention lakes and dry retention areas within The Preserve at Park Trace development site. It is to be used in conjunction with the master site plan and lake planting plans provided by the project's landscape architect and environmental consultant. This plan addresses standards set forth in the Martin County Excavation and Fill Ordinance.

### **Erosion Control and Water Management Provisions –**

The operator shall use Best Management Practices to minimize erosion. The use of native top-soils is encouraged, especially in areas reclaimed for aquatic or wildlife habitats. Where topsoil is not used, the operator shall use a soil or growing medium, including amendments, suitable for the type of vegetative communities planned. Should washes or rills develop after re-vegetation and before final release of the area, the operator shall repair the eroded areas and stabilize the slopes.

Best Management Practices also apply to water quality within the lakes so as to protect the health of the plant material. Turbid water will be kept to a minimum so that sunlight may reach the littoral shelf floor promoting aquatic grass recruitment. The water levels within the lakes have been designed to a specific elevation. Such elevations will be staked along the littoral shelf in order to provide the plant installation contractor a reference from which to install the appropriate plant material. Should water levels within the completed lakes drop to elevations potentially harmful to the planted littoral plants, temporary irrigation will be established by using a small pump and spray-rig situated within the lake. Water from the lake will be sprayed onto the planted littoral and upland transition zones as needed in order to keep such plants healthy.

### **Installation of Native Plant Material –**

The installation of the native plant material within the lakes' littoral and upland transition zones and dry retention areas will be in accordance with approved planting plans (to be submitted at a later date). Please note that all lakes will contain planted littoral zones, while only one which does not front an upland preserve area will contain a planted upland transition zone in accordance with the associated site plan.

Planting of such material will be conducted at the appropriate time after the lake banks and retention areas are sloped in accordance with the approved Construction Drawings. Plants are to be installed in accordance with the spacing and quantities detailed on the approved landscape plans and littoral/UTZ/dry retention planting plans (to be submitted at a later date). All plant material will be of appropriate type for the soils found on site. An Environmental Professional familiar with aquatic plant installation will oversee this activity.

### **Maintenance of Littoral and Upland Transition Zone Areas -**

The littoral and upland transition zone and dry retention planting areas as shown on the approved landscape plans and planting plans will be kept free of nuisance and exotic vegetation in perpetuity. All Category I and II nuisance and exotic vegetation as listed by the Florida Exotic Pest Plant Council (Rule 5B-57.007 FAC) will be treated within such areas. All treatment events will be through the application of the appropriate herbicide approved for use within aquatic environments. The criterion for acceptance of eradication for Category I and II exotic vegetation will be 100 percent treatment/kill and 95 percent treatment/kill for nuisance species. If initial efforts do not achieve this criterion, follow up treatments will be conducted.

Transport of vegetative debris from the lake and retention areas to the staging area will be conducted in a fashion that minimizes the distribution and dispersal of seeds from such debris. No exotic or nuisance woody vegetative material will be left in the littoral and upland transition zone areas or within any of the dry retention areas. All herbicide application activity will be conducted under the supervision of a Florida Department of Agriculture certified applicator, licensed for application of aquatic herbicides. All herbicide applied within aquatic systems on-site must be properly labeled for such use. All herbicide applied must include a visible tracer dye in the mix to facilitate observation of treated vegetation. Within the littoral zones, the areal extent of desirable native plants shall cover at least 80% of the surface area by the end of the second year of monitoring after installation.

