ITEM 11:

Consider a 10-year update to the Jupiter Ridge Natural Area Management Plan (Lease No. 4004).

LOCATION:

Palm Beach County

APPLICANT:

Palm Beach County Department of Environmental Resources Management

STAFF REMARKS:

Background

The 269-acre Jupiter Ridge Natural Area (JRNA) is in the northeastern portion of Palm Beach County. The county owns approximately three acres of land within the natural area, and leases and manages 266 acres pursuant to Lease Agreement 4004 with the State of Florida. Funding for the natural area came from the Palm Beach County Environmentally Sensitive Lands Bond Referendum of March 12, 1991, and State Preservation 2000 matching funds were received from the Conservation and Recreation Lands Program.

The primary purpose for the acquisition of this natural area was to preserve, restore/enhance and manage the site's ecological resources, including the existing natural communities, their component plant and animal species, and local groundwater resources. Acquisition, development and management of JRNA as a natural area has provided members of the public with opportunities for recreational activities, environmental education and scientific research that are consistent with the primary purpose of the site's acquisition. It has also helped the county and the Town of Jupiter comply with portions of their respective comprehensive plans.

Management Plan Overview

Mangrove swamp, mesic flatwoods, scrub, and scrubby flatwoods are the predominant natural communities present on the site. Smaller areas of coastal strand, depression marsh, and estuarine unconsolidated substrate are also present. Thus far, 364 species of plants and 275 species of animals have been recorded on the site, including 19 plant and 22 animal species that have been designated as having some degree of endangerment by at least one governmental agency or have been ranked by the Florida Natural Areas Inventory.

JRNA opened to the public in April 2001. Public use facilities include an accessible nature trail, hiking trail, boardwalk, and wildlife observation platform. Kiosks with interpretive displays provide valuable opportunities for the public to observe and learn about the site's biologically unique plant communities and associated animals. The main public access (including parking facilities, a bicycle rack and pedestrian entrance) is located via a driveway that connects to U.S. 1. Additional pedestrian access to the site is via the Intracoastal Waterway at an area called "Ski Beach" and via a pedestrian gate located on the Town of Jupiter's multi-use Riverwalk recreational corridor on the north end of the site.

The Division of Historical Resources maintains a Master Site File that documents many of Florida's archaeological and historical features. A review of information obtained from the

Florida Master Site File disclosed there are no known archaeological resources associated with the natural area.

The Florida Legislature requires that all land management plans include long and short-term goals. These goals must be measurable objectives, and short-term goals must be achievable within a two-year planning period. Pursuant to section 253.034, Florida Statutes, the Division of State Lands began compiling the short-term goals from each land management plan approved since July 1, 2016. The Division has included short-term goals from this management plan as part of this item.

Public Involvement

Palm Beach County emphasized involvement of numerous stakeholder groups when drafting the plan. The advisory group held a public meeting on August 31, 2021. The management plan was available through the county website 30 days prior to the public meeting. No comments were received during the public review process.

Surplus Lands

The evaluation of this site has determined that no portion of the Jupiter Ridge Natural Area is to be declared surplus.

State Land Management Review Team

This property has not been subject to a recent review by an inter-agency land management review team.

STAFF RECOMMENDATION:

Approve the management plan.

A]	ARC RECOMMENDATION:				
() APPROVE				
() APPROVE WITH MODIFICATIONS:				
() DEFER				
() WITHDRAW				
() NOT APPROVE				
(OTHER:				

Jupiter Ridge Natural Area

Land Management Plan Short-term Goals

Goal	Details of Goal	Objective	Details of Objective	Action	Details of Action	Performance Measure
1	Habitat Restoration and Improvement: Maintain and enhance a healthy scrub community	А	Conduct prescribed burns within sand pine scrub communities as recommended by FNAI (2010). [Note: Prescribed burning is contingent upon appropriate weather conditions, smoke and safety considerations, funding and resource availability, and other factors required for burning within an urban environment.]	n/a	n/a	Prescribed burns completed
1	Habitat Restoration and Improvement: Maintain and enhance a healthy scrub community	В	Conduct prescribed burns within oak scrub communities as recommended by FNAI (2010). [Note: Prescribed burning is contingent upon appropriate weather conditions, smoke and safety considerations, funding and resource availability, and other factors required for burning within an urban environment.]	n/a	n/a	Prescribed burns completed
1	Habitat Restoration and Improvement: Maintain and enhance a healthy scrub community	С	If prescribed burning in Objective A cannot be conducted, the use of mechanical vegetative reduction methods within the site will be utilized, as needed, to create a mosaic of natural communities and successional stages and reduce the risk of catastrophic wildfire.	n/a	n/a	Prescribed burns completed

