

PROSPECTUS

Land Management Plan for Halpatiokee Regional Park

Martin County, Florida

Developed for

Martin County's Ecosystem Restoration & Management Division

PREPARED BY

Sustainable Ecosystems International

May, 2017

I. PROJECT DESCRIPTION

- A. Type and Purpose: During the last several decades, six properties in Martin County along the upper reaches of the South Fork of the St. Lucie River (Figure 1) have been purchased by governmental entities for conservation and recreation. Management Plans with varying levels of detail have been developed for Martin County (County) and/or the South Florida Water Management District (SFWMD) for some individual properties following their individual acquisitions, the most recent of these being in 2003. The parcels have been acquired using funds allocated by the State of Florida through various public land acquisition programs, including the Preservation 2000 (P 2000), the Florida Communities Trust (FCT), and the Save our Rivers programs (which was administered by SFWMD), and Martin County's Lands for You and Lands for Healthy Rivers programs.

Since it is time to update the Land Management Plan for parcels acquired with FCT funds and properties leased from the Florida Division of State Lands, Martin County has elected to create a single Land Management Plan (LMP) that assimilates all the South Fork properties. The purpose of this Land Management Plan is therefore to create a single document that includes: a) A history of county-related land acquisition projects along the South Fork; b) Descriptions of vegetative communities and notable species that are present within the mosaic of parcels; c) A compilation and identification of previous management and habitat restoration activities; d) Suggestions from the public, including those of a land management advisory committee; and e) identification of short-term and long-range management activities and their associated order-of-magnitude budgets.

- B. Location and Size of the Project: This project involves six publicly-owned conservation parcels that are located generally near the southeast intersection of Interstate 95 and Southeast Kanner Highway (State Rd. 76) and west of the South Fork of the St. Lucie River in Martin County. The properties, which cumulatively total approximately 510 acres, include parcels that are owned by Martin County and tracts that were acquired by other governmental partners and which are leased to Martin County.

The portions of Halpatiokee Regional Park that are managed by Martin County's Parks and Recreation Department and which are used for active recreation (e.g., sports fields, tennis courts, hockey rink, etc.) are excluded from this Land Management Plan, although it is noted that various infrastructure-related improvements such as parking lots and surface water management systems may provide dual services for active recreation and natural resource conservation components of the property.

- C. Ownership, Leases and Encumbrances:

Identity of Owners: Martin County is the sole owner of four of the six parcels. The physical address of Halpatiokee Regional Park is 8303 SW Lost River Rd, Stuart, FL 34997-7202. The designated owner of these properties is Martin County, whose mailing address is 2401 S.E. Monterey Rd., Stuart, FL 34996.

Two additional parcels (formerly referred to as the Otter Creek properties) which were purchased through the State of Florida's Save Our Rivers program are owned by the SFWMD and are leased to Martin County. SFWMD's Land Management Division is physically located at 3301 Gun Club Rd, West Palm Beach, FL 33406.

Encumbrances: Florida Power and Light Company (FPL), the public electrical utility that provides electrical service to residents in Martin County, has an easement for an aerial electrical transmission line that extends in a north-south direction along the western boundary of the property.

II. NATURAL AND CULTURAL RESOURCES

- A. The properties generally consist of a mosaic of habitats that include pine flatwoods, freshwater marshes, scrubby flatwoods, xeric hammocks, and freshwater tidal swamp that border approximately 4.2 miles of the western shoreline of the South Fork of the St. Lucie River (Figure 2). The properties also include two man-made lakes that are available for public recreation. Vegetative community maps and soil maps included in the Management Plan identify and depict the juxtaposition of natural and soil resources.
- B. cursory inventories of flora and fauna have been included. These inventories include recordings of Global Positioning System (GPS) coordinates for state-listed and federally-listed Endangered and Threatened species, which were updated during field surveys that were conducted 2016.
- C. Notable floral species on the properties include populations of six species that are designated by the Florida Department of Agriculture and Consumer Services (FDACS) as Endangered; two species that are designated by the state as Threatened, and four species that are designated by the state as Commercially Exploited.

No plants of species designated by the federal government as Endangered or Threatened were confirmed to be present on the properties, although one species (*Polygala smallii*) is potentially present, pending verification of identification.

