



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
850-224-8207
fax 850-681-9364
www.fnai.org

Stacy Rizzo
Golder Associates, Inc.
6026 NW 1st Place
Gainesville, FL 32607

December 1, 2009

Dear Ms. Rizzo,

Thank you for your request for information from the Florida Natural Areas Inventory (FNAI). We have compiled the following information for your project area.

Project: Crystal River Energy Complex – Brookridge Substation
Date Received: November 24, 2009
Location: Citrus and Hernando Counties

Based on the information available, this site appears to be located on or very near a significant region of scrub habitat, a natural community in decline that provides important habitat for several rare species within a small area. Additional consideration should be given to avoid and/or mitigate impacts to these natural resources, and to design land uses that are compatible with these resources.

Element Occurrences

A search of our maps and database indicates that currently we have several Element Occurrences mapped within the vicinity of the study area (see enclosed maps and element occurrence tables). Please be advised that a lack of element occurrences in the FNAI database is not a sufficient indication of the absence of rare or endangered species on a site.

The Element Occurrences data layer includes occurrences of rare species and natural communities. The map legend indicates that some element occurrences occur in the general vicinity of the label point. This may be due to lack of precision of the source data, or an element that occurs over an extended area (such as a wide ranging species or large natural community). For animals and plants, Element Occurrences generally refer to more than a casual sighting; they usually indicate a viable population of the species. Note that some element occurrences represent historically documented observations which may no longer be extant.

*Several of the species and natural communities tracked by the Inventory are considered **data sensitive**. Occurrence records for these elements contain information that we consider sensitive due to collection pressures, extreme rarity, or at the request of the source of the information. The Element Occurrence Record has been labeled "Data Sensitive." We request that you not publish or release specific locational data about these species or communities without consent from the Inventory. If you have any questions concerning this please do not hesitate to call.*

Likely and Potential Rare Species

In addition to documented occurrences, other rare species and natural communities may be identified on or near the site based on habitat models and species range models (see enclosed Biodiversity



Florida Resources
and Environmental
Analysis Center

Institute of Science
and Public Affairs

The Florida State University

Tracking Florida's Biodiversity

Matrix Reports). These species should be taken into consideration in field surveys, land management, and impact avoidance and mitigation.

FNAI habitat models indicate areas, which based on land cover type, offer suitable habitat for one or more rare species that is known to occur in the vicinity. Habitat models have been developed for approximately 300 of the rarest species tracked by the Inventory, including all federally listed species.

FNAI species range models indicate areas that are within the known or predicted range of a species, based on climate variables, soils, vegetation, and/or slope. Species range models have been developed for approximately 340 species, including all federally listed species.

The FNAI Biodiversity Matrix Geodatabase compiles Documented, Likely, and Potential species and natural communities for each square mile Matrix Unit statewide.

Florida Scrub-jay Survey – U.S. Fish and Wildlife Service

This survey was conducted by staff and associates of the Archbold Biological Station from 1992 to 1996. An attempt was made to record all scrub-jay (*Aphelocoma coerulescens*) groups, although most federal lands were not officially surveyed. Each map point represents one or more groups.

This data layer indicates that there are potential scrub-jay populations on or very near your site. For additional information:

Fitzpatrick, J.W., B. Pranty, and B. Stith, 1994, Florida scrub jay statewide map, 1992-1993. U. S. Fish and Wildlife Service Report, Cooperative Agreement no. 14-16-004-91-950.

Managed Areas

Portions of the site appear to be located within the Withlacoochee State Forest, managed by the Florida Department of Agriculture and Consumer Services, Division of Forestry, the Chassahowitzka Wildlife Management Area, managed by the Florida Fish and Wildlife Conservation Commission, and Annutteliga Hammock, managed by the Southwest Florida Water Management District.

The Managed Areas data layer shows public and privately managed conservation lands throughout the state. Federal, state, local, and privately managed conservation lands are included.

Land Acquisition Projects

This site appears to be located within the Annutteliga Hammock Florida Forever BOT Project, which is part of the State of Florida's Conservation and Recreation Lands land acquisition program. A description of this project is enclosed. For more information on this Florida Forever Project, contact the Florida Department of Environmental Protection, Division of State Lands.

Florida Forever Board of Trustees (BOT) projects are proposed and acquired through the Florida Department of Environmental Protection, Division of State Lands. The state has no regulatory authority over these lands until they are purchased.

The Inventory always recommends that professionals familiar with Florida's flora and fauna should conduct a site-specific survey to determine the current presence or absence of rare, threatened, or endangered species.

Please visit www.fnai.org/trackinglist.cfm for county or statewide element occurrence distributions and links to more element information.

The database maintained by the Florida Natural Areas Inventory is the single most comprehensive source of information available on the locations of rare species and other significant ecological resources. However, the data are not always based on comprehensive or site-specific field surveys. Therefore, this information should not be regarded as a final statement on the biological resources of the site being considered, nor should it be substituted for on-site surveys. Inventory data are designed for the purposes of conservation planning and scientific research, and are not intended for use as the primary criteria for regulatory decisions.

Information provided by this database may not be published without prior written notification to the Florida Natural Areas Inventory, and the Inventory must be credited as an information source in these publications. FNAI data may not be resold for profit.

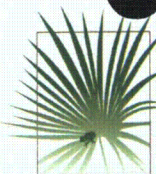
Thank you for your use of FNAI services. If I can be of further assistance, please give me a call at (850) 224-8207.

Sincerely,

Alicia C. Newberry

Alicia C. Newberry
Data Services Coordinator

Encl



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

FLORIDA
Natural Areas
INVENTORY

Element Occurrences

- Animals
- Plants
- Communities
- Other
- Data Sensitive

Point Indicates General Vicinity of Element

U.S. Fish & Wildlife Service Scrub Jay Survey 1992-96

Conservation Lands

- Federal
- State
- Local
- Private
- State Aquatic Preserves

Land Acquisition Projects

- Florida Forever
- Board of Trustees Projects

- FNAI Rare Species Habitat
- FNAI Biodiversity Matrix Square Mile Units

- County Boundary
- Interstate
- Turnpike
- Major Highway
- Local Road
- Railroad [Inactive railroads shown in Gray]
- Water

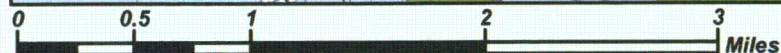
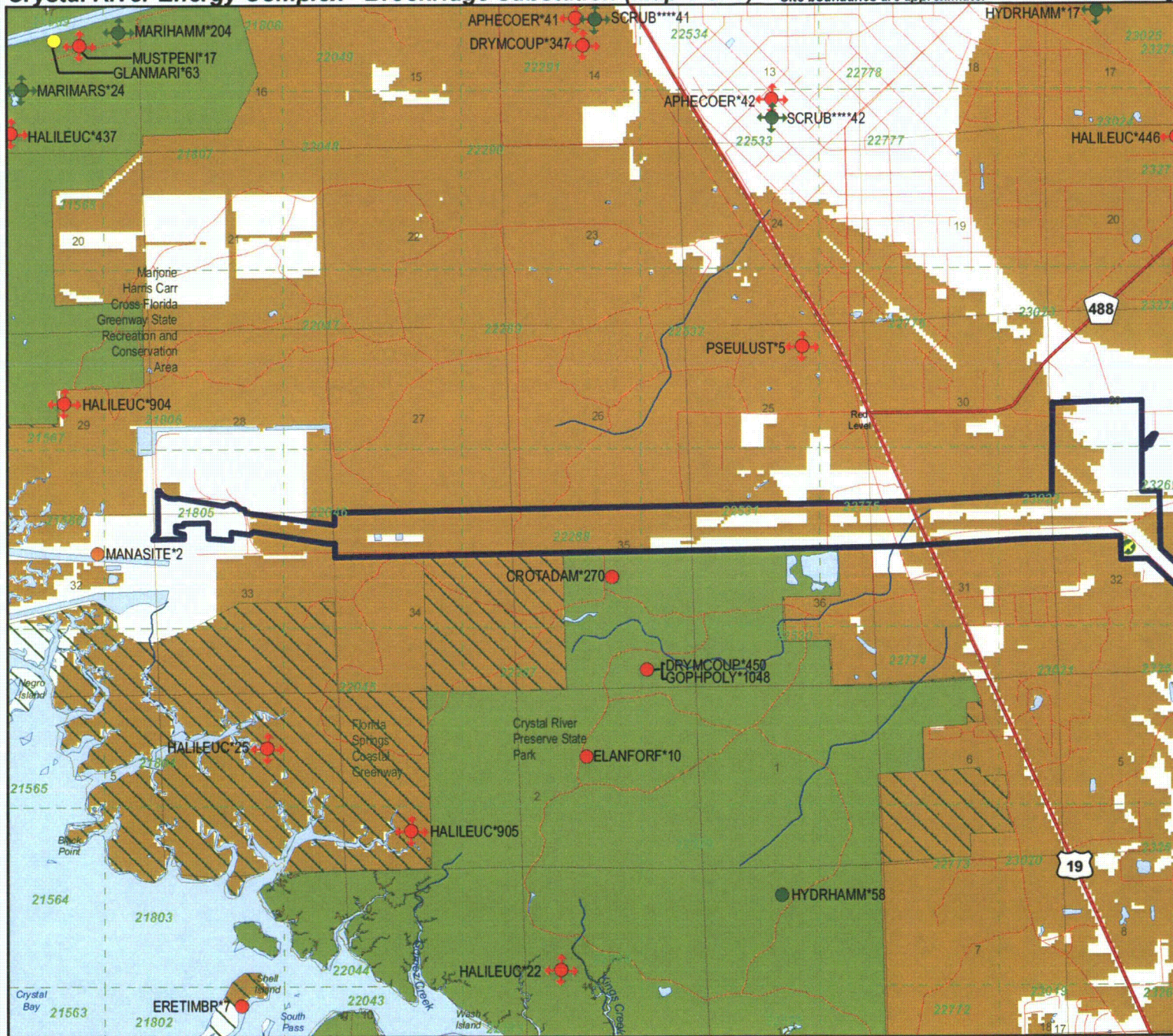


NOTE
Map should not be interpreted without accompanying documents.

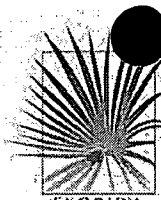
Crystal River Energy Complex - Brookridge Substation (Map 1 of 6)

Site boundaries are approximate.

Citrus County



Map produced by ACN
Map Date: 1 DEC 2009



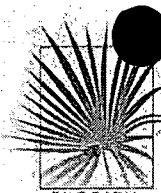
1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 1 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
APHECOER*42	<i>Aphelocoma coerulescens</i>	Florida Scrub-jay	G2	S2	LT	LT	1981-02-21	GRASSY PALMETTO SCRUB	1981-02-21: 11 SCRUB JAYS
MARIHAMM*204	Maritime hammock		G3	S2	N	N	2004	SMALL REMNANT SURROUNDED BY ESTUARINE TIDAL MARSH.	2004: Update to last obs date was based on interpretation of aerial photography (previous value was 1991-10-10) (U05FNA02FLUS). REMNANT DOMINATED BY SABAL PALMETTO WITH PINUS ELLIOTTII, QUERCUS VIRGINIANA, JUNIPERUS SILICICOLA, DICHROMENA COLORATA, MYRIC
HYDRHAMM*17	Hydric hammock		G4	S4	N	N	2004	ISOLATED OCCURRENCE WITH LIMESTONE BOULDERS AT THE SURFACE; SOME DEEPER POOLS OF WATER.	2004: Update to last obs date was based on interpretation of aerial photography (previous value was 1991-11-12) (U05FNA02FLUS). DOMINATED BY SABAL PALMETTO AND ACER RUBRUM.
MARIMARS*24	Marine tidal marsh		G5	S4	N	N	2004	TIDAL MARSH WITH NUMEROUS TIDAL CREEKS, AND INTERGRADING WITH SMALL MARITIME HAMMOCKS ON SLIGHTLY TOPOGRAPHICALLY HIGHER AREAS.	2004: Update to last obs date was based on interpretation of aerial photography (previous value was 1991-10-10) (U05FNA02FLUS). DOMINATED BY JUNCUS REOMERIANUS.
SCRUB****42	Scrub		G2	S2	N	N	2004	GRASSY PALMETTO SCRUB	2004: Update to last obs date was based on interpretation of aerial photography (previous value was 1981-02-21) (U05FNA02FLUS). OCCURRENCE AT SITE
SCRUB****41	Scrub		G2	S2	N	N	1981-02-21	PALMETTO SCRUB, SCATTERED PALMS	OCCURRENCE AT SITE
ERETIMBR*7	<i>Eretmochelys imbricata</i>	Hawksbill	G3	S1	LE	LE	1997-04-02	Coastal hammock island.	1997-04-02: One adult turtle found dead, decomposing (U97MAI01FLUS).
HYDRHAMM*58	Hydric hammock		G4	S4	N	N	1997-04-07	This hammock is deep in the woods. Crystal River marshes and swamps are its south and west border. The north and east edges are flatwoods and sandhills, also within the preserve.	1997-04-07: Completely canopied by mature trees reaching over 100 feet; understory and ground layer fairly open from lack of light; succession dominated by light gaps; enormous, clearly old growth. Hammock is interspersed with shallow running streams and



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

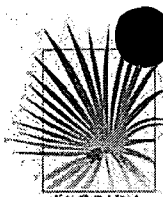
FLORIDA
Natural Areas
INVENTORY

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 1 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
MANASITE*2	Manatee Aggregation Site		GNR	SNR	N	N	1988	WARM-WATER EFFLUENT INTO GULF OF MEXICO (CRYSTAL BAY).	UP TO 5 MANATEES UTILIZE THIS AREA FOR SHORT PERIODS OF COOL WEATHER; MOST HEAVILY IN SPRING AS INDIVIDUALS DISPERSE NORTHWARD FROM CRYSTAL RIVER.
DRYMCOUP*347	Drymarchon couperi	Eastern Indigo Snake	G3	S3	LT	LT	1973-10	No general description given	MUSEUM SPECIMEN: S. CHRISTMAN, OCT 1973, UF.
APHECOER*41	Aphelocoma coerulescens	Florida Scrub-jay	G2	S2	LT	LT	1981-02-21	PALMETTO SCRUB, SCATTERED PINES	1981-02-21: 2 SCRUB JAYS
MUSTPENI*17	Mustela frenata peninsulae	Florida Long-tailed Weasel	G5T3	S3	N	N	1975-03-23	Coastal hammock.	1975-03-23: S.P. Christman, DEP, observation. Observed for several minutes as emerged from holes in hollow logs and ground in "peek-a-boo" fashion. See Fla. Game and Fresh Water Fish Comm., Cross Florida Barge Canal Restudy Rep. -Wildl. Study. Vol. IV, Ap
GOPHPOLY*1048	Gopherus polyphemus	Gopher Tortoise	G3	S3	N	LT	1997-04-08	Planted slash pine; includes some relic sandhill planted with slash pine and turkey oak (NW1/4 of section 2 T18SR16E).	1997-04-08: One individual sighted on dirt road in NW1/4 section 1 T18SR16E (S. Blitch et al.). 1995-1997: S. Blitch made several sightings of tortoises at three different locations within element occurrence boundaries (see attached map).
CROTADAM*270	Crotalus adamanteus	Eastern Diamondback Rattlesnake	G4	S3	N	N	1996	Planted pine.	1996: S. Blitch observed one individual once or twice near state buffer preserve's shop.
ELANFORF*10	Elanoides forficatus	Swallow-tailed Kite	G5	S2	N	N	1995-SPRING	No general description given	1995 Spring: One pair nested in planted slash pine (S. Blitch).
DRYMCOUP*450	Drymarchon couperi	Eastern Indigo Snake	G3	S3	LT	LT	1996-XX-XX	Planted slash pine and pine flatwoods (T17SR16E sec. 35); oak hammock and pasture (T18SR16E Sec. 1) (S. Blitch); mature slash pine plantation (G. Maidhoff).	1995-1996: Individuals observed at four different locations by S. Blitch (no specific dates). 1995-02-21: One snake observed by Ms. Yulee Commander basking in fire trail (U95MAI02).
HALILEUC*904	Haliaeetus leucocephalus	Bald Eagle	G5	S3	PS	N	2003	No general description given	Nest status 1995-2003: Continuously active. (U03FWC01FLUS). Previous data (note different format) Nest; 1995: Produced 1 young; 1994: Produced 2 young; 1993: Produced 2 young; 1992: No data; 1991: Active, productivity unknown; 1990: Produced 1 young; 198



