

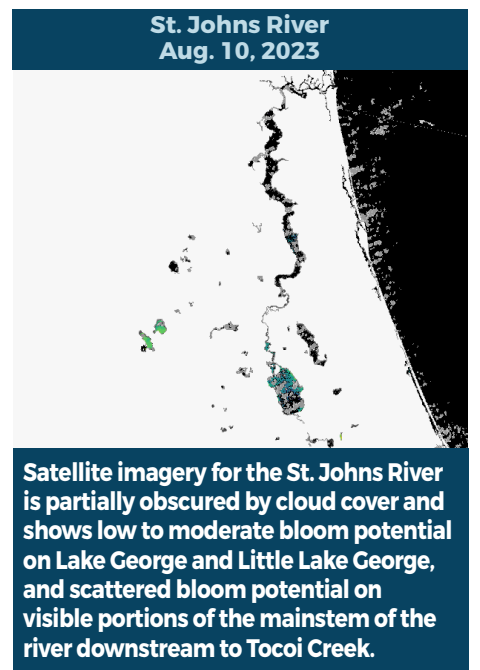
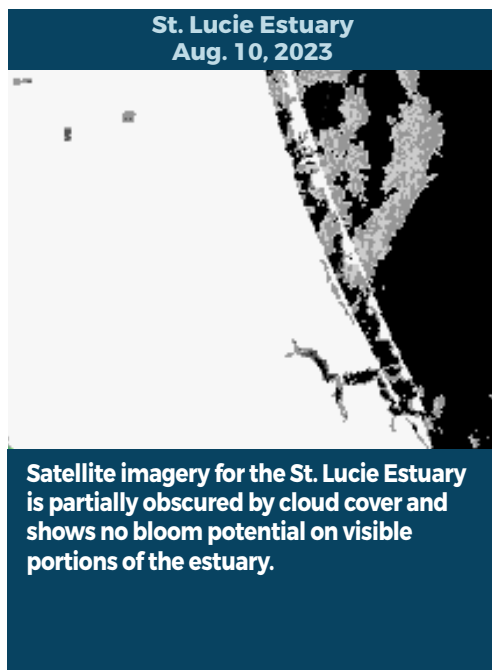
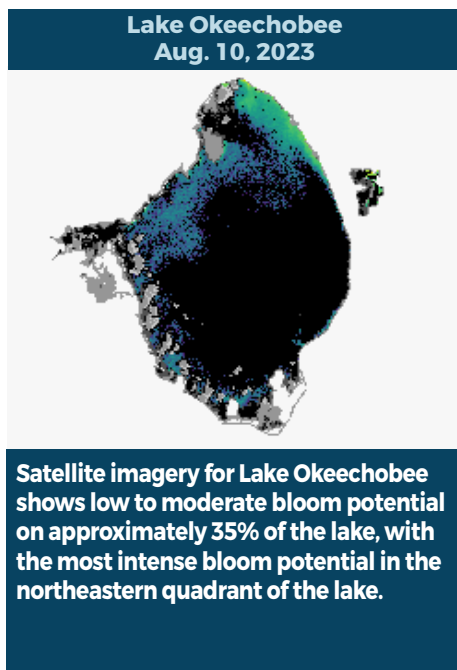
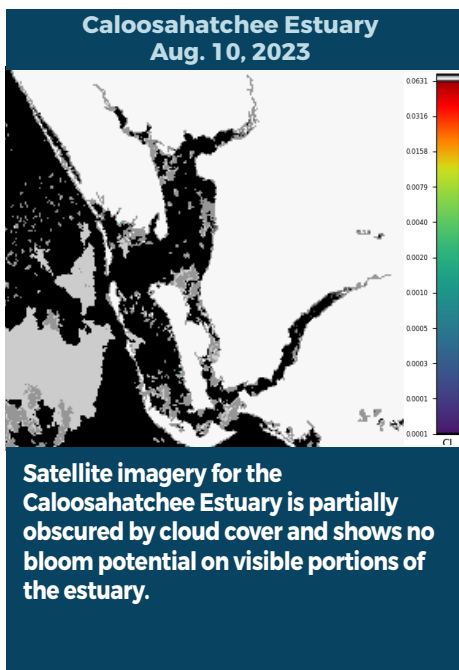


# BLUE-GREEN ALGAL BLOOM WEEKLY UPDATE

## REPORTING AUGUST 4 - AUGUST 10, 2023

Satellite imagery provided by NOAA - Images are impacted by cloud cover.

