

AGENDA MEMORANDUM

Natural Resources Department

City Council Regular Meeting Date: July 16, 2024

To: City Council

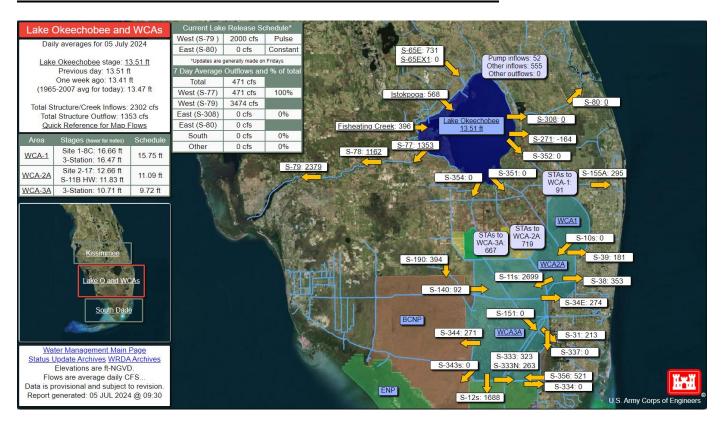
From: Holly Milbrandt, Natural Resources Director

Date: July 5, 2024

SUBJECT: Natural Resources Water Quality Updates

BACKGROUND:

CALOOSAHATCHEE RIVER & ESTUARY CONDITIONS REPORT



Click to view: July 2, 2024 Caloosahatchee Conditions Report

CURRENT RAINFALL AND CLIMATE OUTLOOK

SFWMD rainfall for June 2024 was <u>above normal</u> at 11.83" (152% of normal). https://www.sfwmd.gov/weather-radar/rainfall-historical/monthly

For the 2024 dry season (Nov 2023-May 2024), the SFWMD received 18.38" of rain, 102% of normal. For the 2024 wet season to date (beginning June 2024), the SFWMD has received 13.42" (151% of normal).

https://www.sfwmd.gov/weather-radar/rainfall-historical/seasonal

The SFWMD issued a water shortage warning for Collier & Lee Counties on November 21, 2023. https://www.sfwmd.gov/news-events/news/sfwmd-issues-water-shortage-warning-collier-and-lee-counties

The NOAA Climate Prediction Center one-month Probability Outlook for July 2024 indicates a 40-50% chance of above normal rainfall for south Florida and a 50-60% chance of above normal rainfall for central and north Florida.

https://www.cpc.ncep.noaa.gov/produuth cts/predictions/30day/off14_prcp.gif

The three-month outlook for July-Aug-Sept 2024 indicates a 50-60% chance of above normal rainfall for Florida.

https://www.cpc.ncep.noaa.gov/products/predictions/long_range/lead01/off01_prcp.gif

NOAA ENSO Report (updated on 5/20/2024):

- ENSO-neutral conditions are present.
- Equatorial sea surface temperatures (SSTs) are above average in the west-central Pacific Ocean, near average in the east-central Pacific Ocean, and below-average in the far eastern Pacific Ocean.
- La Niña is favored to develop during July-September (65% chance) and persist into the Northern Hemisphere winter 2024-25 (85% chance during November-January).
- https://www.cpc.ncep.noaa.gov/products/analysis_monitoring/lanina/enso_evolution-status-fcsts-web.pdf

ALGAE BLOOMS

Red Tide: FWC Red Tide Update for July 3, 2024 https://myfwc.com/research/redtide/statewide/

The red tide organism, *Karenia brevis*, was not observed in samples collected statewide over the past week.

There were no reports of fish kills or respiratory irritation suspected to be related to red tide received in Florida over the previous week.



Blue-Green Algae: DEP Weekly Update (June 28-July 2, 2024) https://floridadep.gov/AlgalBloomWeeklyUpdate

There were 25 reported site visits in the past 5 days with 25 samples collected. Algal bloom conditions were observed by samplers at 10 of the sites.

The satellite imagery for Lake Okeechobee from 7/1 is partially obscured by cloud cover and shows low to moderate bloom potential on approximately 50% of the lake.

Satellite imagery for the Caloosahatchee Estuary from 7/1 is partially obscured by cloud cover and shows no bloom potential in visible portions of the estuary. The most recent usable satellite imagery for the St. Lucie Estuary from 6/27 is partially obscured by cloud cover and shows no bloom potential in visible portions of the estuary.

DOH-Lee blue-green algae bloom alerts:

- 6/21/24 Caloosahatchee River Rivers Condo (Caution)
- 6/20/24 Caloosahatchee River Alacante Canal North (Caution)
- 5/17/24 C43 Canal S79 (upstream) LIFTED 5/24/24
- 5/16/24 Caloosahatchee River North Canal Circle LIFTED 5/29/24

Red Drift Algae: Occasional moderate to large deposits reported island-wide, particularly June 7-8 and June 21-29.

