Disclaimer: Information contained in the report addresses environmental conditions only and is not the official South Florida Water Management District operations recommendation or decision.

M E M O R A N D U M

TO: John Mitnik, Assistant Executive Director, Executive Office Staff

FROM: SFWMD Staff Environmental Advisory Team

DATE: September 24, 2025

SUBJECT: Weekly Environmental Conditions for Systems Operations

Summary

Weather Conditions and Forecast

A frontal boundary on Wednesday will support scattered to numerous heavy showers and thunderstorms. By Thursday, an upper-level trough will cause an upper-air disturbance over the Gulf of Mexico to drift eastward across Florida. This will push the frontal boundary south of Lake Okeechobee while the steering currents veer southwesterly. This pattern will favor more rainfall south of the Lake, focusing much of the afternoon shower and thunderstorm activity along the east coast Thursday and Friday. By Saturday, the upper-level trough could drive a cold front into central Florida, potentially supporting a broad coverage of heavy rainfall across the region. Forecast confidence late in the week is much lower than usual, as rainfall amounts and coverage will depend on the precise location of the frontal boundary. In addition, a recurving tropical cyclone offshore the U.S. East Coast will likely influence the frontal zone and may further affect the rainfall coverage. For the 7-day period ending next Tuesday morning, near- to above-average total SFWMD rainfall is likely.

Kissimmee

In the past week, releases were made from East Lake Toho and Lake Toho to keep lake stage at the regulation schedule line. Releases from Kissimmee-Cypress-Hatchineha followed the Headwaters Revitalization Schedule (HRS) Increment 1 Temporary Deviation Discharge Plan. Weekly average discharge on September 21, 2025, was 2,400 cfs at S-65 and 2,900 cfs at S-65A, respectively. Mean weekly water depth on the Kissimmee River floodplain decreased by 0.37 feet to 2.75 feet. The weekly average concentration of dissolved oxygen in the Kissimmee River increased from 0.3 mg/L the previous week to 0.4 mg/L and remained in the lethal zone for Florida bass and other species (**Figure KB-6**).

Lake Okeechobee

Lake Okeechobee stage was 11.86 feet NAVD88 (13.17 ft NGVD29) on September 21, 2025, which was 0.17 feet higher than the previous week and 0.94 feet higher than a month ago. Average daily inflows (excluding rainfall) decreased from 7,320 cfs the

previous week to 5,730 cfs. Average daily outflows (excluding evapotranspiration) totaled 30 cfs. The most recent non-obscured satellite image from September 21, 2025, NOAA's Harmful Algal Bloom Monitoring System suggests moderate cyanobacteria potential along much of the western side of the lake. The September 15-17 sampling showed 26 of 32 phytoplankton samples had detectable levels of cyanotoxins, although none of the samples exceeded USEPA recreational standards.

Estuaries

Total inflow to the St. Lucie Estuary averaged 1,049 cfs over the past week with no flow coming from Lake Okeechobee. Mean salinities decreased at all sites. Salinity in the middle estuary was in the optimal range (10-25) for adult eastern oysters.

Total inflow to the Caloosahatchee Estuary averaged 7,355 cfs over the past week with no flow coming from Lake Okeechobee. Over the past week, salinities remained below 1 at S-79, Val I-75, and Ft. Myers. Mean surface salinities decreased at the remaining sites in the estuary. Mean salinities were in the optimal range (0-10) for tape grass in the upper estuary. Salinities were in the optimal range (10-25) for adult oysters at Shell Point, were in the damaging range (0-5) at Cape Coral, and were in the upper stressful range at Sanibel.

Stormwater Treatment Areas

For the week ending Sunday, September 21st, 2025, no Lake Okeechobee water was delivered to the FEBs/STAs. The total amount of Lake releases sent to the FEBs/STAs in WY2026 is approximately 32,000 ac-feet. The total amount of inflows to the STAs in WY2026 is approximately 375,300 ac-ft. Online STA treatment cells are at or above target stage. STA-1E Central Flow-way is offline for construction activities. Operational restrictions are in effect in STA-1E Western Flow-way, STA-2 Flow-ways 2 and 4, and STA-3/4 Eastern Flow-way for vegetation management activities. Additional restrictions are in place in STA-2 Flow-way 3 for post-drawdown vegetation grow-in. This week, if LOSOM recommends Lake releases to the WCAs and conditions allow, releases will be sent to STA-2.

Everglades

Near average rainfall was experienced in every basin with average local maxima over 5 inches experienced across the basins. Ascension rates at all gauge locations were generally considered good for the week. However, recessions were experienced in northeastern WCA-3A and southcentral WCA-2A. Depths continue to remain well below average (in the 10th percentile) for this time of year in WCA-3A South, and dry conditions persist in northeastern WCA-3A as well. Taylor Slough stages decreased last week but remained above the recent average for this time of year. Florida Bay salinities decreased on average last week, with the central and western regions now near the 50th percentile for this time of year. All Florida Bay regions remain below the hypersalinity threshold.

Supporting Information

Kissimmee Basin

Upper Kissimmee

On September 21, 2025, mean daily lake stages were 56.0 feet NAVD88 (0.2 feet above schedule) in East Lake Toho, 52.8 feet NAVD88 (0.2 feet above schedule) in Lake Toho, and 50.6 feet NAVD88 (0.1 feet below the Increment 1 Temporary Deviation schedule) in Lakes Kissimmee-Cypress-Hatchineha (KCH) (**Table KB-1**, **Figures KB-1-3**).

Lower Kissimmee

For the week ending September 21, 2025, mean weekly discharge was 2,400 cfs at S-65 and 2,900 cfs at S-65A, respectively. Mean weekly discharge from the Kissimmee River was 4,100 cfs and 3,900 cfs at S-65D and S-65E, respectively (**Table KB-2**). Mean weekly headwater stages were 45.0 feet NAVD88 at S-65A and 26.9 feet NAVD88 at S-65D. Mean weekly river channel stage decreased 0.5 feet from the previous week's value to 37.4 feet NAVD88 (**Figure KB-4**). Mean weekly water depth on the Kissimmee River floodplain decreased by 0.37 feet to 2.75 feet (**Table KB-2**, **Figure KB-5**). The weekly average concentration of dissolved oxygen in the Kissimmee River increased from 0.3 mg/L the previous week to 0.4 mg/L (**Table KB-2**, **Figure KB-6**). A fish kill in the Kissimmee River was reported previously during this low DO event.

Water Management Recommendations

In KCH, follow the Headwaters Revitalization Schedule (HRS) Increment 1 Temporary Deviation Discharge Plan for S-65/S-65A (**Figure KB-7**). With KCH stage in Zone B1, use the Increment 1 Interpolation Tool to determine discharge relative to stage in KCH. When stage decreases into Zone B2, target flows of 1,400 cfs at S-65A.

Table KB-1. Average discharge for the preceding seven days, Sunday's average daily stage and Sunday's average daily departure from Kissimmee Chain of Lakes (KCOL) flood regulation lines or temporary schedules. All data are provisional.

Water Body	Structure	Stage Monitoring Site	Weekly (7-Day) Average Discharge (cfs)	Sunday Lake Stage (feet NAVD88)[a]	Schedule Type[b]	Sunday Schedule Stage (feet NAVD88)	Sunday Departure from Regulation (feet)	
							9/21/25	*9/14/25*
Lakes Hart and Mary Jane	S-62	LKMJ	270	59.0	R	58.9	0.1	0.4
Lakes Myrtle, Preston and Joel	S-57	S-57	110	60.0	R	60.0	0.0	0.3
Alligator Chain	S-60	ALLI	210	62.2	R	62.2	0.0	0.1
Lake Gentry	S-63	LKGT	260	59.9	R	59.9	0.0	0.2
East Lake Toho	S-59	TOHOE	1000	56.0	R	55.8	0.2	0.7
Lake Toho	S-61	TOHOW	1500	52.8	R	52.6	0.2	0.2
Lakes Kissimmee, Cypress and Hatchineha	S-65	KUB011 LKIS5B	2400	50.6	T	50.7	-0.1	0.0

a. Names of in-lake monitoring sites and structures used to determine lake stage. If more than one site is listed, an average is reported.

b. A: projected recession line; R: USACE regulation schedule; S: temporary recession target line; T: temporary schedule; NA: not applicable or not available.

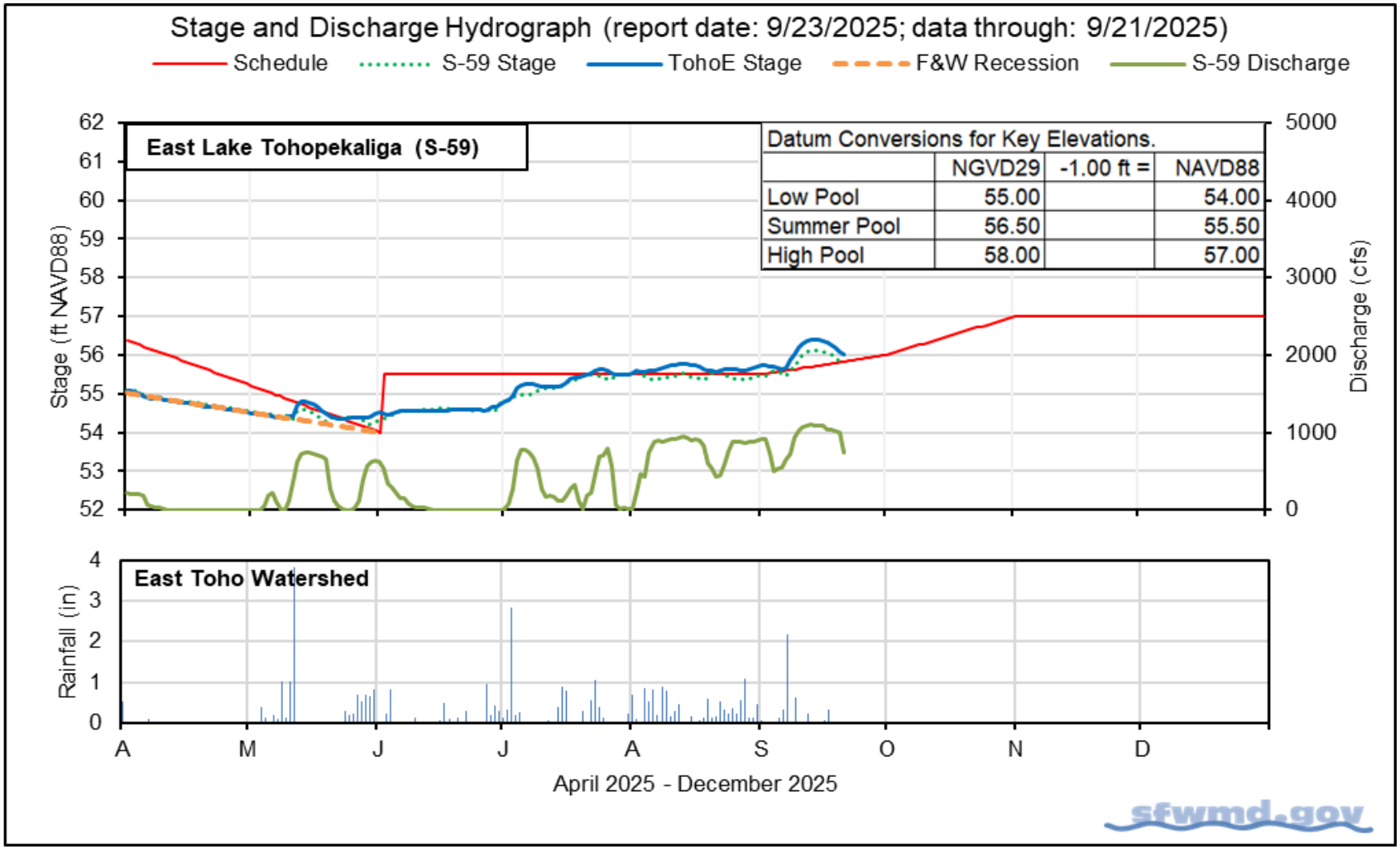


Figure KB-1. East Lake Toho regulation schedule, stage, discharge, and rainfall.