A value of 0.004 is nominally equivalent to approximately 20-30 ug/L chlorophyll a of cyanobacteria, and 0.06 would be in the 300-500 ug/L chlorophyll a range. Please keep in mind that bloom potential is subject to change due to rapidly changing environmental conditions or satellite inconsistencies (i.e., wind, rain, temperature or stage).



## SUMMARY

There were 65 reported harmful algal bloom (HAB) response or HAB routine site visits in the past seven days with 65 samples collected. Algal bloom conditions were observed by samplers at 42 of the sites.

On 8/7-8/9, Florida Department of Environmental Protection (DEP) staff collected 20 HAB response samples. Dominant algal taxa and cyanotoxin results follow each waterbody name.

- **Park Lake - W Shore:** *Microcystis aeruginosa*; no cyanotoxins detected.
- **Lake George:** No dominant algal taxon; no cyanotoxins detected.
- **Caywood Pond - SW Dock:** No dominant algal taxon; trace level (0.11 ppb [parts per billion]) cylindrospermopsin detected.
- **Little Half Moon Lake:** No dominant algal taxon; no cyanotoxins detected.
- **Georges Lake - Boat Ramp:** *Microcystis aeruginosa*; 0.58 ppb microcystins detected.
- **Pioneer Lake - N Shore:** *Microcystis aeruginosa*; 0.4 ppb microcystins detected.
- **Caloosahatchee River - N of Loftons Island:** No dominant algal taxon; no cyanotoxins detected.
- **Caloosahatchee River - Overiver Dr:** *Microcystis aeruginosa*; 1.0 ppb microcystins detected.
- **Caloosahatchee River - End of Canal Cir:** *Microcystis aeruginosa*; 1.8 ppb microcystins detected.
- **Caloosahatchee River - Whitecap Cir Dock:** *Microcystis aeruginosa*; 1.0 ppb microcystins detected.
- **Queens Cove Canal:** No dominant algal taxon; no cyanotoxins detected.
- **Atlantic Ocean - at Simon Dezer Beach Access:** No dominant algal taxon; no cyanotoxins detected.
- **Old Lake Davenport - SW Dock:** No dominant algal taxon; no cyanotoxins detected.
- **Lake Thomas - North:** *Oscillatoria articulata*; no cyanotoxins detected.
- **Lake Seminole - Boat Ramp:** *Microcystis aeruginosa* and *Cylindrospermopsis raciborski* co-dominant; trace level (0.33 ppb) cylindrospermopsin detected.
- **Able Canal - Connie Ave N:** No dominant algal taxon; cyanotoxin results pending.
- **Caloosahatchee River - Fort Myers Shores:** No dominant algal taxon; cyanotoxin results pending.
- **Caloosahatchee River - End of Coon Rd:** *Microcystis aeruginosa*; cyanotoxin results pending.
- **Hancock Creek - Moody Ramp:** No dominant algal taxon; cyanotoxin results pending.
- **Caloosahatchee River - McGregor Colonial Park:** No dominant algal taxon; cyanotoxin results pending.

On 8/7-8/9, South Florida Water Management District (SFWMD) staff collected eight HAB response samples.

