

The  
Red-cockaded Woodpecker  
and Boiling Spring Lakes

# Why we are here

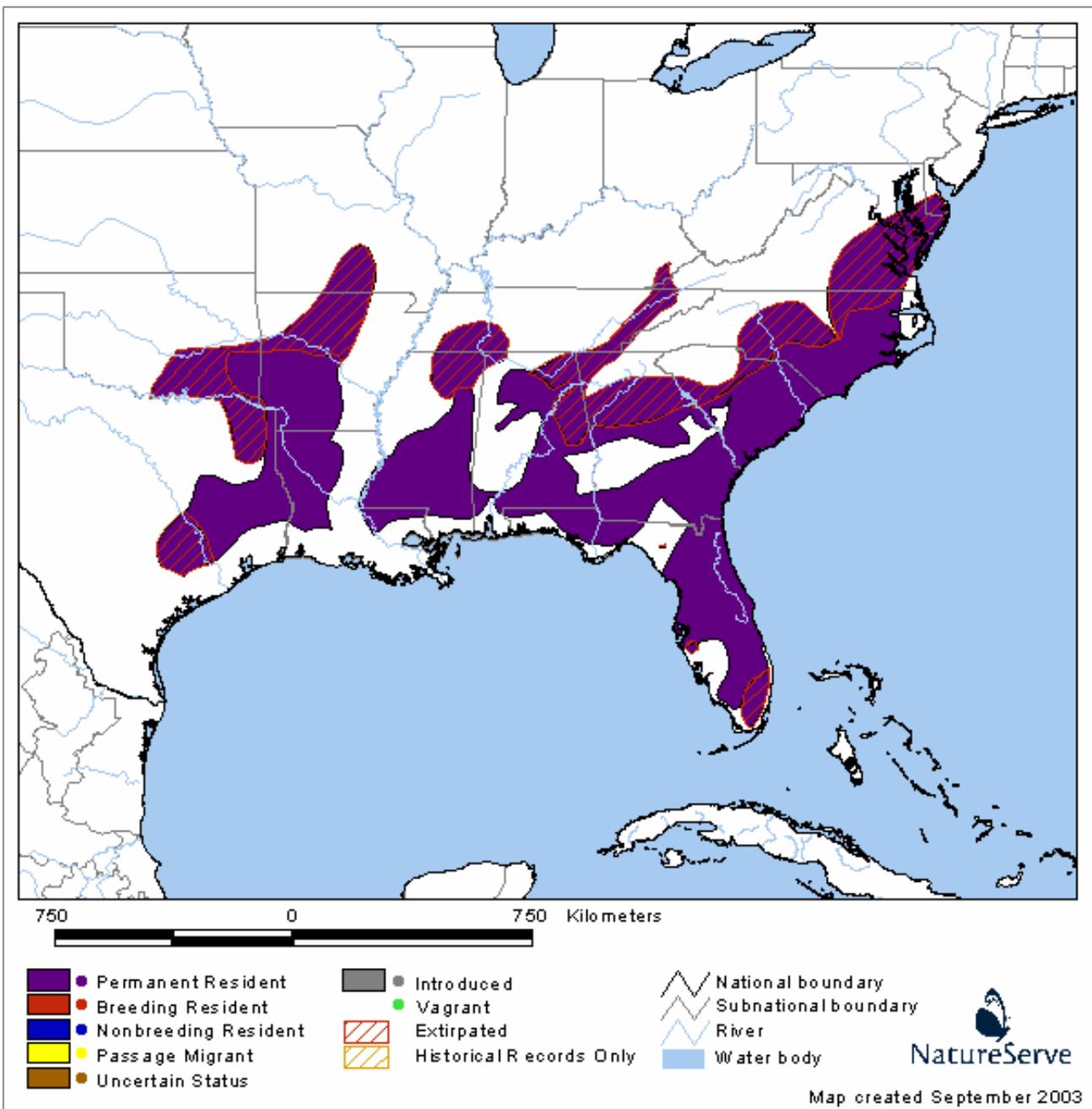
- To tell you about the Red-cockaded woodpecker and why it resides in Boiling Spring Lakes
- Show you the new map and what it means to Boiling Spring Lake residents
- Next Steps
- To discuss myths and realities

# Red-cockaded Woodpecker

## 101



A federally endangered bird that inhabits fire-maintained, mature pine savannas and woodlands