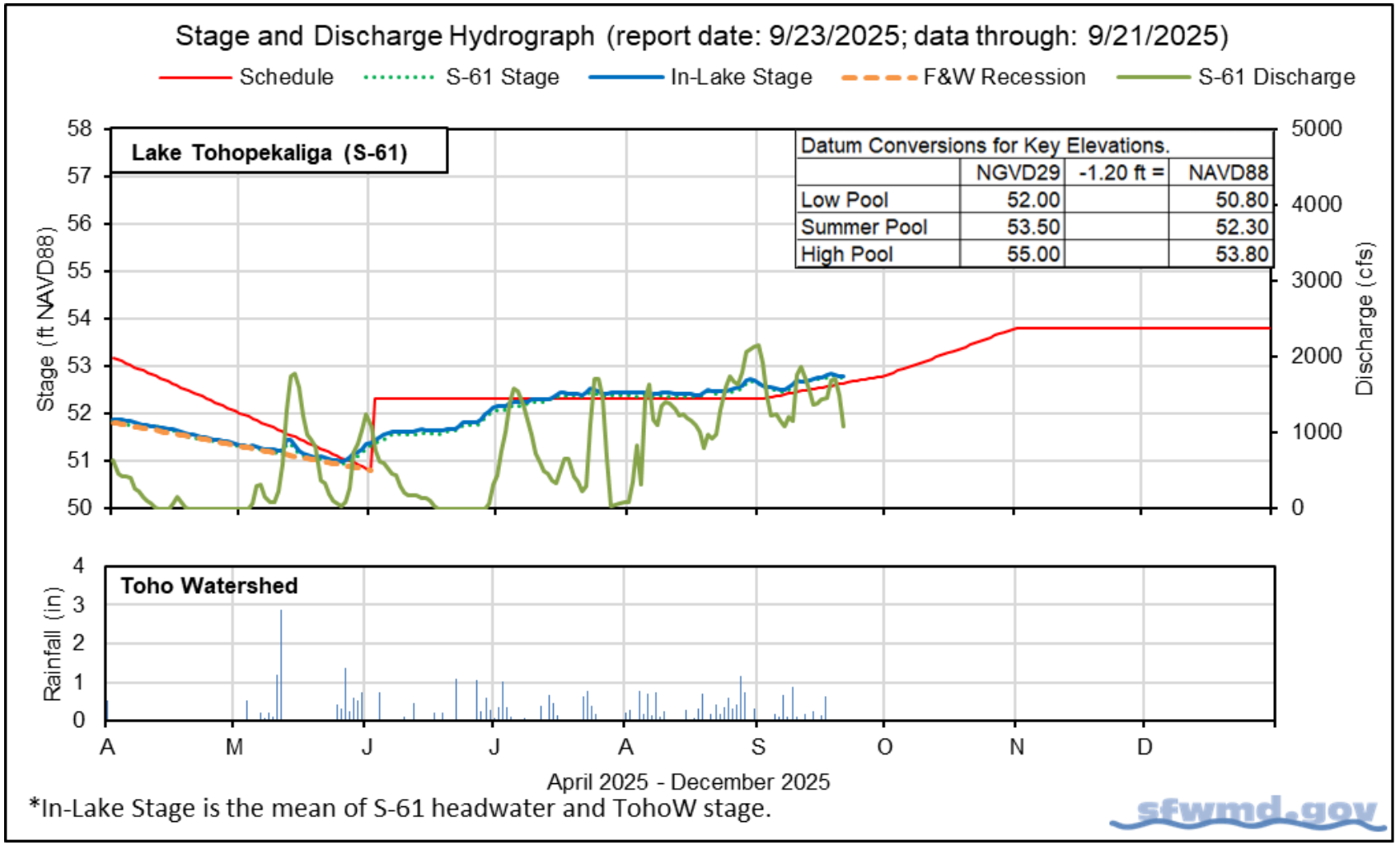


Figure KB-2. Lake Toho regulation schedule, stage, discharge, and rainfall.

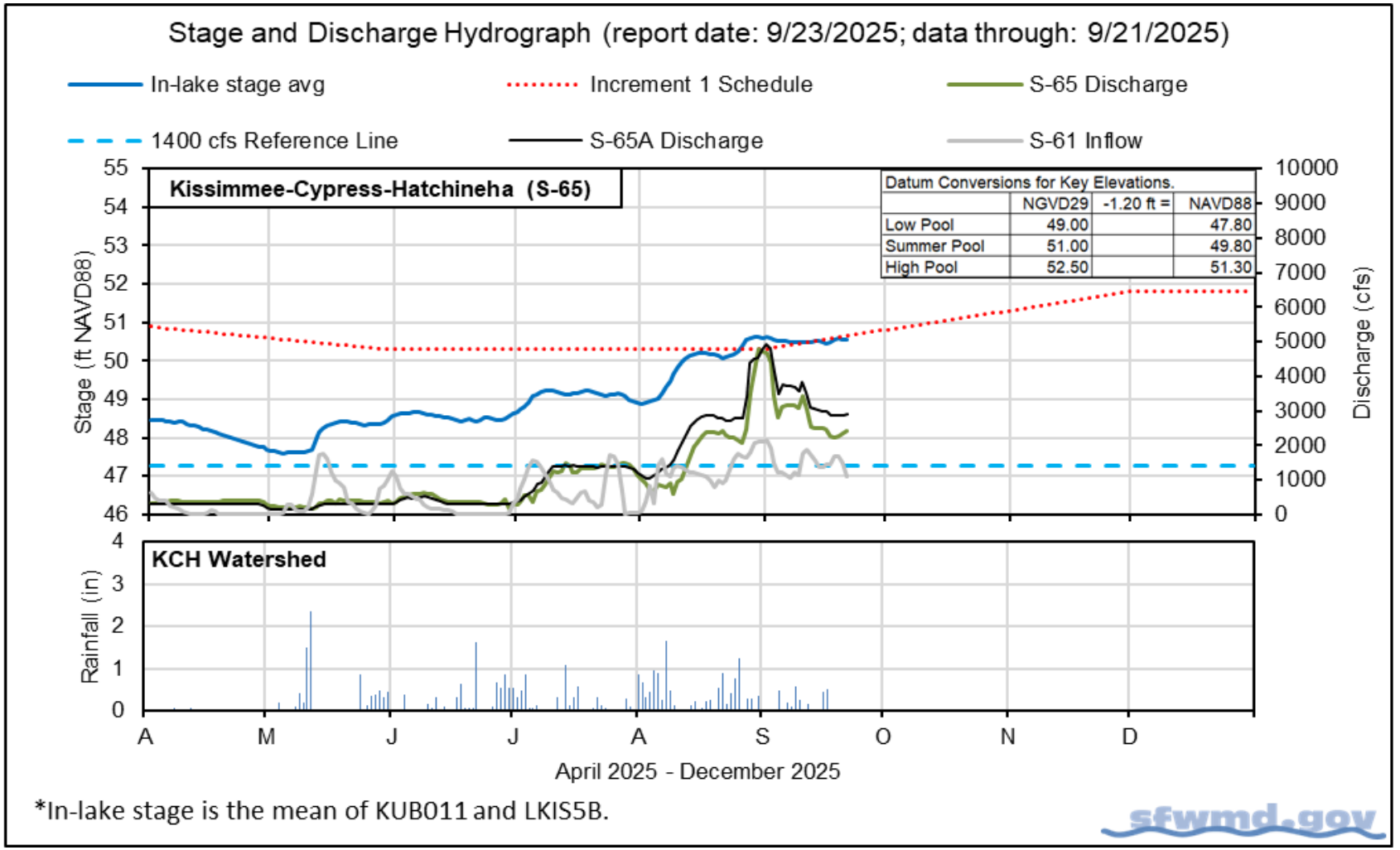


Figure KB-3. Lakes Kissimmee, Cypress and Hatchineha regulation schedule, stage, discharge, and rainfall.

Table KB-2. One- and seven-day average discharge and stage at Lower Kissimmee basin structures, river channel dissolved oxygen concentrations and water depths in the Phase I area floodplain. All data are provisional.

Metric	Location	Sunday Daily Average	Weekly Average for Previous Seven Day Periods			
		9/21/25	9/21/25	9/14/25	9/7/25	8/31/25
Discharge	S-65	2,400	2,400	2,900	3,500	3,400
Discharge	S-65A[a]	2,900	2,900	3,400	4,100	3,900
Headwater Stage (feet NAVD88)	S-65A	44.9	45.0	45.3	45.9	45.7
Discharge	S-65D[b]	3,700	4,100	4,800	3,600	2,800
Headwater Stage (feet NAVD88)	S-65D[c]	26.9	26.9	27.0	27.0	26.1
Discharge (cfs)	S-65E[d]	3,500	3,900	4,600	3,400	2,600
Discharge (cfs)	S-67	0	0	0	0	0
Dissolved Oxygen (mg/L)[e]	Phase I, II/III river channel	0.5	0.4	0.3	0.1	0.2
River channel mean stage (feet NAVD88)[f]	Phase I river channel	37.2	37.4	37.9	38.0	37.1
Mean depth (feet)[g]	Phase I floodplain	1.76	2.75	3.12	3.06	1.42

a. Combined discharge from main and auxiliary structures.

b. Combined discharge from S-65D, S-65DX1, and S-65DX2.

c. Average stage from S-65D and S-65DX1.

d. Combined discharge from S-65E and S-65EX1.

e. Dissolved oxygen is the average of values from sondes KRBN, PC62, PC33, PD62R, and PD42R.

f. Mean of five river channel stations (PC62, KRDR02, KRBN, PC33, PC11) in the Phase I area.

g. One-day spatial average obtained from the South Florida Water Depth Assessment Tool (SFWDAT).