- D. Notable faunal species include populations of gopher tortoises (*Gopherus polyphemus* – state-designated as Threatened), Florida sandhill cranes (*Grus canadensis pratensis* – state designated as Threatened), and various state-listed wading birds (e.g., tri-colored heron (*Egretta tricolor*), little blue heron (*Egretta caerulea*), snowy egret (*Egretta thula*) and white ibis (*Eudocimus albus*) which are designated as Species of Special Concern.

The only animal species designated by the federal government as endangered or threatened that has been recently documented to occur on the properties is the wood stork (*Mycteria americana*), a long-legged wading bird that is occasionally observed flying overhead or foraging in shallow wetlands. Wetlands on the site are within the Core Foraging Area (CFA) of two nesting colonies of wood storks. Previous sightings of other Threatened and

Endangered species, including scrub jays (*Aphelocoma coerulescens*) have been reported, and potentially suitable habitat exists for additional listed species, including indigo snakes (*Drymarchon couperi*) and gopher frogs (*Rana areolata aesopus*).

- E. The Plan includes the results of inquiries to the Florida Department of State Historical resources regarding the potential presence of culturally and/or historically significant sites on the properties.
- F. Populations of 15 plant species that are designated as Category I invasive exotics (as defined by the Florida Exotic Pest Plant Council (FLEPPC)) and 13 species that are designated as Category II invasive exotics have been documented to occur on the properties. Extensive attention has been directed toward control of pest plants in recent years. Initial treatments have been performed on all these species, and the majority of the acreage is now in maintenance mode for control of invasive plants.

Populations of several species of non-native animals are present in comparatively low numbers on the properties, the most problematic of which are wild hogs (*Sus scrofa*). Martin County contracts with third-party vendors for control of wild hogs on the property.

- G. No natural resources of commercial value (e.g., timber) have been identified as being available in sufficient quantities to be lucrative for revenue-generation without adversely affecting the conservation values for which the properties are being managed.
- H. The Plan addresses the subject of Optimal Park Boundary, which include possible coordination with other governmental entities to permanently protect lands upstream of the subject property in the headwaters of the South Fork of the St. Lucie River.

III. TOPOGRAPHIC, HYDROLOGIC AND AQUATIC RESOURCES

- A. Natural ground levels on the properties are generally less than 15 feet above mean sea level (NGVD 1928). Prior to human-related topographic and hydrologic alterations, in general, the properties sloped gradually from west-to-east toward the South Fork of the St. Lucie River.
- B. Numerous depressional wetlands, particularly in the southern portions of the property, are seasonally flooded and drain eastward toward the river during periods of excessive standing water.

Natural drainage and surface water flows appear to have been altered in the past as a result of the initial construction and permanent presence of Interstate 95, which abuts approximately 1.2 miles of the property to the west and drainage conveyances that were created on the properties prior to public ownership. No comprehensive assessments of topography and hydrologic conditions have been performed, but LIDAR (Light Detection and Ranging) data for the properties have been acquired.

- C. The properties include approximately 4.2 miles of river frontage on the west side of the

natural portion of the north-flowing South Fork of the St. Lucie River. The state-owned Atlantic Ridge Preserve State Park abuts approximately three miles of the properties on the east bank of the River. Upstream (south) of the subject properties, the South Fork is non-navigable, with its headwaters receiving inputs from agricultural lands which are used primarily for cattle grazing. Single-family residences are present along the east shore of the South Fork along the northern-most one mile of the properties.

The portions of the South Fork that abut the subject properties are designated by the State of Florida as “Class III” Waters. Class III waters are those that are designated for Fish Consumption, Recreation, Propagation and Maintenance of a Healthy, Well-Balanced Population of Fish and Wildlife.