750 0 750 Kilometers

- Permanent Resident
- Introduced
- National boundary
- Breeding Resident
- Vagrant
- Subnational boundary
- Nonbreeding Resident
- Historical Records Only
- River
- Passage Migrant
- Water body
- Uncertain Status



Map created September 2003

# WOODPECKERS



- photo by J. L. Hanula



Photo by J. A. Spindelov



J. Atroc and P. Moss



Photo by J. A. Spindelov



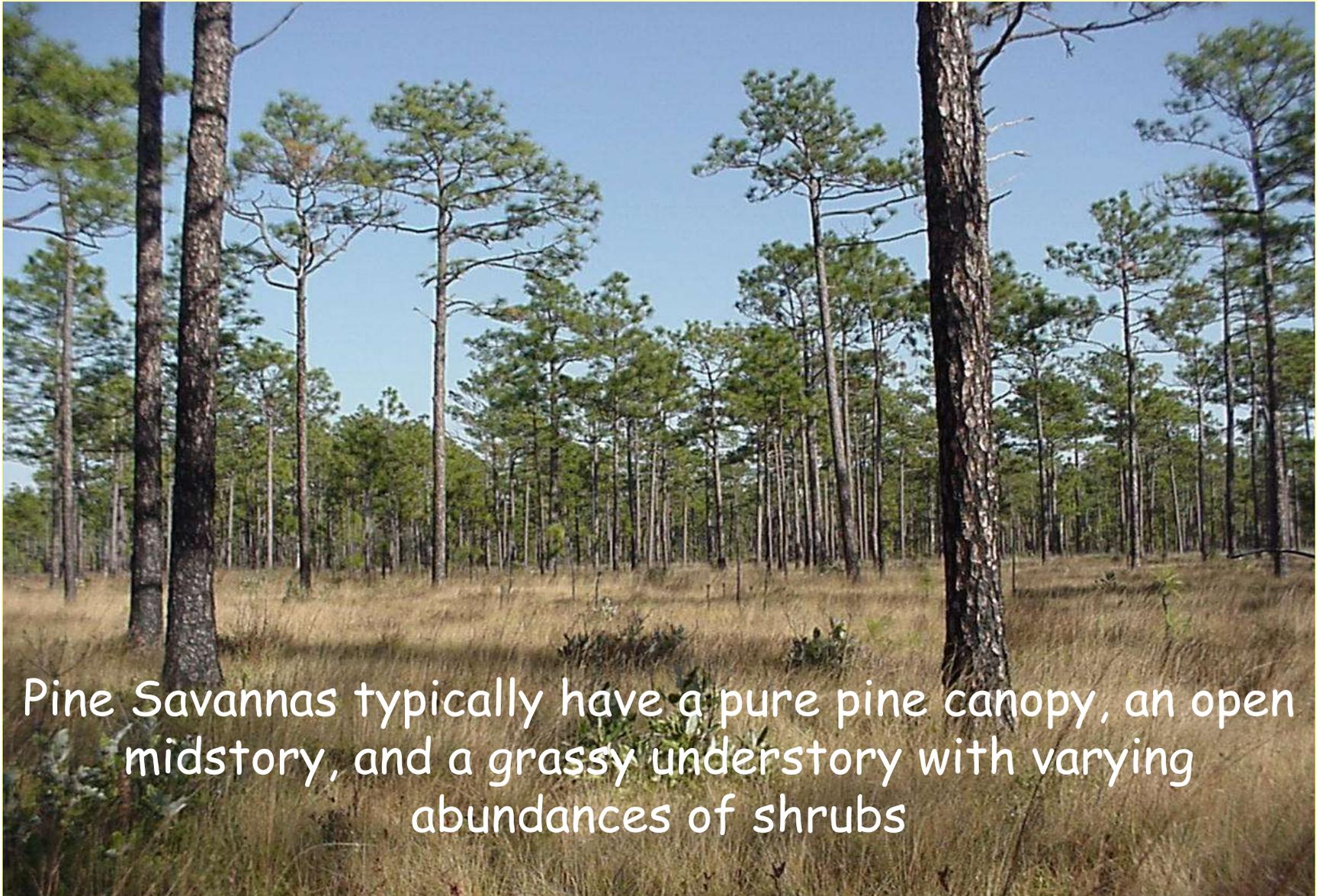
Photo by A. Wilson



Barry Vandusen



## Habitat Preference: Longleaf Pine Savannas



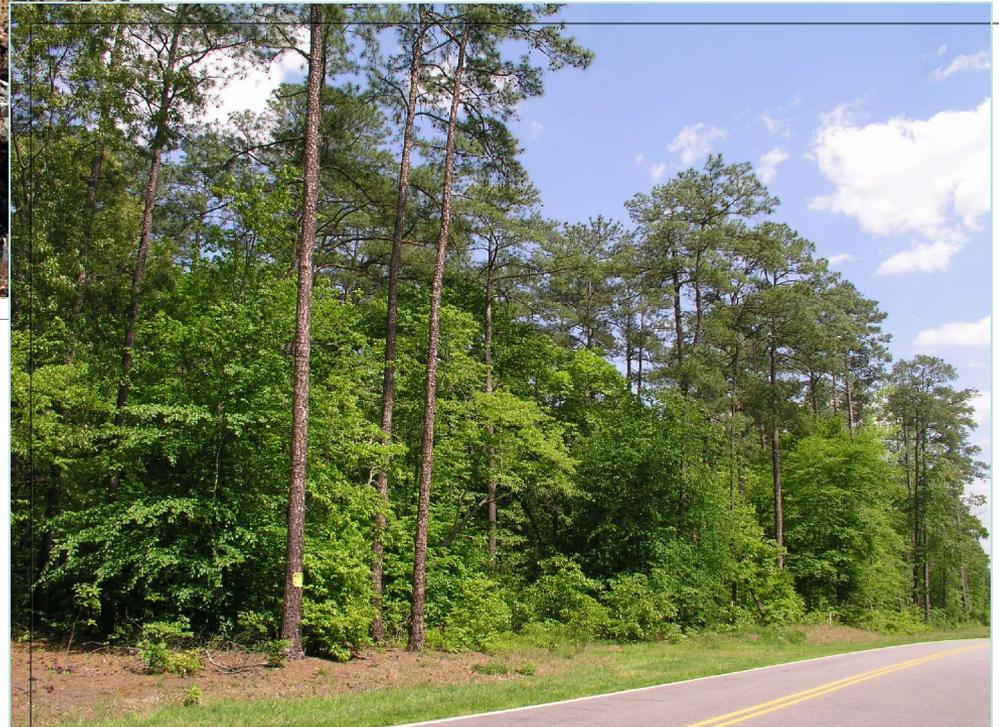
Pine Savannas typically have a pure pine canopy, an open midstory, and a grassy understory with varying abundances of shrubs