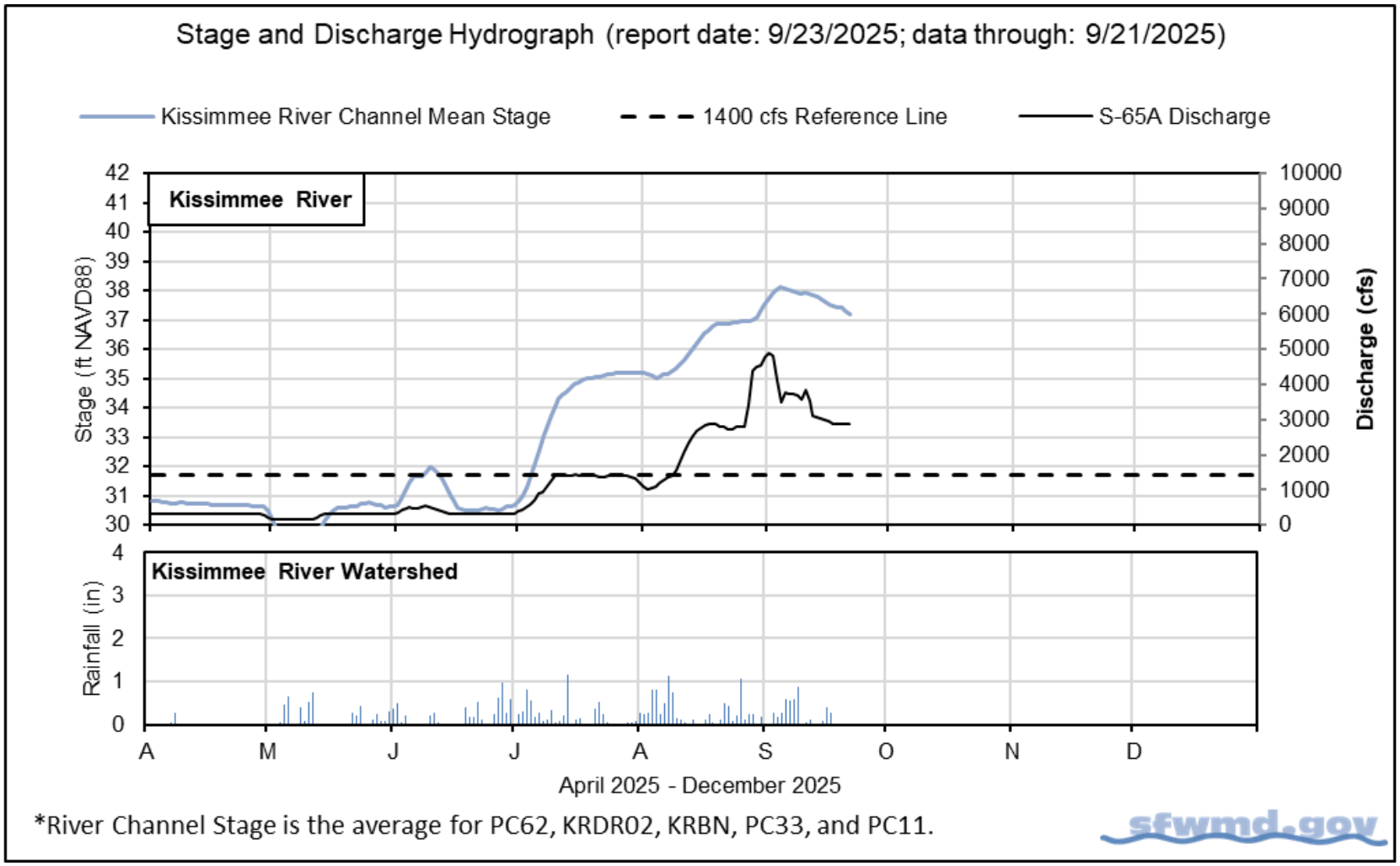


Figure KB-4. Kissimmee River stage, discharge, and rainfall.

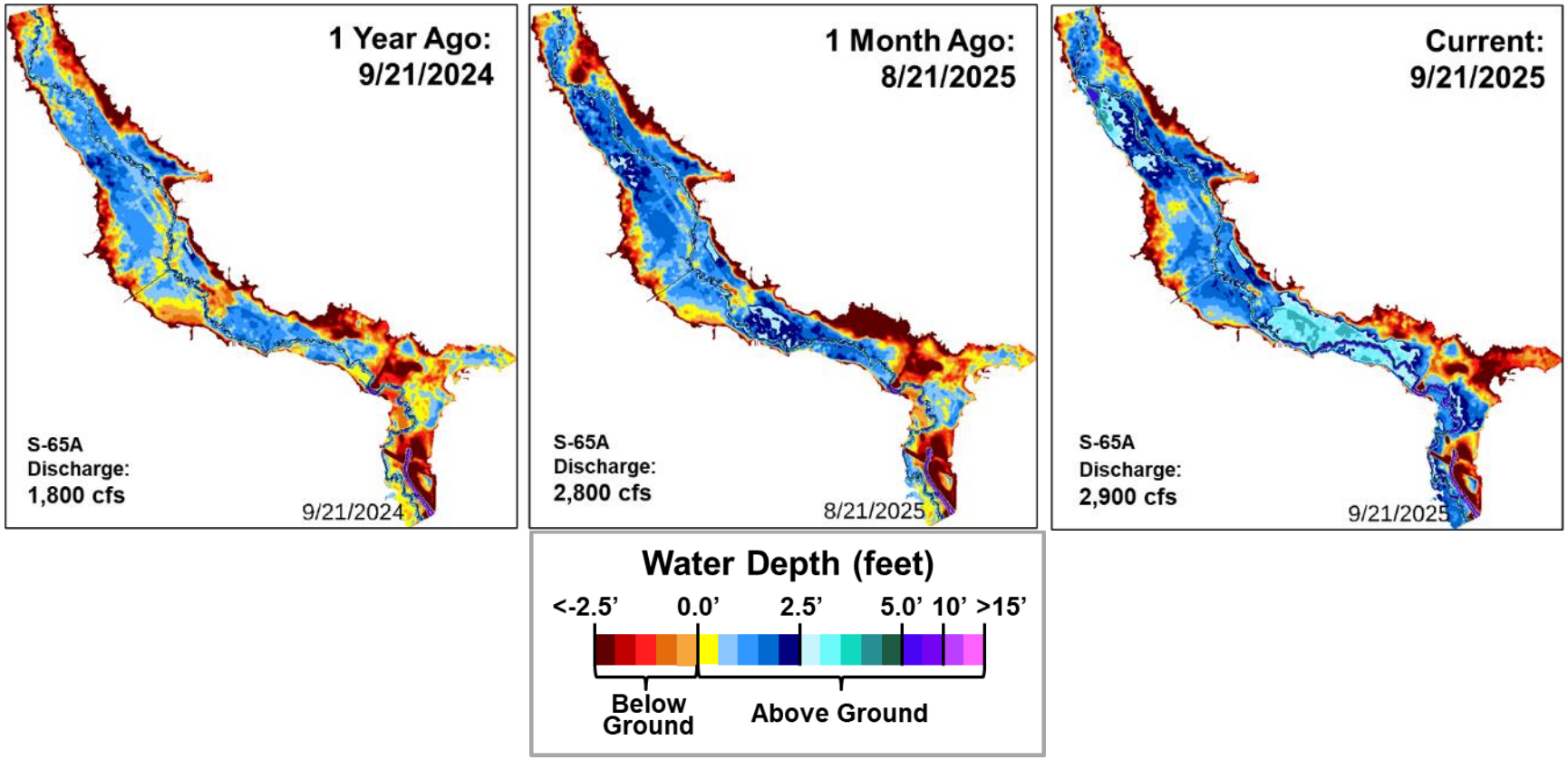


Figure KB-5. Phase I-II-III area Kissimmee River floodplain water depths (from left to right) one year ago, one month ago, and current.

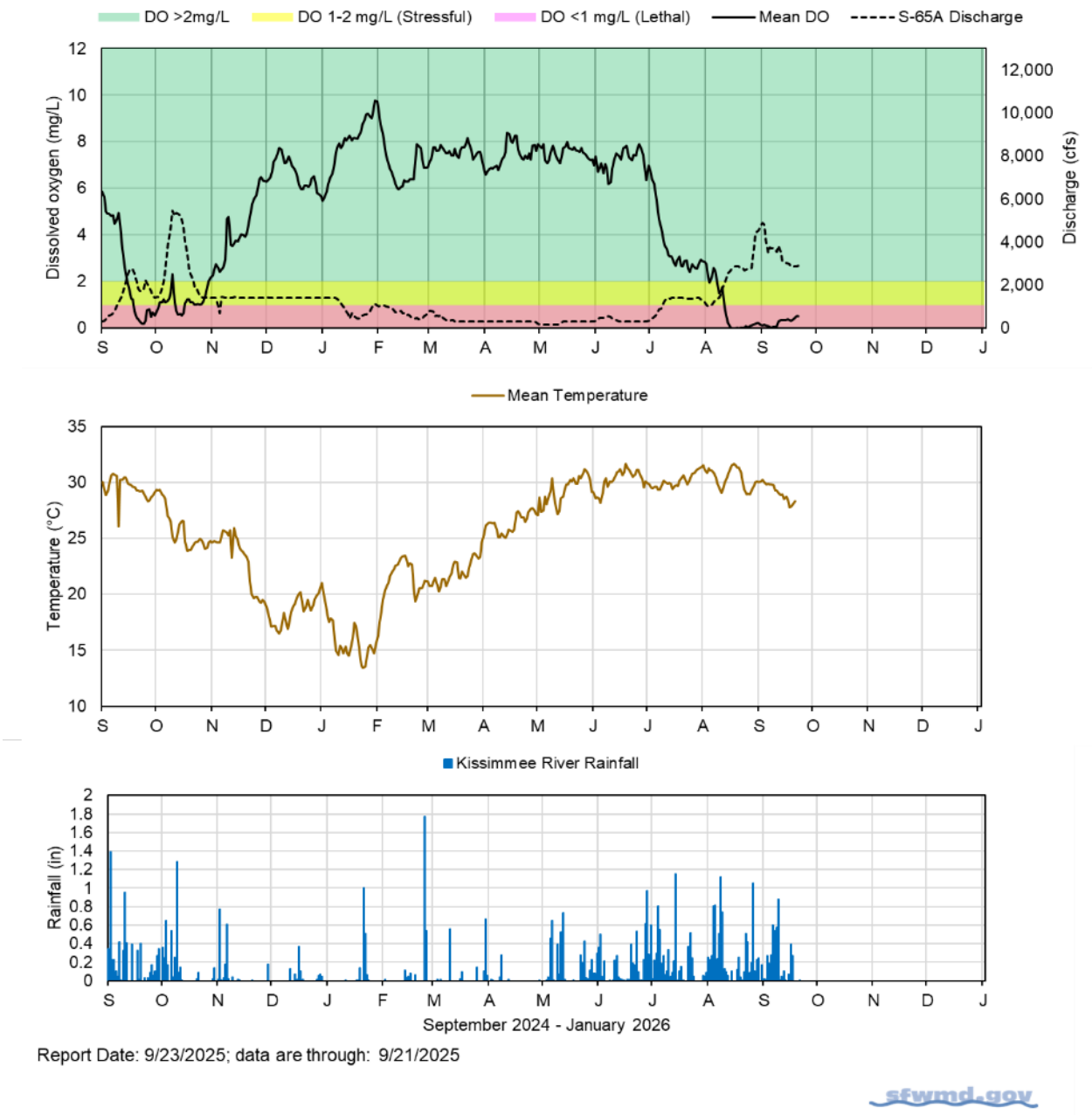


Figure KB-6. Kissimmee River channel mean daily dissolved oxygen concentration (mg/L), S-65A discharge (cfs), temperature (°C) and rainfall (inches). Dissolved oxygen (DO) and temperature are mean daily values averaged for PC62, KRDR02, KRBN, PC33, PC11, PD62R, and PD42R with an average of five stations reporting this week. Rainfall values are daily totals for Kissimmee River (Pool BCD) AHED watershed.