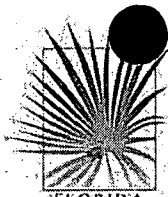
1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 1 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
HALILEUC*22	<i>Haliaeetus leucocephalus</i>	Bald Eagle	G5	S3	PS	N	1991	No general description given	Nest status 1999-2003: Inactive - 2003; Unknown/not assessed - 2002, 2001, 2000, 1999; Status 1995-98: Inactive - 1998, 1997, 1996, 1995; (U03FWC01FLUS). Previous data (note different format) NEST: 1995: GONE; 1994: INACTIVE; 1993: INACTIVE; 1992: NO DAT
HALILEUC*446	<i>Haliaeetus leucocephalus</i>	Bald Eagle	G5	S3	PS	N	2003	No general description given	Nest status 1995-2003: Continuously active. (U03FWC01FLUS). Previous data (note different format) NEST: 1995: PRODUCED 1 YOUNG; 1994: GONE; 1993: PRODUCED 2 YOUNG; 1992-87: NO DATA; 1982-1986 ACTIVE; FLEDGED YOUNG 1982-1983, 1985.
HALILEUC*905	<i>Haliaeetus leucocephalus</i>	Bald Eagle	G5	S3	PS	N	2003	No general description given	Nest status 1995-2003: Continuously active. (U03FWC01FLUS). Previous data (note different format) Nest; 1995: Produced 1 young; 1994: Produced 1 young; 1993: Produced 1 young; 1992: No data; 1991: Produced 1 young; 1990: No data; 1989: Produced 1 young;
HALILEUC*437	<i>Haliaeetus leucocephalus</i>	Bald Eagle	G5	S3	PS	N	1982	No general description given	Nest status 1999-2003: Unknown/not assessed - 2003, 2002, 2001, 2000, 1999; Status 1995-98: Inactive - 1998, 1997, 1996, 1995; (U03FWC01FLUS). Previous data (note different format) NEST; 1995-93: GONE; 1992-83: NO DATA; ONLY ACTIVITY 1982. TWO ADULTS SEE
HALILEUC*25	<i>Haliaeetus leucocephalus</i>	Bald Eagle	G5	S3	PS	N	1991	No general description given	Nest status 1999-2003: Inactive - 2003; Unknown/not assessed - 2002, 2001, 2000, 1999; Status 1995-98: Inactive - 1998, 1997, 1996, 1995; (U03FWC01FLUS). Previous data (note different format) NEST: 1995-93: GONE; 1992: NO DATA; 1991: ACTIVE, PRODUCTIVITY
GLANMARI*63	<i>Glandularia maritima</i>	Coastal Vervain	G3	S3	N	LE	2003-03-18	2007-01-23: Ruderal edge of limerock road that borders maritime hammock (PNDHER03FLUS).	2003-03-18: 50 plants were documented scattered within an area covering 100 feet X 10 feet. Plants were in flower (PNDHER03FLUS).



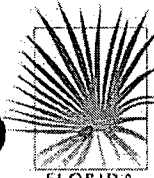
1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 1 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
PSEULUST*5	<i>Pseudobranchius striatus lustricolus</i>	Gulf Hammock Dwarf Siren	G5T1	S1	N	N	1951-03-15	1951: habitat not described by Neill (1951) (A51NEI02FLUS).	1951-03-15: W. T. Neill collected at least eight adults (paratypes, ERA-WTN 14218-14225) (A51NEI02FLUS, B92MOL01FLUS).



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

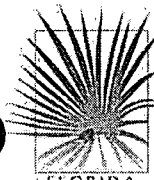
Florida Natural Areas Inventory

Biodiversity Matrix Report Map 1 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
Matrix Unit ID: 21805					
Likely					
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Manatee aggregation site</i>		GNR	SNR	N	N
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*
Potential					
<i>Acipenser oxyrinchus desotoi</i>	Gulf Sturgeon	G3T2	S2	LT	LS
<i>Ammodramus maritimus peninsulæ</i>	Scott's Seaside Sparrow	G4T3Q	S3	N	LS
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Caretta caretta</i>	Loggerhead	G3	S3	LT	LT
<i>Chelonia mydas</i>	Green Turtle	G3	S2	LE	LE
<i>Cistothorus palustris marianae</i>	Marian's Marsh Wren	G5T3	S3	N	LS
<i>Corynorhinus rafinesquii</i>	Rafinesque's Big-eared Bat	G3G4	S2	N	N
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Leitneria floridana</i>	Corkwood	G3	S3	N	LT
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Neovison vison halilimnetes</i>	Gulf Salt Marsh Mink	G5T3	S3	N	N
<i>Nerodia clarkii clarkii</i>	Gulf Salt Marsh Snake	G4T4	S3?	N	N
<i>Phyllanthus leibmannianus ssp. platylepis</i>	Pinewood Dainties	G4T2	S2	N	LE
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Rallus longirostris scottii</i>	Florida Clapper Rail	G5T3?	S3?	N	N
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Trichechus manatus</i>	Manatee	G2	S2	LE	LE
Matrix Unit ID: 22046					
Likely					
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
Mesic flatwoods		G4	S4	N	N
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*
Potential					
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Corynorhinus rafinesquii</i>	Rafinesque's Big-eared Bat	G3G4	S2	N	N
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Leitneria floridana</i>	Corkwood	G3	S3	N	LT
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Neovison vison halilimnetes</i>	Gulf Salt Marsh Mink	G5T3	S3	N	N
<i>Phyllanthus leibmannianus ssp. platylepis</i>	Pinewood Dainties	G4T2	S2	N	LE
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

Florida Natural Areas Inventory

Biodiversity Matrix Report Map 1 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
Matrix Unit ID: 22288					
Documented					
<i>Crotalus adamanteus</i>	Eastern Diamondback Rattlesnake	G4	S3	N	N
Likely					
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*
Potential					
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Corynorhinus rafinesquii</i>	Rafinesque's Big-eared Bat	G3G4	S2	N	N
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Leitneria floridana</i>	Corkwood	G3	S3	N	LT
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Neovison vison halilimnetes</i>	Gulf Salt Marsh Mink	G5T3	S3	N	N
<i>Phyllanthus leibmannianus ssp. platylepis</i>	Pinewood Dainties	G4T2	S2	N	LE
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE

Matrix Unit ID: 22531

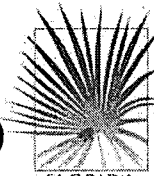
Likely

<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
Mesic flatwoods		G4	S4	N	N
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*

Potential

<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Corynorhinus rafinesquii</i>	Rafinesque's Big-eared Bat	G3G4	S2	N	N
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Leitneria floridana</i>	Corkwood	G3	S3	N	LT
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Neovison vison halilimnetes</i>	Gulf Salt Marsh Mink	G5T3	S3	N	N
<i>Phyllanthus leibmannianus ssp. platylepis</i>	Pinewood Dainties	G4T2	S2	N	LE
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pseudobranchius striatus lustricolus</i>	Gulf Hammock Dwarf Siren	G5T1	S1	N	N
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 1 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
Matrix Unit ID: 22775					
Likely					
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Mesic flatwoods		G4	S4	N	N
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*
Potential					
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Corynorhinus rafinesquii</i>	Rafinesque's Big-eared Bat	G3G4	S2	N	N
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Leitneria floridana</i>	Corkwood	G3	S3	N	LT
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Phyllanthus leibmannianus ssp. platylepis</i>	Pinewood Dainties	G4T2	S2	N	LE
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pseudobranchius striatus lustricolus</i>	Gulf Hammock Dwarf Siren	G5T1	S1	N	N
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Matrix Unit ID: 23022

Likely

<i>Aphelocoma coerulescens</i>	Florida Scrub-jay	G2	S2	LT	LT
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Mesic flatwoods		G4	S4	N	N

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Corynorhinus rafinesquii</i>	Rafinesque's Big-eared Bat	G3G4	S2	N	N
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Leitneria floridana</i>	Corkwood	G3	S3	N	LT
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 1 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Phyllanthus leibmannianus</i> ssp. <i>platylepis</i>	Pinewood Dainties	G4T2	S2	N	LE
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Matrix Unit ID: 23023

Likely

<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
Mesic flatwoods		G4	S4	N	N

Potential

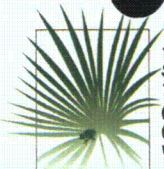
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Leitneria floridana</i>	Corkwood	G3	S3	N	LT
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Phyllanthus leibmannianus</i> ssp. <i>platylepis</i>	Pinewood Dainties	G4T2	S2	N	LE
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.

Crystal River Energy Complex - Brookridge Substation (Map 2 of 6)

Site boundaries are approximate.

Citrus County



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

FLORIDA Natural Areas INVENTORY

Element Occurrences

- Animals
- Plants
- Communities
- Other
- Data Sensitive

Point Indicates General Vicinity of Element

U.S. Fish & Wildlife Service Scrub Jay Survey 1992-96

Conservation Lands

- Federal
- State
- Local
- Private
- State Aquatic Preserves

Land Acquisition Projects

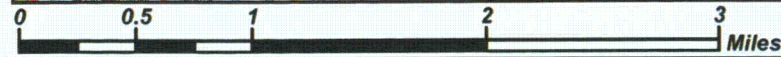
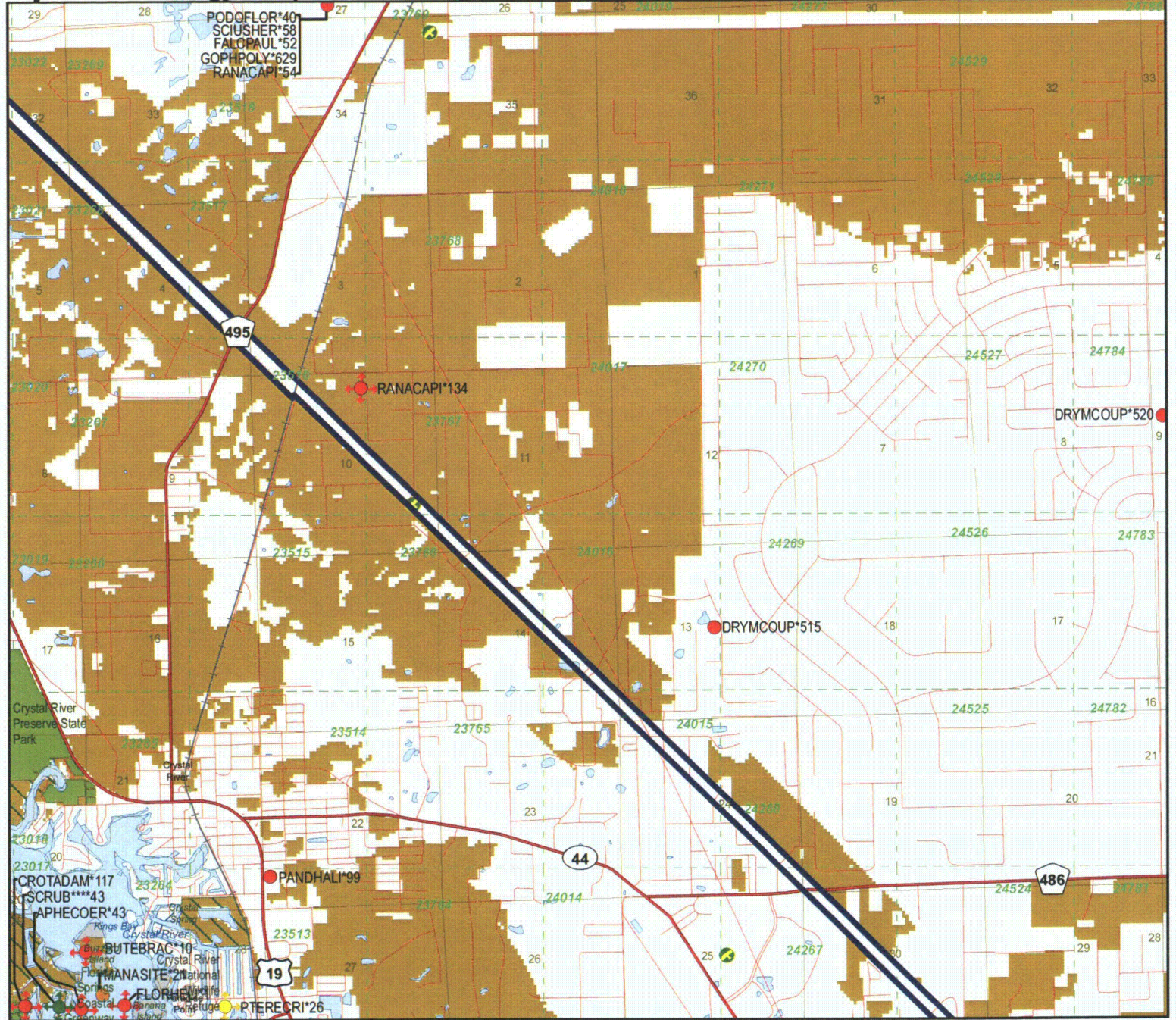
- Florida Forever
- Board of Trustees Projects

- FNAI Rare Species Habitat
- FNAI Biodiversity Matrix Square Mile Units

- County Boundary
- Interstate
- Turnpike
- Major Highway
- Local Road
- Railroad [Inactive railroads shown in Gray]
- Water



NOTE
Map should not be interpreted without accompanying documents.