# Reasons for Rarity



Habitat Loss in late  
1800s/early 1900s

Fire Suppression in  
remaining/regenerating  
habitat



# Effects of Fire Suppression



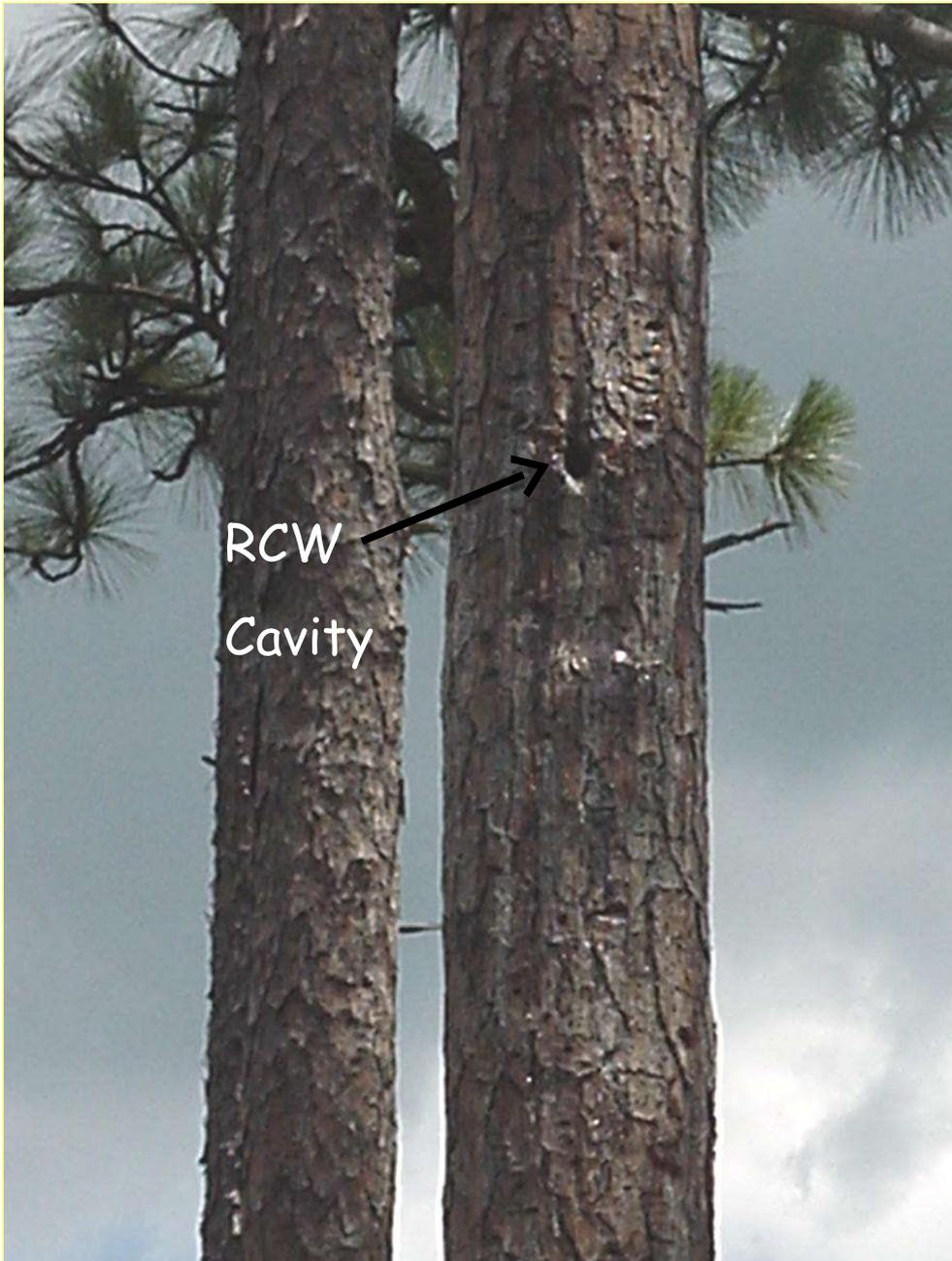
Hardwoods grow into the midstory.....

....and eventually the overstory creating a pine-hardwood forest



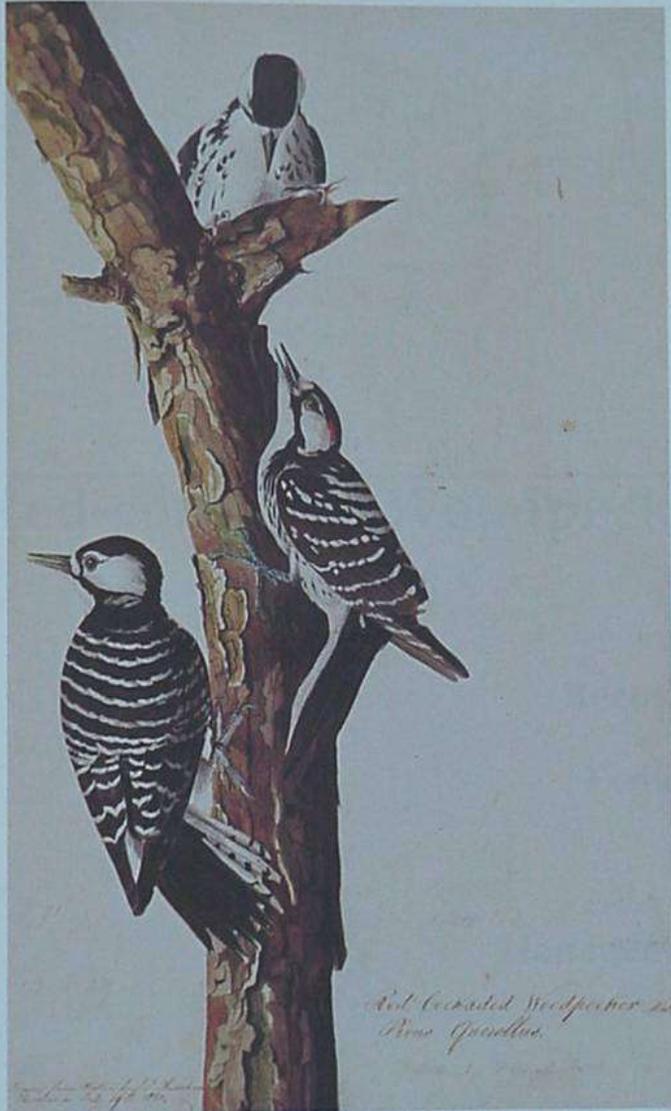


Encroaching hardwoods cause RCWs to eventually abandon their cluster site



RCW  
Cavity

- The RCW is the only woodpecker that excavates its cavity in a bole of a living pine tree
- Tree must be older than 60 years to excavate cavity