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

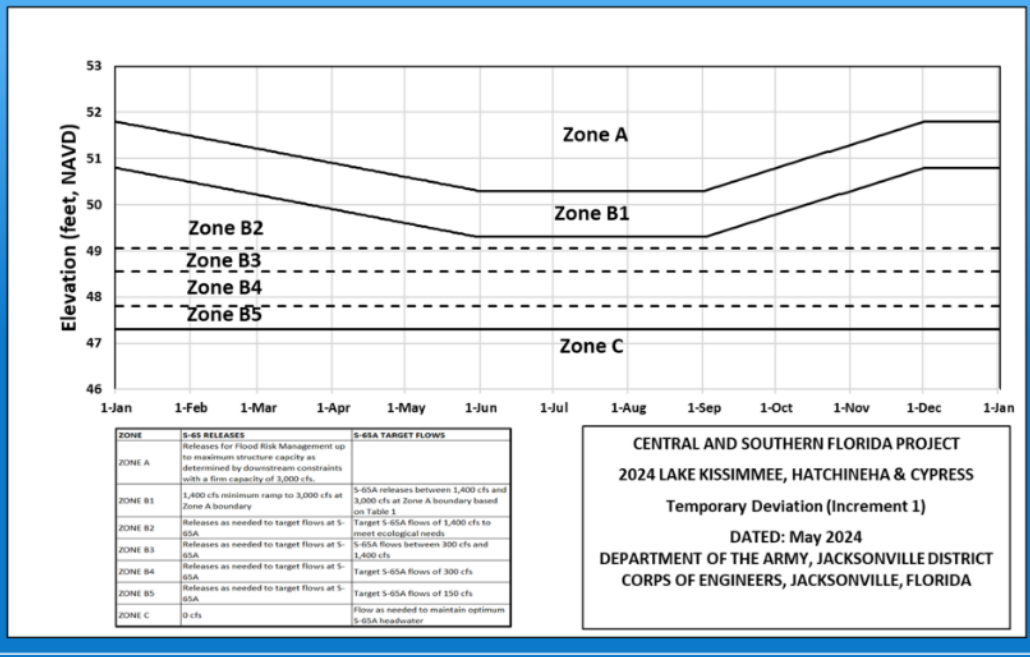
HRS Increment 1 Temporary Deviation Discharge Plan for S-65/S-65A

Discharge Guidance for Increment I Temporary Deviation Discharge Plan		
ZONE	**S-65 RELEASES**	**S-65A TARGET FLOWS**
ZONE A	Releases for Flood Risk Management up to maximum structure capcity as determined by downstream constraints with a firm capacity of 3,000 cfs.	
ZONE B1	1,400 cfs minimum ramp to 3,000 cfs at Zone A boundary	S-65A releases between 1,400 cfs and 3,000 cfs at Zone A boundary based on Table 1
ZONE B2	Releases as needed to target flows at S-65A	Target S-65A flows of 1,400 cfs to meet ecological needs
ZONE B3	Releases as needed to target flows at S-65A	S-65A flows between 300 cfs and 1,400 cfs
ZONE B4	Releases as needed to target flows at S-65A	Target S-65A flows of 300 cfs
ZONE B5	Releases as needed to target flows at S-65A	Target S-65A flows of 150 cfs
ZONE C	0 cfs	Flow as needed to maintain optimum S-65A headwater

Table KB-3. Maximum Rate of Change Limits for S-65A

MAXIMUM Release Rate of Chane Limits for S-65A. **In general recommended rates of change will be slower than shown in this table.**

Q (cfs)	Maximum rate of INCREASE (cfs/day)	Maximum rate of DECREASE (cfs/day)
0-300	50	-50
301-650	75	-75
651-1400	150	-150
1401-3000	300	-600
>3000	1000	-2000



ZONE	S-65 RELEASES	S-65A TARGET FLOWS
ZONE A	Releases for Flood Risk Management up to maximum structure capcity as determined by downstream constraints with a firm capacity of 3,000 cfs.	
ZONE B1	1,400 cfs minimum ramp to 3,000 cfs at Zone A boundary	S-65A releases between 1,400 cfs and 3,000 cfs at Zone A boundary based on Table 1
ZONE B2	Releases as needed to target flows at S-65A	Target S-65A flows of 1,400 cfs to meet ecological needs
ZONE B3	Releases as needed to target flows at S-65A	S-65A flows between 300 cfs and 1,400 cfs
ZONE B4	Releases as needed to target flows at S-65A	Target S-65A flows of 300 cfs
ZONE B5	Releases as needed to target flows at S-65A	Target S-65A flows of 150 cfs
ZONE C	0 cfs	Flow as needed to maintain optimum S-65A headwater

CENTRAL AND SOUTHERN FLORIDA PROJECT

2024 LAKE KISSIMMEE, HATCHINEHA & CYPRESS

Temporary Deviation (Increment 1)

DATED: May 2024

DEPARTMENT OF THE ARMY, JACKSONVILLE DISTRICT
CORPS OF ENGINEERS, JACKSONVILLE, FLORIDA

Other Considerations

- When possible, limit lake ascension rate in the Jun 1 - Aug 15 window to 0.25 ft per 7 days in Lakes Kissimmee, Cypress, Hatchineha (S-65), East Toho (S-59) and Toho (S-61).
- If outlook is for extreme dry conditions meet with KB staff to discuss modifications to this plan.

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Figure KB-7. Headwaters Revitalization Schedule (HRS) Increment 1 Temporary Deviation Discharge Plan for S-65/S-65A.

Lake Okeechobee

Lake Okeechobee stage was 11.86 feet NAVD88 (13.17 ft NGVD29) on September 21, 2025, which was 0.17 feet higher than the previous week and 0.94 feet higher than a month ago (**Figure LO-1**). Lake stage is in Zone D of the regulation schedule (**Figure LO-2**), is within the recovery ecological envelope, and is 0.36 feet above the water shortage management band (**Figure LO-3**). According to NEXRAD, 0.60 inches of rain fell directly over the lake during the previous week, while 0.84 inches were lost to evapotranspiration.

Average daily inflows (excluding rainfall) decreased from 7,320 cfs the previous week to 5,730 cfs. The highest inflows came from the Kissimmee River (3,920 cfs via S-65E(X1)). Average daily outflows (excluding evapotranspiration) totaled 30 cfs. **Figures LO-4 and LO-5** show the combined average daily inflows and outflows for the Lake over the past eight weeks, and average inflows and outflows last week, respectively.

In the most recent non-obscured satellite image from September 21, 2025, NOAA's Harmful Algal Bloom Monitoring System suggests moderate cyanobacteria potential along much of the western side of the lake (**Figure LO-6**).

The routine water quality and phytoplankton monitoring sampling trips are on the bloom season (May-Oct) schedule and occur twice per month. Provisional phytoplankton results from the September 15-17 sampling showed 26 of 32 phytoplankton samples had detectable levels of cyanotoxin. Twenty-three sites had detectable levels of cylindrospermopsin (≥ 0.1 µg/L), 5 had detectable microcystins (≥ 0.2 µg/L), 2 of which had both toxins present. None of the samples exceeded USEPA recreational standards. Site L006 had a high of 3.8 µg/L of microcystins, while all samples with cylindrospermopsin were < 1 µg/L of. (**Figure LO-7**).

Note: All data presented in this report are provisional and are subject to change.

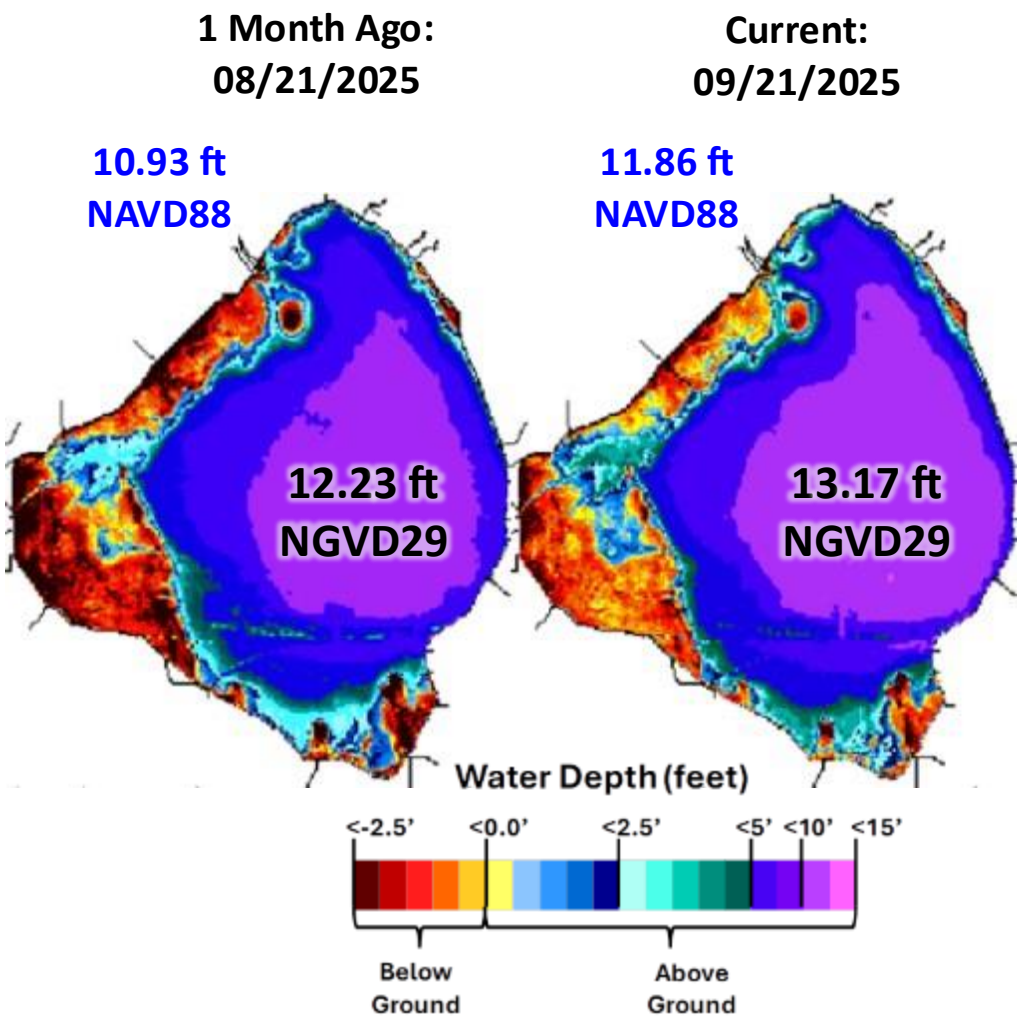

Figure LO-1. Lake Okeechobee water depth estimates based on South Florida Water Depth Assessment Tool (SFWDAT).