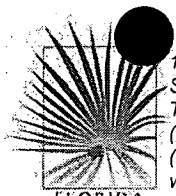
Map produced by ACN
Map Date: 1 DEC 2009

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 2 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
RANACAPI*134	<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS	1991-03-17	Upland Pine Forest; old field community	1991-03-17: D.J. STEVENSON, observed 1 adult female.
SCRUB****43	Scrub		G2	S2	N	N	2004	OAK SCRUB	2004: Update to last obs date was based on interpretation of aerial photography (previous value was 1981-03-26) (U05FNA02FLUS). OCCURRENCE AT SITE
GOPHPOLY*629	<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT	1990-04	SANDHILL, LONGLEAF PINE-TURKEY OAK, WIREGRASS, ALSO SOME PASTURE.	NUMEROUS BURROWS. 300+/- INDIVIDUALS BASED ON BURROW SURVEYS TO FGFWFC STANDARDS, EST POPULATION DENSITY OF 1.3/AC. 42%, 25% AND 33% OF OBSERVED BURROWS WERE ACTIVE, INACTIVE AND OLD RESPECTIVELY.
FALCPAUL*52	<i>Falco sparverius paulus</i>	Southeastern American Kestrel	G5T4	S3	N	LT	1990-04	SANDHILL, LONGLEAF PINE-TURKEY OAK, WIREGRASS.	8 INDIVIDUALS AND SURVIVING FLEDGLINGS AND 2 CONFIRMED NESTS.
PODOFLOR*40	<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS	1990-04	SANDHILL, LONGLEAF PINE-TURKEY OAK, WIREGRASS.	36 (ADULTS AND JUVENILE) INDIVIDUALS CAPTURED AND RELEASED, DURING 800 TRAP NIGHT SURVEY. MAJORITY OF TRAPS WERE SET IN VICINITY OF GOPHERUS BURROWS.
RANACAPI*54	<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS	1990-04	SANDHILL, LONGLEAF PINE-TURKEY OAK, WIREGRASS.	6 INDIVIDUALS CAPTURED IN FUNNEL TRAPS SET AT ENTRANCE OF GOPHER TORTOISE BURROWS.
MANASITE*21	Manatee Aggregation Site		GNR	SNR	N	N	1988	SPRING-RUN STREAM.	UP TO 150+ MANATEES USE THIS AREA IN THE WINTER.
PANDHALI*99	<i>Pandion haliaetus</i>	Osprey	G5	S3S4	N	LS*	1996-03-28	Urban.	1996-03-28: Two adults observed nesting in nesting dish on top of utility pole (PNDBAR06); 1996-02-12: one active nest observed on top of utility pole; 1995-02-21: one active nest observed on top of utility pole (PNDMAI01).
SCIUSHER*58	<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS	1990-04	SANDHILL, LONGLEAF PINE-TURKEY OAK, WIREGRASS, ALSO IN PASTURE-BAHIA GRASS.	6 INDIVIDUALS OBSERVED IN SANDHILL AND PASTURE.
PTERECRI*26	<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT	1983-09-01	N/A	1983-09-01: Specimen taken [f] (Schmid).

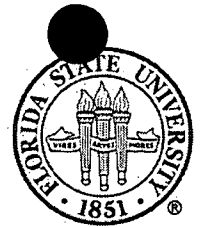


1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

FLORIDA
Natural Areas
INVENTORY

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 2 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
CROTADAM*117	<i>Crotalus adamanteus</i>	Eastern Diamondback Rattlesnake	G4	S3	N	N	1994-10-15	Snakes have been observed in general vicinity in a variety of habitats from salt marsh to scrub.	1994-10-15: One DOR observed (U94MEN02). 1992-10-06: One DOR observed (U92MEN01). 1989-05-16: One DOR observed (U89MEN01). 1987-09-00: One snake observed while removing debris pile (U87MEN01).
APHECOER*43	<i>Aphelocoma coerulescens</i>	Florida Scrub-jay	G2	S2	LT	LT	1981-03-26	OAK SCRUB	1981-03-26: 2 SCRUB JAYS
BUTEBRAC*10	<i>Buteo brachyurus</i>	Short-tailed Hawk	G4G5	S1	N	N	1992-05-20	Hydric Hammock; Xeric Hammock (live oak/sand live oak).	1992-05-20: B.A. Millsap, GFC, observed 1 adult male and 1 adult female displaying courtship behavior. Male light morph, female dark morph.
FLORHELI*1	<i>Floridobia helicogyra</i>	Crystal Siltsnail	G1	S1	N	N	1968-pre	LAGOON CA 0.25 MI LONG X 200 YDS WIDE. DRAINS FROM S INTO CRYSTAL R.(CHANNEL CA 50' WIDE). SEVERAL LG SUBMERGED SPRINGS ON LAGOON PERIPHERY. FINE SAND BOTTOM, COVERED W/ VALLISNERIA.	F. THOMPSON: SNAILS SCARCE ON ALL 3 OCCASIONS SURVEYED(B68THO01). SNAILS PRIMARILY ON ELODEA, SOME ON VAL- LISNERIA, ONLY NEAR LARGE BOIL AT HEAD OF CHANNEL. NOTFOUND 1979-1984 DURING ROUTINE COLLECTIONS AT TYPE LOCALITY. POP. DEPRESSED APPARENTLY DU E T
DRYMCoup*515	<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT	2006-06-06	2006-06-06: residential area in former sandhill and scrub (U06MAI01FLUS).	2006-06-06: Ruttledge observed individual in yard and photographed (U06MAI01FLUS)
DRYMCoup*520	<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT	2008-06-18	2008-06-18: sandhill developed as a residential subdivision with many roads and houses (U08MAI01FLUS).	2006-06-18: D. Ferry photographed adult in his driveway (U08MAI01FLUS).



Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 2 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
Matrix Unit ID: 23268					
Likely					
<i>Aphelocoma coerulescens</i>	Florida Scrub-jay	G2	S2	LT	LT
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Mesic flatwoods		G4	S4	N	N
Potential					
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Corynorhinus rafinesquii</i>	Rafinesque's Big-eared Bat	G3G4	S2	N	N
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Leitneria floridana</i>	Corkwood	G3	S3	N	LT
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neovison vison halilimnetes</i>	Gulf Salt Marsh Mink	G5T3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Phyllanthus leibmannianus ssp. platylepis</i>	Pinewood Dainties	G4T2	S2	N	LE
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Matrix Unit ID: 23269

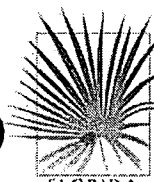
Likely

<i>Aphelocoma coerulescens</i>	Florida Scrub-jay	G2	S2	LT	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Mesic flatwoods		G4	S4	N	N
Sandhill upland lake		G3	S2	N	N

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Leitneria floridana</i>	Corkwood	G3	S3	N	LT
<i>Litsea aestivalis</i>	Pondspice	G3	S2	N	LE
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

FLORIDA
Natural Areas
INVENTORY

Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 2 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Phyllanthus leibmannianus</i> ssp. <i>platylepis</i>	Pinewood Dainties	G4T2	S2	N	LE
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Matrix Unit ID: 23516

Likely

<i>Aphelocoma coerulescens</i>	Florida Scrub-jay	G2	S2	LT	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Mesic flatwoods		G4	S4	N	N
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS

Potential

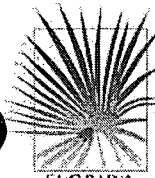
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Corynorhinus rafinesquii</i>	Rafinesque's Big-eared Bat	G3G4	S2	N	N
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Leitneria floridana</i>	Corkwood	G3	S3	N	LT
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Monotropsis reynoldsiae</i>	Pygmy Pipes	G1Q	S1	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pycnanthemum floridanum</i>	Florida Mountain-mint	G3	S3	N	LT
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Matrix Unit ID: 23517

Likely

<i>Aphelocoma coerulescens</i>	Florida Scrub-jay	G2	S2	LT	LT
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Mesic flatwoods		G4	S4	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

Florida Natural Areas Inventory

Biodiversity Matrix Report Map 2 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
Sandhill		G3	S2	N	N
Sandhill upland lake		G3	S2	N	N
Potential					
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Leitneria floridana</i>	Corkwood	G3	S3	N	LT
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Phyllanthus leibmannianus</i> ssp. <i>platylepis</i>	Pinewood Dainties	G4T2	S2	N	LE
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Matrix Unit ID: 23766

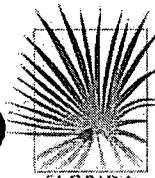
Likely

<i>Aphelocoma coerulescens</i>	Florida Scrub-jay	G2	S2	LT	LT
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Mesic flatwoods		G4	S4	N	N
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
Sandhill		G3	S2	N	N

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Litsea aestivalis</i>	Pondspice	G3	S2	N	LE
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Monotropsis reynoldsiae</i>	Pygmy Pipes	G1Q	S1	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

Florida Natural Areas Inventory

Biodiversity Matrix Report Map 2 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Pycnanthemum floridanum</i>	Florida Mountain-mint	G3	S3	N	LT
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE

Matrix Unit ID: 23767

Likely

<i>Aphelocoma coerulescens</i>	Florida Scrub-jay	G2	S2	LT	LT
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Mesic flatwoods		G4	S4	N	N
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
Sandhill		G3	S2	N	N

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Leitneria floridana</i>	Corkwood	G3	S3	N	LT
<i>Litsea aestivalis</i>	Pondspice	G3	S2	N	LE
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pycnanthemum floridanum</i>	Florida Mountain-mint	G3	S3	N	LT
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE

Matrix Unit ID: 24015

Likely

<i>Aphelocoma coerulescens</i>	Florida Scrub-jay	G2	S2	LT	LT
Mesic flatwoods		G4	S4	N	N
Sandhill		G3	S2	N	N
Sandhill upland lake		G3	S2	N	N

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 2 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Forestiera godfreyi</i>	Godfrey's Swampprivet	G2	S2	N	LE
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Justicia cooleyi</i>	Cooley's Water-willow	G2	S2	LE	LE
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Monotropis reynoldsiae</i>	Pygmy Pipes	G1Q	S1	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Pycnanthemum floridanum</i>	Florida Mountain-mint	G3	S3	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Matrix Unit ID: 24016

Documented

Drymarchon couperi Eastern Indigo Snake G3 S3 LT LT

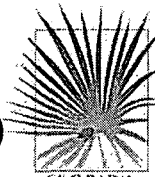
Likely

Aphelocoma coerulescens Florida Scrub-jay G2 S2 LT LT
Heterodon simus Southern Hognose Snake G2 S2 N N
 Mesic flatwoods G4 S4 N N
 Sandhill G3 S2 N N
 Sandhill upland lake G3 S2 N N

Potential

Agrimonia incisa Incised Groove-bur G3 S2 N LE
Aimophila aestivalis Bachman's Sparrow G3 S3 N N
Asplenium heteroresiliens Wagner's Spleenwort GNA S1 N N
Asplenium x curtissii Curtiss' Spleenwort GNA S1 N N
Athene cunicularia floridana Florida Burrowing Owl G4T3 S3 N LS
Centrosema arenicola Sand Butterfly Pea G2Q S2 N LE
Digitaria floridana Florida Crabgrass G1 S1 N N
Gopherus polyphemus Gopher Tortoise G3 S3 N LT
Litsea aestivalis Pondspice G3 S2 N LE
Matelea floridana Florida Spiny-pod G2 S2 N LE
Mustela frenata peninsulæ Florida Long-tailed Weasel G5T3 S3 N N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

Florida Natural Areas Inventory

Biodiversity Matrix Report Map 2 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pycnanthemum floridanum</i>	Florida Mountain-mint	G3	S3	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Matrix Unit ID: 24267

Likely

<i>Aphelocoma coerulescens</i> Mesic flatwoods	Florida Scrub-jay	G2 G4	S2 S4	LT N	LT N
---	-------------------	----------	----------	---------	---------

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Matrix Unit ID: 24268

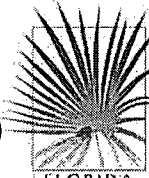
Likely

<i>Aphelocoma coerulescens</i> Mesic flatwoods	Florida Scrub-jay	G2 G4	S2 S4	LT N	LT N
---	-------------------	----------	----------	---------	---------

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

Natural Areas
INVENTORY

Florida Natural Areas Inventory

Biodiversity Matrix Report Map 2 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Matrix Unit ID: 24524

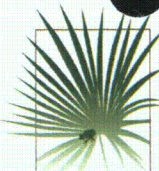
Likely

<i>Apelocoma coerulescens</i>	Florida Scrub-jay	G2	S2	LT	LT
Mesic flatwoods		G4	S4	N	N
Sandhill		G3	S2	N	N
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cucularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Nolina atopocarpa</i>	Florida Beargrass	G3	S3	N	LT
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Spiranthes polyantha</i>	Green Ladies'-tresses	G4	S1S2	N	LE

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

FLORIDA Natural Areas INVENTORY

Element Occurrences

- Animals
- Plants
- Communities
- Other
- Data Sensitive

Point Indicates General Vicinity of Element

U.S. Fish & Wildlife Service Scrub Jay Survey 1992-96

Conservation Lands

- Federal
- State
- Local
- Private
- State Aquatic Preserves

Land Acquisition Projects

- Florida Forever
- Board of Trustees Projects

- FNAI Rare Species Habitat
- FNAI Biodiversity Matrix Square Mile Units

- County Boundary
- Interstate
- Turnpike
- Major Highway
- Local Road
- Railroad [Inactive railroads shown in Gray]
- Water



NOTE
Map should not be interpreted without accompanying documents.

Crystal River Energy Complex - Brookridge Substation (Map 3 of 6)

Site boundaries are approximate.

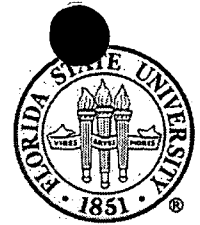
Citrus County



Map produced by ACN
Map Date: 1 DEC 2009

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 3 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
PICOBORE*48	Picoides borealis	Red-cockaded Woodpecker	G3	S2	LE	LS	ZZ	No general description given	ACTIVE COLONY.
PTERECRI*1	Pteroglossaspis ecristata	Giant Orchid	G2G3	S2	N	LT	1981-09-19	SANDY SOIL OF SCRUB OAK-PINE.	FLOWERING ON 19 SEPTEMBER 1981.
LAMPEXTE*11	Lampropeltis extenuata	Short-tailed Snake	G3	S3	N	LT	1927-09	No general description given	UF-1574, SEPTEMBER 1927, O.F. SWED.
DS*17662	Data Sensitive Element	Data Sensitive	G3	S2	N	N	1982-pre	Data Sensitive	Data Sensitive
DS*20785	Data Sensitive Element	Data Sensitive	G4	S1S2	N	LE	1954-02-07	Data Sensitive	Data Sensitive
DS*19735	Data Sensitive Element	Data Sensitive	G5	S3	N	LE	1982-12-28	Data Sensitive	Data Sensitive
SANDHILL*207	Sandhill		G3	S2	N	N	2008-05-14	No general description given	2008-05-14: extensive longleaf pine sandhill in variable condition, but largely with high quality groundcover. Turkey oak, bluejack oak and sand post oak are abundant, and throughout most of the tract are overgrown, forming a moderately dense midstory.
GOPHPOLY*630	Gopherus polyphemus	Gopher Tortoise	G3	S3	N	LT	1990-06	SANDHILL-LONGLEAF PINE, TURKEY OAK, WIREGRASS.	45+ BURROWS. 60+/- INDIVIDUALS (ESTIMATE) ON 30 ACRE SITE BASED ON BURROW SURVEY TO FGFWFC STANDARDS. EST. POPULATION DENSITY = 2.0/AC. 45%, 12% AND 39% OF BURROWS WERE ACTIVE, INACTIVE AND OLD, RESPECTIVELY.
PODOFLOR*41	Podomys floridanus	Florida Mouse	G3	S3	N	LS	1990-06	SANDHILL-LONGLEAF PINE, TURKEY OAK, WIREGRASS.	6 INDIVIDUALS TRAPPED DURING 100 TRAP NIGHT SURVEY.
PODOFLOR*43	Podomys floridanus	Florida Mouse	G3	S3	N	LS	1990-02	SANDHILL (LONGLEAF PINE, TURKEY OAK, WIREGRASS) WITH PLANTED SAND PINE COMPONENT.	1 MOUSE CAPTURED AND RELOCATED.
DS*22963	Data Sensitive Element	Data Sensitive	G3	S2	N	N	1982-12-28	Data Sensitive	Data Sensitive
PICOBORE*44	Picoides borealis	Red-cockaded Woodpecker	G3	S2	LE	LS	2008-05-14	2008-05-14: extensive longleaf pine/wiregrass xeric sandhill in variable condition, due to history of lack of adequate fire; recent years (since 2001) burning has increased substantially and condition is improving. Population grown through additions of	2007: 74 active clusters, 58 potential breeding groups, 68 fledglings (U08DOF01FLUS). 2002: 45 active clusters, 43 potential breeding groups, 45 fledglings (U08DOF01FLUS). 1990-07-26: GFC Wildobs Data: start trees at intersection of roads 6 and 11A (S.