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Goal	Details of Goal	Objective	Details of Objective	Action	Details of Action	Performance Measure
1	Habitat Restoration and Improvement: Maintain and enhance a healthy scrub community	D	Provide habitat for listed species that require early stages of scrub succession and those that require later stages by rotation burning of management units.	n/a	n/a	Habitat provided
1	Habitat Restoration and Improvement: Maintain and enhance a healthy scrub community	E	Attempt to meet vegetation structure objectives recommended by the Florida Fish and Wildlife Conservation Commission (FWC) and the Florida Natural Areas Inventory (FNAI) in the 2010 Scrub Management Guidelines for Peninsular Florida (FWC and FNAI 2010), or subsequent updated versions, with appropriate adjustments made based on the needs of imperiled species present on the site.	n/a	n/a	Vegetation structure objectives met.
2	Nonnative, Invasive and Nuisance Species Maintenance and Control: Maintain and enhance a healthy scrub community: Control non-native and invasive plant species, and nonnative and nuisance animal species so that they do not significantly impact native plant communities.	А	Conduct ongoing invasive/nonnative plant treatments, as needed, to maintain coverage of invasive/nonnative plant species at less than 1 2-6 percent of the natural area. An evaluation will be conducted in 2 years to see if goals and objectives are being achieved.	n/a	n/a	Invasive/nonnative plant treatments conducted.

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Goal	Details of Goal	Objective	Details of Objective	Action	Details of Action	Performance Measure
2	Nonnative, Invasive and Nuisance Species Maintenance and Control: Maintain and enhance a healthy scrub community: Control non-native and invasive plant species, and nonnative and nuisance animal species so that they do not significantly impact native plant communities.	В	Monitor the site for feral hogs (Sus scrofa), domestic and feral cats, stray dogs, raccoons (Procyon lotor) and other nonnative/nuisance animals, as needed, during opportunistic observations and scheduled wildlife surveys, and remove/control populations of nonnative/nuisance animals as necessary and feasible. An evaluation will be conducted in 2 years to see if goals and objectives are being achieved.	n/a	n/a	Site monitored for Feral hogs, feral cats, stray dogs, raccoons, and other nonnative/nuisance animals.

Source: Florida DEP, Office of Environmental Services, Revised 2020-MWE.

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LAND MANAGEMENT PLAN EXECUTIVE SUMMARY

Lead Agency: Palm Beach County Department of Environmental Resources Management Common Name of Property: Jupiter Ridge Natural Area Location: Town of Jupiter, Palm Beach County Total Acreage: 269 (266 State-Owned, 3 County-Owned) Acreage Breakdown: Land Cover Classification Acreage* Land Cover Classification Acreage* Coastal Strand 1.3 Mesic Flatwoods 8.1 3.4 0.6 Depression Marsh Parking Area 162.1 Disturbed Scrub 3.1 Scrub Estuarine Unconsolidated Substrate 12.2 Scrubby Flatwoods 41.4 Mangrove Swamp 31.5 Shell Rock Road 5.3 *Includes approximately 6.67 acres of submerged and upland areas between the eastern edge of the Atlantic Intracoastal Waterway and the official property boundary that are not being managed by another entity Lease Number: 4004 Use: Single X Multiple Management Responsibility: Agency Responsibility Palm Beach County All management activities except maintenance of Riverwalk Town of Jupiter Public safety and law enforcement, maintenance of Riverwalk Designated Land Use: Natural Area (Conservation) Sublease(s): None Encumbrances: 23 linear easements and 13 smaller encumbrances Type Acquisition: Fee simple shared acquisition- Conservation, Recreation Lands funds, and Palm Beach County Environmentally Sensitive Lands Bond Referendum funds Unique Resources: Natural <u>Lake Worth Creek, Pamlico Dune Ridge, Florida Scrub</u> Archaeological/Historical None Management Needs: Maintenance of native ecosystems (primarily through prescribed burning and mechanical vegetation reduction), maintenance of listed species population, and continued control of invasive nonnative species Acquisition Needs/Acreage: None Surplus Land Needs/Acreage: None Public Involvement: Natural Areas Management Advisory Committee meetings, public hearing, Board of County Commissioners Meeting, Acquisition and Restoration Council meeting DO NOT WRITE BELOW THIS LINE (FOR DIVISION OF STATE LANDS USE ONLY) ARC Approval Date: _____ Trustees Approval Date: _____ Comments:

THE PALM BEACH COUNTY NATURAL AREAS SYSTEM MANAGEMENT STATEMENT

The Palm Beach County Natural Areas System is comprised of those environmentally sensitive lands that are owned or leased by the County and managed as natural areas by the County's Department of Environmental Resources Management. These natural areas were selected and acquired to preserve the rare and diverse native ecosystems present on these sites and the endangered, threatened, and rare species of plants and animals that live there.

Purpose and Goals of the Natural Areas System

- The purpose of the Natural Areas System is to protect, restore and manage remnant native ecosystems, and the plants and animals characteristic of those ecosystems, in perpetuity, throughout Palm Beach County. The management of each natural area shall be coordinated with that of the other natural areas in the system.
- Attempts shall be made to maintain physical and/or biological connections with other publicly- or privately-owned natural areas through additional land acquisitions, conservation easements, interlocal agreements, greenway/trail connections and other appropriate actions.

Management Considerations

- County natural areas shall be open to the public for non-consumptive/non-destructive, resource-based recreation, environmental education and scientific research. Public use shall not take precedence over ecosystem protection. Public uses shall be limited to those that are compatible with the perpetual preservation and management of the native ecosystems, plants and animals found on the natural area.
- All public use facilities shall be chosen, designed and located to have minimal impact on the rare and imperiled plants, animals and natural communities found on the natural area. Facilities, structures or roads (other than management accessways/firebreaks or access roads) that would cause fragmentation of a natural area shall not be permitted.
- To the extent practicable, fire-maintained native ecosystems shall be burned at the fire interval necessary to maintain those ecosystems. Burns shall be conducted by trained personnel, using a prescribed burn plan that addresses safety and smoke concerns.
- Native ecosystems that have been impacted by invasive/nonnative plant infestations, landclearing activities, drainage and/or other man-made disturbances shall be restored to their previous condition, if practicable, or to a native ecosystem that is better suited to current environmental conditions.

• The special requirements of listed species shall be considered in developing management strategies for each natural area, but an individual species' needs shall not take precedence over management of an entire ecosystem or be allowed to have a detrimental impact on that ecosystem's complement of species.

Management Plan Development and Revision

- A management plan shall be written for each natural area that: 1) describes the natural and cultural resources; 2) identifies any constraints associated with managing the natural area in an urbanized environment; and 3) identifies the strategies and techniques that will be used to preserve, restore and manage the native ecosystems, preserve the cultural resources, protect listed species, control invasive/nonnative plants and animals, provide for appropriate public access, manage and maintain public use facilities, and prevent unauthorized access and activities.
- Each plan shall be reviewed by the Palm Beach County Natural Areas Management Advisory Committee (NAMAC), a citizens' advisory board, and the public shall be invited to comment on the plan at a public hearing held by NAMAC in the community in which the site is located. Following NAMAC's review of any comments received, the plan shall be sent to the Board of County Commissioners for approval.
- Each approved plan shall be subsequently reviewed and updated at least every ten years in accordance with F.S. 253.034(5).

EXECUTIVE SUMMARY

The 269-acre Jupiter Ridge Natural Area (natural area) is located in the northeastern portion of Palm Beach County (County). The County owns approximately three acres of land within the natural area, and leases and manages 266 acres pursuant to a Lease Agreement with the State of Florida. Funding for the natural area came from the Palm Beach County Environmentally Sensitive Lands Bond Referendum of March 12, 1991 and State Preservation 2000 matching funds were received from the Conservation and Recreation Lands (CARL) Program.

