

MEMORANDUM

TO: John Mitnik, Assistant Executive Director

THROUGH: Peter Kwiatkowski, Section Administrator, Resource Evaluation

FROM: SFWMD Staff Water Supply Advisory Team

DATE: October 5th, 2021

SUBJECT: Water Supply Report

District-wide Conditions

Surface and groundwater levels showed mixed trends throughout the District over the last week. The majority of the United States Geological Survey (USGS) real-time wells in the Kissimmee Basin (KB) within the District boundaries are at median levels for this time of year. The wells in the northern portion of the KB are mostly completed in the Floridan aquifer and the wells in southern KB in the surficial aquifer system. Surface and groundwater levels decreased in about three quarters of the stations in the Kissimmee Basin.

Stages in the Upper East Coast (UEC) canals C-23, C-24, and C-25 are 22.83, 19.31, and 21.83 feet, all above the fourteen feet agricultural cut-off. About three quarters of surficial aquifer stations are at median levels, with the remainder in the lower percentile ranges for this time of year. Water levels mostly decreased over the last seven days at the Lower East Coast stations. S-176 and S-177 (both in C-111 Basin) are in the “yellow” caution zone. The majority of the Biscayne aquifer wells are at median levels and higher for this time of year. Groundwater levels are on the low side in C-111 Basin.

Groundwater levels decreased in most of the Lower West Coast (LWC) stations since last week. The majority of the surficial aquifer and Lower Tamiami wells are at median levels and higher for this time of year. Approximately sixty percent of the Sandstone aquifer wells are in the lower percentile ranges, and the remainder are in the median range. Over half of the Mid-Hawthorn aquifer monitor wells are in the lower percentile ranges, with the remainder split between median levels and the upper percentile range for this time of year. **Figure 1** summarizes current conditions.