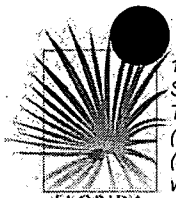


Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 3 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
LAMPEXTE*12	Lampropeltis extenuata	Short-tailed Snake	G3	S3	N	LT	1981	No general description given	UF-52700, 1981, GORDON SPRETT.
GOPHPOLY*194	Gopherus polyphemus	Gopher Tortoise	G3	S3	N	LT	1990-02	SANDHILL, LONGLEAF PINE, TURKEY OAK, WIREGRASS. ALSO PASTURE (U90SHA13FL).	LARGE AREA WHERE RUFUS S. PULLED TORTOISES IN PAST. 45 +/- BURROWS, 80 +/- POP. ESTIMATE, BASED ON 0.5/AC. DENSITY
RANACAPI*55	Rana capito	Gopher Frog	G3	S3	N	LS	1990-02	1990-02: sandhill-longleaf pine, turkey oak, wiregrass. Small marsh on site (U90SHA09FLUS).	1990-02: 20 individuals trapped at Gopherus burrows (U90STA09FLUS).
FALCPAUL*53	Falco sparverius paulus	Southeastern American Kestrel	G5T4	S3	N	LT	1990-02	SANDHILL-LONGLEAF PINE, TURKEY OAK, WIREGRASS. SMALL MARSH ON SITE.	8 INDIVIDUALS (4 ADULTS AND 4 JUVENILES).
PICOBORE*47	Picoides borealis	Red-cockaded Woodpecker	G3	S2	LE	LS	1986	PINE FLATWOODS	ACTIVE COLONY.
DRYMCOUP*399	Drymarchon couperi	Eastern Indigo Snake	G3	S3	LT	LT	1990-02	SANDHILL-LONFLEAF PINE, TURKEY OAK, WIREGRASS. SMALL MARSH ON SITE.	1, 4.5 FT. INDIVIDUAL.
DRYMCOUP*25	Drymarchon couperi	Eastern Indigo Snake	G3	S3	LT	LT	1977-09-12	No general description given	1977-09-12: JOHN WHITE (GFC) OBSERVED 4-FT INDIGO SNAKE (MOLER INTERVIEW; U82MOL01FLUS). [1991-03-06: D.J. STEVENSON OBSERVED 1 ADULT ON CRYSTAL RIVER WATERSHED: U97GFC02FLUS; WAS THIS IN SAME AREA?].
PITUMUGI*194	Pituophis melanoleucus mugitus	Florida Pine Snake	G4T3	S3	N	LS	1991-03-06	Hydric Hammock; old field.	1991-03-06: D.J. STEVENSON observed 1 adult.
DRYMCOUP*261	Drymarchon couperi	Eastern Indigo Snake	G3	S3	LT	LT	1970	No general description given	INDIGOS REGULARLY OBSERVED THROUGHOUT CAMP BY PAUL ANDERSON POST 1970 (MOLER INTERVIEW OF P. ANDERSON 1982-06-30).
CROTADAM*280	Crotalus adamanteus	Eastern Diamondback Rattlesnake	G4	S3	N	N	1998-10-09	Open pasture to scrub oak.	1998-10-09: One live snake, ca. 48 inches long and uninjured, observed by Henry Pann on roadside (U99MAI01).
PTERECRI*74	Pteroglossaspis ecristata	Giant Orchid	G2G3	S2	N	LT	2000-08-24	2000-08-24: Plants occur in xeric habitat with dry sandy soils under partially open canopy of Pinus palustris, Quercus geminata, and Quercus laevis. The shrub and herb layers are relatively diverse with Serenoa repens, Quercus incana, Smilax auriculata,	2000-08-24: Small population of 3 plants (2 flowering, 1 fruiting) with feeble vigor in an xeric area of 584 square yards (U03SCH03FLUS).



1018 Thomasville Road
 Suite 200-C
 Tallahassee, FL 32303
 (850) 224-8207
 (850) 681-9364 Fax
 www.fnai.org

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 3 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
SANDHILL*212	Sandhill		G3	S2	N	N	2008-05-14	2008: now within Withlacoochee State Forest, in large part. The Lecanto Sandhills Management Unit. (PNDKIN02FLUS)1995: Area is surrounded by pasture and development. Withlacoochee State Forest is within 1/2 mile of SE edge of site.	2008:area heavily encroached with oaks, groundcover of wiregrass still abundant in places (PNDKIN02FLUS). 2004: Update to last obs date was based on interpretation of aerial photography (previous value was 1995-12-11) (U05FNA02FLUS). There is a canopy of
TYPOFULV*3	Typocerus fulvocinctus	Yellow-banded Typocerus Long-horned Beetle	G2	S2	N	N	1994-Pre	1994-Pre: occurs in pine flatwoods (B94DEY01FLUS).	1994-Pre: This species occurs in pine flatwoods (B94DEY01FLUS).

Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
Matrix Unit ID: 24518					
Likely					
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Sandhill		G3	S2	N	N
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
Potential					
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cucularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Monotropis reynoldsiae</i>	Pygmy Pipes	G1Q	S1	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Triphora craigheadii</i>	Craighead's Nodding-caps	G1	S1	N	LE
<i>Typocerus fulvocinctus</i>	Yellow-banded Typocerus Long-horn	G2	S2	N	N

Matrix Unit ID: 24519

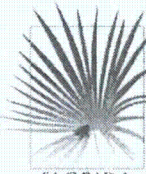
Likely

<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Mesic flatwoods		G4	S4	N	N
Sandhill		G3	S2	N	N
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium verecundum</i>	Modest Spleenwort	G1	S1	N	LE
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

FLORIDA
Natural Areas
INVENTORY

Florida Natural Areas Inventory

Biodiversity Matrix Report
Map 3 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Typocerus fulvocinctus</i>	Yellow-banded Typocerus Long-horne	G2	S2	N	N
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*

Matrix Unit ID: 24520

Likely

<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Sandhill		G3	S2	N	N
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium verecundum</i>	Modest Spleenwort	G1	S1	N	LE
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
Terrestrial cave		G3	S2	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.

Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Typocerus fulvocinctus</i>	Yellow-banded Typocerus Long-horne	G2	S2	N	N
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*
Matrix Unit ID: 24521					
Likely					
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Sandhill		G3	S2	N	N
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
Potential					
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium verecundum</i>	Modest Spleenwort	G1	S1	N	LE
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Monotropis reynoldsiae</i>	Pygmy Pipes	G1Q	S1	N	LE
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
Terrestrial cave		G3	S2	N	N
<i>Typocerus fulvocinctus</i>	Yellow-banded Typocerus Long-horne	G2	S2	N	N
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*
Matrix Unit ID: 24522					
Likely					
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Sandhill		G3	S2	N	N
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
Potential					
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium verecundum</i>	Modest Spleenwort	G1	S1	N	LE
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.

Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 3 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Litsea aestivalis</i>	Pondspice	G3	S2	N	LE
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecrinata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Spiranthes polyantha</i>	Green Ladies'-tresses	G4	S1S2	N	LE
Terrestrial cave		G3	S2	N	N

Matrix Unit ID: 24523

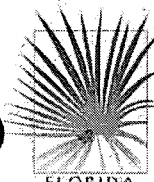
Likely

<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
Mesic flatwoods		G4	S4	N	N
Sandhill		G3	S2	N	N
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Litsea aestivalis</i>	Pondspice	G3	S2	N	LE
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Monotropsis reynoldsiae</i>	Pygmy Pipes	G1Q	S1	N	LE
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Nolina atopocarpa</i>	Florida Beargrass	G3	S3	N	LT
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecrinata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
 Suite 200-C
 Tallahassee, FL 32303
 (850) 224-8207
 (850) 681-9364 Fax

FLORIDA
Natural Areas
 INVENTORY

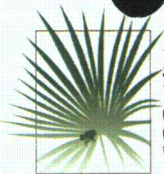
Florida Natural Areas Inventory

Biodiversity Matrix Report
 Map 3 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Spiranthes polyantha</i>	Green Ladies'-tresses	G4	S1S2	N	LE

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

FLORIDA
Natural Areas
INVENTORY

Element Occurrences

- Animals
- Plants
- Communities
- Other
- Data Sensitive

Point Indicates General Vicinity of Element

U.S. Fish & Wildlife Service Scrub Jay Survey 1992-96

Conservation Lands

- Federal
- State
- Local
- Private
- State Aquatic Preserves

Land Acquisition Projects

Florida Forever
Board of Trustees Projects

- FNAI Rare Species Habitat
- FNAI Biodiversity Matrix Square Mile Units

- County Boundary
- Interstate
- Turnpike
- Major Highway
- Local Road
- Railroad [Inactive railroads shown in Gray]
- Water

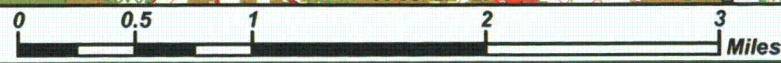


NOTE
Map should not be interpreted without accompanying documents.

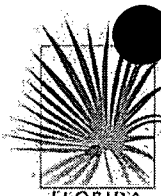
Crystal River Energy Complex - Brookridge Substation (Map 4 of 6)

Site boundaries are approximate.

Citrus County



Map produced by ACN
Map Date: 1 DEC 2009



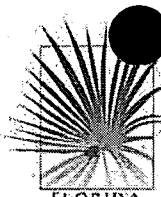
1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 4 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
SCIUSHER*129	Sciurus niger shermani	Sherman's Fox Squirrel	G5T3	S3	N	LS	1989-05-04	Sandhill/Upland Pine Forest; pine plantation	1989-05-04: D.E. Runde, GFC, observed 1 adult.
SANDHILL*207	Sandhill		G3	S2	N	N	2008-05-14	No general description given	2008-05-14: extensive longleaf pine sandhill in variable condition, but largely with high quality groundcover. Turkey oak, bluejack oak and sand post oak are abundant, and throughout most of the tract are overgrown, forming a moderately dense midstory.
GOPHPOLY*485	Gopherus polyphemus	Gopher Tortoise	G3	S3	N	LT	1989-07-15	TURKEY OAK/PALMETTO/SAND PINE. ROAD SIDE SWALE.	1 ADULT MALE APPROX. 25-30 FEET FROM BURROW ATTEMPTING TO CROSS US 19/98; 1 JUVENILE AT ROAD EDGE (50 FEET TO S OF ADULT) FEEDING ON EXTREMELY DRIED OUT ARMADILLO REMAINS.
PITUMUGI*210	Pituophis melanoleucus mugitus	Florida Pine Snake	G4T3	S3	N	LS	2002-09-20	2002-09-20: Large sandhill (6,000 acres) with slight sinkhole depression in sandhill; longleaf pine, turkey oak, wiregrass (U02WER04FLUS). 2002-Spring: Large area of sandhill with moderate to heavy sand live oak encroachment (F02HIP01FLUS).	2002-09-20: One adult captured in "herp array" (U02WER04FLUS). 2002-spring: one individual observed entering a gopher tortoise burrow (F02HIP01FLUS).
PICOBORE*44	Picoides borealis	Red-cockaded Woodpecker	G3	S2	LE	LS	2008-05-14	2008-05-14: extensive longleaf pine/wiregrass xeric sandhill in variable condition, due to history of lack of adequate fire; recent years (since 2001) burning has increased substantially and condition is improving. Population grown through additions of	2007: 74 active clusters, 58 potential breeding groups, 68 fledglings (U08DOF01FLUS). 2002: 45 active clusters, 43 potential breeding groups, 45 fledglings (U08DOF01FLUS). 1990-07-26: GFC Wildobs Data: start trees at intersection of roads 6 and 11A (S.
LAMPEXTE*12	Lampropeltis extenuata	Short-tailed Snake	G3	S3	N	LT	1981	No general description given	UF-52700, 1981, GORDON SPRETT.
PICOBORE*47	Picoides borealis	Red-cockaded Woodpecker	G3	S2	LE	LS	1986	PINE FLATWOODS	ACTIVE COLONY.
ATHEFLOR*6	Athene cunicularia floridana	Florida Burrowing Owl	G4T3	S3	N	LS	1999	1999: Yard of occupied lot (trailer) (U99BOW01FLUS); 1975: IMPROVED PASTURE	1999: Two territories with 4 adults and 3 young observed (U99BOW01FLUS). 1975: FAMILY OBSERVED IN PASTURE BY P. MOLER.
LAMPEXTE*13	Lampropeltis extenuata	Short-tailed Snake	G3	S3	N	LT	1979-02	No general description given	UNCATALOGUED FSM SPECIMEN, FEBRUARY OR MARCH, 1979, F.CAMAMELLA.



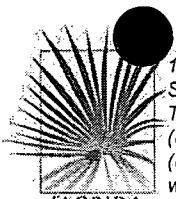
1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 4 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
FALCPAUL*79	Falco sparverius paulus	Southeastern American Kestrel	G5T4	S3	N	LT	1988-07	Utility right of way	1988-07: Noel Warner (Wamer? -NeSmith) reports 2 observations of single birds along a stretch of powerline from lat 284500N and 285130N, ca. 5 miles. (D. E. Runde GFC record).
DRYMCoup*261	Drymarchon couperi	Eastern Indigo Snake	G3	S3	LT	LT	1970	No general description given	INDIGOS REGULARLY OBSERVED THROUGHOUT CAMP BY PAUL ANDERSON POST 1970 (MOLER INTERVIEW OF P. ANDERSON 1982-06-30).
CROTADAM*249	Crotalus adamanteus	Eastern Diamondback Rattlesnake	G4	S3	N	N	1990	Ruderal area around old hdqtrs.	1990: One snake observed (U95KLE01).
GOPHPOLY*34	Gopherus polyphemus	Gopher Tortoise	G3	S3	N	LT	1978-11-21	TWO DISJUNCT PARCELS OF LAND 0.8 KM APART; MAINLY LONGLEAF PINE-OAK UPLANDS, FAIRLY OPEN CANOPY, GRADING INTO PINE FLATWOODS TOWARDS N AND S ENDS OF MAIN (S) TRACT.	LOGAN (21 NOV 1978) COUNTED 30 ACTIVE BURROWS (PLUS 6 INACTIVE & 7 ABANDONED) & EST. TOTAL POP OF 85, OR 6. 3/HA.; EVIDENCE OF-SUCCESSFUL RECRUITMENT; U79LOG01 GIVES BURROW WIDTHS.
HETESIMU*17	Heterodon simus	Southern Hognose Snake	G2	S2	N	N	2002-05-22	2002-05-22: Sandhill, longleaf pine, wiregrass, turkey oak (U02WER02FLUS).	2002-05-22: 1 adult caught at a drift fence array (U02WER02FLUS).
HETESIMU*18	Heterodon simus	Southern Hognose Snake	G2	S2	N	N	2002-06-20	2002-06-20: Sandhill, longleaf pine, turkey oak, wiregrass; slightly degraded from fire suppression (U02WER03FLUS).	2002-06-20: 1 adult captured in drift fence array (U02WER03FLUS).
DRYMCoup*506	Drymarchon couperi	Eastern Indigo Snake	G3	S3	LT	LT	2002-01-15	2002-01-15: Sandhill, slightly degraded due to lack of burning; longleaf pine, turkey oak, wiregrass (U02MOR01FLUS).	2002-01-15: One adult seen fleeing prescribed burn (U02MOR01FLUS).
PODOFLOR*97	Podomys floridanus	Florida Mouse	G3	S3	N	LS	2002-03	2002-SPRNG: Large area of sandhill with moderate to heavy sand live oak encroachment (F02HIP01FLUS).	2002-03: One adult captured in Herp array (F02HIP01FLUS).
SCIUSHER*185	Sciurus niger shermani	Sherman's Fox Squirrel	G5T3	S3	N	LS	2002-03	2002-SPRNG: Large area of sandhill with moderate to heavy sand live oak encroachment (F02HIP01FLUS).	2002-03: Seven sightings at different locations over a span of three months (F02HIP01FLUS).
CROTADAM*291	Crotalus adamanteus	Eastern Diamondback Rattlesnake	G4	S3	N	N	2002-03	2002-SPRNG: Large area of sandhill with moderate to heavy sand live oak encroachment (F02HIP01FLUS).	2002-03: individual observed at the mouth of a tortoise burrow (F02HIP01FLUS).