Mangrove swamp, mesic flatwoods, scrub, and scrubby flatwoods are the predominant natural communities present on the site. Smaller areas of coastal strand, depression marsh, and estuarine unconsolidated substrate are also present. Thus far, 364 species of plants and 275 species of animals have been recorded on the site, including nineteen plant and twenty-two animal species that have been designated as having some degree of endangerment by at least one governmental agency or have been ranked by the Florida Natural Areas Inventory.

The primary purpose for the acquisition of this natural area was to preserve, restore/enhance and manage the site's ecological resources, including the existing natural communities, their component plant and animal species, and local groundwater resources. Acquisition, development and management of the site as a natural area have provided members of the public with opportunities for recreational activities, environmental education and scientific research that are consistent with the primary purpose of the site's acquisition. It also has helped the County and the Town of Jupiter comply with portions of their respective comprehensive plans.

Public use facilities have been constructed; the site opened to the public in April 2001. An accessible nature trail, hiking trail, boardwalk, wildlife observation platform, and kiosks with interpretive displays provide valuable opportunities for the public to observe and learn about the site's biologically unique plant communities and associated animals. The main public access, including parking facilities, a bicycle rack and pedestrian entrance, is located via a driveway that connects to U.S. 1. Additional pedestrian access to the site is via the Intracoastal Waterway at an area called "Ski Beach" and via a pedestrian gate located on the Town of Jupiter's multi-use Riverwalk recreational corridor on the north end of the site.

This updated management plan: 1) identifies the existing natural and resources, including rare and imperiled species and vegetation communities; 2) identifies factors that affect the preservation, restoration and long-term management of the existing resources; 3) addresses the site-specific goals, strategies and techniques that will be used to preserve, restore/enhance, manage and monitor the existing resources; 4) ensures that the natural area is developed and managed in accordance with all applicable grant restrictions, and lease agreement conditions; and 5) identifies public recreational uses that may be accommodated without adversely affecting the site's natural resources. This management plan also includes information related to the site's estimated capital costs, estimated annual management and maintenance costs, and any other issues identified by staff.

The County will review and update this management plan at least once every ten years as necessary based on new information, improvements in management techniques or other relevant factors in accordance with F.S. 253.034(5). The next scheduled review of the plan by the Acquisition and Restoration Council will be in 2031.