Seaweed piling up on Sanibel shoreline (nbc-2.com) (7/1/2024)

Trichodesmium: No reports

Sargassum: No reports

 USF Satellite-based Sargassum Watch System (SaWS) & Monthly Bulletins https://optics.marine.usf.edu/projects/saws.html



Red drift algae on east end beaches- 6/29/2024

MEETING HIGHLIGHTS & UPDATES

SFWMD Governing Board Meeting

June 6, 2024

West Palm Beach, FL

https://www.sfwmd.gov/news-events/meetings

- Discussion: C-43 Reservoir Project Update and Budget Amendments
 - Progress Update: https://legistarweb-production.s3.amazonaws.com/uploads/attachment/pdf/2669025/26_Discussion_D
 adrian C43 Caloosahatchee Reservoir.pdf Initial Fill: Anticipated May 2025
 - Approved Resolution No. 2024-0612 authorizing additional budgetary authority in the amount of \$60,000,000 for construction of the C-43 Caloosahatchee Basin Storage Reservoir
 - Approved Resolution No. 2024-0613 authorizing an increase in the contract with Kirwin Norris, P.A. by \$5,000,000 to defend the District's interests and fully

prosecute its claims related to the C-43 West Caloosahatchee Basin Storage Reservoir

Blue Green Algae Task Force

Agricultural Research and Best Management Practices
June 4, 2024

https://www.protectingfloridatogether.gov/state-action/blue-green-algae-task-force

- Presentations:
 - FDACS and Florida Department of Agricultural and Consumer Services
 - University of Florida Institute of Food and Agricultural Sciences
- Task Force Discussion (Highlights)
 - o No agriculture producers have opted for voluntary water quality monitoring
 - Agencies could not provide any examples of where agricultural BMPs have shown documented water quality improvement
 - Support more frequent updates to BMP manuals to account for emerging research/technology
 - Support research to investigate how fertilizer leaches into soils/groundwater based on rates applied/crops
 - Support targets for nutrient/leachate reductions to measure the success of BMPs

UPCOMING MEETINGS & EVENTS

SFWMD 2024 Aquifer Storage and Recovery Science Plan Peer Review Panel

July 10. 2024 8:30AM

Virtual Workshop

https://www.sfwmd.gov/event/2024-asr-science-plan-peer-review-panel-virtual-workshop

SFWMD Governing Board Meeting

July 11, 2024 9:00 AM

West Palm Beach, FL

https://www.sfwmd.gov/news-events/meetings

- Farewell to U.S. Army Corps of Engineers, Jacksonville District, Col. James L. Booth and Welcome to Incoming Col. Brandon L. Bowman
- Fiscal Year 2024-2025 Proposed Tentative Budget and Submission of Proposed Millage Rates
 - The millage rates that are being proposed for Fiscal Year 2024-2025 are the same rates as last year's rates and are not an increase. With these proposed rates, the Fiscal Year 2024-2025 will be the twenty-seventh year that the District has not increased its millage rates.
- Discussion: Providing Flood Control with Aging Infrastructure and Changed Conditions

South Florida Ecosystem Restoration Task Force

Joint Working Group/Science Coordination Group Meeting July 23, 2024

Long Key Natural Area & Nature Center, Davie, FL

https://www.evergladesrestoration.gov/working-group/jul-23-2024-wgscg

CHNEP Technical Advisory Committee

August 8, 2024 9:30 AM-2:00 PM Port Charlotte, FL

https://www.chnep.org/technical-advisory-committee

SFWMD Governing Board Meeting

August 8, 2024 9:00 AM West Palm Beach, FL https://www.sfwmd.gov/news-events/meetings

Harmful Algal Bloom Task Force

August 15, 2024

https://myfwc.com/research/redtide/taskforce/meeting/

LOSOM (Lake Okeechobee System Operating Manual)

https://www.saj.usace.army.mil/LOSOM/

- Consultation with NOAA-NMFS is complete. Final Environmental Impact Statement (EIS) published on May 24, 2024.
- The proposed LOSOM plan remains the same as documented in the Draft EIS and Water Control Plan (WCP) released in July 2022.
- The review period of the Final EIS was 30 days beginning on May 24, 2024.
- June 18, 2024, PDT Meeting to review the Final EIS and discuss changes based on comments received from the review of the Draft EIS; <u>Slide Presentation</u>
- Final Corps South Atlantic Division (SAD) Review & Record of Decision: Anticipated August 2024

FUNDING SOURCE: N/A

RECOMMENDED ACTION: N/A