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 4 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
ELANFORF*45	Elanoides forficatus	Swallow-tailed Kite	G5	S2	N	N	2002-03	2002-SPRNG: Large area of sandhill with moderate to heavy sand live oak encroachment (F02HIP01FLUS).	2002-03: One individual observed foraging over site (F02HIP01FLUS).
AIMOAE*61	Aimophila aestivalis	Bachman's Sparrow	G3	S3	N	N	2002-SPRNG	2002-SPRNG: Large area of sandhill with moderate to heavy sand live oak encroachment (F02HIP01FLUS).	2002-spring: Ten individuals detected at eight of 53 point count locations distributed throughout the site (F02HIP01FLUS).
TYPOFULV*3	Typocerus fulvocinctus	Yellow-banded Typocerus Long-horned Beetle	G2	S2	N	N	1994-Pre	1994-Pre: occurs in pine flatwoods (B94DEY01FLUS).	1994-Pre: This species occurs in pine flatwoods (B94DEY01FLUS).
DRYMCOU*519	Drymarchon couperi	Eastern Indigo Snake	G3	S3	LT	LT	2004-10-18	2004-10-18: sandhill; portion in Withlacoochee State Forest appears from 2004 aerial photograph to be in fairly good condition; residential development has degraded other sandhill immediately to west (U04BIE01FLUS).	2004-10-18: J. Bierly caught 5-foot snake at 15 Drypetes Ct. West, released in nearby Withlacoochee State Forest (U04BIE01FLUS provides gps points). 2003-07-30: Bierly observed road-killed snake (U04BIE01FLUS).
SCIUSHER*197	Sciurus niger shermani	Sherman's Fox Squirrel	G5T3	S3	N	LS	2003-01-27	2003-01-27: subdivision within sandhill with turkey oak and longleaf pine; primary disturbance is residential development (U03MAI03FLUS, PNDBIE01FLUS).	2003-01-27: J. Bierly regularly observes 3 adults at his bird feeder (see U03MAI03FLUS for precise location; PNDBIE01FLUS).
FALCPAUL*106	Falco sparverius paulus	Southeastern American Kestrel	G5T4	S3	N	LT	2003-01-27	2003-01-27: subdivision within sandhill with turkey oak and longleaf pine; primary disturbance is residential development (U03MAI03FLUS, PNDBIE01FLUS).	2003-01-27: J. Bierly has regularly observed a successful breeding pair from 2000-2002, with one fledged young each year (see U03MAI04FLUS for precise location; PNDBIE01FLUS).
GOPHPOLY*1231	Gopherus polyphemus	Gopher Tortoise	G3	S3	N	LT	2002-10-24	2002-10-24: subdivision within sandhill with turkey oak and longleaf pine; primary disturbance is residential development (U03MAI03FLUS, PNDBIE01FLUS).	2002-10-24: J. Bierly regularly observes several individuals, from young to adult (see U03MAI03FLUS for precise location; PNDBIE01FLUS).
RANACAPI*196	Rana capito	Gopher Frog	G3	S3	N	LS	2002-09-19	2002-09-19: sandhill with turkey oak and longleaf pine; disturbances include residential development and off-road vehicle damage (U03MAI01FLUS, PNDBIE01FLUS).	2002-09-19: J. Bierly observed adult at mouth of tortoise burrow (observed multiple days) (U03MAI01FLUS; PNDBIE01FLUS).



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 4 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
Matrix Unit ID: 24513					
Likely					
<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
Scrub		G2	S2	N	N
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
Potential					
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Typocerus fulvocinctus</i>	Yellow-banded Typocerus Long-horn	G2	S2	N	N

Matrix Unit ID: 24514

Documented

<i>Falco sparverius paulus</i>	Southeastern American Kestrel	G5T4	S3	N	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS

Likely

<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.

Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 4 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE

Matrix Unit ID: 24515

Likely

<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Falco sparverius paulus</i>	Southeastern American Kestrel	G5T4	S3	N	LT
<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE

Matrix Unit ID: 24516

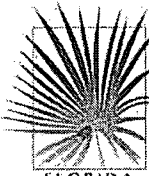
Likely

<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

FLORIDA
Natural Areas
INVENTORY

Florida Natural Areas Inventory

Biodiversity Matrix Report Map 4 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE

Matrix Unit ID: 24517

Likely

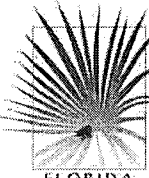
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE

Matrix Unit ID: 24518

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

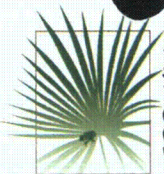
Florida Natural Areas Inventory

Biodiversity Matrix Report Map 4 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
Likely					
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
Sandhill		G3	S2	N	N
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
Potential					
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Aimophila aestivalis</i>	Bachman's Sparrow	G3	S3	N	N
<i>Asplenium heteroresiliens</i>	Wagner's Spleenwort	GNA	S1	N	N
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cucularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Monotropsis reynoldsiae</i>	Pygmy Pipes	G1Q	S1	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecrinata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Triphora craigheadii</i>	Craighead's Nodding-caps	G1	S1	N	LE
<i>Typocerus fulvocinctus</i>	Yellow-banded Typocerus Long-horne	G2	S2	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

FLORIDA
Natural Areas
INVENTORY

Element Occurrences

- Animals
- Plants
- Communities
- Other
- Data Sensitive

Point Indicates General Vicinity of Element

U.S. Fish & Wildlife Service Scrub Jay Survey 1992-96

Conservation Lands

- Federal
- State
- Local
- Private
- State Aquatic Preserves

Land Acquisition Projects

- Florida Forever
- Board of Trustees Projects

- FNAI Rare Species Habitat
- FNAI Biodiversity Matrix Square Mile Units

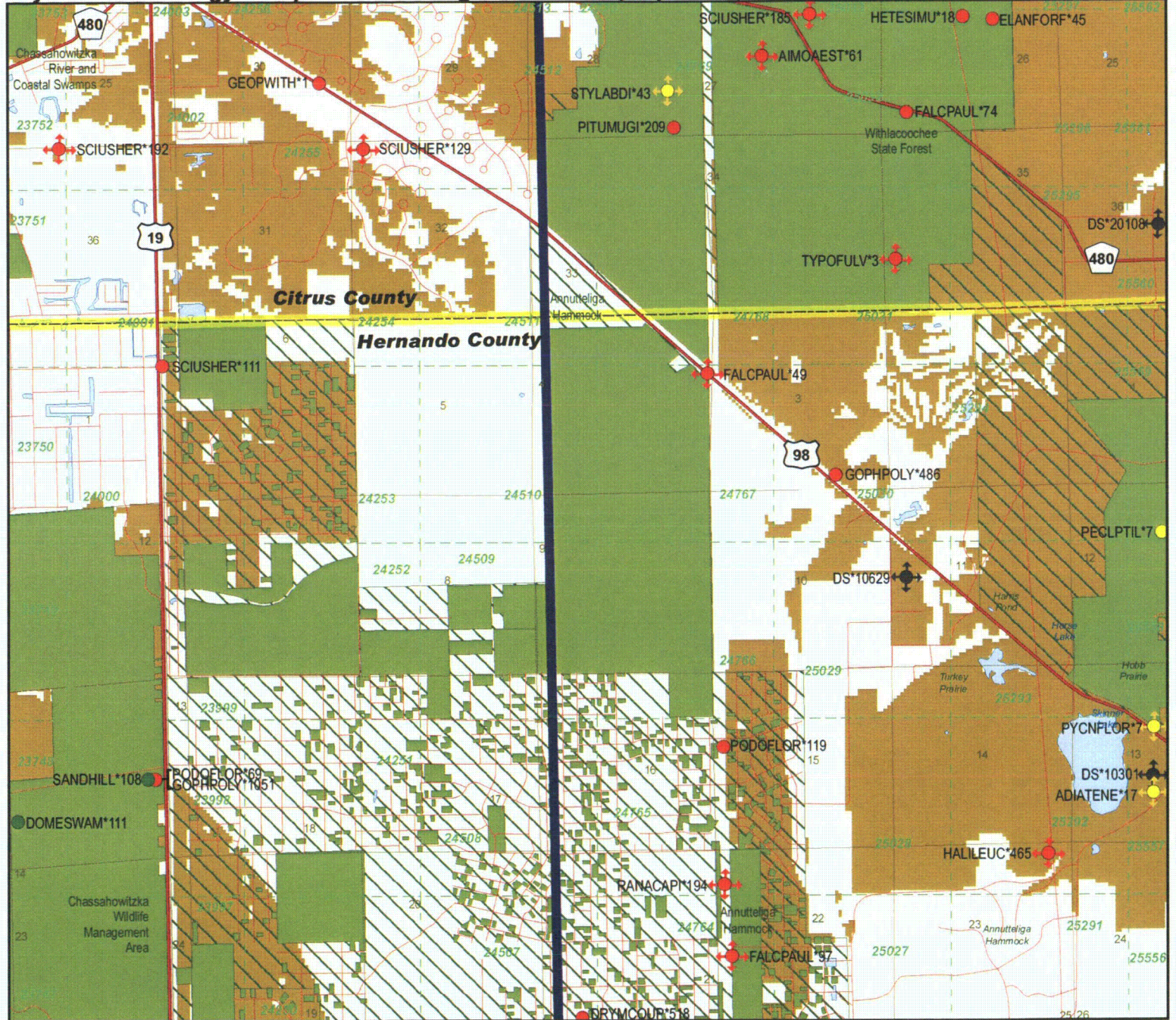
- County Boundary
- Interstate
- Turnpike
- Major Highway
- Local Road
- Railroad [Inactive railroads shown in Gray]
- Water



NOTE
Map should not be interpreted without accompanying documents.

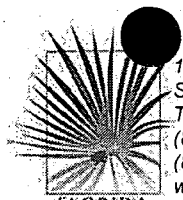
Crystal River Energy Complex - Brookridge Substation (Map 5 of 6)

Citrus and Hernando Counties



Site boundaries are approximate.

Map produced by ACN
Map Date: 1 DEC 2009



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 5 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
SCIUSHER*129	Sciurus niger shermani	Sherman's Fox Squirrel	G5T3	S3	N	LS	1989-05-04	Sandhill/Upland Pine Forest; pine plantation	1989-05-04: D.E. Runde, GFC, observed 1 adult.
SANDHILL*108	Sandhill		G3	S2	N	N	1997-03-12	open longleaf pine sandhill community	Canopy of widely scattered longleaf pines (Pinus palustris) with understory of wiregrass (Aristida stricta) and pineywoods dropseed (Sporobolus junceus). Area had been burned 2 weeks before. Other herbs and subshrubs identifiable were Psoralea canescens,
GOPHPOLY*486	Gopherus polyphemus	Gopher Tortoise	G3	S3	N	LT	1997-07-26	Large area of sandhill and pasture rapidly being developed residentially.	1997-07-26: One adult observed (PNDMAI01FLUS); 1990-08-17: 1 adult male observed leaving vegetable farm (PNDOST01FLUS); 1990-06-24: 1 adult female skeleton found; 1990-04-29: 1 female observed, poachers observed with tortoises; 1989-07-15: 1 DOR individu
DOMESWAM*111	Dome swamp		G4	S4	N	N	2004	Small, open-canopied pond cypress dome swamp.	2004: Update to last obs date was based on interpretation of aerial photography (previous value was 1997-03-12) (U05FNA02FLUS). Open canopy of pond cypress (Taxodium ascendens) with shrubs of St John's wort (Hypericum fasciculatum) and dahoon holly (Ilex
FALCPAUL*49	Falco sparverius paulus	Southeastern American Kestrel	G5T4	S3	N	LT	1986-07-16	POWERLINE RIGHT OF WAY, SURROUNDING HABITAT CONSISTS OF SAND PINE PLANTATION (APPROX. 15-25' HT.) ON FORMER SANDHILL SITE. POWERLINE RIGHT-OF-WAY APPROXIMATELY 400' IN WIDTH WITH LOW UNDERSTORY OF GRASSES AND FORBES.	OBSERVED ON SITE ON 2 OCCASIONS PERCHING AND ACTIVELY FEEDING.
DS*10301	Data Sensitive Element	Data Sensitive	G5	S1	N	LE	1982-12-31	Data Sensitive	Data Sensitive
ADIATENE*17	Adiantum tenerum	Brittle Maidenhair Fern	G5	S3	N	LE	1982-12-31	1982-12-31: Rocky banks of wet-weather stream through hammock (S82LEOFSFLUS).	1982-12-31: Specimen taken (S82LEOFSFLUS).
PYCNFLOR*7	Pycnanthemum floridanum	Florida Mountain-mint	G3	S3	N	LT	1959-09-13	HAMMOCK.	1959-09-13:FLOWERING/FRUITING.
DS*20108	Data Sensitive Element	Data Sensitive	GNA	S1	N	N	1987-04-11	Data Sensitive	Data Sensitive

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 5 of 6)



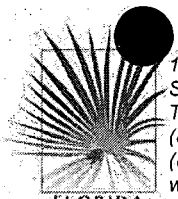
Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
FALCPAUL*97	Falco sparverius paulus	Southeastern American Kestrel	G5T4	S3	N	LT	1988-07	Utility right of way	1988-07: Noel Warner (Warner? -NeSmith) reports 2 observations of single birds along a stretch of powerline from lat 283830N and 283930N, ca. 1 mile. (D. E. Runde GFC record).
GOPHPOLY*1051	Gopherus polyphemus	Gopher Tortoise	G3	S3	N	LT	1997-03-13	Small area of sandhill (majority of former sandhill east of US 19 has been developed). Canopy of scattered longleaf pine. Subcanopy and midstory of turkey oak (30-50% coverage) and a few live oak. Herb cover including wiregrass resprouting from two week	1997-03-13: Few burrows observed during general walk-through; no specific survey conducted (PNDHIP01FLUS).
FALCPAUL*74	Falco sparverius paulus	Southeastern American Kestrel	G5T4	S3	N	LT	1997-07-26	improved pasture	1997-07-26: two adults observed foraging (PNDMAI01).
PODOFLOR*69	Podomys floridanus	Florida Mouse	G3	S3	N	LS	1997-03-13	Small area of sandhill (majority of former sandhill east of Highway 19 has been developed). Canopy of scattered longleaf pine. Subcanopy and midstory of turkey oak (30-50% coverage) and a few live oak. Herb cover including wiregrass resprouting from two	1997-03-11: Captured 19 individuals in 12 X 13 grid; 1997-03-12: Captured 10 new individuals and 10 recaptures; 1997-03-13: Captured 9 new individuals and 14 recaptures; total number of trapped individuals is 38 in 468 trapnights (3 X 12 X 13). No estima
SCIUSHER*111	Sciurus niger shermani	Sherman's Fox Squirrel	G5T3	S3	N	LS	1997-03-09	Sandhill (longleaf pine, turkey oak, saw palmetto, wiregrass, etc.) along both sides of highway	1997-03-09: one adult DOR (PNDMAI01)
DS*10629	Data Sensitive Element	Data Sensitive	G5	S1	N	LE	1947-02-03	Data Sensitive	Data Sensitive
HALILEUC*465	Haliaeetus leucocephalus	Bald Eagle	G5	S3	PS	N	2003	No general description given	Nest status 1995-2003: Continuously active. (U03FWC01FLUS). Previous data (note different format) NEST: 1984-1988 ACTIVE; FLEDGED YOUNG 1984-1985, UNKNOWN 1986.
HETESIMU*18	Heterodon simus	Southern Hognose Snake	G2	S2	N	N	2002-06-20	2002-06-20: Sandhill, longleaf pine, turkey oak, wiregrass; slightly degraded from fire suppression (U02WER03FLUS).	2002-06-20: 1 adult captured in drift fence slightly array (U02WER03FLUS).