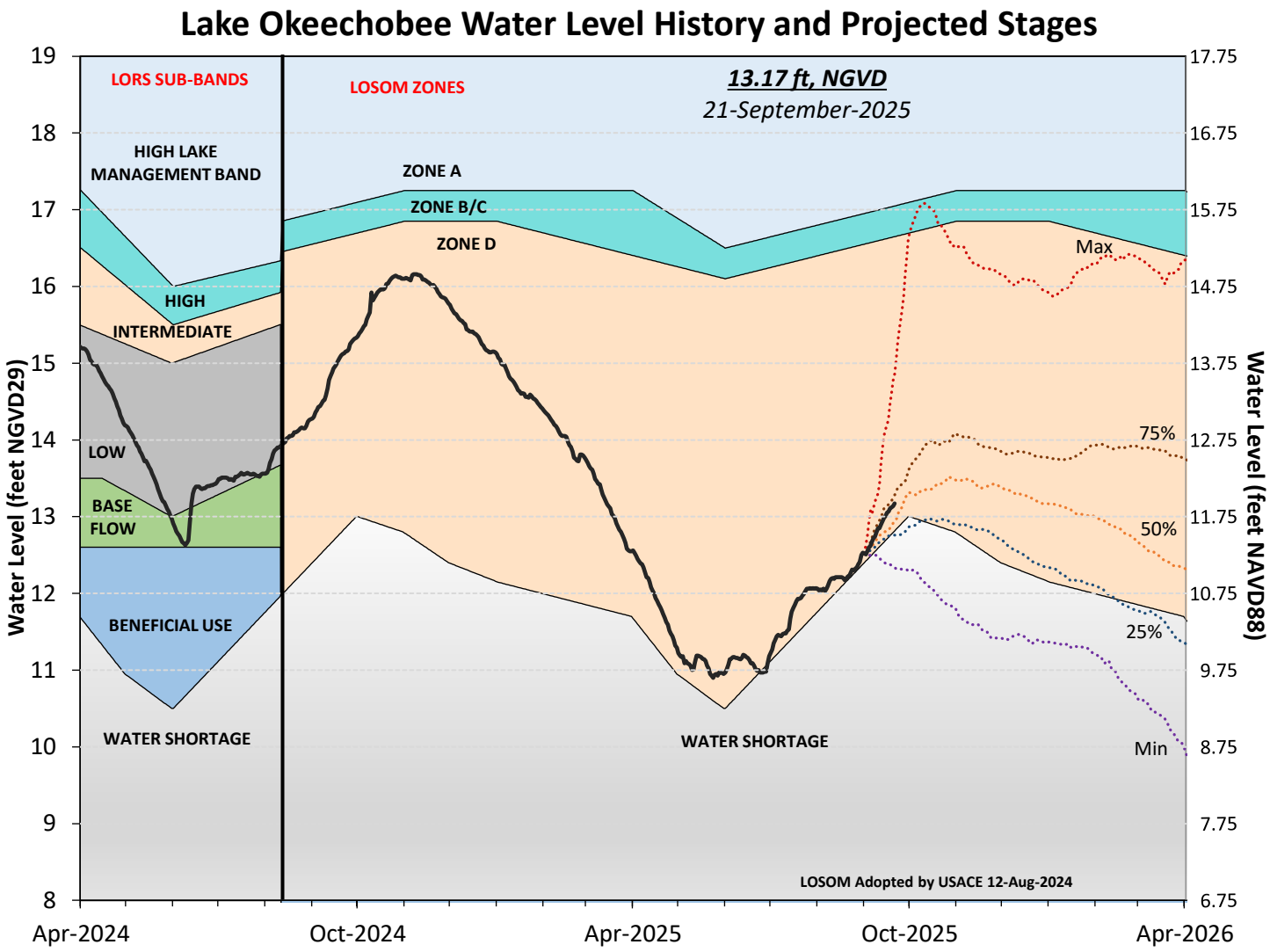

Figure LO-2. Recent Lake Okeechobee stages with projected stages based on a dynamic position analysis. Note: stages are in NGVD29, approximate NAVD88 values are shown for reference.

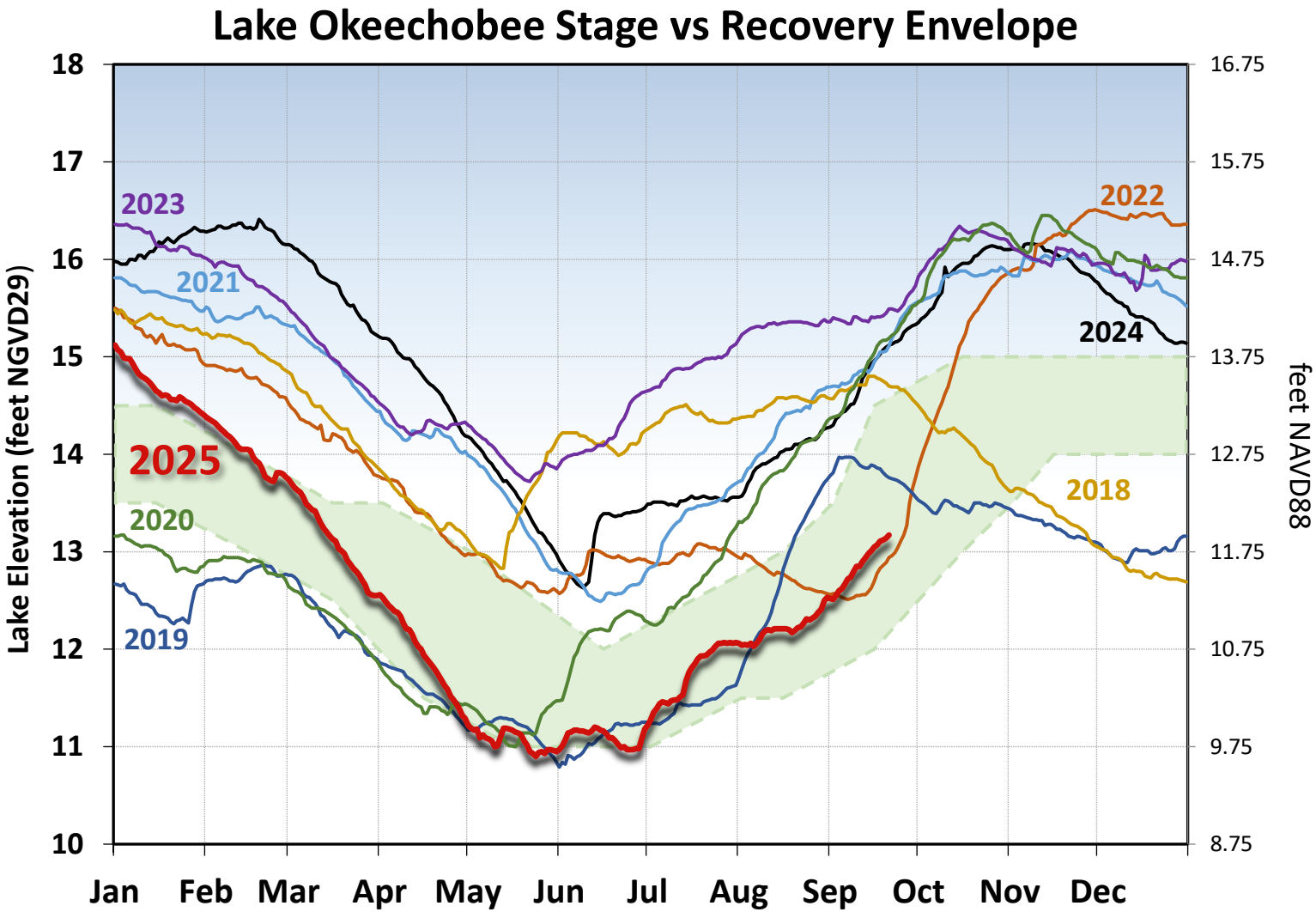

Figure LO-3. The current and seven prior year's annual stage hydrographs for Lake Okeechobee in comparison to the recovery envelope (light green). A shift from the normal to the recovery envelope occurred because the 30-day minimum lake stage (elevations exposed for at least 30 days, nonconsecutively) in the June 1 – July 31, 2023 (and 2024), window was >13 ft NGVD29 (11.75 ft NAVD88).

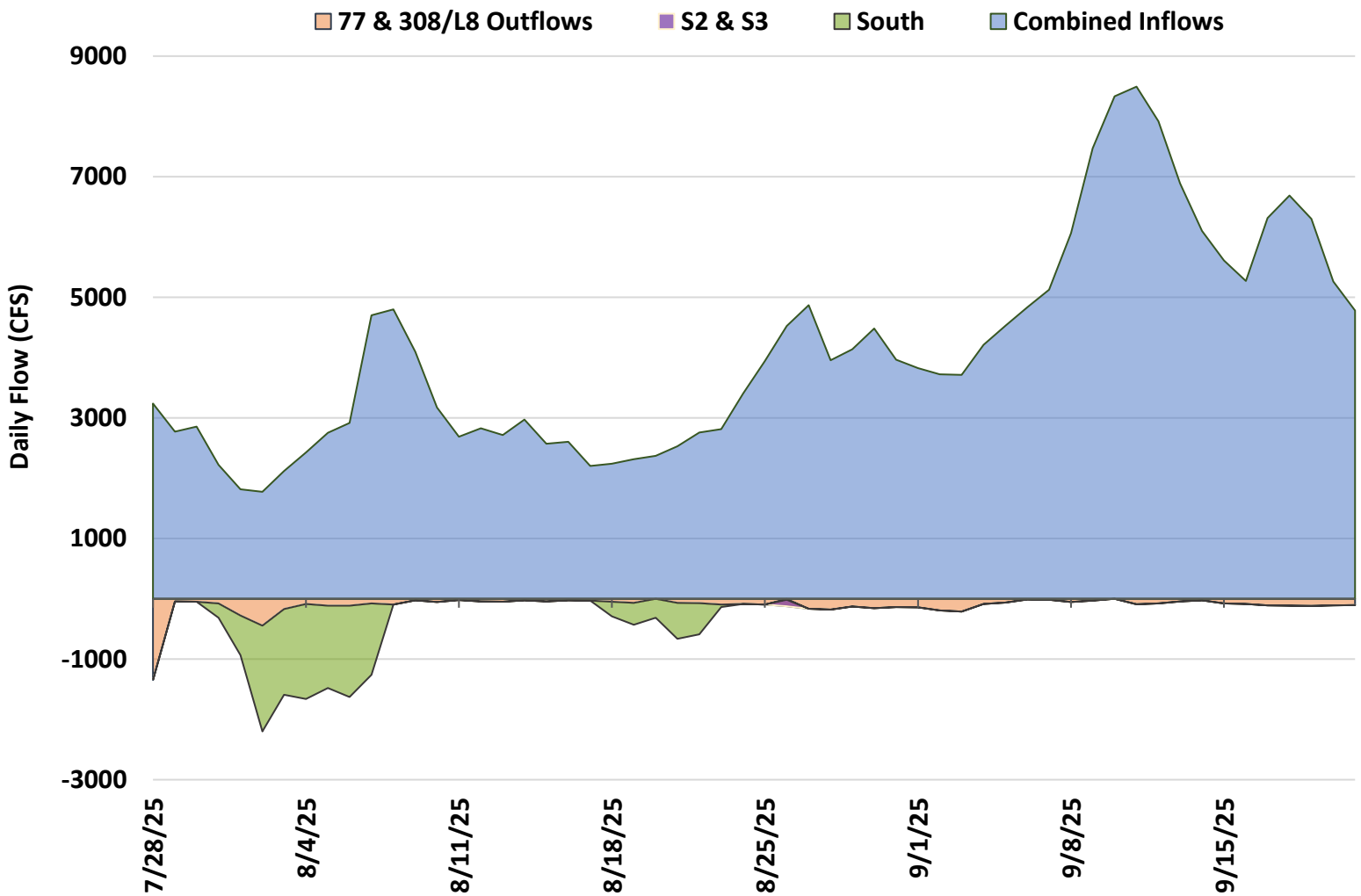

Figure LO-4. Major inflows (orange) to and outflows east and west (blue) from Lake Okeechobee. Outflows south are shown in green. Flows into Lake Okeechobee from the L-8 canal through S-271 (formerly Culvert 10A) or from the C-44 canal through the S-308 are included as inflows. Conversely, flows from Lake Okeechobee into the L-8 or C-44 canals are included with outflows. Inflows are shown as positive values; outflows are negative. Outflows through the S-77 (Caloosahatchee) and S-308 (C-44 Canal) structures are based on downstream gauges to include flows to lock openings for navigation.

