

MEMORANDUM

TO: Laureen Borochaner, Chief, Engineering Division (USACE)
FROM: John Mitnik, Chief District Engineer (SFWMD)
Akin Owosina, Chief, Hydrology & Hydraulics Bureau (SFWMD)
DATE: December 12, 2019
SUBJECT: Operational Position Statement for December 10, 2019 to December 16, 2019

This Position Statement is for the one-week period from December 10, 2019 to December 16, 2019. On December 9, Lake Okeechobee stage was 12.92 feet NGVD, which places it within the Base Flow Sub-band of the 2008 Lake Okeechobee Regulation Schedule (LORS). Lake stage decreased by 0.17 feet during the preceding 7 days.

District December rainfall to date is well below average (9% of normal). District rainfall forecast (issued December 11) predicts above-average rainfall for this 7-day period and near-average for the following week.

Precipitation Outlook: The most recent CPC precipitation outlooks for December 2019 is for below-normal rainfall (45%) for south Florida. The 3-month window Feb-Apr shows slightly below average rainfall for Lake Okeechobee and the areas north of the Lake. Other than that, all the 3-month windows from Dec 2019-Feb 2020 to the end of the 2020 wet season call for equal chances of above-normal, normal, or below-normal rainfall for south Florida.

2008 LORS Release Guidance (Part C): With Lake Okeechobee stage within the Base Flow Sub-band and the Tributary Hydrologic Conditions in the Dry category, Part C of the 2008 LORS suggests “No Releases to WCAs”.

Over the 7-day period from December 2 to December 8, 2019, no Lake Regulatory releases were sent to the STAs, or to the Lake Worth Lagoon through the C-51 canal. A volume of 3,900 acre-feet was delivered from the lake to STA 2 and STA3/4 to bring cell stages to targets. Stage in WCA-1 is in Zone B of the regulation schedule. Stage in WCA-2A is in Zone A of the regulation schedule. WCA-3A stage is in Zone E of the regulation schedule. For the coming operational period, the USACE is recommending the SFWMD not implement Lake Okeechobee regulatory releases south to the WCAs.

2008 LORS Release Guidance (Part D): With Lake Okeechobee stage in the Base Flow Sub-band, Part D of the 2008 LORS suggests “S-79 Up to 450 cfs and S-80 Up to 200 cfs”.

Total discharge to the St. Lucie Estuary averaged approximately 175 cfs over the past week with no releases from Lake Okeechobee. The 7-day average salinity at the US1 Bridge is in the good range for adult oysters. Total inflow to the Caloosahatchee Estuary averaged approximately 750 cfs over the past week with about 525 cfs coming from Lake Okeechobee. Salinity conditions at Val I-75 remain in the good range for tape grass but in the fair range at Ft. Myers. Salinity conditions for adult eastern oysters are in the good range at Cape Coral and Shell Point, and in the fair range at the Sanibel location.

The District, in coordination with the Florida Department of Environmental Protection (FDEP), has considered the current system conditions and the application of the SFWMD’s Lake Okeechobee Adaptive Protocols (AP), since the lake stage is in the Base Flow Sub-band and LORS 2008 suggests Base Flow releases to the Estuaries. Given that the estuary needs water and the likelihood of lake stage falling below 11.0 feet NGVD by June 1, 2020 is less than 50% based on the December 2019 dynamic position analysis, the SFWMD recommends the USACE follow LORS 2008.