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 5 of 6)



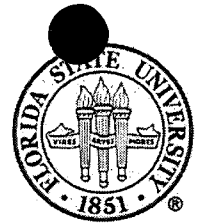
Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
SCIUSHER*192	Sciurus niger shermani	Sherman's Fox Squirrel	G5T3	S3	N	LS	2006-01-07	2004: Open canopied Longleaf and slash pine flatwoods with shrub and understory of saw palmetto, wax myrtle, Lyonia fruticosa, Ilex cassine, Asimina sp., Vaccinium myrsinites. Open areas with Aristida, Licania, and Andropogon (U04COR01FLUS).	2006-01-07: Two individuals observed; one entered a nest in an oak tree (U06COR01FLUS). 2004: At least one individual observed on 11-14 and 11-16 (U04COR01FLUS)
PITUMUGI*209	Pituophis melanoleucus mugitus	Florida Pine Snake	G4T3	S3	N	LS	2002-SPRNG	L2002-SPRNG: Large area of sandhill with moderate to heavy sand live oak encroachment (F02HIP01FLUS).	2002-SPRNG: One individual observed in gopher tortoise burrow with burrow camera (F02HIP01FLUS).
STYLABDI*43	Stylisma abdita	Scrub Stylisma	G3	S3	N	LE	2002-05-11	2002-05-11: The Sugarmill Woods is mostly sandhill with small scrub components. The area was historically winter burned for cattle grazing (U02WER01FLUS).	2002-05-11: no population size provided but plants were flowering (U02WER01FLUS).
SCIUSHER*185	Sciurus niger shermani	Sherman's Fox Squirrel	G5T3	S3	N	LS	2002-03	2002-SPRNG: Large area of sandhill with moderate to heavy sand live oak encroachment (F02HIP01FLUS).	2002-03: Seven sightings at different locations over a span of three months (F02HIP01FLUS).
ELANFORF*45	Elanoides forficatus	Swallow-tailed Kite	G5	S2	N	N	2002-03	2002-SPRNG: Large area of sandhill with moderate to heavy sand live oak encroachment (F02HIP01FLUS).	2002-03: One individual observed foraging over site (F02HIP01FLUS).
AIMOAEEST*61	Aimophila aestivalis	Bachman's Sparrow	G3	S3	N	N	2002-SPRNG	2002-SPRNG: Large area of sandhill with moderate to heavy sand live oak encroachment (F02HIP01FLUS).	2002-spring: Ten individuals detected at eight of 53 point count locations distributed throughout the site (F02HIP01FLUS).
GEOFWITH*1	Geopsammodius withlacoochee	Withlacoochee Tiny Sand-loving Scarab	G1	S1	N	N	2002-11-24	2002-11-24: No description given other than "sand on roadside" (A06SKE01FLUS).	2002-11-24: A total of 318 specimens were collected from sand near the road (A06SKE01FLUS).
TYPOFULV*3	Typocerus fulvocinctus	Yellow-banded Typocerus Long-horned Beetle	G2	S2	N	N	1994-Pre	1994-Pre: occurs in pine flatwoods (B94DEY01FLUS).	1994-Pre: This species occurs in pine flatwoods (B94DEY01FLUS).
DRYMCOUN*518	Drymarchon couperi	Eastern Indigo Snake	G3	S3	LT	LT	2006-11	2006-11: found crossing road; area is a developing rural residential neighborhood. Roads are primarily dirt and most lots still undeveloped. Large powerline/natural gas pipeline corridor cutting through general area to the east (F07GUN02FLUS).	2006-11: one snake (~3.5 - 4.5 ft) observed crossing road (F07GUN02FLUS).



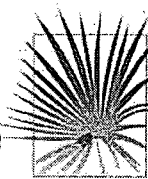
1018 Thomasville Road
 Suite 200-C
 Tallahassee, FL 32303
 (850) 224-8207
 (850) 681-9364 Fax
 www.fnai.org

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 5 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
PODOFLOR*119	Podomys floridanus	Florida Mouse	G3	S3	N	LS	2007-01	2007-01: the EO was found within a natural gas pipeline corridor. Surrounding area has growing residential development in remnant longleaf pine/turkey oak sandhill (F07GUN06FLUS).	2007-01: one adult mouse documented while excavating gopher tortoise burrows during a gopher tortoise relocation project (F07GUN06FLUS).
RANACAPI*194	Rana capito	Gopher Frog	G3	S3	N	LS	2006-11	2006-11 - 2006-10: natural gas pipeline corridor with growing residential development within remnant sandhill (F07GUN07FLUS).	2006-11 - 2006-10: 3 adult gopher frogs were documented during gopher tortoise burrow excavations during a gopher tortoise relocation project (F07GUN07FLUS).
PECLPTIL*7	Pecluma ptilodon	Swamp Plume Polypody	G5?	S2	N	LE	2008-05-14	2007-04-01: none given (U08WER01FLUS, PNDWER02FLUS).	2007-04-01: 10+ plants (U08WER01FLUS, PNDWER02FLUS).



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

FLORIDA
Natural Areas
INVENTORY

Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 5 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
Matrix Unit ID: 24507					
Documented					
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
Likely					
Sandhill		G3	S2	N	N
Potential					
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulae</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*

Matrix Unit ID: 24508

Likely

Sandhill		G3	S2	N	N
----------	--	----	----	---	---

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulae</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



Florida Natural Areas Inventory

Biodiversity Matrix Report Map 5 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*

Matrix Unit ID: 24509

Likely

Sandhill	G3	S2	N	N
Scrub	G2	S2	N	N

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*

Matrix Unit ID: 24510

Likely

Sandhill	G3	S2	N	N
Scrub	G2	S2	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.

Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 5 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
Potential					
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Falco sparverius paulus</i>	Southeastern American Kestrel	G5T4	S3	N	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*

Matrix Unit ID: 24511

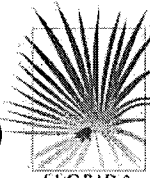
Likely

<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
Sandhill		G3	S2	N	N
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
Scrub		G2	S2	N	N
<i>Stylisma abdita</i>	Scrub Stylisma	G3	S3	N	LE

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Falco sparverius paulus</i>	Southeastern American Kestrel	G5T4	S3	N	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

Florida Natural Areas Inventory

Biodiversity Matrix Report Map 5 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
<i>Typocerus fulvocinctus</i>	Yellow-banded Typocerus Long-horne	G2	S2	N	N

Matrix Unit ID: 24512

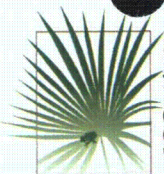
Likely

<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
Sandhill		G3	S2	N	N
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
Scrub		G2	S2	N	N
<i>Stylisma abdita</i>	Scrub Stylisma	G3	S3	N	LE

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
<i>Typocerus fulvocinctus</i>	Yellow-banded Typocerus Long-horne	G2	S2	N	N
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

FLORIDA
Natural Areas
INVENTORY

Element Occurrences

- Animals
- Plants
- Communities
- Other
- Data Sensitive

Point Indicates General Vicinity of Element

U.S. Fish & Wildlife Service Scrub Jay Survey 1992-96

Conservation Lands

- Federal
- State
- Local
- Private
- State Aquatic Preserves

Land Acquisition Projects

Florida Forever
 Board of Trustees Projects

- FNAI Rare Species Habitat
- FNAI Biodiversity Matrix Square Mile Units

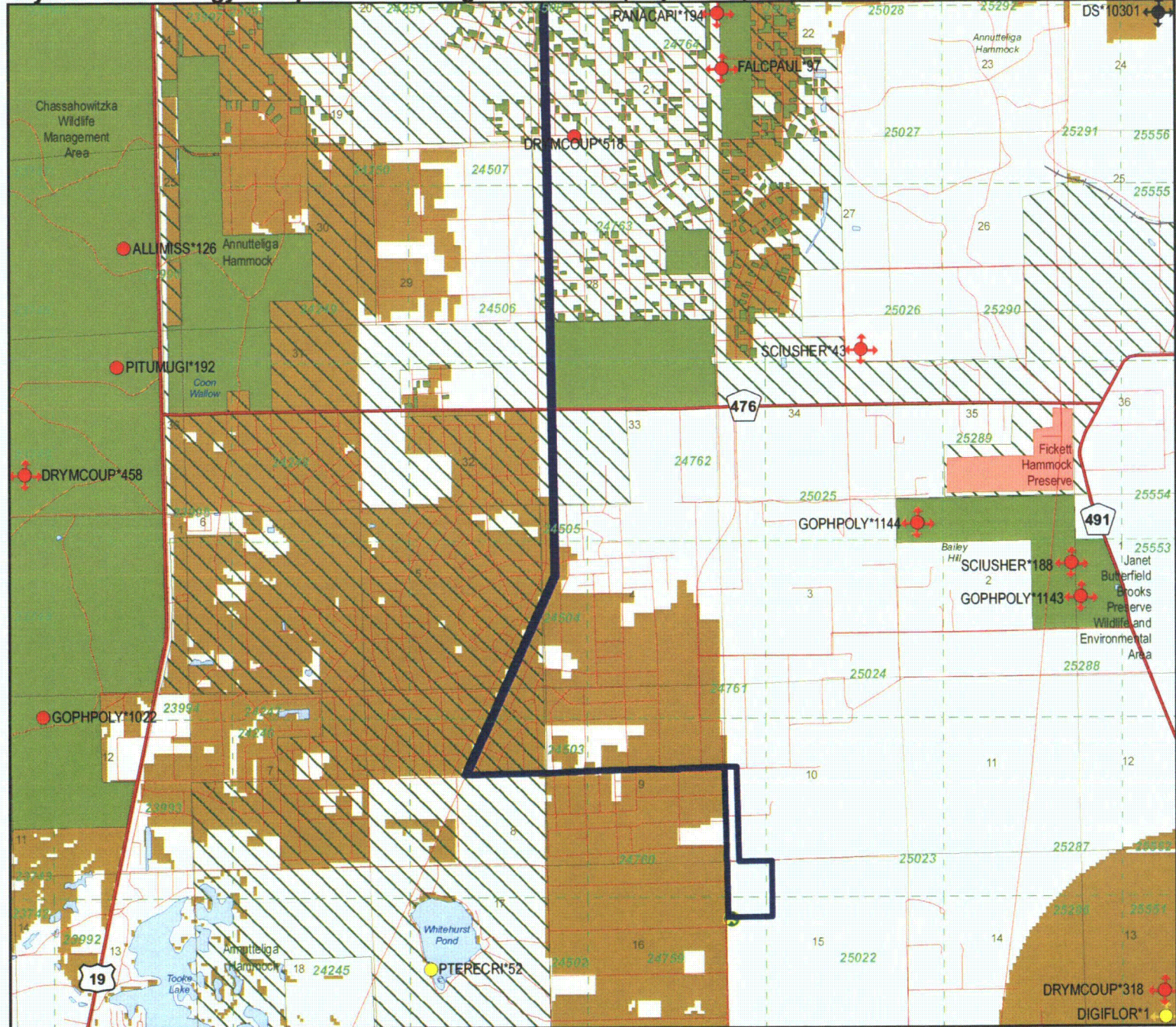
- County Boundary
- Interstate
- Turnpike
- Major Highway
- Local Road
- Railroad [Inactive railroads shown in Gray]
- Water



NOTE
Map should not be interpreted without accompanying documents.

Crystal River Energy Complex - Brookridge Substation (Map 6 of 6)

Hernando County

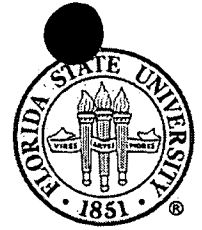


Site boundaries are approximate.

Map produced by ACN
Map Date: 1 DEC 2009

Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 6 of 6)

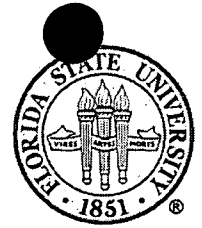


Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
DRYMCOU*318	<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT	1936-12-06	No general description given	MUSEUM SPECIMEN: A. LAESSLE, 6 DEC 1936 (UF 910).
DIGIFLOR*1	<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N	1960-09-30	IN HEAPS OF POT SOIL AND ALONG PATHS, MOSTLY IN SAWDUST ON THE GROUNDS OF NINA'S NURSERY.	1960-09-30: FRUITING, ABUNDANT, SOME PLANTS WITH LEAFY STOLONS.
DS*10301	Data Sensitive Element	Data Sensitive	G5	S1	N	LE	1982-12-31	Data Sensitive	Data Sensitive
FALCPAUL*97	<i>Falco sparverius paulus</i>	Southeastern American Kestrel	G5T4	S3	N	LT	1988-07	Utility right of way	1988-07: Noel Warner (Warner? -NeSmith) reports 2 observations of single birds along a stretch of powerline from lat 283830N and 283930N, ca. 1 mile. (D. E. Runde GFC record).
SCIUSHER*43	<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS	1989	SANDHILL	2 SQUIRRELS OBSERVED BETWEEN OCT 1988 AND JULY 1989.
GOPHPOLY*1022	<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT	1995-10-18	1995-10-18: Sandhill (PNDWOO09FLUS).	1995-10-18: One specimen caught (PNDWOO09FLUS).
PITUMUGI*192	<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS	1996-06-20	Scrubby flatwoods.	Specimen (UF 109410) found in trap June 20, 1996.
ALLIMISS*126	<i>Alligator mississippiensis</i>	American Alligator	G5	S4	SAT	LS	1995-07-27	Trap was set in a depression marsh.	4 specimens caught in a bucket trap.
PTERECRI*52	<i>Pteroglossaspis ecrinata</i>	Giant Orchid	G2G3	S2	N	LT	2002-08-19	2002-08-19: Broad transitional "edge" of large sandhill lake, downslope from sandhills. No canopy. Herbaceous ground cover of <i>Amphicarpon</i> , <i>Axonopus</i> , <i>Rubus</i> , <i>Sorghastrum</i> spp., <i>Andropogon</i> spp. Lots of vehicle use apparent along lake edge (P	2002-08-19: 5 plants seen (in flower) (PNDCAR05FLUS).
DRYMCOU*458	<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT	1995-96	The area supports a mosaic of upland and wetland habitats, including scrub, sandhill, xeric hammock, upland mixed forest, mesic flatwoods, depression marsh, wet prairie, and dome swamp. Most forested tracts are second growth. See A00ENG01FLUS for brief	1995-1996: Enge and Wood caught four indigo snakes in funnel traps set along drift fences, and also observed two additional specimens, at multiple localities. They conclude that the Wildlife Management Area supports a good-sized population (A00ENG01FLUS