Approximately 3.2 miles downstream (north) of the subject properties, the South Fork joins the dredged portion of the river which is managed by the U.S. Army Corps of Engineers as the Okeechobee Waterway (also known as the C-44 Canal). Freshwater discharged from Lake Okeechobee and the local drainage basins primarily flows northward into the St. Lucie Estuary and then eastward toward the Indian River Lagoon and the St. Lucie Inlet. When flood tides coincide with C-44 discharges, water quality abutting the subject properties may be adversely affected with elevated nutrients and/or other potential contaminants that are pushed upstream. Portions of the Okeechobee Waterway and the South Fork have been designated as an “Impaired Water” by the Florida Department of Environmental Protection (FDEP) (303(d) F.A.C.) and are subject to Total Maximum Daily Load (TMDL) criteria.

IV. Recreational Resources and Public Involvement

A. Following their individual acquisitions, Martin County has been successful in opening each of the properties for the types and levels of public recreational activities (Figure 3) that are appropriate and consistent with the conservation goals for which the parcels were acquired. The park is open from sunrise to sunset. Recreational opportunities include:

- Approximately eight miles of hiking trails;
- Approximately eight miles of off-road biking trails;
- A back-country campsite for primitive camping (available on a by-reservation-only basis);
- Access to two man-made lakes for use of non-motorized vessels (i.e., canoes, kayaks);
- Kayak and canoe rental lease (through a concessionaire contractor) that includes a building and vessel launch area at the northeast corner of the property;
- Approximately 4.2 miles of paddling trail along the South Fork of the St. Lucie River adjacent to the properties;

- Covered picnic shelters (within the Regional Park); and
- Educational kiosks and signage that include maps and information about native flora and fauna.

B. Martin County has developed mutually beneficial relationships with several user groups at Halpatiokee. These include the following groups and areas of coordination:

<u>Group</u>	<u>Area of Interest</u>
Florida Trail Association	Hiking trails
Airborne Mountain Bike Club	Bike trails
Martin County Geocachers	Treasure-hunting advocates

A variety of other groups (e.g., Martin County Rocks, the Martin County Chapter of the Florida Native Plant Society, school groups, etc.) occasionally use the property on an intermittent basis for field trips or other outings and activities.

Picnic shelters are also available for group use on an advanced-reservation basis.

III. **MANAGEMENT GOAL and ACTION PLANS**

A. It is Martin County's intent to continue to manage properties within the Halpatiokee Regional Park for the dual purposes of ecosystem sustainability and habitat-appropriate, non-consumptive public recreation. Guiding principles include:

1. Maintaining healthy ecosystems through standard land management techniques (e.g., re-introduction and use of fire or mechanical fuel reduction, where appropriate);
2. Restoring vegetative communities that have been degraded;
3. Controlling invasive non-native flora and fauna that adversely affect native ecosystems;
4. Maintaining trails for public use (e.g., hiking, biking, cane/kayaking), and expanding or enhancing these features as may be warranted;
5. Working with user groups to maintain and/or enhance recreational opportunities that do not have significant adverse impacts on natural resources;
6. Maintaining a collaborative relationship with managers and staff of Atlantic Ridge Preserve State Park, which abuts the property to the east;
7. Maintaining collaborative relationships with state agencies, including the Florida Forest Service (FFS), SFWMD, FCT, & FDEP; and

8. Seeking to establish mutually beneficial relationships with other potential user groups whose activities would not be counterproductive to the primary goal of ecosystem conservation.

B. Short-term (10 year) Action Plan

1. Martin County will continue to manage native plant communities and ecosystems at Halpatiokee Regional Park in a healthy and sustainable manner. Contractors and volunteers may be retained for selected management activities (e.g., control of invasive vegetation).
2. Staff will document ground surface conditions at two locations in the western part of the property and one location on the east where existing culverts have washed out, become plugged or may be inappropriately sized. Site inspections will be performed during the rainy season and/or following heavy rain events to determine if problems can be easily rectified through routine maintenance, or if more-detailed engineering analyses and permitting is required. Funds will be sought in order to allow site-appropriate management to take place.
3. Permits, if necessary, will be applied for and obtained prior to implementation of projects that could affect hydrological conditions on the property.
4. To the extent that it remains financially lucrative to do so, an agreement or lease will be maintained (or up-dated or replaced) in order to maintain a concessionaire under contract with Martin County to provide water-related recreational opportunities (e.g., canoeing/kayaking) to the public.
5. Grants will be pursued to support on-going management activities (e.g., invasive species control) on the subject parcels.
6. Martin County will work to maintain and/or enhance relationships with existing user groups, and be open to establishing relationships with potential new user groups, provided their activities are compatible with the County's primary goal of maintaining healthy and sustainable vegetative communities and ecosystems.