Red-cockaded Woodpecker by John James Audubon, (1821), watercolor, graphite gouche, black crayon, accession number 1863.17.389. Collection of the New York Historical Society

- RCWs live in clusters of multiple cavity trees
- RCWs typically live in groups of 3 or more birds
- A group consists of a breeding male and female and helpers
- Helpers are typically sons from previous year's nests
- All members of the group participate in raising the nestlings, defending the territory, and maintaining the cluster

# The Cluster



- aggregate of multiple cavity trees occupied by a group of RCWs
- may include a few to many cavity trees
- cavity heights vary depending on the habitat
- RCWs occupy their cluster year-round

# Categories and Characteristics of Cavity Trees:

Stage of Development and Activity Status

## Start Holes: the beginning of a cavity





An Advanced Start Hole:  
Notice characteristic  
stream of fresh resin  
exuding from lip of entrance  
hole, a circular entrance,  
and no resin wells yet

## Active, completed cavity: key characteristics

- Reddish underbark showing at resin wells and plate
- Symmetrically shaped cavity entrances - not oval or rectangular - about 2 inches in diameter
- Clear, flowing sap
- Bark scaling above and below cavity, particularly new cavities



## Inactive, completed cavity: key characteristics

- Entrance hole is still symmetrical and cavity is probably still usable
- Resin wells are less visible and no reddish underbark is visible
- No flowing sap or sap that is present has an amber color
- Sap accumulated on bole has a grayish cast or has darkened



Enlarged, Abandoned Cavities: no longer provide shelter for RCWs but are used by other creatures



# The Endangered Species Act and what it means for Boiling Spring Lakes

# Endangered Species Act

## (A brief overview)

The Endangered Species Act (ESA), enacted in 1973, is the nation's primary tool for conserving imperiled plants and animals. Currently over 1,200 U.S. species and over 550 foreign species are listed as either threatened or endangered.

**Endangered species: In imminent risk of going extinct.**

**Threatened species: In imminent risk of becoming endangered.**

➤ **"Take" Prohibition: The ESA prohibits the "take" of listed species, defined under Section 9 as actions that harm, harass, pursue, hunt, shoot, wound, trap, capture, collect, or kill a species.**

➤ **A "take" also includes actions that significantly modify habitat in a manner that would lead to the injury or death of a listed species.**

➤ **The take prohibition applies to both federal and non-federal parties, including state and local governments, private companies, private individuals**

# Private Lands Guidelines for RCWs: The Basics

- **Illegal to trap, harm, harass, or kill a Red Cockaded Woodpecker**
- **Preserve and protect existing cavity trees**
- **Provide a total of 3,000 ft<sup>2</sup> BA of 10" DBH or larger pine trees on at least 75 acres and preferably within ¼ mile of the cluster site but no farther than ½ mile.**
- **Stands counted as foraging habitat should be contiguous with the cluster or not have gaps greater than 200 ft between them.**
- **Conduct activities outside of the breeding season (April 1 – July 31)**

# Boiling Spring Lakes Maps:

February 1, 2006

September 1, 2006

## What does the map mean for:

- Landowners located in the purple areas (clusters and foraging partitions: 02A, 03, 14, 18, 19, 26, 30, and 36)
- Landowners located in all other Foraging Partitions:

For landowners located in the purple areas (clusters and foraging partitions: 02A, 03, 14, 18, 19, 26, 30, and 36)

- We are advising the city to not issue a building or clearing permit until someone from the USFWS, a Consultant (at your cost), or a USFWS representative takes a look at your lot.
  - You may receive a letter that you may continue without an USFWS permit
  - You may be advised to apply for an USFW Incidental Take Permit
- Do not clear cut your lot. If you do you may be violating the Endangered Species Act
  - If you cleared your lot w/o a City permit after September 7, 2006 you may be in violation of the ESA and you cannot receive an authorization letter from the USFWS.
  - We will need to see proof that the lot was cleared before September 7, 2006.