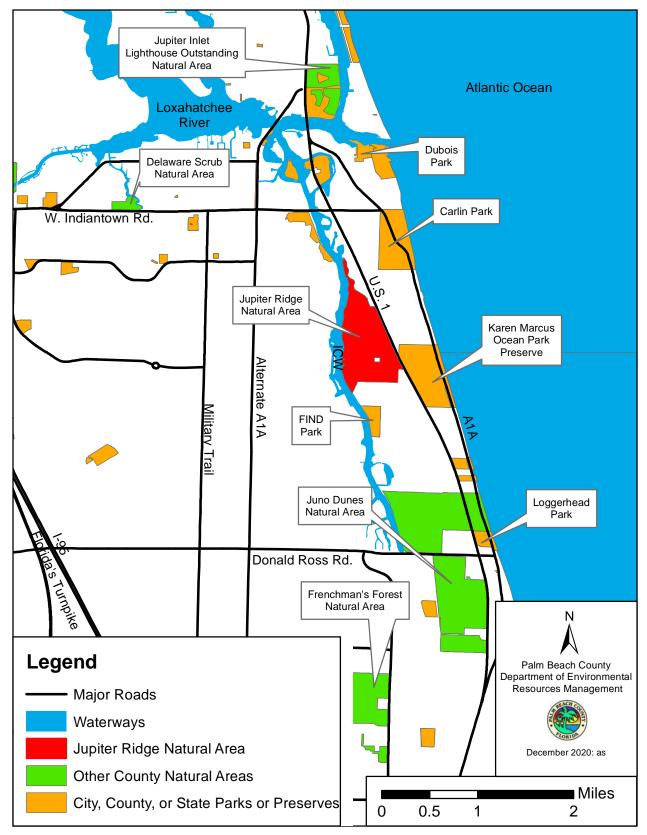


Figure 1. Jupiter Ridge Natural Area Location Map

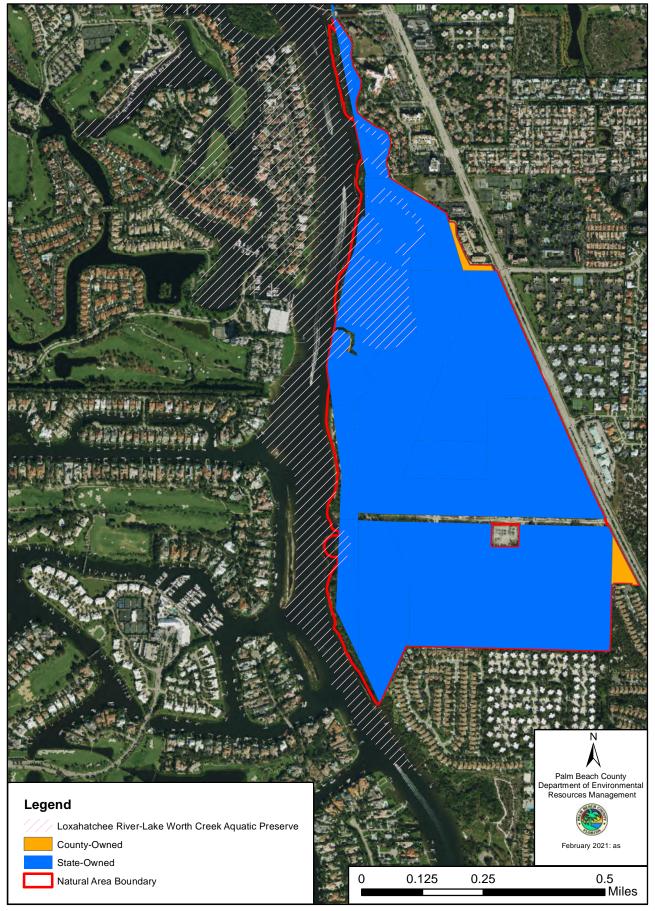


Figure 2. Jupiter Ridge Natural Area Ownership Map

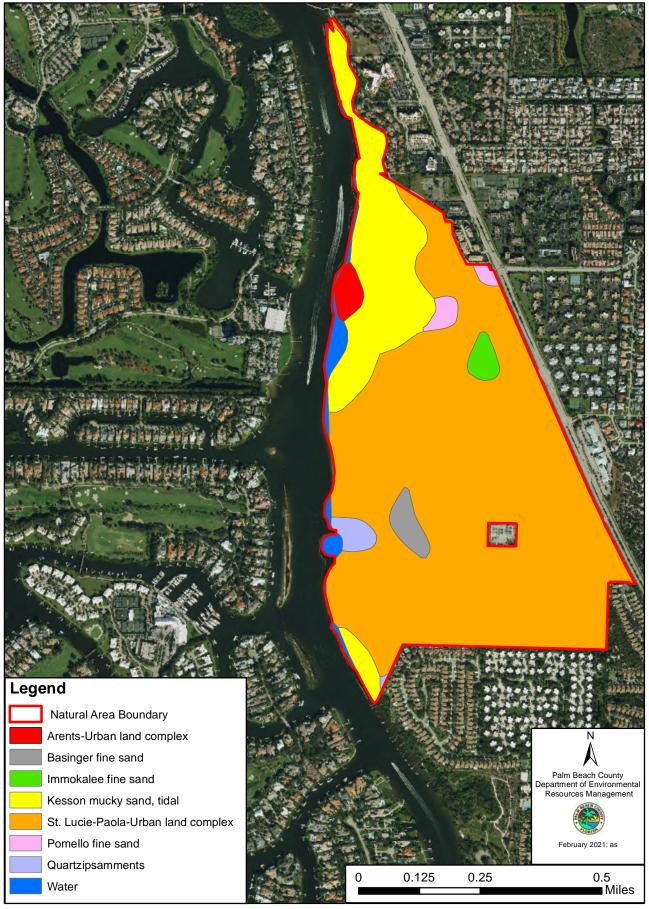


Figure 3. Jupiter Ridge Natural Area Soils