C. Long-term Action Plan

1. Martin County will manage the native vegetative communities and ecosystems at Halpatiokee Park in a healthy and sustainable condition.
2. The Land Management Plan for Halpatiokee Regional Park shall be updated at least once every ten years. Information contained in the Management Plan will be in compliance and consistent with management plans for other FCT-funded projects.

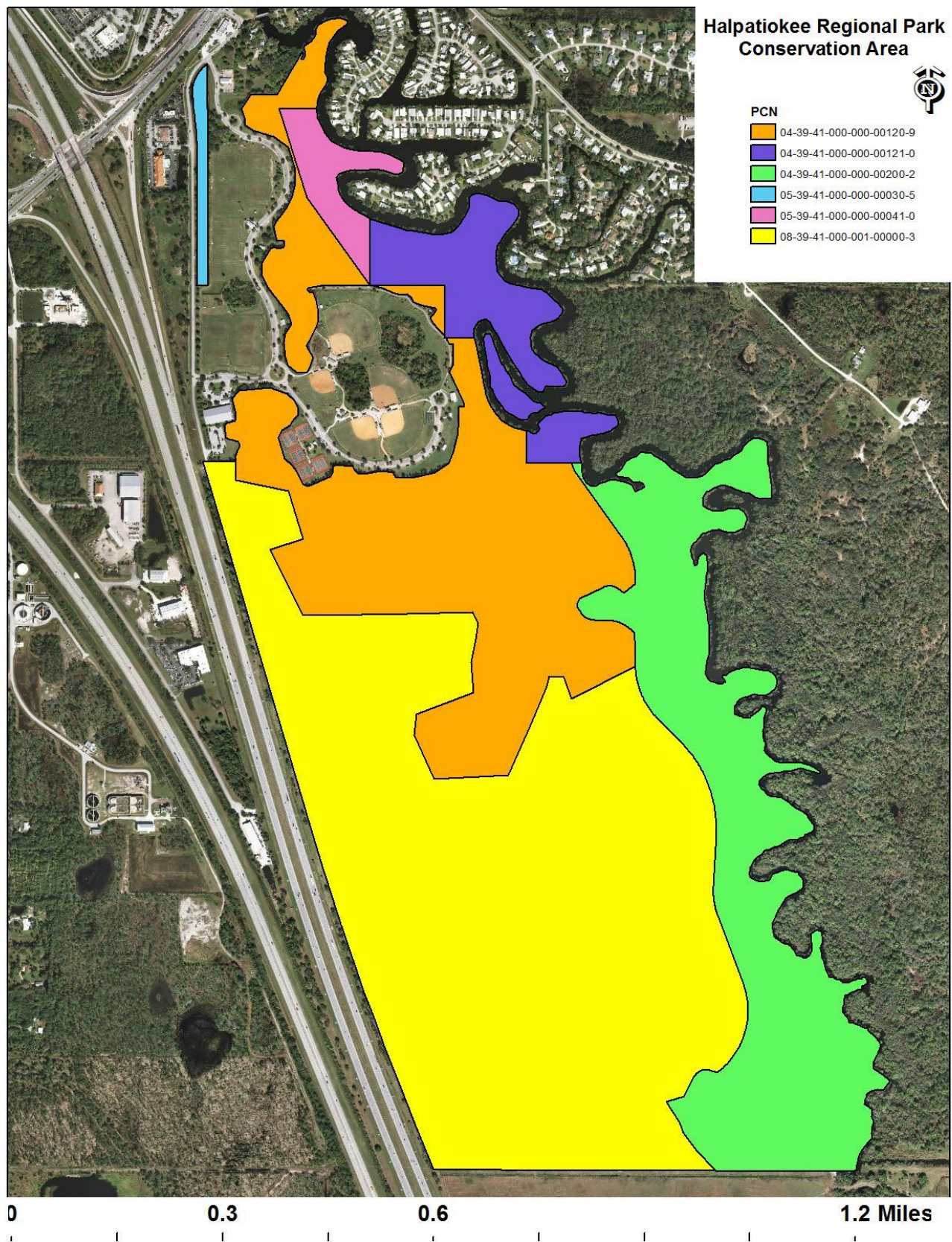


Figure 1

Parcels addressed in the Land Management Plan for Halpatiokee Regional Park