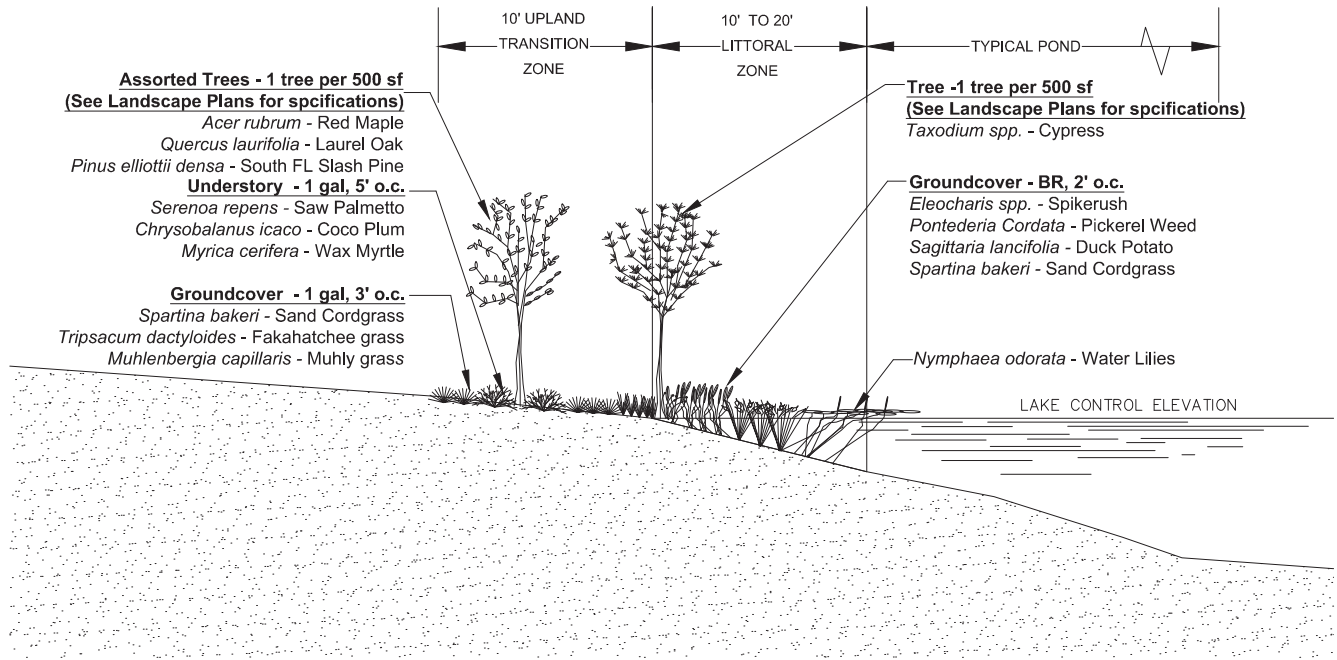
### **Re-Vegetation Provisions -**

Re-vegetation of the lake littoral and upland transition zone areas will occur using aquatic plant species native to the region in accordance with the approved landscape and planting plans. The operator has developed a plan for the proposed re-vegetation, including the species to be planted, and the spacing of vegetation.



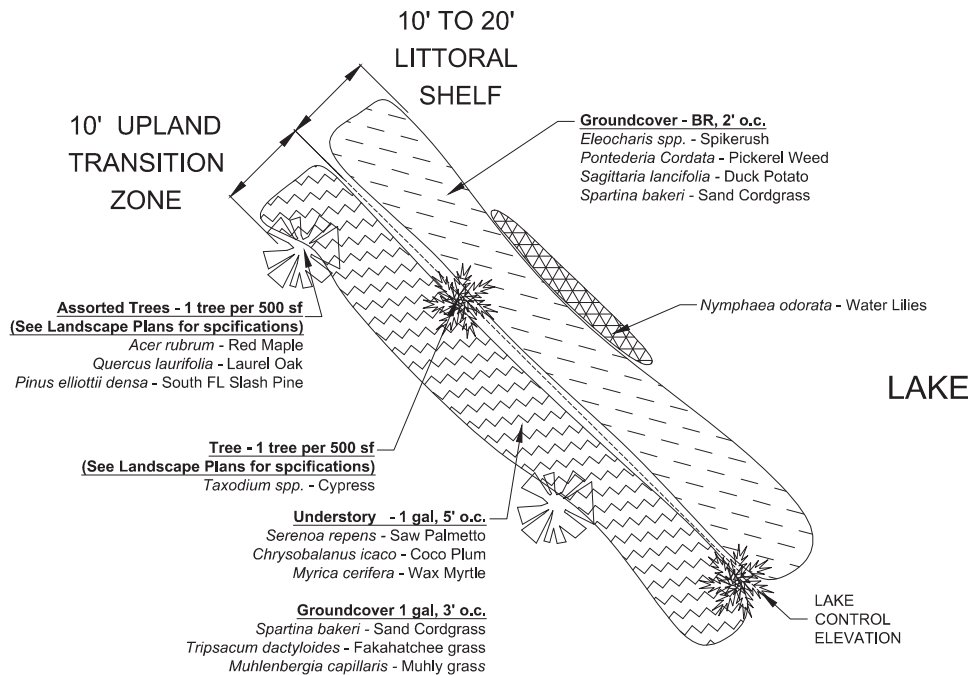
# LITTORAL & UPLAND TRANSITION ZONE SECTION

N.T.S.



# LITTORAL & UPLAND TRANSITION ZONE DETAIL

N.T.S.



REFERENCED SPECIES MAY BE SUBSTITUTED WITH OTHER APPROPRIATE NATIVE SPECIES BASED ON AVAILABILITY.

NOTE: PLANTS TO BE INSTALLED AS TO MIMIC NATURAL OCCURRENCE.