# What does the map mean for landowners located in all the other foraging partitions

- Currently you can receive building permits without authorization from the USFWS
- We encourage you to not clear your lot if you are not planning on building within the next several months.
- We encourage you to clear your lot of hardwood midstory trees and shrubs and retain your longleaf pine trees

# What can we do to help protect the species and development?

## Incidental Take Permits

Private landowners, corporations, state or local governments, or other non-Federal landowners who wish to conduct activities on their land that might incidentally harm (or "take") wildlife that is listed as endangered or threatened must first obtain an incidental take permit from the U.S. Fish and Wildlife Service.

## Habitat Conservation Plans

To obtain a permit, the applicant must develop a *Habitat Conservation Plan* (HCP), designed to offset any harmful effects the proposed activity might have on the species. The HCP process allows development to proceed while promoting listed species conservation.

# Incidental Take Permits and Habitat Conservation Plans

## A brief overview

- HCPs are documents that outline the necessary steps that identify the mitigation efforts that will be used to offset the loss of species and/or habitat
- ITPs/HCPs allow development to take place and take of species to happen legally
- HCPs can be developed and used for any landowner regardless of the size of property
- HCPs can be developed for towns, communities, counties and states
- HCPs can take up to 1 to 2 years to develop
- HCPs cost money to develop and implement
- There have been 16 HCPs to date to assist the RCW

# What we are doing?

- The USFWS, The Nature Conservancy and the North Carolina Wildlife Resources Commission are working together to develop a Habitat Conservation Plan for part of Boiling Spring Lakes
  - Data gathering by TNC, NCWRC to develop the biological information for the HCP and the writing of the HCP by the USFWS will save the city an estimated \$40,000
  - Mitigation for the RCWs in several of these eight foraging partitions may be found on The Nature Conservancy properties and other non-federal (private) lands
  - There will be a landowner cost associated with receiving an Incidental Take Permit through this HCP. That cost is yet to be determined
  - What you are paying for? Mitigation where we can grow the birds that we will lose in BSL. And, the ability to develop property legally while ensuring no net loss of the RCW

## What can the city do:

- **Work on developing a citywide Habitat Conservation Plan.** (With the current rate of growth in the city other foraging partitions will face the same restrictions as seen by those eight.)
- **Find a partnering organization or group to help share the cost of developing a citywide HCP.** (The USFWS cannot be the permit holder for an incidental take permit.)

# What can you do:

- **Do not clear cut your lot if you are not planning on building now**
- **Retain as many mature pine trees as possible when building your house**
- **Get the facts. Check the website. Call or email our office to find out the latest information.**

# Questions and Answers:

- A. Is this the final version of the map?
- B. No it is not the final version of the map. Data is changing every day here in BSL. Every time a lot is clear-cut that removes available foraging habitat
  
- D. Can the city be liable for violating the Endangered Species Act?
- E. Yes, the city can be liable for violating the ESA. Private conservation groups can sue the city and the USFWS on behalf of the endangered species for violating the ESA
  
- G. Why is BSL being singled out?
- A. BSL is not being singled out. There have been road projects in greater Brunswick County that have been affected by the presence of the RCW. Recently we were made aware of a planned development that may involve RCWs. We have informed the parties of their responsibilities under the ESA.

# Questions and Answers:

- A. Some lots in Boiling Spring Lakes will never be able to be built on because of the presence of RCWs?
- B. Not true. Once a Habitat Conservation Plan is in place all lots in BSL will be buildable.
  
- D. Why can't all of the birds be moved to the preserve?
- E. There is not enough suitable habitat.
  
- G. The cost of mitigation for a landowner for an ITP/HCP can be more than \$100,000 ?
- H. While we do not have the final cost of the HCP, we can assure you that it will not be in the neighborhood of \$100,000 per landowner.

# Questions and Answers:

- A. The longleaf pine is a weak tree and will break in high winds?
- A. When Hurricane Katrina struck the Gulf Coast in August 2005, she left a swath of damaged forestland. But longleaf pine withstood the storm much better than many other tree species, according to a S.C. Department of Natural Resources release dates April 24, 2006.
- C. The Federal Government will throw a person in jail if they cut down a woodpecker tree?
- D. Under the ESA there are penalties for violating “Take” provisions. If a person knowingly and willingly harms, harasses an endangered species there are civil and criminal penalties these can be financial, as well as, a one-year minimum sentence to be served for violating the ESA.

# Conclusion