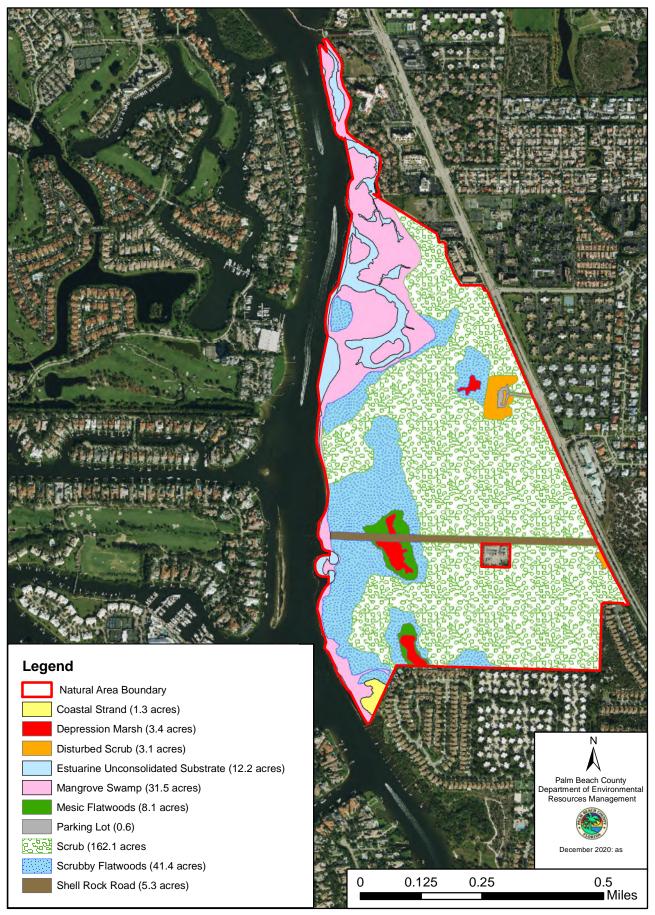


Figure 4. Jupiter Ridge Natural Area Vegetation Community

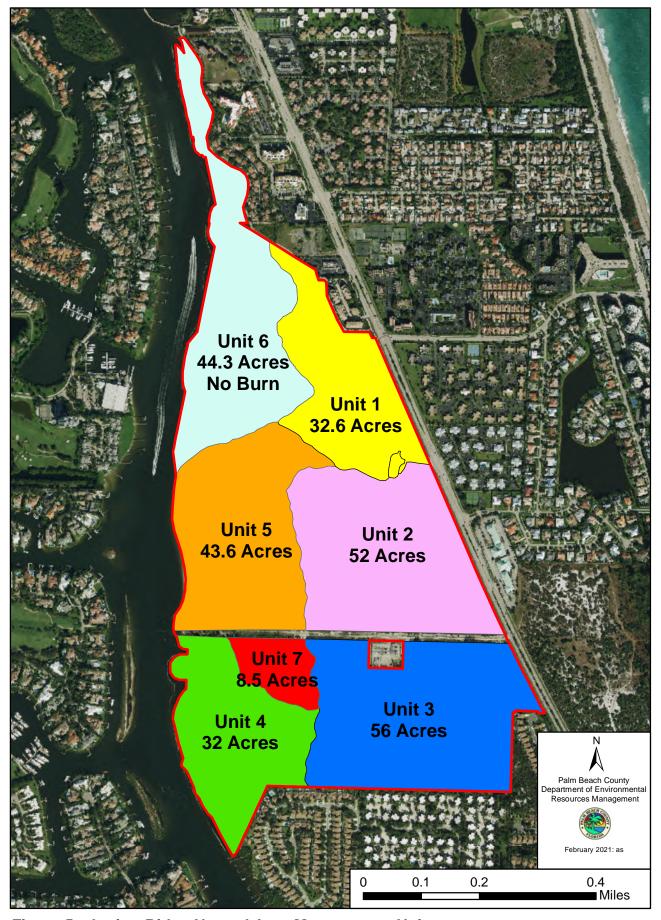


Figure 5. Jupiter Ridge Natural Area Management Units

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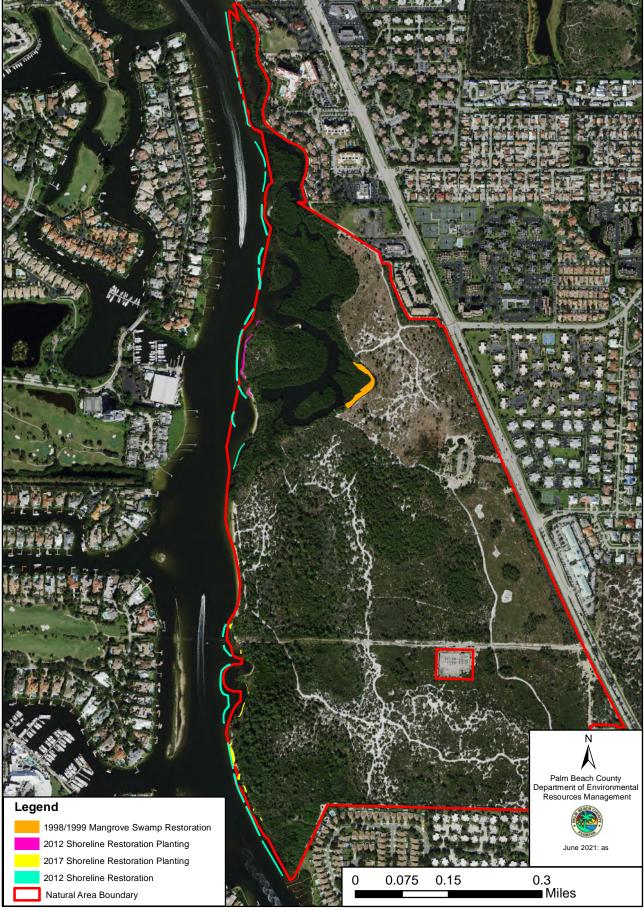