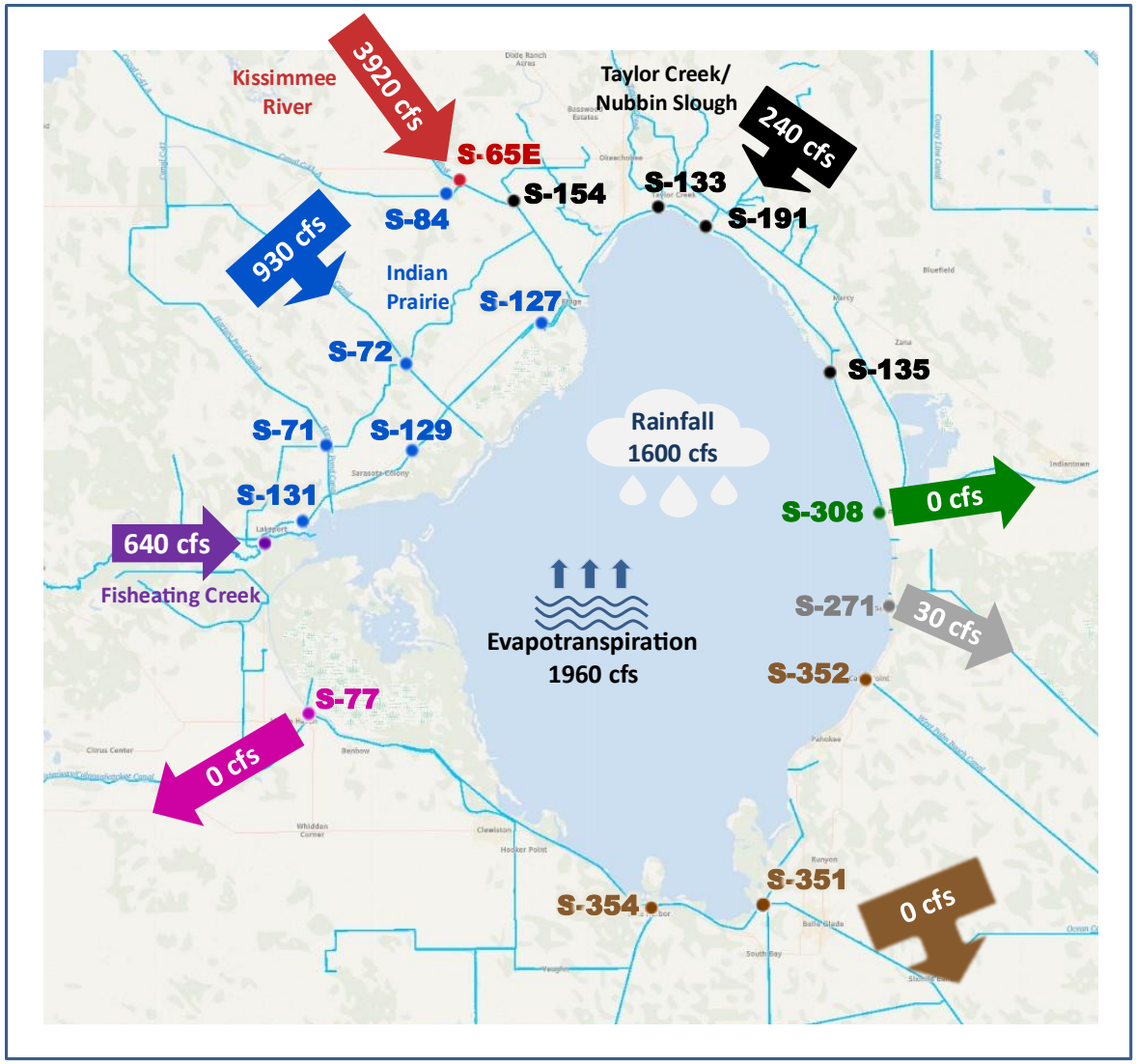

Figure LO-5. Inflows into Lake Okeechobee from Indian Prairie basins, Taylor Creek/Nubbin Slough, Kissimmee River and Fisheating Creek (currently no flow data available for FECR), and outflows to the west via S-77, to the east via S-308, to the south via S-351, S-352, S-354, and to southeast via S-271 (formerly Culvert 10A) for the week of Sep 15 – 21, 2025.

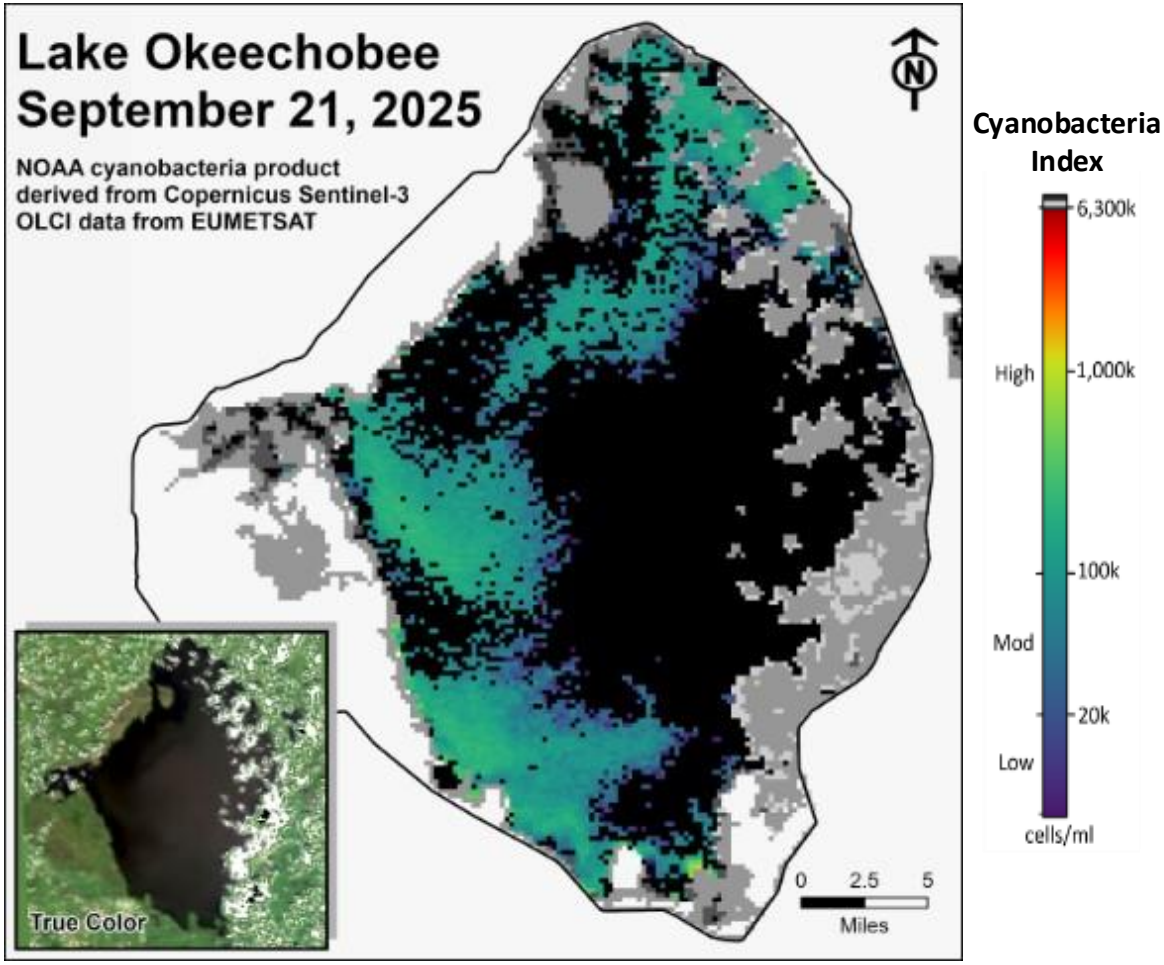

Figure LO-6. Cyanobacteria bloom index level on Lake Okeechobee, based on NOAA's harmful algal bloom monitoring system. Gray color indicates cloud cover. *Provisional NOAA image, subject to change*.

Collection Date: September 15 - 17, 2025

Station	CHL*a* (ug/L)	TOXIN (ug/L)	TAXA
FEBIN		BDL	*mixed*
FEBOUT		BDL	*mixed*
KISSR0.0		BDL	*mixed*
L005		0.2	*Planktol*
LZ2		0.2	*Micro/Plank*
KBARSE		0.1	*Micro/Raphi*
RITTAE2		0.4	*Micro/Plank*
PELBAY3		0.3	*Microcys*
POLE3S		0.6	*Micro/Plank*
LZ25A		0.7	*Microcys*
PALMOUT		0.3	*Dolic/Plank*
PALMOUT1		0.2	*Dolic/Plank*
PALMOUT2		BDL	*Microcys*
PALMOUT3		0.3	*Microcys*
POLESOUT		0.2	*Micro/Plank*
POLESOUT1		0.2	*Micro/Plank*
POLESOUT2		0.3	*Micro/Plank*
POLESOUT3		0.2	*Woron/Plank*
EASTSHORE		0.3	*Micro/Plank*
NES135		0.5	*Micro/Plank*
NES191		0.2	*Micro/Plank*

Station	CHL*a* (ug/L)	TOXIN (ug/L)	TAXA
L001		0.2	*Micro/Plank*
L004		BDL	*mixed*
L006		3.9	*Microcys*
L007		0.1	*mixed*
L008		0.2	*Planktol*
LZ30		0.3	*Dolic/Plank*
LZ40		2.0	*Microcys*
CLV10A		2.7	*Microcys*
NCENTER		0.2	*Micro/Plank*
S308C		0.2	*Microcys*
S77		BDL	*Dinophyceae*

- SFWMD considers >40 µg/L Chlorophyll *a* (Chl*a*) an algal bloom
- BDL – Below Detectable Limit of **0.2** µg/L (Cyl = 0.1 µg/L)
- ND – No Dominant taxa
- P – Pending
- NS – Not Sampled
- Station bold font – crew observed possible BGA
- Chlorophyll *a* analyzed by SFWMD
- Toxin & Taxa analyzed by FDEP:
  Microcys = Microcystis; Raphi = Raphidiopsis; Planktol = Planktolyngbya; Dolicho = Dolichospermum; Pseud = Pseudanabaena; Woron = Woronichinia

Toxins include cylindrospermopsin and/ormicrocsytins

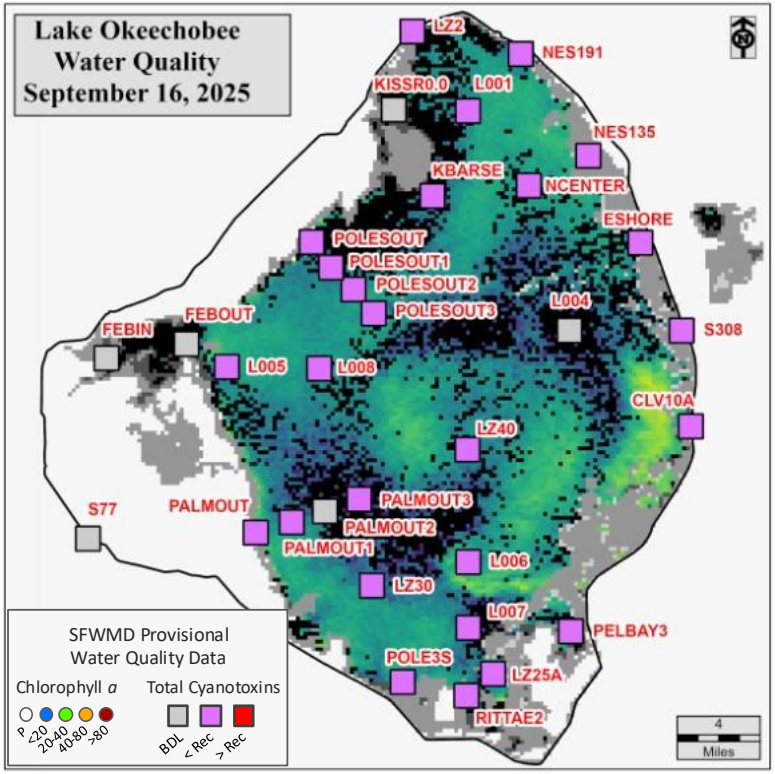

Figure LO-7. Dominant taxa, cyanotoxins (µg/L) and chlorophyll *a* (µg/L) concentration data from September 15 - 17, 2025. Sampling locations, chlorophyll *a*, and total toxin concentrations are overlaid on the September 16, 2025, image from NOAA's harmful algal bloom monitoring system. Gray color indicates cloud cover.

Estuaries

St. Lucie Estuary

Over the past week, mean total inflow to the St. Lucie Estuary was 1,049 cfs (**Figures ES-1** and **ES-2**), and the previous 30-day mean inflow was 1,157 cfs. For comparison, the historical provisional mean inflows from contributing areas are shown in **Figure ES-2**.