Date: March 30, 2017

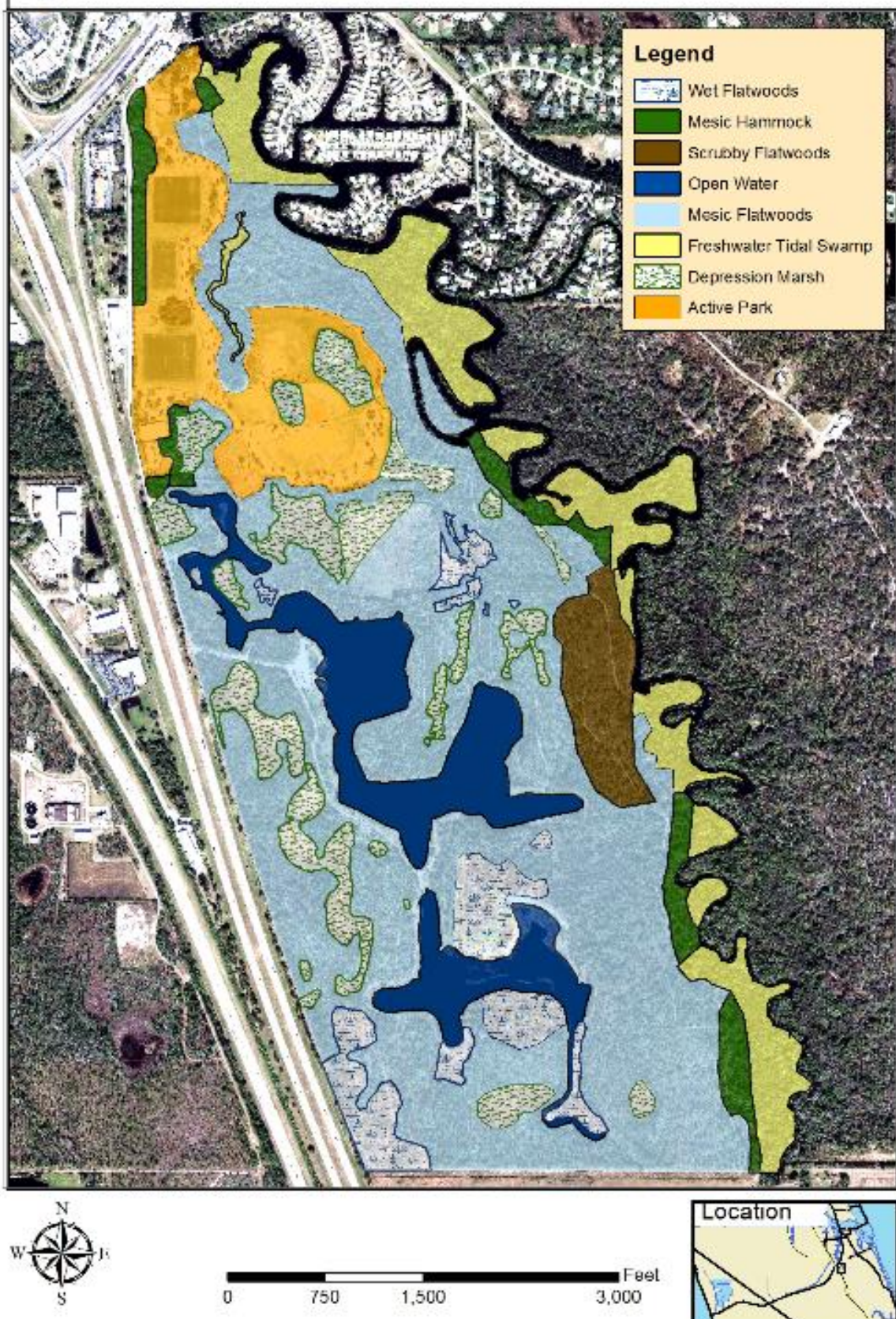


Figure 2
Habitat Map – Halpatiokee Regional Park
Date: May 11, 2017

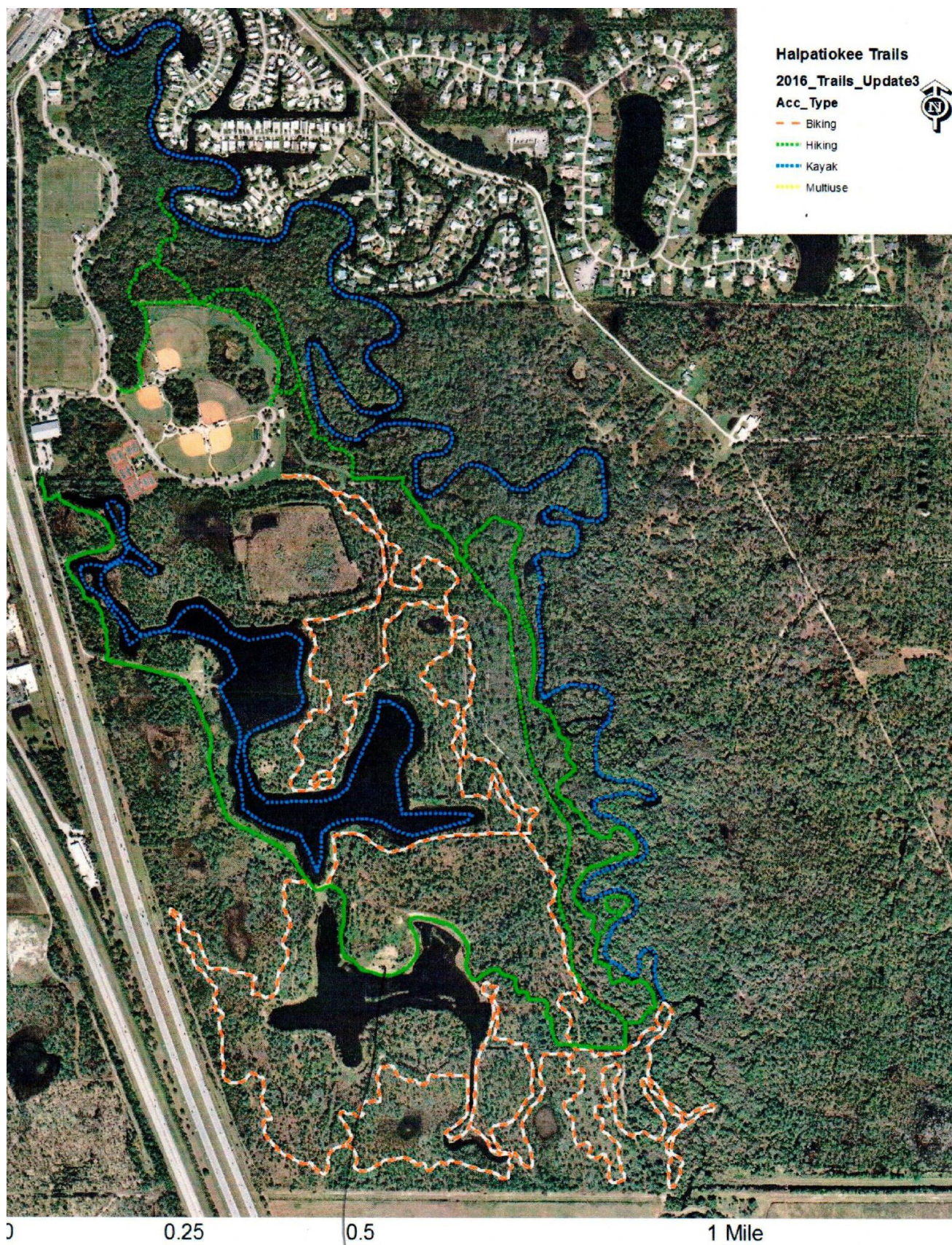


Figure 3
Trails Map – Halpaticokee Regional Park
Date: March 30, 2017