Everglades Restoration Transition Plan Biological Opinion

FREQUENTLY ASKED QUESTIONS

Why did the *Everglades Restoration Transition Plan* Biological Opinion need to be redone?

In 2014, the Cape Sable seaside sparrow population fell to 2,720 individuals (its lowest level since 2002), which triggered the need to reinitiate consultation on the species. Current preliminary results for 2016 indicate that the population may have decreased to approximately 2,400 birds, the lowest on record.

The U.S. Army Corps of Engineers reinitiated consultation on Everglades Restoration Transition Plan (ERTP) in November 2014 as a result of the Incidental Take limit being exceeded. The Incidental Take Re-initiation Trigger states: "If the annual Cape Sable seaside sparrow population estimate falls below 2,915 sparrows, re-initiation of consultation must occur."

Because of this determination, and in compliance with the Endangered Species Act (ESA), the Service and the Corps entered into a formal consultation to address how the management of South Florida water flows by the Corps affects the Cape Sable seaside sparrow—a small, highly endangered ground-nesting bird.

What was the goal of the consultation?

The goal of the consultation was to determine whether the Corps' current water management operations in South Florida would likely jeopardize the continued existence of the Cape Sable seaside sparrow or result in the destruction or adverse modification of critical habitat.

Through the consultation process, the Service determined current operations do pose jeopardy to the Cape Sable seaside sparrow. The two agencies worked together, along with other partners and stakeholders, to develop a reasonable and prudent alternative and associated actions that will avoid jeopardy.

Why protect the Cape Sable seaside sparrow and other imperiled species in the Everglades?

The Cape Sable seaside sparrow and other imperiled wildlife serve as key indicator species for the health and sustainability of the Florida Everglades, which supports a vast array of wildlife, natural resources and water supplies that all of South Florida depends on.

What happened after the Service issued a jeopardy biological opinion in 1999 to the Corps regarding Cape Sable seaside sparrows?

The jeopardy finding led to the development of the Interim Operational Plan or IOP, which established the closure/opening dates for the water control structures (S-12A/B/C) upstream of Cape Sable seaside sparrow sub-populations. In 2006, IOP was extended for four more years because it wouldn't jeopardize the continued existence of the sparrow. In

2010, the IOP was replaced by the ERTP, which expired in April and was extended to July 15.

What is a "jeopardy finding" under the ESA?

Jeopardy occurs when an action is reasonably expected, directly or indirectly, to diminish a species' numbers, reproduction, or distribution so that the likelihood of survival and recovery in the wild is appreciably reduced.

What is the Reasonable and Prudent Alternative (RPA) and where can I find it?

The Corps' proposed action for managing water under the *Everglades Restoration Transition Plan* would continue a hydrologic alteration of the habitat of the Cape Sable seaside sparrow. The Service has determined that this is likely to jeopardize the continued existence of the species, in violation of the ESA. Upon making a jeopardy finding, the ESA requires the Service to provide the Corps a reasonable and prudent alternative the Service believes would not violate the ESA and also avoid jeopardy.

In this particular case, successfully implementing the RPA will:

- Eliminate the ongoing loss of functional sparrow habitat resulting from the invasion of woody and exotic plant species due to water management practices; and
- Restore and enhance sparrow habitat west of Shark River Slough and in Taylor Slough.

Based on the best commercial and scientific data available, the RPA's mandated actions are designed to enhance the associated hydrologic characteristics of the sparrow's habitat that are most relevant to its survival and recovery. The mandated actions are:

- Consecutive dry days (water below ground surface) during the breeding season (March 1 – July 15), which influences nesting success;
- If the sparrow's grass habitat gets too dry, meaning water is below ground surface level for 90 days, woody plants takeover. If the sparrow's habitat stays too wet, defined as water above ground surface for more than 210 days, a wetland habitat takes over. Service biologists are working with the Corps the get habitat conditions just right between March 1 and July 15.
- Annual water levels above ground, which along with fire, influence the structure and composition of plant communities to provide habitat for the sparrow.

What biological information was used to help determine the Service's recommendations?

The biological opinion references dozens of peer-reviewed journal articles, modeling, approved reports, and documents completed by credentialed scientists at various governmental agencies, universities, and consulting firms. It also includes direct communications with experts and information solicited from basin states, Tribes, and state fish and game agencies.

What were the Service's recommendations?

Through the consultation, the Service and the Corps collaborated to develop actions that they all believe will ensure needed protection for imperiled species protected under the ESA. These recommendations include the necessary conservation actions contained in the RPA. It is the combination of all parts of the alternative, working in concert that will reduce the potential for jeopardy to the species.

How will the recommended actions benefit the species?

The recommended actions are critical for the immediate and long-term survival of the Cape Sable seaside sparrow population. These performance measures are based on the best available science acquired from monitoring and research activities over the last several decades. Proper hydrology is the key to maintaining and restoring Cape Sable seaside sparrow suitable habitat. Physical and biological characteristics for successful breeding and suitable Cape Sable seaside sparrow habitat consist of at least 90 consecutive dry days (water below ground surface) during the breeding season (March 1 – July 15) and 90-210 days of water being above ground surface each year; along with the presence of appropriate plant communities. The failure to consistently achieve these metrics has contributed to the decline of the Cape Sable seaside sparrow populations.

What is the current status of the Cape Sable seaside sparrow?