- **Lake Okeechobee - S308C (lakeside):** *Microcystis aeruginosa*; 8.9 ppb microcystins detected.
- **C44 Canal - S308C (canal side):** *Microcystis aeruginosa*; 1.6 ppb microcystins detected.
- **L-8 Canal - CULV10A (canal side):** *Microcystis aeruginosa*; trace level (0.47 ppb) microcystins detected.
- **Lake Okeechobee - Pahokee Marina Boat Ramp:** *Microcystis aeruginosa*; trace level (0.56 ppb) microcystins detected.
- **Lake Okeechobee - S271 (lakeside):** *Microcystis aeruginosa*; 23 ppb microcystins detected.
- **Lake Okeechobee - S352 (lakeside):** *Microcystis aeruginosa*; 1.3 ppb microcystins detected.
- **Lake Okeechobee - S354 (lakeside):** *Microcystis aeruginosa*; trace level (0.30 ppb) microcystins detected.
- **C44 Canal - Timer Powers Park Boat Ramp:** *Microcystis aeruginosa*; 5.6 ppb microcystins detected.

On 8/8-8/9, SFWMD staff collected 28 routine HAB samples on Lake Okeechobee and at one structure on the **C43 Canal - S77 (upstream)**. Site **C43 Canal - S77 (upstream)** had no dominant algal taxon and no cyanotoxins detected. All the Lake Okeechobee stations were dominated by *Microcystis aeruginosa* except for **KISSR0.0**, which was dominated by *Planktolyngbya limnetica*, and **POLE3S** and **RITTAE2**, which were co-dominated by *Microcystis aeruginosa* and *Planktolyngbya limnetica*. Microcystin concentrations are in parenthesis following each station name.

No microcystins were detected at **KISSR0.0** and **RITTAE2**.

Trace levels of microcystins were detected at **LZ2** (trace 0.86 ppb); **L001** (trace 0.27 ppb); **NCENTER** (trace 0.55 ppb); **L008** (trace 0.39 ppb); **POLESOUT3** (trace 0.49 ppb); **POLESOUT2** (trace 0.48 ppb); **POLESOUT1** (trace 0.44 ppb); **POLESOUT** (trace 0.26 ppb); **KBARSE** (trace 0.28 ppb); **CLV10A** (trace 0.88 ppb); **LZ40** (trace 0.26 ppb); **L006** (trace 0.71 ppb); **PALMOUT1** (trace 0.42 ppb); **PALMOUT** (trace 0.25 ppb); **LZ30** (trace 0.97 ppb); **POLE3S** (trace 0.35 ppb); **LZ25A** (trace 0.35 ppb); and **PELBAY3** (trace 0.41 ppb).

Unqualified microcystin levels were detected at **NES191** (4.0 ppb); **NES135** (5.9 ppb); **EASTSHORE** (14 ppb); **L004** (5.4 ppb); **L005** (2.7 ppb); **PALMOUT3** (1.2 ppb); **PALMOUT2** (1.4 ppb); and **L007** (1.4 ppb).

On 8/8-8/10, St. Johns River Water Management District staff collected one HAB response and seven HAB routine samples.

- **St. Johns River - Shands Bridge (20030157):** No dominant algal taxon; no cyanotoxins detected.
- **Doctors Lake - Center (DTL):** No dominant algal taxon; no cyanotoxins detected.
- **St. Johns River - Mandarin Point (MP72):** No dominant algal taxon; no cyanotoxins detected.
- **Lake George - Center (LEO):** *Planktolyngbya limnetica*; no cyanotoxins detected.
- **Blue Cypress Lake - Center (BCL):** No dominant algal taxon; no cyanotoxins detected.
- **Lateral M Canal - Just North of Blue Cypress Lake:** *Microcystis aeruginosa*; no cyanotoxins detected.
- **Stick Marsh - North (STKM):** No dominant algal taxon; trace level (0.23 ppb) cylindrospermopsin detected.
- **Crescent Lake - Mouth of Dunns Creek (CRESLM):** *Microcystis aeruginosa*; cyanotoxin results pending.

### Pending Results from Last Week

On 8/3, DEP staff collected HAB response samples from **Peace River - Crews Park Boat Ramp**, **Peace River - Brownville Park**, and **Peace River - Veterans Park Ramp**. There was no dominant algal taxon and no cyanotoxins detected in the three samples.

On 8/3, SFWMD staff collected four HAB response samples.