## THE PRESERVE AT PARK TRACE LITTORAL & UTZ PLANTING



**EW CONSULTANTS, INC.**

1000 SE MONTEREY COMMONS BLVD., SUITE 208

STUART, FL 34996

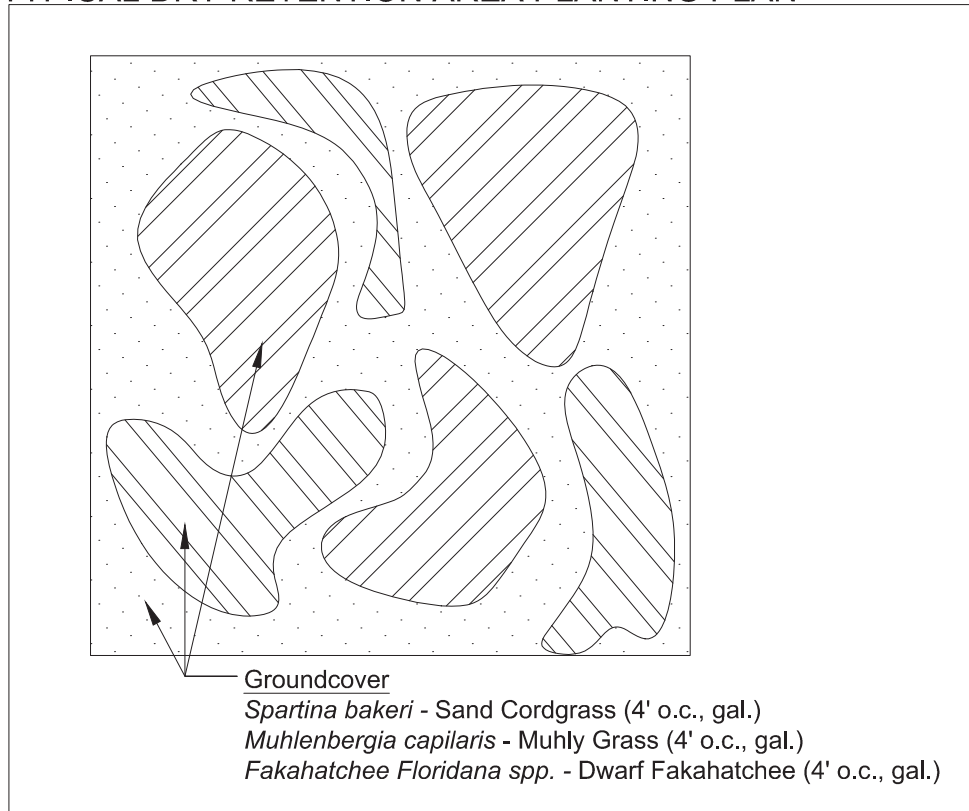
772-287-8771 FAX 772-287-2988

WWW.EWCONSULTANTS.COM

**MAY 2020**

**FIGURE**

## TYPICAL DRY RETENTION AREA PLANTING PLAN



# THE PRESERVE AT PARK TRACE DRY RETENTION PLANTING



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 1000 SE MONTEREY COMMONS BLVD., SUITE 208  
 STUART, FL 34996  
 772-287-8771 FAX 772-287-2988  
 WWW.EWCONSULTANTS.COM

**MAY 2020**

**FIGURE**



**CONSULTANTS, INC.**

# **THE PRESERVE AT PARK TRACE**

## **DOCUMENTATION IN SUPPORT OF THE ENVIRONMENTAL WAIVER AND EXCEPTION APPLICATION**

**Prepared for:  
Via Claudia Investments LLC**

**Prepared by:  
EW Consultants, Inc.**

**June 2020**

**©2020**

## **1.0 PROJECT DESCRIPTION -**

### **1.1 Introduction and Project Description -**

The Preserve at Park Trace project consists of three parcels of land totaling ±97 acres, located in unincorporated Martin County, Florida. It is south of and adjacent to Cove Road, south of its intersection with Willoughby Boulevard. The proposed project consists of a single-family development, associated roadways, amenities center, stormwater facilities, as well as extensive wetland and upland preserve areas.

The site can generally be described as containing wetland areas along its perimeter, with a large melaleuca-infested wetland located along Cove Road extending into the interior of the site identified as Wetland 9A. This portion of the site is the only access point connecting to an existing external roadway (Cove Road). Thus, access to the upland portion of the property (generally located in the central and southern portions of the site) is proposed through Wetland 9A (as well as through the much smaller 9B) as shown on the submitted site plan. Therefore, the Access to Uplands provision in Martin County's Land Development Regulations (Section 4.3.B.2., LDR), is being utilized as part of the associated Environmental Waiver application.