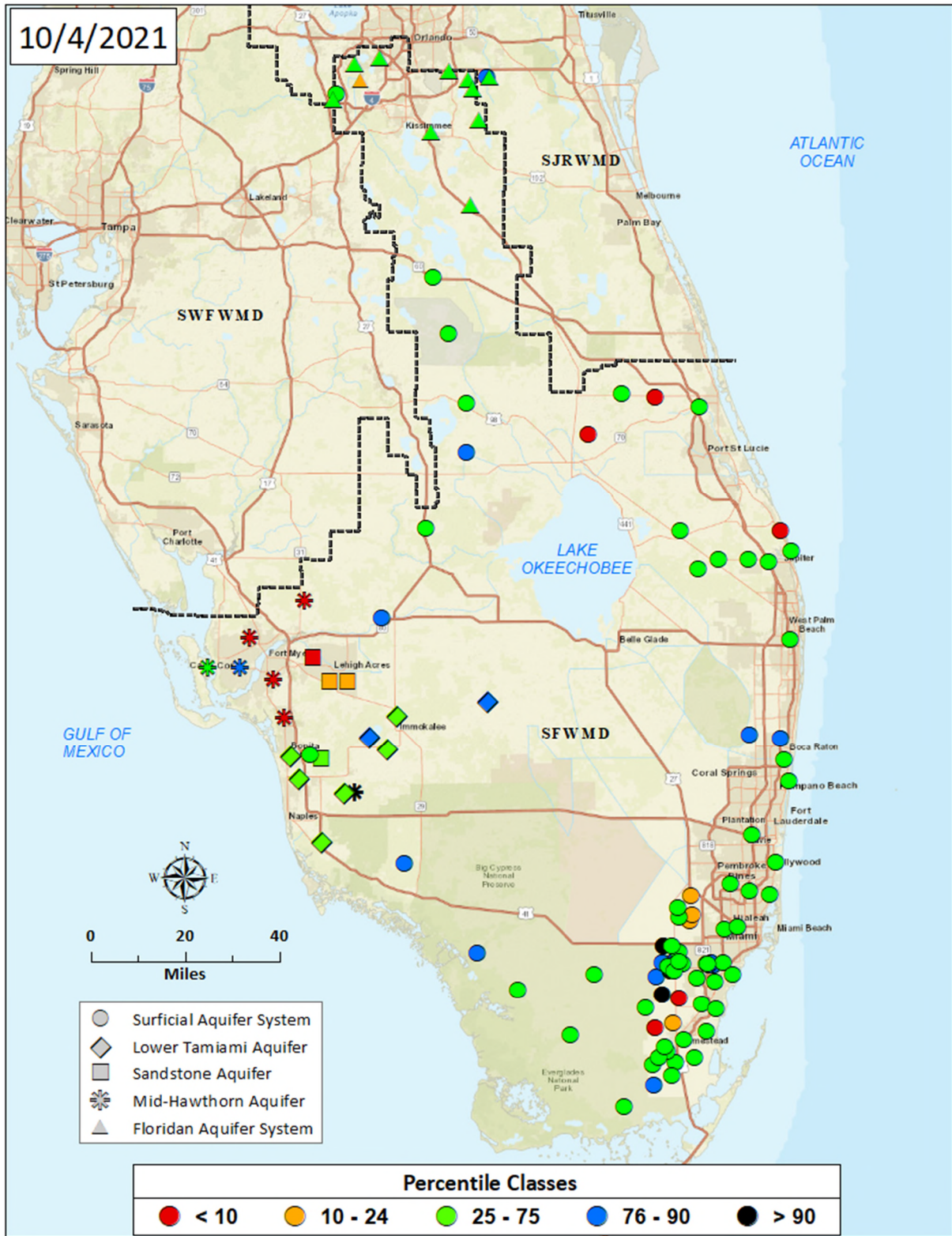


Figure 1. Real-Time Groundwater Level Map

Water Supply Technical Input to LORS2008

The Palmer Index for Lake Okeechobee (LOK) Tributary Conditions was -2.61 on October 2nd, 2021 and is classified as “extremely dry,” and is in the “high” risk category for water supply. The LOK stage for the next two months is projected to be in the Low Sub-band, and the risk to water supply is categorized as “low.” The Climate Prediction Center’s (CPC) Precipitation Outlook is projected as “normal” for one month and “below normal” for three months, leaving the one-month outlook in the “low” risk category and three-month outlook in the “moderate” risk category. The LOK Seasonal Net Inflow Forecast is in the “dry” category and is in the “moderate” risk category. The LOK Multi-Seasonal Net Inflow Forecast is in the “dry” range with “high” risk to water supply. The stages in WCA 1, WCA 2A and WCA 3A are above line 1 and are in the “low” risk category. Year-Round Irrigation Rule is in effect for the LEC Service Areas. All Service Areas are in the “low” risk category for water supply. **Figure 2** summarizes the water supply risk indicators.

LORS2008 Implementation on 10/4/2021 (ENSO Condition- La Nina Watch):

Status for week ending 10/4/2021:

Water Supply Risk Evaluation

Area	Indicator	Value	Color Coded Scoring Scheme
LOK	Projected LOK Stage for the next two months	Low Sub-band	L
	Palmer Drought Index for LOK Tributary Conditions	-2.61 (10/2/2021) (Extremely Dry)	H
	CPC Precipitation Outlook	1 month: Normal	L
		3 months: Below Normal	M
	LOK Seasonal Net Inflow Outlook	0.50 ft	M
	ENSO Forecast	Dry	M
	LOK Multi-Seasonal Net Inflow Outlook	0.37 ft	H
ENSO Forecast		Dry	H
WCAs	WCA 1: 3 Station Average (Site 1-7, 1-8T and 1-9)	Above Line 1 (17.28 ft)	L
	WCA 2A: Site 2-17	Above Line 1 (14.18 ft)	L
	WCA-3A: 3 Station Average (Site 63, 64 and 65)	Above Line 1 (10.35 ft)	L
LEC	Service Area 1	Year-Round Irrigation Rule in effect	L
	Service Area 2	Year-Round Irrigation Rule in effect	L
	Service Area 3	Year-Round Irrigation Rule in effect	L

Note: The water supply risk classification based on the Palmer index, as well as the LOK seasonal and multi-seasonal net inflow outlooks use slightly different classification intervals than those used by the 2008-LORS.

Figure 2. Water Supply Risk Indicators