- **C44 Canal - Timer Powers Park Boat Ramp:** *Microcystis aeruginosa*; 800 ppb microcystins detected.
- **Lake Okeechobee - S271 (lakeside):** *Microcystis aeruginosa*; 12 ppb microcystins detected.
- **Lake Okeechobee - S352 (lakeside):** *Microcystis aeruginosa* and *Microcystis wesenbergii*; trace level (0.60 ppb) microcystins detected.
- **Lake Okeechobee - S354 (lakeside):** *Microcystis aeruginosa*; trace level (0.71 ppb) microcystins detected.

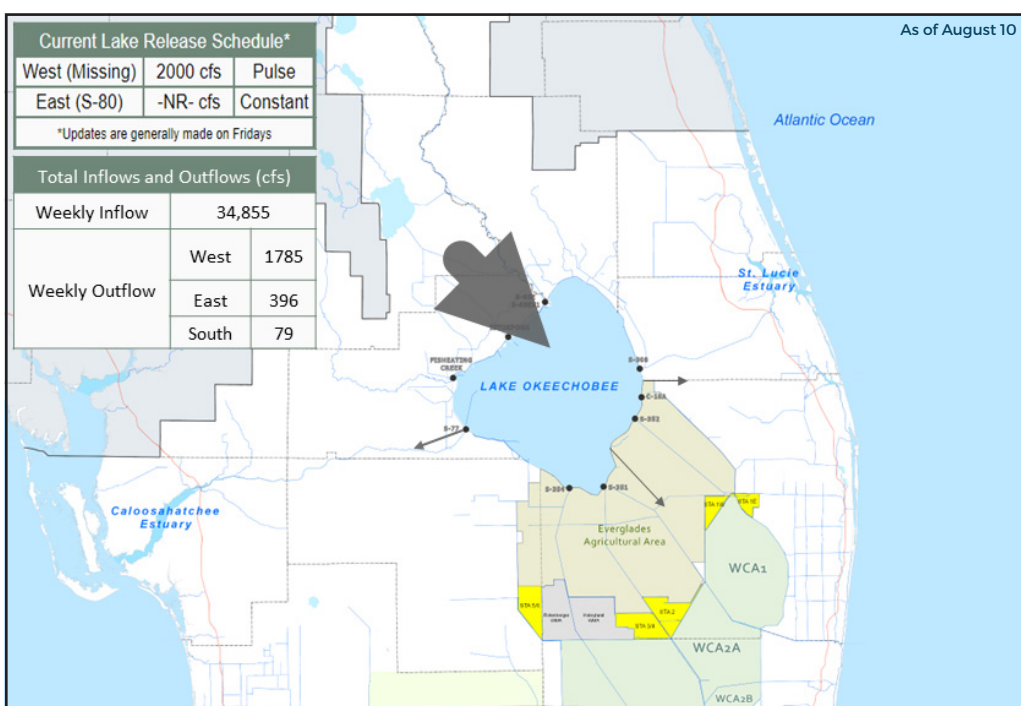
Regarding 8/3 sample results for the **C-44 Canal - Timer Powers Park Boat Ramp**, an innovative technology has been deployed at this location to target blue-green algal cells and the toxins they produce. Post-treatment sampling was conducted between 8/7 and 8/9, and microcystins results were measured at 5.6 ppb. Weekly water quality monitoring is ongoing while toxins are detected. All sampling locations and results are posted to DEP's Algal Bloom Monitoring and Response dashboard. Residents and visitors are advised to avoid coming into contact with algae and to stay out of the water where a visible bloom is present.

On 8/3, Highlands County staff collected one HAB response sample from **Lake Istokpoga**. The dominant algal taxon was *Microcystis wesenbergii* and a trace level (0.77 ppb) of microcystins was detected.