Over the past week, salinities decreased at all sites (**Table ES-1** and **Figure ES-3**). The seven-day moving average of the surface and bottom salinities at the US1 Bridge was 14.8. Salinity conditions in the middle estuary were estimated to be within the optimal range for adult eastern oysters (**Figure ES-4**). The mean larval oyster recruitment rate reported by the Fish and Wildlife Research Institute (FWRI) for August was 0.3 spat/shell at Rio, showing a decrease from the previous month. This decline reflects a pattern typically observed in the summer months, when recruitment rates decrease following a late-spring to early-summer peak (**Figure ES-5**).

Caloosahatchee River Estuary

Over the past week, mean total inflow to the Caloosahatchee River Estuary was 7,355 cfs (**Figures ES-6** and **ES-7**), and the previous 30-day mean inflow was 5,530 cfs. For comparison, the historical provisional mean inflows from the contributing areas are shown in **Figure ES-7**.

Over the past week, surface salinities remained below 1 at S-79 and Val I-75 and decreased at the remaining sites in the estuary (**Table ES-2** and **Figures ES-8** and **ES-9**). The seven-day mean salinities (**Table ES-2**) were in the optimal range (0-10) for tape grass in the upper estuary. The seven-day mean salinity values were within the optimal range for adult eastern oysters at Shell Point, were in the damaging range at Cape Coral, and were in the upper stressful range at Sanibel (**Figure ES-10**). The mean larval oyster recruitment rates reported by the FWRI in August were 39.1 spat/shell at Iona Cove and 27.7 spat/shell at Bird Island, which is an increase from the previous month (**Figures ES-11 and ES-12**).

Surface salinity at Val I-75 was forecast for the next two weeks using an autoregression model (Qiu and Wan, 2013[1]) coupled with a linear reservoir model for the tidal basin. Model scenarios included pulse releases at S-79 ranging from 450 to 2,000 cfs, with estimated tidal basin inflows of 887 cfs. Model results from all scenarios predict daily salinity to be 0.3 and the 30-day moving average surface salinity to be 0.2 at Val I-75 at the end of the two-week period (**Table ES-3** and **Figure ES-13**). This keeps predicted salinities in the upper estuary within the optimal salinity range (0-10) for tape grass.

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[1] Qui, C., and Y. Wan. 2013. Time series modeling and prediction of salinity in the Caloosahatchee River Estuary. *Water Resources Research* 49:5804-5816.

Red Tide

The FWRI reported on September 19, 2025, that *Karenia brevis*, the Florida red tide dinoflagellate, was not observed in any samples collected within the District region.

Water Management Recommendations

Lake stage is in Zone D. Current hydrological conditions are wet and climatological conditions are normal. The LOSOM release guidance suggests up to 2,000 cfs release at S-79 to the Caloosahatchee River Estuary and no releases at S-80 to the St. Lucie Estuary.

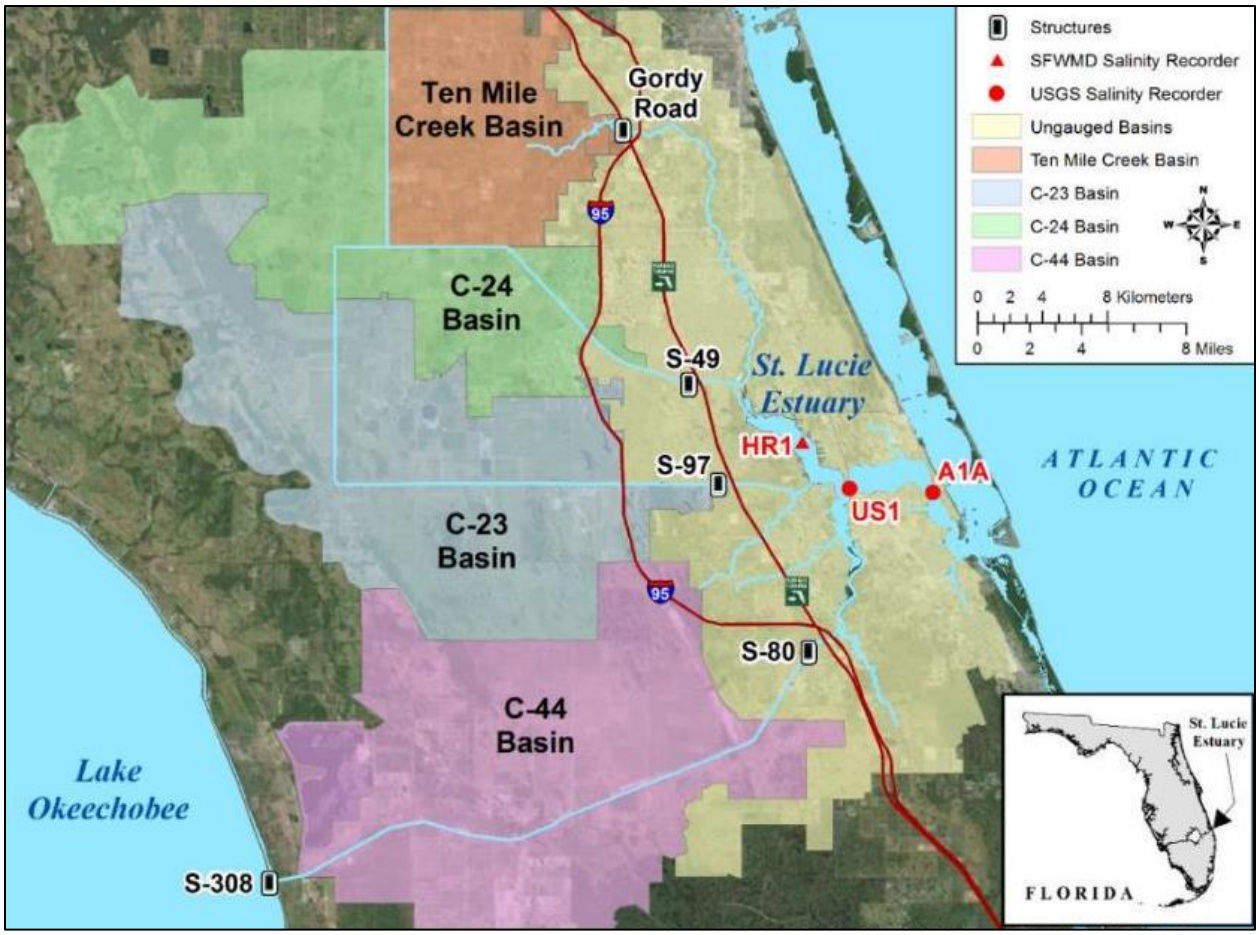

Figure ES-1. Basins, water control structures and salinity monitoring sites in the St. Lucie Estuary.

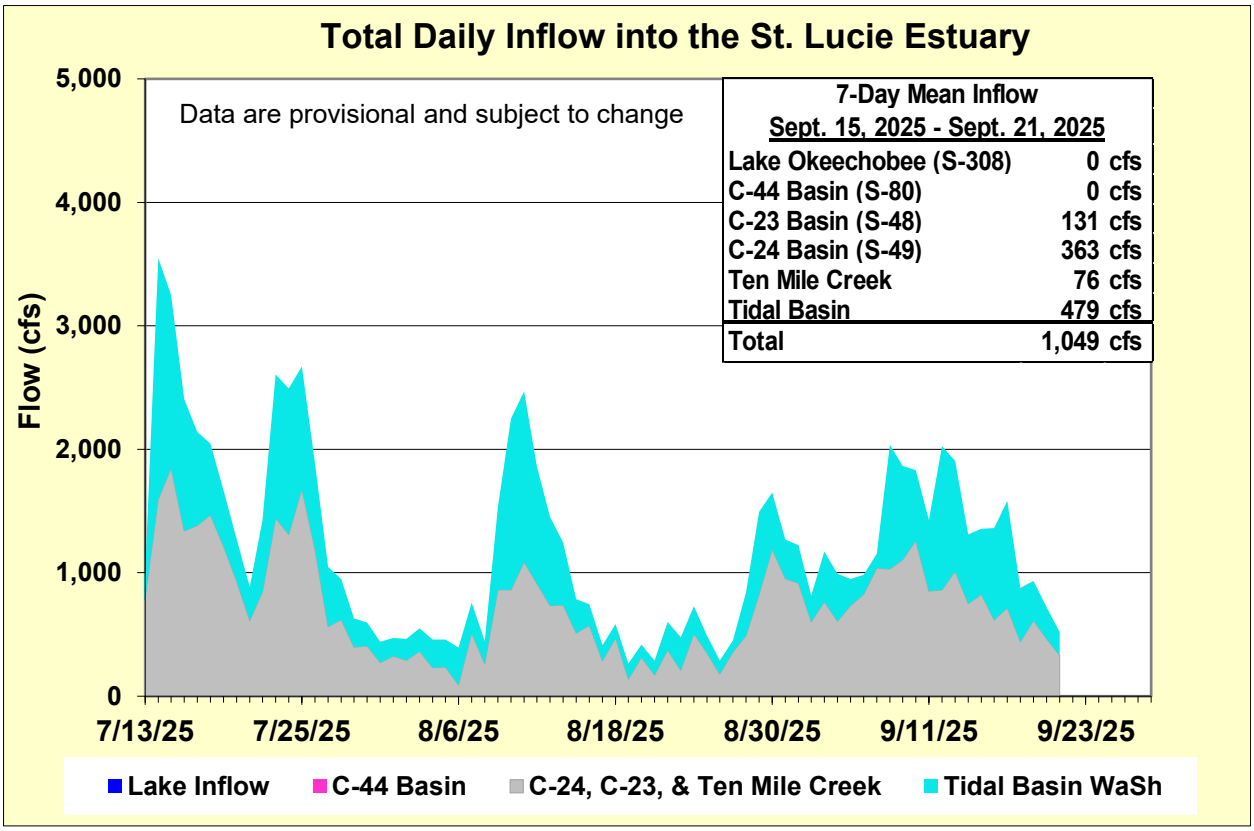

Figure ES-2. Total daily inflows from Lake Okeechobee and runoff from the C-44, C-23, C-24, Ten Mile Creek, and Tidal Basins into the St. Lucie Estuary.

Table ES-1. Seven-day mean salinity at oyster monitoring sites in the St. Lucie Estuary. Current means are in bold font; previous week's means are in parentheses. The envelope reflects the optimum salinity range for adult eastern oysters (*Crassostrea virginica*) in the estuary. Data are provisional.