Figure 6. Jupiter Ridge Natural Area Restoration Map



Figure 7. Jupiter Ridge Natural Area Greenways and Trails Map

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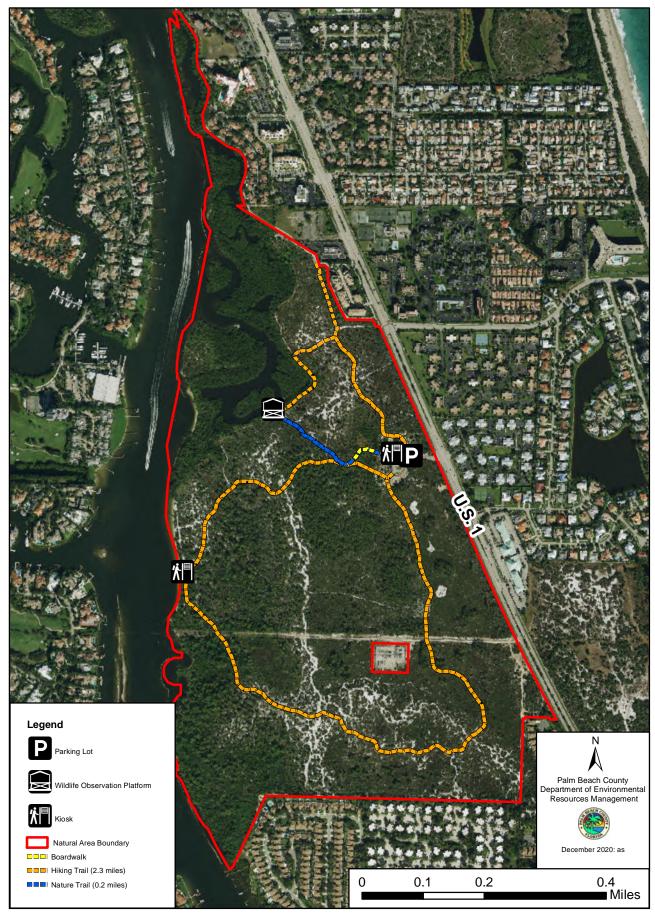


Figure 8. Jupiter Ridge Natural Area Public Use Facilities