The Cape Sable seaside sparrow is listed as endangered under the ESA and found only in the Everglades. The Cape Sable seaside sparrow is one of several species in Florida either critically imperiled (such as the Florida grasshopper sparrow) or extinct (such as the dusky seaside sparrow). The Cape Sable seaside sparrow has not recovered from an approximately 50 percent decline in population numbers in 1993, and current indications are that the overall population continues to decline. In addition, several of the six subpopulations are at critically low population levels and periodically disappear.

In 2014, the Cape Sable seaside sparrow population fell to 2,720 individuals (its lowest level since 2002), which triggered the need to reinitiate consultation on the species. The Cape Sable seaside sparrow population rebounded slightly in 2015 due to optimal breeding conditions in the 2014 breeding season, but the overall population trend is declining. Current preliminary results for 2016 indicate that the population has decreased to approximately 2,400 birds, the lowest on record. The El Nino conditions caused extreme rain events that resulted in a record low amount of suitable dry habitat available for Cape Sable seaside sparrow breeding. Additionally, emergency actions by the Corps and South Florida Water Management District to reduce water levels in Water Conservation Area 3-A resulted in additional water flowing over Cape Sable seaside sparrow habitat. The 2016 breeding season didn't go well, further adding to the plight of this species.

What exactly is the *Everglades Restoration Transition Pla*n? How is it related to the Comprehensive Everglades Restoration Plan? And who are the Service's primary partners in implementing these programs?

The *Everglades Restoration Transition Plan* is an evolving project, changing as new projects come online. It is like a road map for how the water flows through the ecosystem as Everglades restoration projects are constructed over time. Diverse state and federal agencies are concerned about how the water flow will affect their interests and the Plan offers an opportunity to collaborate on the best plan that fits everyone's needs. Every time a new project is added or changed then this plan must be updated.

Comprehensive Everglades Restoration Plan is the original and primary Everglades Restoration initiative written into law around 1999. It contains many individual projects throughout South Florida that when put together will result in the best possible restoration for the Everglades ecosystem. It is a partnership between the Corps and South Florida Water Management District. Other state and federal agencies as well as the tribes and other stakeholders are also involved. The Service works with these agencies to provide input that ensures the interests of federally listed species are a priority and strives to improve the ecological benefits provided by the projects.

What are the Service's primary roles in Everglades Restoration Transition Plan, Comprehensive Everglades Restoration Plan and Central Everglades Planning Project?

The U.S. Fish and Wildlife Service's priority is to prevent the extinction of species in the Everglades and to work with our federal, state and local partners to help them recover. The Service participates in the planning phases of Everglades projects and plans, helps integrate consideration of wildlife needs and conservation measures early in the process, reviews final project plans and operations, and monitors final construction and operation to assure that environmental safeguards are being met.

What are the ESA-listed species involved in these projects and programs for the Everglades? What does the Service do to ensure the protection of these listed species in conjunction with these programs?

In 1999, the Service developed a multi-species plan to look at the status and needs of all of imperiled species listed under the ESA in South Florida holistically. The Service still maintains this holistic approach. Threatened and endangered species include the Everglades snail kite, Cape Sable seaside sparrow, American wood stork, Florida panther, manatee, indigo snake, Florida bonneted bat, and several butterflies and plants.

First, the Service tracks the status of these species. How many are there? Are their numbers increasing or decreasing? Do they have enough habitat? What's happening to their habitat? What does the Service need to learn about this species before it can help? Next, we review the plans, created by another agency, for the project that may affect the species the Service has been discussing. How will these plans help or hurt the species and or its habitat? Finally, the Service makes recommendations on how the plan can be made better for the health of the species.

We hear a lot about storm-water treatment areas, the Everglades Agricultural Area water conservation areas and water control structures. What are they and how do they relate to Central Everglades Planning Project?

The storm-water treatment areas are wetlands constructed by the South Florida Water Management District with the purpose of treating water and removing nutrients, especially phosphorus, prior to releasing the water into the Everglades.

The Everglades Agricultural Area is an area of agricultural production south of Lake Okeechobee. Runoff and associated nutrients from this area flow through a series of canals and eventually into the Everglades.

South Florida's three Water Conservation Areas are vast tracts of remnant Everglades sawgrass marsh located adjacent to Everglades National Park. Spanning 846,387 acres, the Water Conservation Areas serve multiple water resource and environmental purposes, including flood control, water supply and habitat for South Florida's plant and animal communities. Discharges from Water Conservation Area-3 to Everglades National Park through the S-12 structures are limited to protect the endangered Cape Sable seaside sparrow during certain times of the year.

The water control structures are a series of gates, weirs, pumps, etc., which control the flow of water throughout the Everglades system. These structures were designed to provide flood protection and to drain areas for human safety.

What else is being done to conserve the Cape Sable seaside sparrow?

Many different state and federal agencies are engaged in efforts to conserve the sparrow while also addressing water management needs. For example, the National Park Service conducts rangewide population surveys via helicopter, maintains a hydrologic monitoring network throughout the sparrow's habitat, undertakes woody vegetation control through prescribed fire and other measures, and funds a variety of research efforts undertaken by the U.S. Geological Survey or others. Among the research efforts being undertaken by the U.S. Geological Survey are projects to develop a habitat suitability index, undertake genetic and demographic analyses, and design a sophisticated modeling tool to determine the amount of dry sparrow habitat on a daily basis. The Fish and Wildlife Service, in addition to its role consulting with the Corps of Engineers, is also involved in research and monitoring efforts, including intensive ground-based demographic monitoring of selected sparrow subpopulations.