As part of the access to the upland portions of the site, fill impacts to the melaleuca-infested wetland along Cove Road and associated wetland buffers are proposed. Discussions regarding the areal extent of the impacts, the location, and alternatives to the proposed access roadway are detailed in subsequent sections of this report.

### **1.2 Environmental Conditions -**

The project site consists of a mosaic of pine flatwoods (57 acres), prairie wetlands (37.2 acres), and upland exotic vegetation (2.8 acres). There are also pockets of exotic vegetation within the wetland areas. Specifically, exotic vegetation such as melaleuca and Brazilian pepper dominate the northern "chimney" of the site in the location of the proposed access road connecting to Cove Road. The remaining wetlands site are in good ecological condition, as are the pine flatwoods with only minor occurrences of the exotic vegetation.

There are 12 state-verified freshwater wetland areas on-site, with the two northern wetlands in the chimney (9A and 9B) the subject of this waiver application. The ecological value of these wetlands is significantly diminished by the presence, and in some areas the dominance, of the exotic melaleuca tree, as well as Brazilian pepper along their edges. All wetlands on the site have been flagged, surveyed and verified by the South Florida Water Management District within the past year. Such documentation is included in the Environmental Assessment (EA) provided in the Preserve Area Management Plan (PAMP).

Upland land covers on-site include common native pine flatwoods and exotic Brazilian pepper-infested areas. The presence of the state threatened gopher tortoise has been confirmed in the pine flatwoods portions of the site.

The upland areas surrounding the subject wetlands (9A and 9B) are dominated by Brazilian pepper as well as other exotic species such as earleaf acacia and java plum. These areas, therefore, are the logical locations for the creation of additional wetland areas. In this way, impacts to native pine flatwoods for the creation of wetland areas can be avoided.

### **1.3 Proposed Wetland Impact -**

In order to access the upland portions of the property from Cove Road, a single 50-foot wide roadway crossing through wetlands 9A and 9B is proposed as shown on Figure 1. This "Preferred Alternative" location was chosen based on its ultimate alignment with Willoughby Boulevard. This roadway will result in the filling of 1.0-acre of isolated, freshwater wetlands, with 9B (0.03 acres) being eliminated and 9A having 0.97-acres of impact. Using the Wetland Rapid Assessment Procedure (WRAP) functional assessment methodology, these direct (fill) impacts generate 0.41 debits of wetland mitigation (see Table 1 below). The WRAP functional assessment was selected for this impact analysis based on its anticipated future use with the permitting agencies (South Florida Water Management District and U.S. Army Corps of Engineers).

Initial entrance roadway designs included a 75-foot wide right-of-way at a 3:1 slope which included all associated construction impacts. This option was not selected as shown on the corresponding site plan.

Secondary wetland impacts have also been considered in order to determine the ultimate wetland mitigation needed on-site for compensation. A 25-foot swath adjacent to the both sides of the access roadway (50-feet total) has been assessed using the WRAP system to reflect potential impacts to wildlife usage. Other functional components, such as vegetation, hydrology and land use/water quality, will remain unimpacted. As such, 0.91 acres of wildlife foraging area adjacent to the driveway may be partially impacted resulting in 0.03 functional units lost (debts) in addition to the 0.41 from the direct impact to the wetland within the 50-foot roadway segment. Therefore, the direct and secondary impacts generate 0.44 total debits as shown on Table 1.

### **1.4 Proposed Wetland Buffer Impacts -**

As part of the Preferred Alternative roadway alignment, 0.17-acres (7,500 square feet) of wetland buffer will be impacted ((50 feet in width x 50-foot buffers) x 3). This calculation is based on Martin County's minimum 50-foot wetland buffer requirement for isolated wetlands. As proposed, the Preferred Alternative alignment will partially impact the northern and southern buffers of W-9A, plus the southern buffer to 9B (there is no northern buffer since it is bounded by Cove Road to the north). The buffers associated on the northern end of W-9A and southern portion of 9B are dominated by exotic vegetation and do not consists of intact native upland habitat. The southern buffer of W-9A consists of native pine flatwood upland habitat. Additional pine flatwood habitat preserve is provided within throughout the development site in order to account for the loss in buffer acreage.

## **2.0 ROADWAY ALIGNMENT ALTERNATIVES -**

Figure 1 shows the preferred alternative alignment and two (2) alternative alignments that were examined as part of the site planning process. Each alternative alignment is described below.