Florida Natural Areas Inventory

ELEMENT OCCURRENCES DOCUMENTED ON OR NEAR Crystal River Energy Complex - Brookridge Substation (Map 6 of 6)



Map Label	Scientific Name	Common Name	Global State Federal State Observation				Date	Description	EO Comments
			Rank	Rank	Status	Listing			
GOPHPOLY*1143	Gopherus polyphemus	Gopher Tortoise	G3	S3	N	LT	1992	1992: sandhill with longleaf pine, turkey oak, wiregrass; bordered by hardwood (xeric?) hammock on north, developed or degraded lands offsite on other sides (U92TNC02FLUS).	Need to obtain recent updates from land manager. 1992: preserve management plan (U92TNC02FLUS) notes recent estimate of 16-25 tortoises per ha; however, possible that this estimate referred to burrow numbers rather than tortoises.
GOPHPOLY*1144	Gopherus polyphemus	Gopher Tortoise	G3	S3	N	LT	1992	1992: sandhill with longleaf pine, turkey oak, wiregrass; bordered by hardwood (xeric?) hammock and flatwoods on east, developed or degraded lands offsite on other sides (U92TNC02FLUS).	Need to obtain recent updates from land manager. 1992: preserve management plan (U92TNC02FLUS) notes recent estimate of 16-25 tortoises per ha; however, possible that this estimate referred to burrow numbers rather than tortoises.
SCIUSHER*188	Sciurus niger shermani	Sherman's Fox Squirrel	G5T3	S3	N	LS	1992	1992: principal habitat is sandhill with longleaf pine, turkey oak, wiregrass; this occurs chiefly in the western and southeastern portions of the preserve; other habitats on site that may be used include hardwood (xeric?) hammock and flatwoods (U92TNC0	Need to obtain recent updates from land manager. 1992: preserve management plan notes recent estimate of 19-63 squirrels per square km within the sandhill habitat (U92TNC02FLUS).
DRYMCOU*518	Drymarchon couperi	Eastern Indigo Snake	G3	S3	LT	LT	2006-11	2006-11: found crossing road; area is a developing rural residential neighborhood. Roads are primarily dirt and most lots still undeveloped. Large powerline/natural gas pipeline corridor cutting through general area to the east (F07GUN02FLUS).	2006-11: one snake (~3.5 - 4.5 ft) observed crossing road (F07GUN02FLUS).
RANACAPI*194	Rana capito	Gopher Frog	G3	S3	N	LS	2006-11	2006-11 - 2006-10: natural gas pipeline corridor with growing residential development within remnant sandhill (F07GUN07FLUS).	2006-11 - 2006-10: 3 adult gopher frogs were documented during gopher tortoise burrow excavations during a gopher tortoise relocation project (F07GUN07FLUS).

Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 6 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
Matrix Unit ID: 24503					
Likely					
<i>Grus canadensis pratensis</i> Sandhill	Florida Sandhill Crane	G5T2T3 G3	S2S3 S2	N N	LT N
Potential					
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*

Matrix Unit ID: 24504

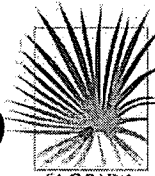
Likely

<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
----------------------------------	------------------------	--------	------	---	----

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

Florida Natural Areas Inventory

Biodiversity Matrix Report Map 6 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*

Matrix Unit ID: 24505

Likely

<i>Grus canadensis pratensis</i> Sandhill	Florida Sandhill Crane	G5T2T3 G3	S2S3 S2	N N	LT N
--	------------------------	--------------	------------	--------	---------

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*

Matrix Unit ID: 24506

Likely

<i>Drymarchon couperi</i> Sandhill	Eastern Indigo Snake	G3 G3	S3 S2	LT N	LT N
---------------------------------------	----------------------	----------	----------	---------	---------

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.

Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 6 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*

Matrix Unit ID: 24507

Documented

<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
---------------------------	----------------------	----	----	----	----

Likely

Sandhill		G3	S2	N	N
----------	--	----	----	---	---

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.

Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Ursus americanus floridanus</i>	Florida Black Bear	G5T2	S2	N	LT*
Matrix Unit ID: 24759					
Likely					
<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
Potential					
<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS

Matrix Unit ID: 24760

Likely

<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
----------------------------------	------------------------	--------	------	---	----

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.

Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 6 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Matrix Unit ID: 25022

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Grus canadensis pratensis</i>	Florida Sandhill Crane	G5T2T3	S2S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Matrix Unit ID: 25023

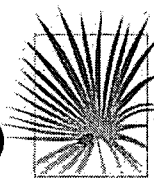
Likely

Mesic flatwoods	G4	S4	N	N
-----------------	----	----	---	---

Potential

<i>Agrimonia incisa</i>	Incised Groove-bur	G3	S2	N	LE
<i>Asplenium x curtissii</i>	Curtiss' Spleenwort	GNA	S1	N	N
<i>Athene cunicularia floridana</i>	Florida Burrowing Owl	G4T3	S3	N	LS
<i>Calopogon multiflorus</i>	Many-flowered Grass-pink	G2G3	S2S3	N	LE
<i>Centrosema arenicola</i>	Sand Butterfly Pea	G2Q	S2	N	LE
<i>Coelorachis tuberculosa</i>	Piedmont Jointgrass	G3	S3	N	LT
<i>Digitaria floridana</i>	Florida Crabgrass	G1	S1	N	N
<i>Drymarchon couperi</i>	Eastern Indigo Snake	G3	S3	LT	LT
<i>Gopherus polyphemus</i>	Gopher Tortoise	G3	S3	N	LT
<i>Heterodon simus</i>	Southern Hognose Snake	G2	S2	N	N
<i>Litsea aestivalis</i>	Pondspice	G3	S2	N	LE
<i>Matelea floridana</i>	Florida Spiny-pod	G2	S2	N	LE
<i>Mustela frenata peninsulæ</i>	Florida Long-tailed Weasel	G5T3	S3	N	N
<i>Myotis austroriparius</i>	Southeastern Bat	G3G4	S3	N	N
<i>Nemastylis floridana</i>	Celestial Lily	G2	S2	N	LE
<i>Neofiber alleni</i>	Round-tailed Muskrat	G3	S3	N	N

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax

FLORIDA
Natural Areas
INVENTORY

Florida Natural Areas Inventory

Biodiversity Matrix Report

Map 6 of 6



Scientific Name	Common Name	Global Rank	State Rank	Federal Status	State Listing
<i>Notophthalmus perstriatus</i>	Striped Newt	G2G3	S2S3	N	N
<i>Picoides borealis</i>	Red-cockaded Woodpecker	G3	S2	LE	LS
<i>Pituophis melanoleucus mugitus</i>	Florida Pine Snake	G4T3	S3	N	LS
<i>Podomys floridanus</i>	Florida Mouse	G3	S3	N	LS
<i>Pteroglossaspis ecristata</i>	Giant Orchid	G2G3	S2	N	LT
<i>Rana capito</i>	Gopher Frog	G3	S3	N	LS
<i>Sciurus niger shermani</i>	Sherman's Fox Squirrel	G5T3	S3	N	LS
<i>Spigelia loganioides</i>	Pinkroot	G2Q	S2	N	LE
<i>Stilosoma extenuatum</i>	Short-tailed Snake	G3	S3	N	LT

Definitions: Documented - Rare species and natural communities documented on or near this site.
 Documented-Historic - Rare species and natural communities documented, but not observed/reported within the last twenty years.
 Likely - Rare species and natural communities likely to occur on this site based on suitable habitat and/or known occurrences in the vicinity.
 Potential - This site lies within the known or predicted range of the species listed.

GLOBAL AND STATE RANKS

Florida Natural Areas Inventory (FNAI) defines an **element** as any rare or exemplary component of the natural environment, such as a species, natural community, bird rookery, spring, sinkhole, cave, or other ecological feature. FNAI assigns two ranks to each element found in Florida: the **global rank**, which is based on an element's worldwide status, and the **state rank**, which is based on the status of the element within Florida. Element ranks are based on many factors, including estimated number of occurrences, estimated abundance (for species and populations) or area (for natural communities), estimated number of adequately protected occurrences, range, threats, and ecological fragility.

GLOBAL RANK DEFINITIONS

- G1** Critically imperiled globally because of extreme rarity (5 or fewer occurrences or less than 1000 individuals) or because of extreme vulnerability to extinction due to some natural or man-made factor.
- G2** Imperiled globally because of rarity (6 to 20 occurrences or less than 3000 individuals) or because of vulnerability to extinction due to some natural or man-made factor.
- G3** Either very rare and local throughout its range (21-100 occurrences or less than 10,000 individuals) or found locally in a restricted range or vulnerable to extinction from other factors.
- G4** Apparently secure globally (may be rare in parts of range).
- G5** Demonstrably secure globally.
- G#?** Tentative rank (e.g., G2?)
- G#G#** Range of rank; insufficient data to assign specific global rank (e.g., G2G3)
- G#T#** Rank of a taxonomic subgroup such as a subspecies or variety; the G portion of the rank refers to the entire species and the T portion refers to the specific subgroup; numbers have same definition as above (e.g., G3T1)
- G#Q** Rank of questionable species - ranked as species but questionable whether it is species or subspecies; numbers have same definition as above (e.g., G2Q)
- G#T#Q** Same as above, but validity as subspecies or variety is questioned.
- GH** Of historical occurrence throughout its range, may be rediscovered (e.g., ivory-billed woodpecker)
- GNA** Ranking is not applicable because element is not a suitable target for conservation (e.g. as for hybrid species)
- GNR** Not yet ranked (temporary)
- GNRTNR** Neither the full species nor the taxonomic subgroup has yet been ranked (temporary)
- GX** Believed to be extinct throughout range
- GXC** Extirpated from the wild but still known from captivity/cultivation
- GU** Unrankable. Due to lack of information, no rank or range can be assigned (e.g., GUT2).

STATE RANK DEFINITIONS

Definition parallels global element rank: substitute "S" for "G" in above global ranks, and "in Florida" for "globally" in above global rank definitions.

**FEDERAL AND STATE LEGAL STATUSES (U.S. Fish and Wildlife Service – USFWS)
PROVIDED BY FNAI FOR INFORMATION ONLY.**

For official definitions and lists of protected species, consult the relevant state or federal agency.

FEDERAL LEGAL STATUS

Definitions derived from U.S. Endangered Species Act of 1973, Sec. 3. Note that the federal status given by FNAI refers only to Florida populations and that federal status may differ elsewhere.

- LE** Listed as Endangered Species in the List of Endangered and Threatened Wildlife and Plants under the provisions of the Endangered Species Act. Defined as any species which is in danger of extinction throughout all or a significant portion of its range.
- LE,XN** A non essential experimental population of a species otherwise Listed as an Endangered Species in the List of Endangered and Threatened Wildlife and Plants. LE,XN for *Grus americana* (Whooping crane), Federally listed as XN (Non essential experimental population) refers to the Florida experimental population only. Federal listing elsewhere for *Grus americana* is LE.
- PE** Proposed for addition to the List of Endangered and Threatened Wildlife and Plants as Endangered Species.
- LT** Listed as Threatened Species, defined as any species which is likely to become an endangered species within the foreseeable future throughout all or a significant portion of its range.
- LT,PDL** Species currently listed Threatened but has been proposed for delisting.
- PT** Proposed for listing as Threatened Species.
- C** Candidate Species for addition to the list of Endangered and Threatened Wildlife and Plants, Category 1. Federal listing agencies have sufficient information on biological vulnerability and threats to support proposing to list the species as Endangered or Threatened.
- SAT** Threatened due to similarity of appearance to a threatened species.
- SC** Species of Concern, species is not currently listed but is of management concern to USFWS.
- N** Not currently listed, nor currently being considered for addition to the List of Endangered and Threatened Wildlife and Plants.

**FLORIDA LEGAL STATUSES (Florida Fish and Wildlife Conservation Commission – FFWCC/
Florida Department of Agriculture and Consumer Services – FDACS)**

Animals: Definitions derived from “Florida’s Endangered Species and Species of Special Concern, Official Lists” published by Florida Fish and Wildlife Conservation Commission - FFWCC, 1 August 1997, and subsequent updates.

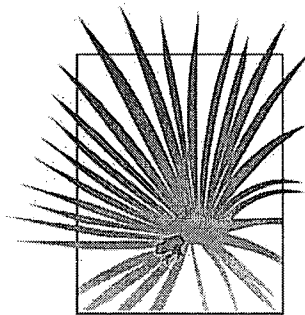
- LE** Listed as Endangered Species by the FFWCC. Defined as a species, subspecies, or isolated population which is so rare or depleted in number or so restricted in range of habitat due to any man-made or natural factors that it is in immediate danger of extinction or extirpation from the state, or which may attain such a status within the immediate future.
- LT** Listed as Threatened Species by the FFWCC. Defined as a species, subspecies, or isolated population which is acutely vulnerable to environmental alteration, declining in number at a rapid rate, or whose range or habitat is decreasing in area at a rapid rate and as a consequence is destined or very likely to become an endangered species within the foreseeable future.
- LT*** Indicates that a species has LT status only in selected portions of its range in Florida. LT* for *Ursus americanus floridanus* (Florida black bear) indicates that LT status does not apply in Baker and Columbia counties and in the Apalachicola National Forest. LT* for *Neovison vison* pop. 1 (Southern mink, South Florida population) state listed as Threatened refers to the Everglades population only (Note: species formerly listed as *Mustela vison* mink pop. 1. Also, priorly listed as *Mustela evergladensis*).
- LS** Listed as Species of Special Concern by the FFWCC, defined as a population which warrants special protection, recognition, or consideration because it has an inherent significant vulnerability to habitat modification,

environmental alteration, human disturbance, or substantial human exploitation which, in the foreseeable future, may result in its becoming a threatened species.

- LS*** Indicates that a species has LS status only in selected portions of its range in Florida. LS* for *Pandion haliaetus* (Osprey) state listed as LS (Species of Special Concern) in Monroe County only.
- PE** Proposed for listing as Endangered.
- PT** Proposed for listing as Threatened.
- PS** Proposed for listing as a Species of Special Concern.
- N** Not currently listed, nor currently being considered for listing.

Plants: Definitions derived from Sections 581.011 and 581.185(2), Florida Statutes, and the Preservation of Native Flora of Florida Act, 5B-40.001. FNAI does not track all state-regulated plant species; for a complete list of state-regulated plant species, call Florida Division of Plant Industry, 352-372-3505 or please visit: <http://DOACS.State.FL.US/PI/Images/Rule05b.pdf>

- LE** Listed as Endangered Plants in the Preservation of Native Flora of Florida Act. Defined as species of plants native to the state that are in imminent danger of extinction within the state, the survival of which is unlikely if the causes of a decline in the number of plants continue, and includes all species determined to be endangered or threatened pursuant to the Federal Endangered Species Act of 1973, as amended.
- PE** Proposed by the FDACS for listing as Endangered Plants.
- LT** Listed as Threatened Plants in the Preservation of Native Flora of Florida Act. Defined as species native to the state that are in rapid decline in the number of plants within the state, but which have not so decreased in such number as to cause them to be endangered. LT* indicates that a species has LT status only in selected portions of its range in Florida.
- PT** Proposed by the FDACS for listing as Threatened Plants.
- N** Not currently listed, nor currently being considered for listing.



