

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

## **NEWS RELEASE**

June 16, 2010

<u>CONTACT:</u> **Randy Smith** South Florida Water Management District Office: (561) 682-2800 or Cellular: (561) 389-3386

www.sfwmd.gov/news follow us on **twitter** 

## SFWMD Exploring Options for Regional Water Storage

Additional surface water storage among possible options



(Top) In early 2009, the Nine Gems property sat mostly dry. (Middle) The District, in cooperation with Martin County has since restored the hydrology of the land to add 2,000 acre-feet of regional water storage.

(Bottom left and right) C.M. Payne & Sons Ranch is among eight ranches that have agreed to retain water as part of the pilot Florida Ranchlands Environmental Services Project.

**West Palm Beach, FL** — With the annual rainy season under way, the South Florida Water Management District (SFWMD) is evaluating strategies that could increase regional storage and lessen the volume of future freshwater releases from Lake Okeechobee to the St. Lucie and Caloosahatchee estuaries.

"The St. Lucie and Caloosahatchee rivers and their estuaries are vital to the way of life of residents and businesses on both of Florida's coasts," said SFWMD Executive Director Carol Ann Wehle. "The options currently under evaluation will not prevent future lake releases by themselves, but they are part of the long-term solution for easing the burden on the estuaries. We recognize that a lot more work needs to be done."

At its May 13 meeting in Stuart, the SFWMD Governing Board heard the concerns of residents on both coasts about the harmful effects of freshwater lake releases on the estuaries. District staff shared information on its alternative water storage and treatment initiative and opportunities to expand shallow water storage on public and private lands. Staff has been building on existing efforts and developing new strategies, including:

• Expanding surface water storage capacity around Lake Okeechobee. Since 2005, the District has been working with a coalition of other agencies, landowners, environmental organizations and researchers to add 127,100 acre-feet of surface

water storage capacity on private, public and tribal lands. The District is continuing to evaluate these projects while looking to further expand storage capacity for emergencies and the long term by:

 Determining the feasibility of storing water on District lands and sites set aside for Everglades restoration projects on an interim basis. For viable District and state properties with lessees, the District is asking the lessees to retain more storm water on site. Some District lessees have already made system modifications to retain more



Through the pilot Florida Ranchlands Environmental Services Project, the District is partnering with ranchers and several state and federal agencies and organizations to develop a service payment program for ranchers to retain or accept water for storage.

storm water. For properties that do not have a lease or reservation, the District is in the process of developing designs, construction and operation cost estimates and schedules.

 Developing a dispersed water and treatment solicitation program to select cost-beneficial projects for implementation to obtain more storage and retention capacity. The District is currently reaching out to private landowners to gauge their interest in holding storm water on their land or storing regional runoff and exploring project concepts.

- Partnering with the City of West Palm Beach on a pilot project to store storm water that would otherwise be lost to tide. The pilot project involves intercepting water from the C-51 canal, which runs parallel to Southern Boulevard, during times when the canal is releasing water to tide. The intercepted storm water would be treated at the city's existing Renaissance Project facility and stored in Clear Lake near Okeechobee Boulevard.
- Partnering in Palm Beach County with Florida Power & Light (FPL) to improve water quality at the L-8 Reservoir and temporarily increase storage capacity. FPL will soon install temporary pumps to use approximately 10 percent of the reservoir water to cool its new West County Energy Center. In early 2011, FPL's reclaimed water system will be in place. Until then, the withdrawals will make room for additional water storage for the District to use during the 2010 rainy season. In addition, the partnership will create an opportunity for rainfall and stormwater runoff to lower chloride levels in the reservoir, allowing it to be used for its intended environmental purpose as part of the Comprehensive Everglades Restoration Plan (CERP).
- Utilizing aquifer storage and recovery (ASR). ASR involves injecting and storing water within underground aquifers until it needs to be recovered. The District and the U.S. Army Corps of Engineers are pilot testing two ASR systems as part of CERP. The most recent test at the Kissimmee River ASR pilot well was able to store 1,500 acre-feet of water.
- Releasing water south to the Everglades Agricultural Area (EAA) and when capacity is available in the regional system. Over the course of the 2009-2010 dry season, the District sent 73,731 acre-feet of water south from Lake Okeechobee to maintain EAA canal levels, helping to lower the lake level.
  - During a recent eight-day combined water supply and water storage release in late May, the combined average flow of water south, as measured at the S-351, S-352 and S-354 structures, was 1,351 cubic feet per second (cfs) per day, or 21,438 total acre-feet. For comparison, the Corps' targets for its most recent round of releases were 1,170 cfs per day to the St. Lucie Estuary and 3,000 cfs per day to the Caloosahatchee Estuary.

In addition to the District's current efforts, the long-term solution for reducing freshwater releases from the lake to the estuaries includes:

- The Corps is continuing its efforts to rehabilitate the 75-year-old Herbert Hoover Dike, which will eventually allow it to safely hold more water in the lake. The Corps recently awarded a \$40 million contract for repairs to the most vulnerable section of the dike between Port Mayaca and Belle Glade.
- The completion of CERP projects will enable the District and the Corps to send more clean water south to the Everglades.

• The District's pending purchase of strategically located land owned by the United States Sugar Corporation south of Lake Okeechobee, which would significantly increase water storage south of the lake.

The U.S. Army Corps of Engineers manages Lake Okeechobee water levels with the goal of balancing flood control, public safety, navigation, water supply and ecological health. The Corps bases operational decisions — whether to retain or release water in the 730-square-mile lake — on its regulation schedule and the best available science and data provided by its staff and a variety of partners, including the District.

Since late March, the Corps has been periodically releasing water from Lake Okeechobee to the St. Lucie and Caloosahatchee estuaries to lower the lake level for the rainy season for public health and safety purposes. During the November-to-May dry season, South Florida received an average of 24.67 inches of rainfall, nearly 6 inches above normal. The water level in Lake Okeechobee reached as high as 15.15 feet in early May. The Corps strives to manage the lake between 12.5 and 15.5 feet to protect the integrity of the Herbert Hoover Dike.

Details of the goals, roles and responsibilities for managing Lake Okeechobee can be found <u>here</u>. More information about the South Florida Water Management District's efforts to enhance water storage and treatment around Lake Okeechobee is available in this <u>fact sheet</u>.

## # # #

## About the South Florida Water Management District

The South Florida Water Management District is a regional, governmental agency that oversees the water resources in the southern half of the state – 16 counties from Orlando to the Keys. It is the oldest and largest of the state's five water management districts. The agency mission is to manage and protect water resources of the region by balancing and improving water quality, flood control, natural systems and water supply. A key initiative is cleanup and restoration of the Everglades.