### **2.1 Preferred Alternative –**

The Preferred Alternative, as shown on Figure 1, is located in the northeast portion of the project site. As designed, it would impact 0.03 acres of W-9B and 0.97 acres of W-9A using the 50-foot right-of-way design. This alternative aligns with Willoughby Boulevard off-site to the north which is preferred by traffic professionals.

### **2.2 Alternative 1 –**

Alternative 1 is located in the northwestern portion of the project site, paralleling the western property line. This alignment was the initial design, as it avoided more wetland area than the Preferred Alternative. As designed, it would impact 0.66 acres of W-9A. While this alternative is the least damaging from an areal standpoint, it does not align with Willoughby Boulevard, and would likely cause visual and noise impacts to the adjacent properties to the west.

### **2.3 Alternative 2 –**

Alternative 2 is located in the north-central portion of the project site, midway between the property lines. The alignment was not considered by the design professionals working on the project, but has been added as a second possible alternative to the selected alignment. As shown, Alternative 2 would impact 1.59 acres of W-9A. This alternative has more impact area than the Preferred Alternative, and does not align with Willoughby Boulevard.

## **3.0 PROPOSED MITIGATION FOR WETLAND AND BUFFER IMPACTS -**

Two primary mitigation techniques will be used to offset the proposed wetland and wetland buffer impacts. The first is an increased amount of native upland preserve habitat throughout the project site. Martin County requires a minimum of 25% of the upland habitat be preserved on-site when common native upland habitat exists. The project site contains 57.0 acres of pine flatwoods, a common native upland habitat type per Martin County code. Therefore, 14.25 acres (minimum) is required to be preserved in-situ. The applicant proposes to preserve a total of 20.34 acres of upland area, 20.33 of which are native pine flatwoods representing an excess of 6.08 acres above the 14.25 acres required. The remaining 0.01 acres of wetland preserve is Brazilian pepper infested buffer on the northeast side of W-9A. This buffer will be restored to



pine flatwoods as shown on Figure 2. With the proposed impact to required wetland buffers to W-9A and 9B calculated to be 0.17-acres, there is sufficient additional native upland preserve provided in the form of 6.08 acres to offset these impacts.

The second portion of the proposed mitigation is the creation of 1.94-acres of wet prairie in the northern portions of the project site on either side of W-9A in areas currently dominated by Brazilian pepper. The 1.94-acres is 0.94-acres more than the proposed impact area, thus meeting Martin County's "no loss of the spatial extent of wetlands" criterion. Please refer to Figure 2 for the locations of the created wetland areas.

In evaluating if these wetland mitigation areas will be sufficient in function to offset the proposed impact, the Wetland Rapid Assessment Procedure (WRAP) was used to evaluate the ecological condition of W-9A and 9B along the Preferred Alternative roadway alignment. These impact areas were given scores (from 0.0 to 3.0) for five separate wetland functions. The total scores were then divided by fifteen (total number of points possible), and multiplied by the areal extent of each impact area to determine the number of wetland debits generated. The mitigation areas (in this case the created wet prairies shown on Figure 2) was then evaluated using WRAP based on projected wetland conditions after creation activities have been completed. Similarly, this score is multiplied by the areal extent of the created wetland areas which then generates a total credit figure.

In the case of this application, the impact areas for W-9A and 9B scored a 0.42 and 0.20 respectively, generating 0.41 debits (see Table 1). The secondary impacts added another 0.03 debits for a total of 0.44. The mitigation areas generate a score of 0.47, totaling 0.91 credits ( $0.47 \times 1.94$  acres), with "lift" coming from a higher vegetation score for densely installed native wetland groundcover, as well as a higher pre-treatment score due to the presence of the surface water management system in the post-development condition. Other categories, such as adjacent upland buffer and land use, were scored lower in the post-development condition appropriately. There was lift given for wetland hydrology since the creation area is currently upland and will be scraped-down to meet adjacent grades within W-9A. Therefore, the net credit for the on-site mitigation is estimated to be 0.47 which meets Martin County's "no net loss of wetland function" criterion.

See Table 1 below for a summary of the wetland impacts and proposed mitigation.