1018 Thomasville Road
Suite 200-C
Tallahassee, FL 32303
(850) 224-8207
(850) 681-9364 Fax
www.fnai.org

FLORIDA
Natural Areas
INVENTORY

Annutteliga Hammock - Group B/Full Fee

Annutteliga Hammock
Citrus and Hernando Counties

Group B
Full Fee

Purpose for State Acquisition

The Brooksville Ridge in west-central Florida supports some of the last large tracts of longleaf-pine sandhills in Florida, unique forests of northern hardwood trees, and many archaeological sites. The Annutteliga Hammock project will conserve the remaining fragments of the forests between the Withlacoochee State Forest and the Chassahowitzka Wildlife Management Area, thereby protecting habitat for black bear and many sandhill-dwelling plants and animals and giving the public a large area for recreation in the original landscape of this fast-growing region.

Managers

Division of Forestry (DOF) (northeastern and southeastern parts) and Fish and Wildlife Conservation Commission (FWC) (western part).

General Description

This project is defined by its excellent quality sandhill and very good upland hardwood forest natural communities (there is little upland hardwood forest protected in this ecoregion). Remnants of Annutteliga Hammock on steep-sided hills and in small valleys cover 15% of the project area. This hardwood forest resembles forests far to the north; in fact, several northern trees reach their southern limits near this area. Westward the hardwoods give way to drier longleaf-pine sandhills

on slightly lower and more level terrain. Remnants of these sandhill forests cover 64% of the project. It is an excellent habitat for many rare vertebrates adapted to xeric communities and several rare plant species. Twenty archaeological sites attest the long history of Native American occupation here. Limerock mines, golf courses, and residential developments are now seriously fragmenting these natural areas, but excellent examples of the original vegetation and wildlife, including the Florida black bear, remain. The Suncoast Parkway is planned to run through this project.

The Lecanto Sandhills is 2,029 acres of sandhills, xeric hammocks, and depression marshes.

Public Use

This project is designated for use as a state forest and wildlife management area. Such uses as camping, picnicking, hiking, and boating will be compatible with the protection of the area.

Acquisition Planning

This project consists of several large tracts as well as large subdivided areas. Essential parcels include Sugarmill Woods (acquired), World Woods (acquired by the DOF), Florida Crushed Stone, Orange Meadow Corp./Seville (acquired), Blackwell (westernmost tract—acquired by the SWFWMD), Tooke’s Lake Joint Venture, and other large hammock and sandhill parcels.

On March 10, 1995, the LAMAC approved the addition of 990 acres to the project boundary.

Annutteliga Hammock	
FNAI Elements - July 2009	
Florida Black Bear	G5T2/S2
Red-cockaded Woodpecker	G3/S2
Eastern Indigo Snake	G3/S3
Gopher Tortoise	G3/S3
Florida Mouse	G3/S3
Swallow-tailed Kite	G5/S2
Cooley's Water-willow	G2/S2
Southern Hognose Snake	G2/S2
Giant Orchid	G2G3/S2
Scrub Stylisma	G3/S3
Plume Polypody	G5/S2
Swamp Plume Polypody	G5/S2

22 rare species are associated with the project.

Placed on list	1995
Project Area (Acres)	31,250
Acres Acquired	11,511
at a Cost of	\$35,925,705
Acres Remaining	19,739
with Estimated (Tax Assessed) Value of \$36,241,171	

On July 29, 1999, the Council combined Lecanto Sandhills (2,029 acres) in Citrus County with the Annutteliga Hammock project.

Lecanto Sandhills was acquired in 2001.

Coordination

A Memorandum of Understanding between FDOT and DEP regarding the future conveyance of a portion of the Annutteliga Hammock project within the proposed alignment for the Suncoast Parkway, was signed on August 3, 1998. This project is also included within SWFWMD's Five-Year Plan. Hernando County is an acquisition and management partner.

Management Policy Statement

The primary goals of management of the Annutteliga Hammock project are: to conserve and protect environmentally unique and irreplaceable lands that contain native, relatively unaltered flora and fauna representing a natural area unique to, or scarce within, a region of this state or a larger geographic area; to conserve and protect significant habitat for native species or endangered and threatened species; to conserve, protect, manage, or restore important ecosystems, landscapes, and forests, in order to enhance or protect significant surface water, coastal, recreational, timber, fish or wildlife resources which local or state regulatory programs cannot adequately protect; to provide areas, including recreational trails, for natural-resource-based recreation; and to preserve significant archaeological or historical sites.

Management Prospectus

Qualifications for state designation The project has the size and resource diversity to qualify as a Wildlife Management Area and a State Forest.

Manager The DOF proposes to manage approximately 14,336 acres in the northeastern and southeastern portions of the project. The Fish and Wildlife Conservation Commission is recommended to be lead manager on the southwestern 14,048 acres next to the Chassahowitzka Wildlife Management Area.

Conditions affecting intensity of management

A. Division of Forestry

There are no known major disturbances that will require extraordinary attention so the level of management intensity is expected to be typical for a state forest.

B. Fish and Wildlife Conservation Commission

Annutteliga Hammock lies within 40 miles of the St. Petersburg/Tampa metropolitan area and is expected to receive heavy demand for wildlife oriented recre-

Annutteliga Hammock - Group B/Full Fee

ational use. The demand for hunting, camping, hiking, horseback riding and nature study is expected to be high. Additionally, the sandhill community will need the frequent application of fire to rejuvenate itself.

Timetable for implementing management and provisions for security and protection of infrastructure

A. Division of Forestry

The primary land management goal for the Division of Forestry is to restore, maintain and protect in perpetuity all native ecosystems; to integrate compatible human use; and to insure long-term viability of populations and species considered rare. This total resource concept will guide the DOF's management activities on this project.

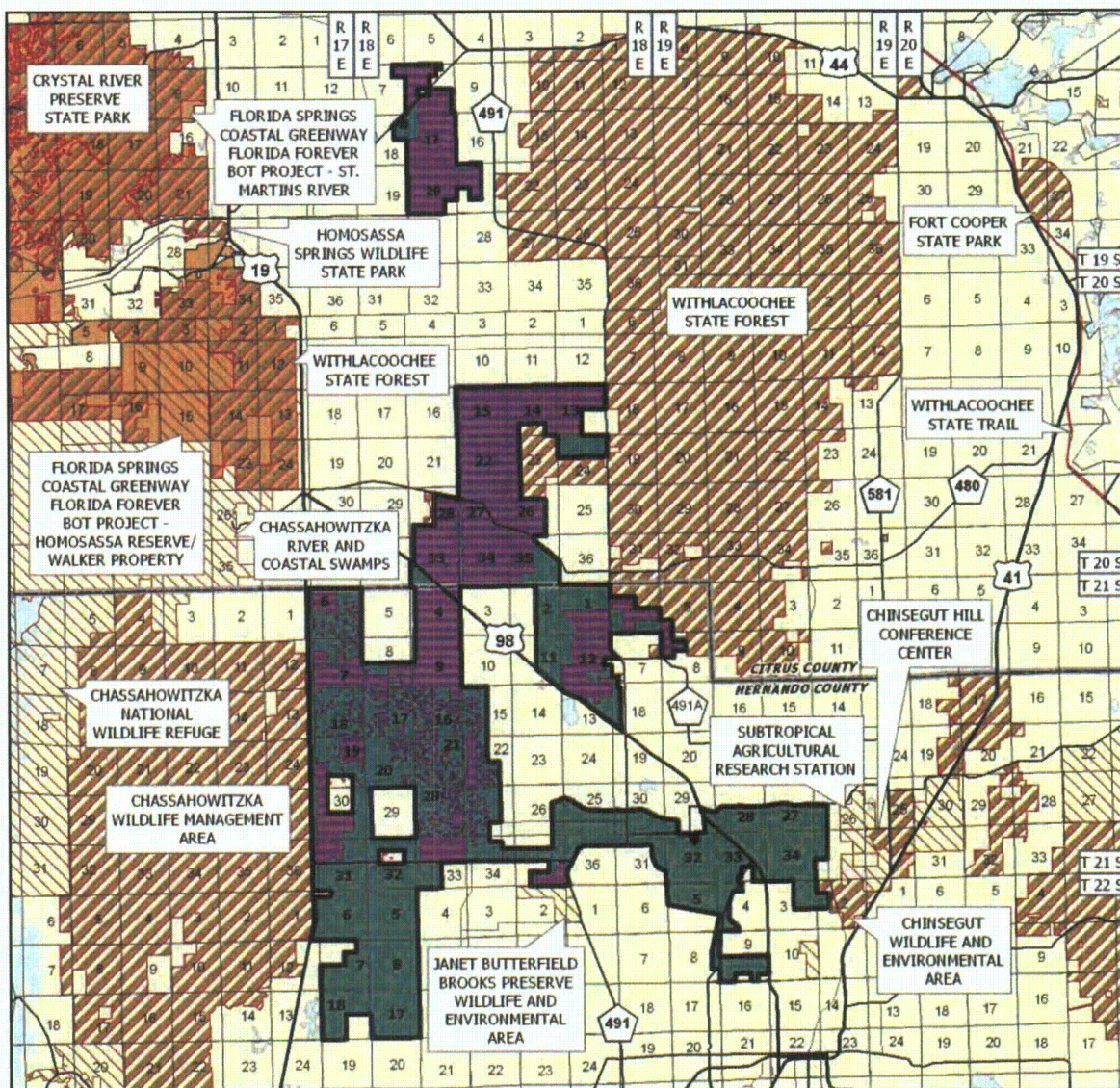
Once the core area is acquired and assigned to the DOF for management, public access will be provided for low intensity, non-facilities related outdoor recreation activities. Until specific positions are provided for the project, public access will be coordinated through Withlacoochee Forestry Center (WFC) Headquarters and management activities will be conducted utilizing personnel from WFC.

Initial or intermediate management efforts will concentrate on site security, public and fire management access, resource inventory, and removal of existing trash. Steps will be taken to insure that the public is provided appropriate access while simultaneously affording protection of sensitive resources. Vehicular use by the public will be confined to designated roads and unnecessary access points will be closed. An inventory of the site's natural resources and threatened and endangered flora and fauna will be conducted to provide the basis for formulation of a management plan.

Prior to collection of necessary resource information, management proposals for this project can only be conceptual in nature. Long-range plans for this property will generally be directed toward the restoration of disturbed areas and maintenance of natural communities. To the greatest extent practical, disturbed sites will be restored to conditions that would be expected to occur in naturally functioning ecosystems. Management activities will also stress enhancement of the abundance and spatial distribution of threatened and endangered species.







An all season burning program will be established utilizing practices that incorporate recent research findings. Whenever possible, existing roads, black lines, foam lines and natural breaks will be utilized to contain and control prescribed and natural fires.

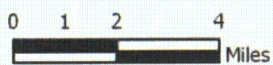
Annutteliga Hammock - Group B/Full Fee



ANNUTTELIGA HAMMOCK

CITRUS AND HERNANDO COUNTIES

-  Florida Forever BOT Project Boundary
-  Acquired
-  Essential Parcel(s) Remaining
-  Other Florida Forever BOT Projects
-  State Owned Lands
-  Other Conservation Lands



APRIL 2009

Annutteliga Hammock - Group B/Full Fee

Timber management activities will primarily consist of improvement thinning and regeneration harvests aimed at maintaining and perpetuating forest ecosystems. Plantations will be thinned to achieve a more natural appearance and, where appropriate, will be reforested with species that would typically be found in a naturally functioning ecosystem. Stands will not have a targeted rotation age but will be managed to maintain a broad diversity of age classes ranging from young stands to areas with old growth characteristics. This will provide habitat for the full spectrum of species that would be found in the natural environment.

The resource inventory will be used to identify sensitive areas that need special attention, protection or management, and to locate areas that are appropriate for any recreational or administrative facilities. Infrastructure development will primarily be located in already disturbed areas and will be the absolute minimum required to allow public access for the uses mentioned above, to provide facilities to accommodate public use, and to administer and manage the property.

The Division will promote recreation and environmental education in the natural environment. As a general practice, if it is determined that a new recreation area is needed, low impact, rustic facilities will be the only kind developed. High-impact, organized recreation areas will be discouraged because of possible adverse effects on the natural environment. Unnecessary roads, firelines and hydrological disturbances will be abandoned and/or restored to the greatest extent practical.

B. Fish and Wildlife Conservation Commission

During the first year after acquisition, emphasis will be placed on securing and posting boundaries, assuring public access to the tract, surveying wildlife and plant communities, and restoring fire as a viable component of the ecosystem. A management plan for the tract

will be prepared.

Longer-range plans for the property include securing and stabilizing necessary roads for public access, developing camping and nature interpretive facilities and developing hiking and horseback riding trails. All-weather access roads will be developed and maintained for use by the public and for management operations. An all-season prescribed burning program will be established using both aerial and ground ignition techniques. Whenever possible existing roads, trails and firebreaks will be used to control both prescribed and natural fires. Unnecessary roads, firelines and hydrological disturbances will be abandoned or restored as appropriate. Environmentally sensitive areas will be identified and appropriate protective measures will be implemented to assure the areas are protected from abuse.

Revenue-generating potential

A. Division of Forestry

The Division will sell timber as needed to improve or maintain desirable ecosystem conditions. Revenue from these sales will vary, but the revenue-generating potential of this project is expected to be low to moderate.

B. Fish and Wildlife Conservation Commission

Harvest of pinelands could help offset operational costs. Any estimate of revenue from harvest of the pinelands will depend on a detailed timber cruise. Revenue may also be generated from the sale of Wildlife Management Area stamps to recreational users of the property.

Management Cost Summary/DOF

Category Source of Funds	Startup CARL	Recurring CARL
Salary	\$85,020	\$85,020
OPS	\$0	\$0
Expense	\$25,000	\$25,000
OCO	\$116,800	\$10,000
FCO	\$0	\$0
TOTAL	\$226,820	\$120,020

Management Cost Summary/FWC

Category Source of Funds	Startup CARL	Recurring CARL
Salary	\$78,353	\$78,353
OPS	\$10,500	\$5,250
Expense	\$52,500	\$42,000
OCO	\$124,000	\$10,000
FCO	\$150,000	\$0
TOTAL	\$404,958	\$135,603



Technical Assistance Provided by:

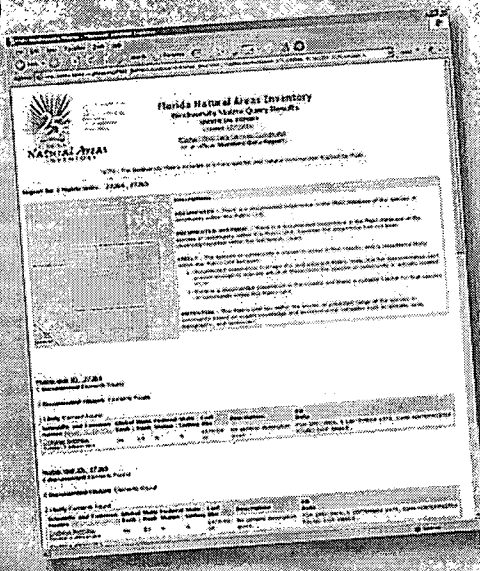


FOR IMMEDIATE RELEASE

FNAI's Biodiversity Matrix Online



The Biodiversity Matrix Map Server is a new **screening tool** from FNAI that provides **immediate, free access** to rare species occurrence information statewide. This tool allows you to zoom to your site of interest and create a report listing documented, likely, and potential occurrences of rare species and natural communities.



The FNAI Biodiversity Matrix offers **built-in interpretation** of the likelihood of species occurrence for each 1-square-mile Matrix Unit across the state. The report includes a site map and list of species and natural communities by occurrence status: Documented, Documented-Historic, Likely, and Potential.

Try it today:

www.fnai.org/biointro.cfm

Please note: FNAI will continue to offer our Standard Data Report service as always. The Standard Data Report offers the most comprehensive information available on rare species, natural communities, conservation lands, and other natural resources.

www.fnai.org