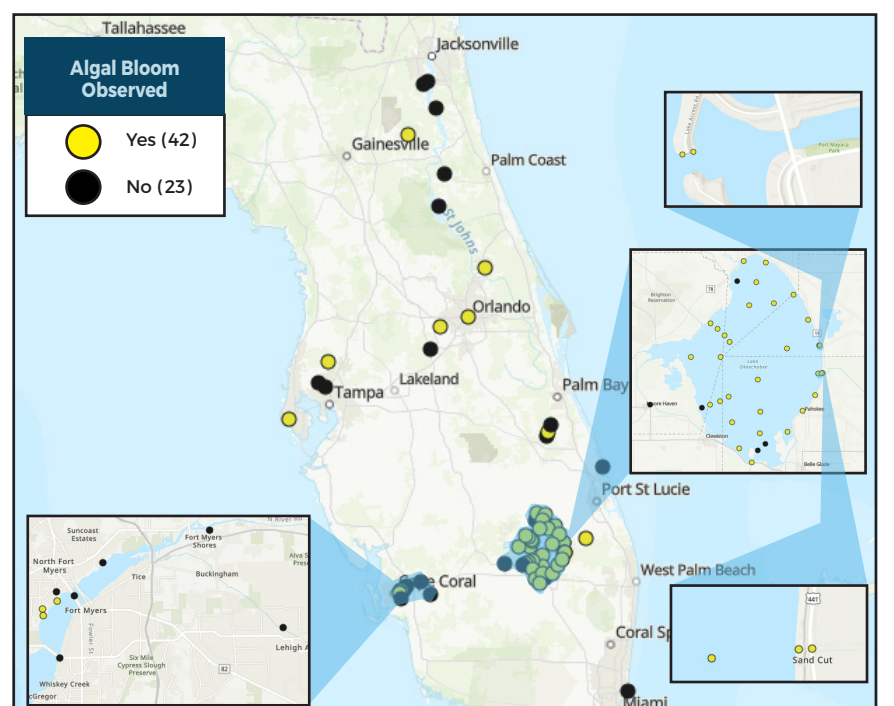
Results for completed analyses are available at [FloridaDEP.gov/AlgalBloom](https://FloridaDEP.gov/AlgalBloom).

This is a high-level summary of the sampling events for the reported week. For all field visit and analytical result details, please refer to the complete algal bloom map with data table by clicking the "Field and Lab Details" Quick Link from the Algal Bloom Dashboard. Different types of blue-green algal bloom species can look different and have different impacts. However, regardless of species, many types of blue-green algae can produce toxins that can make you or your pets sick if swallowed or possibly cause skin and/or eye irritation due to contact. We advise staying out of water where algae is visibly present as specks or mats or where water is discolored pea-green, blue-green or brownish-red. Additionally, pets or livestock should not come into contact with algal bloom-impacted water or with algal bloom material or fish on the shoreline.

## LAKE OKEECHOBEE OUTFLOWS



## SITE VISITS FOR BLUE-GREEN ALGAE



### SIGN-UP FOR UPDATES

To receive personalized email notifications about blue-green algae and red tide, visit

**PROTECTING TOGETHER**  
ProtectingFloridaTogether.gov.

### REPORT PUBLIC HEALTH ISSUES

#### HUMAN ILLNESS

Florida Poison Control Centers can be reached 24/7 at 800-222-1222 (DOH provides grant funding to the Florida Poison Control Centers)

#### OTHER PUBLIC HEALTH CONCERNS

**CONTACT DOH**  
(DOH county office)  
[FloridaHealth.gov/all-county-locations.html](https://FloridaHealth.gov/all-county-locations.html)

### REPORT ALGAL BLOOMS

#### SALTWATER BLOOM

- Observe stranded wildlife or a fish kill.
- Information about red tide and other saltwater algal blooms.

#### CONTACT FWC

800-636-0511 (fish kills)  
888-404-3922 (wildlife Alert)  
[MyFWC.com/RedTide](https://MyFWC.com/RedTide)

#### FRESHWATER BLOOM

- Observe an algal bloom in a lake or freshwater river.
- Information about blue-green algal blooms.

#### CONTACT DEP

855-305-3903 (to report freshwater blooms)  
[FloridaDEP.gov/AlgalBloom](https://FloridaDEP.gov/AlgalBloom)