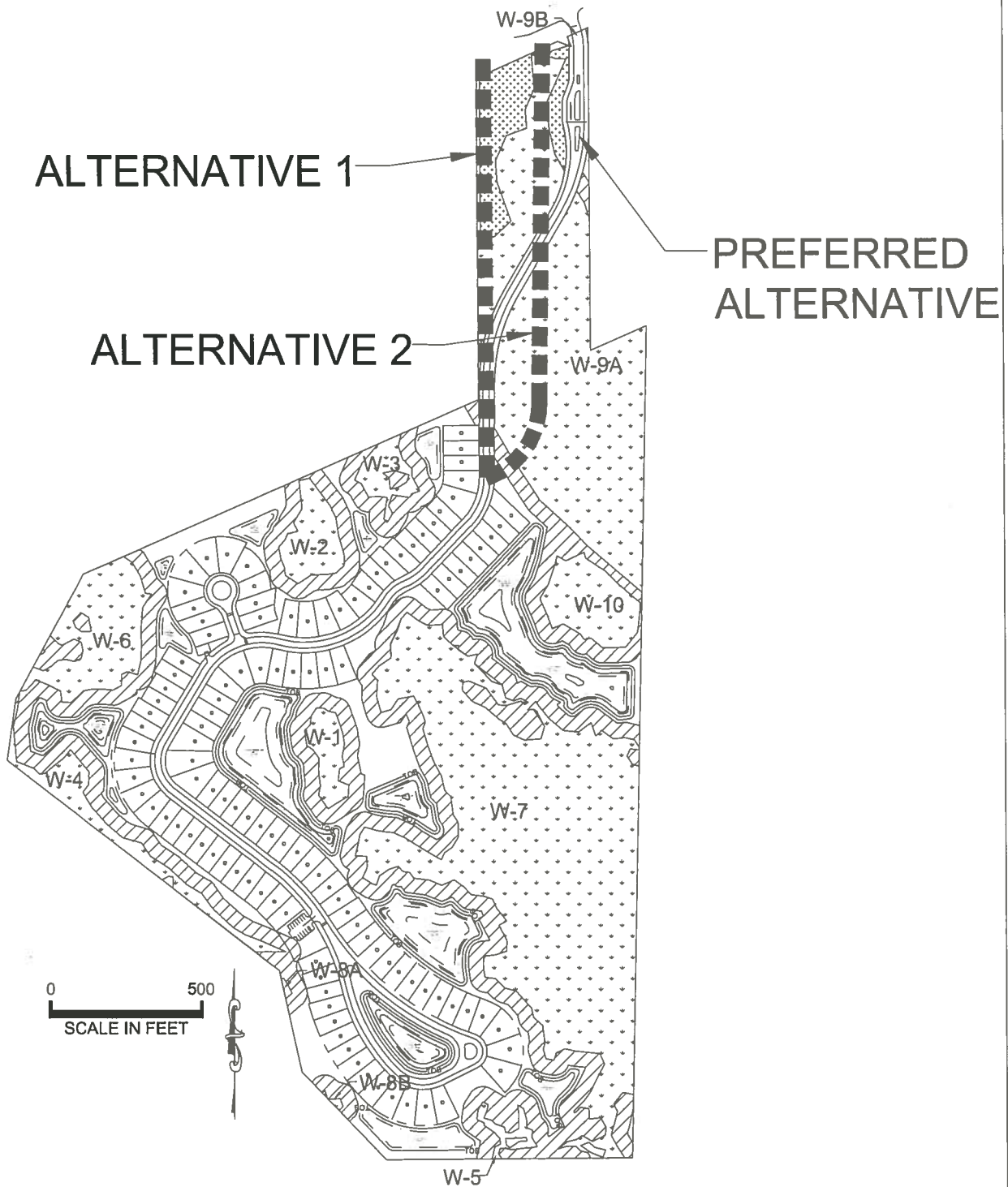
TABLE 1								
THE PRESERVE AT PARK TRACE								
WETLAND MITIGATION SUMMARY								
DIRECT IMPACTS								
Wetland #	AC	Type	Preserve	Impact	Imp Type	WRAP Pre	WRAP Post	Debits
9A	12.60	643	11.63	0.97	Direct (Fill)	0.42	0.00	0.407
9B	0.03	643	0.00	0.03	Direct (Fill)	0.20	0.00	0.006
TOTALS	12.63		11.63	1.00				0.413
SECONDARY IMPACTS								
Wetland #								
9A	0.91	643	0.00	0.91	Secondary	0.42	0.38	0.030
GRAND TOTAL								0.443
MITIGATION								
ID	AC	Target Type	Preserve	Impact	Imp Type	WRAP Pre	WRAP Post	Credits
W-9A Expansion	1.94	643				0.0 (up)	0.47	0.912
TOTALS	1.94							0.912
NET CREDITS								0.468

#### 4.0 WETLAND CREATION AREA DESIGN -

As part of the mitigation for the wetland crossing impact, 1.94 acres of wet prairie wetland habitat will be created as shown on Figure 2. The areas selected for the wetland creation are upland, and contain extensive amounts of the exotic vegetation. It is anticipated that heavy equipment will be used to remove the exotic vegetation within these creation areas in anticipation of the scrape-down that will need to occur prior to wetland plant installation.

Following the exotic vegetation removal and scrape-down effort, native plant species typically found in wet prairie communities will be installed (see planting detail on Figure 2). Monitoring of the creation areas will be on an annual basis in order to ensure success. The project's PAMP contains additional details with regard to monitoring requirements and vegetative success criteria.





## THE PRESERVE AT PARK TRACE PREFERRED & OPTIONAL ROUTES

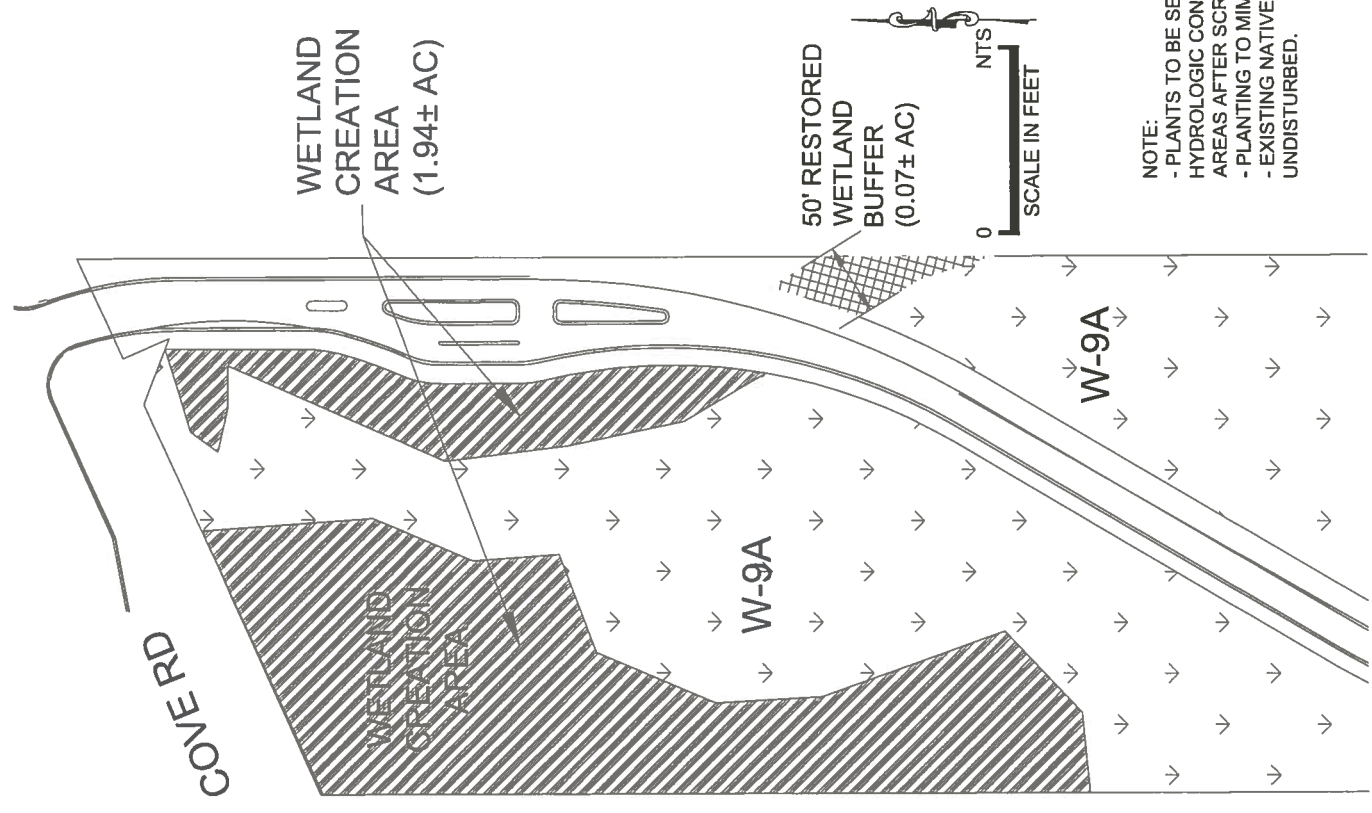


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**JUNE 2020**

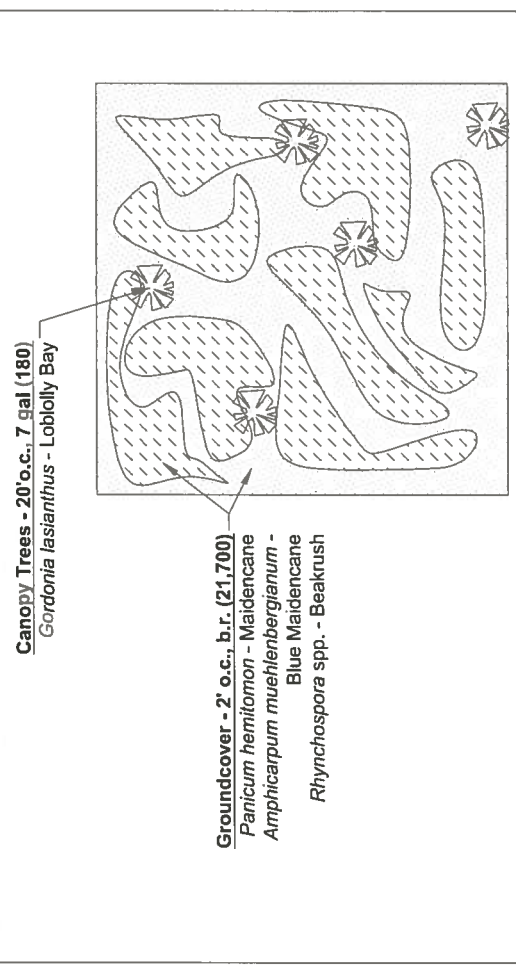
**FIGURE**

**1**

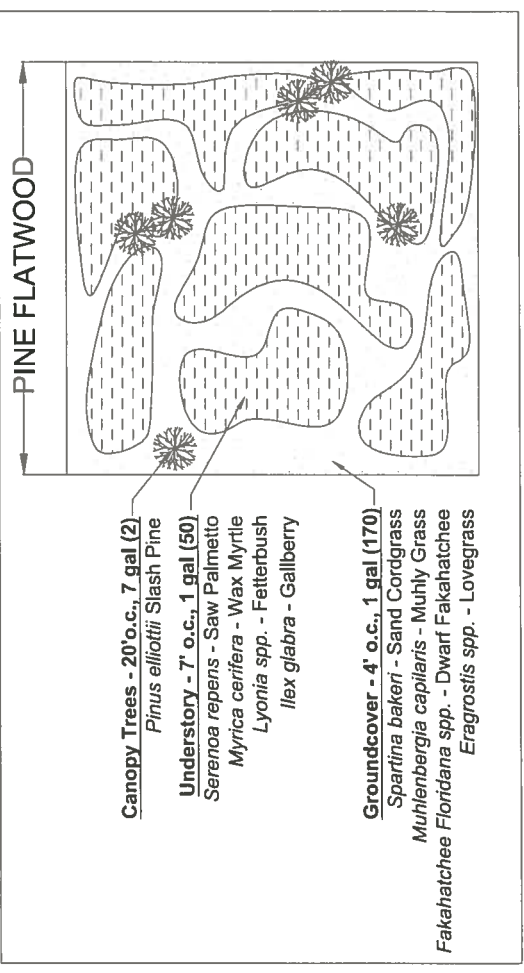


NOTE:  
- PLANTS TO BE SELECTED AND INSTALLED BASED ON HYDROLOGIC CONDITIONS OF WETLAND CREATION AREAS AFTER SCRAPE-DOWN IS COMPLETED.  
- PLANTING TO MIMIC NATURAL OCCURRENCE.  
- EXISTING NATIVE VEGETATION TO REMAIN UNDISTURBED.

WETLAND CREATION AREA PLANTING MATERIAL



RESTORED WETLAND BUFFER PLANTING PLAN



PRESERVE AT PARK TRACE  
WETLAND CREATION AREA  
PLANTING MATERIAL

**MARTIN COUNTY, FLORIDA**  
**PRESERVE AREA MANAGEMENT PLAN**  
**ANNUAL MONITORING REPORT FOR (Year)**

- **Name and address of current owner of Preserve Area;**
- **Location of Preserve Area**
- **Date PAMP approved;**
- **Documentation of vegetation changes, including encroachment of exotic vegetation;**
- **Fixed-point panoramic photos of all Preserve Areas;**
- **Synopsis of maintenance activities conducted in compliance with the PAMP requirements such as exotic vegetation removal, re-vegetation, and additional enhancement activities necessary to maintain the Preserve Area;**
- **A timetable for action within 90 days of the report;**
- **A list of all violations of the PAMP; and**
- **Recommendations for remedial actions, with a proposed schedule for the coming year.**

**Signature/Date :** \_\_\_\_\_

**Typed Name/Title :** \_\_\_\_\_

**Company Name (if applicable) :** \_\_\_\_\_