Sampling Site	Surface	Bottom	Optimum Envelope
HR1 (North Fork)	**10.6** (11.5)	**15.2** (17.8)	10.0 – 25.0
US1 Bridge	**14.1** (16.1)	**15.4** (17.9)	10.0 – 25.0
A1A Bridge	**22.6** (24.4)	**26.6** (28.0)	10.0 – 25.0

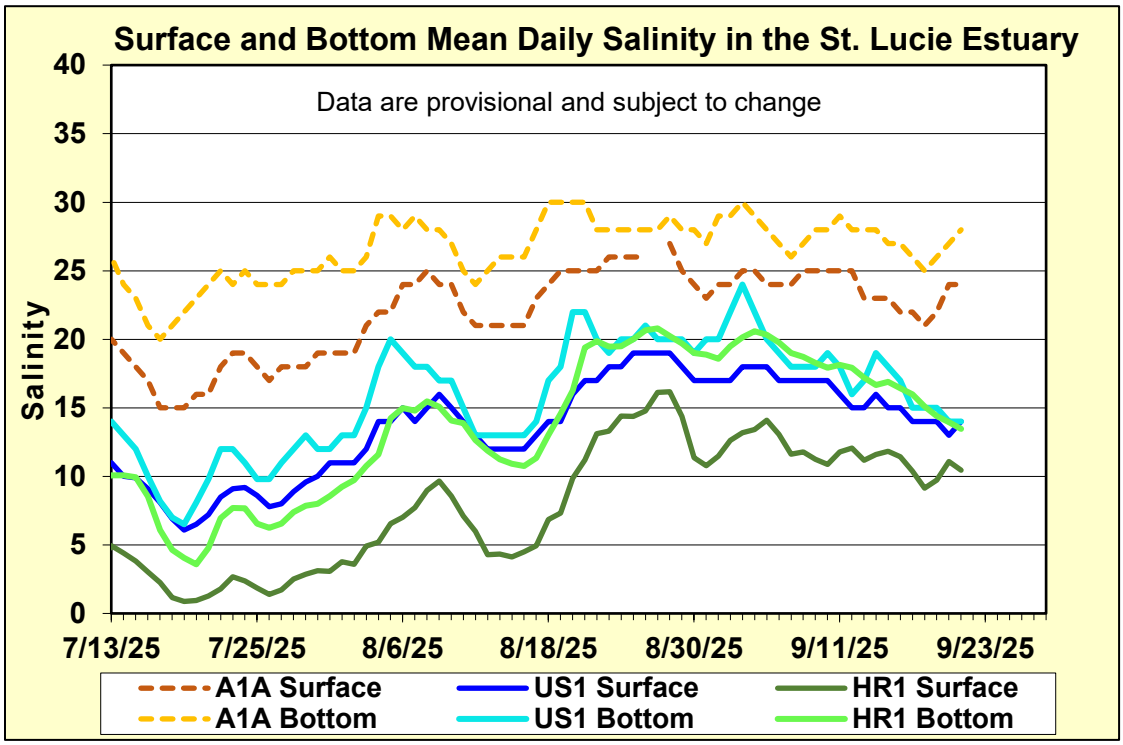

Figure ES-3. Mean daily salinity at the A1A, US1, and HR1 sites in the St. Lucie Estuary.

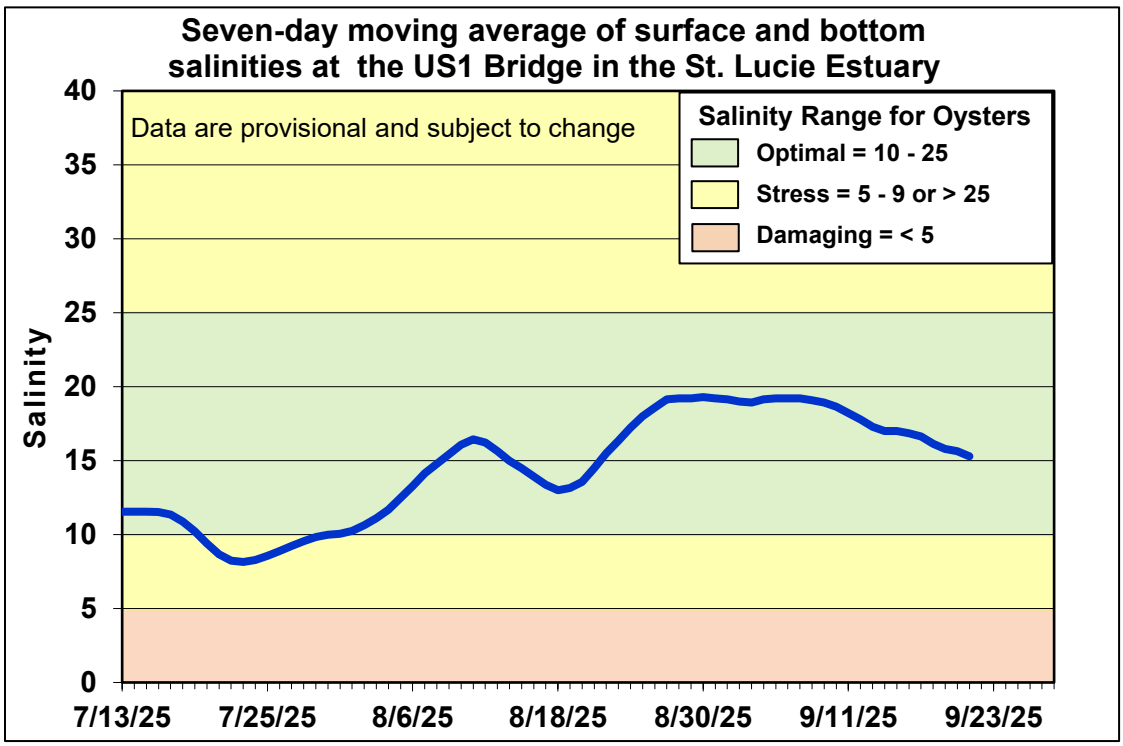

Figure ES-4. Seven-day moving average of the surface and bottom salinities at the US1 Bridge in the St. Lucie Estuary.

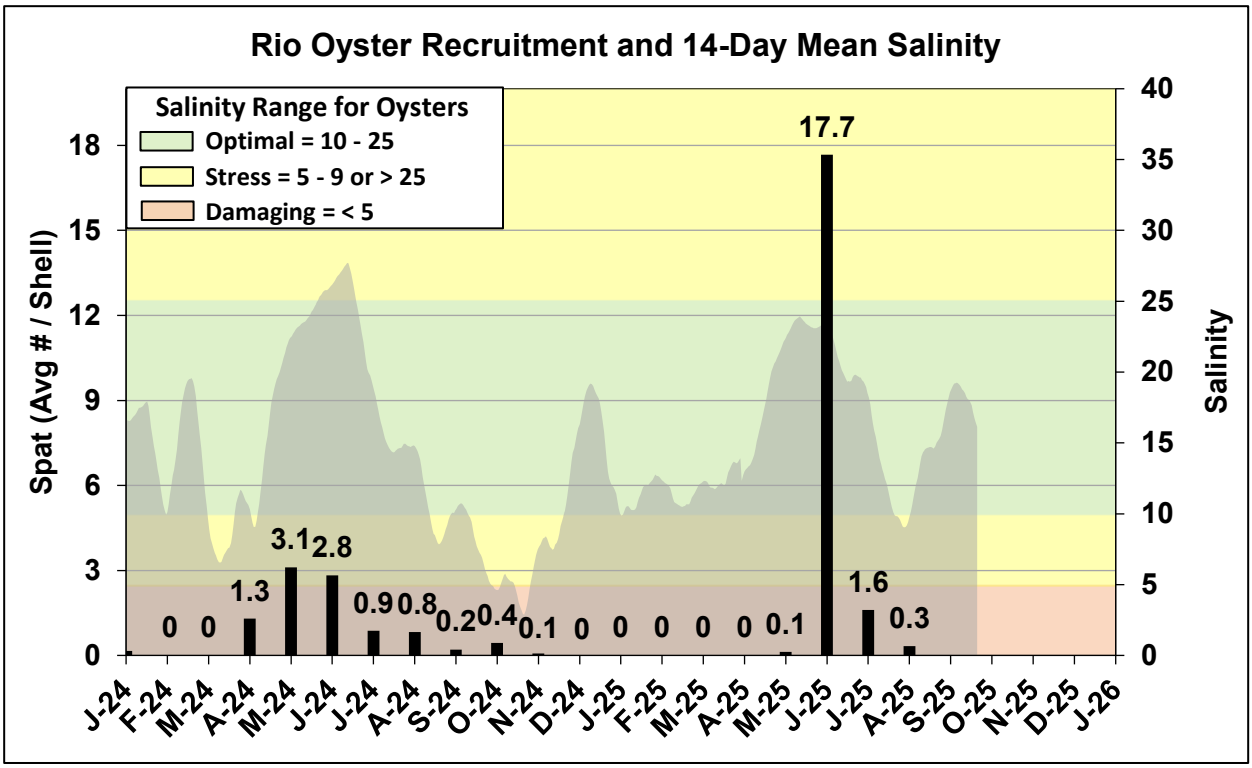

Figure ES-5. Mean oyster recruitment at the Rio oyster monitoring station and 14-day mean salinity at US1 Bridge.

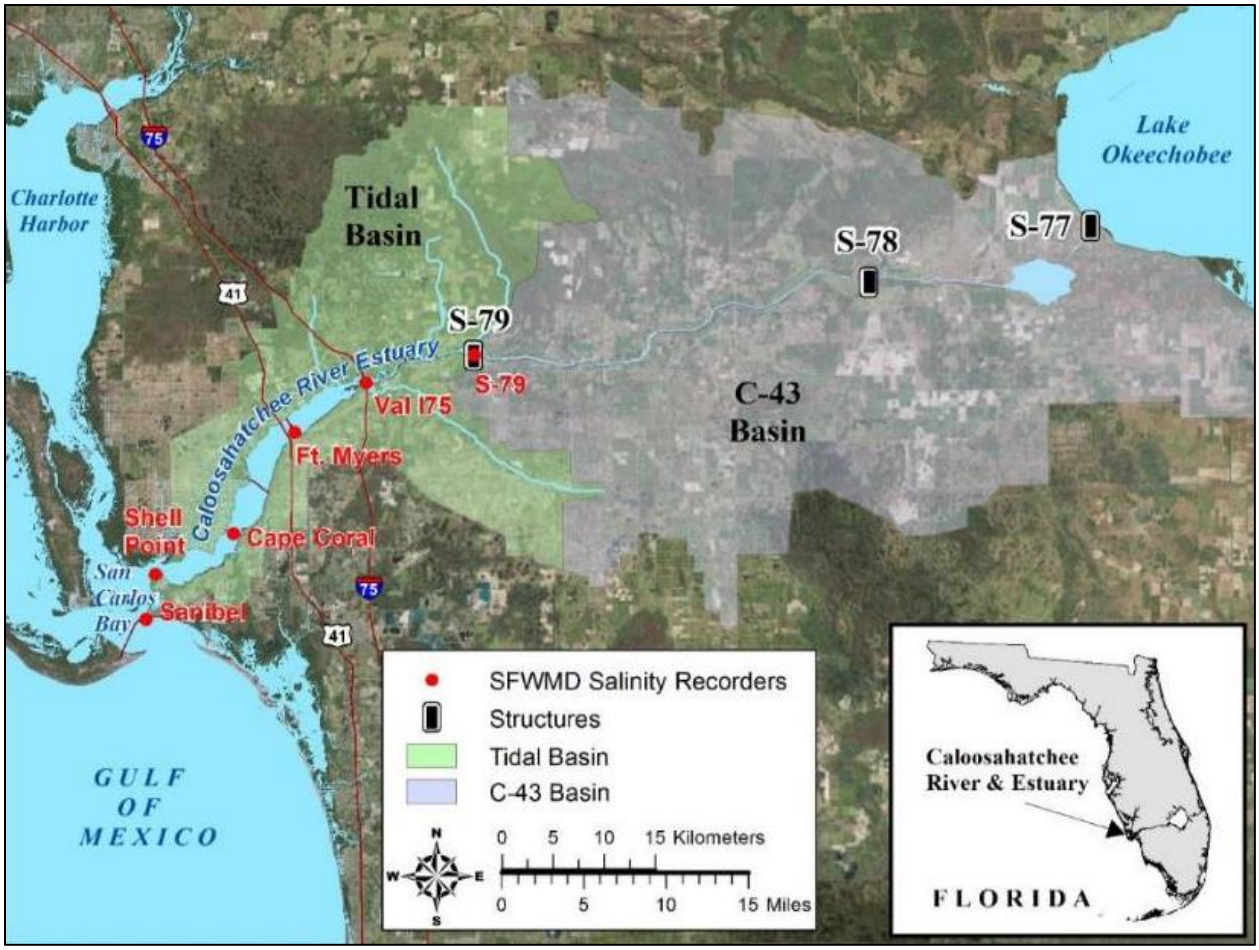

Figure ES-6. Basins, water control structures, and salinity monitoring sites in the Caloosahatchee River Estuary.

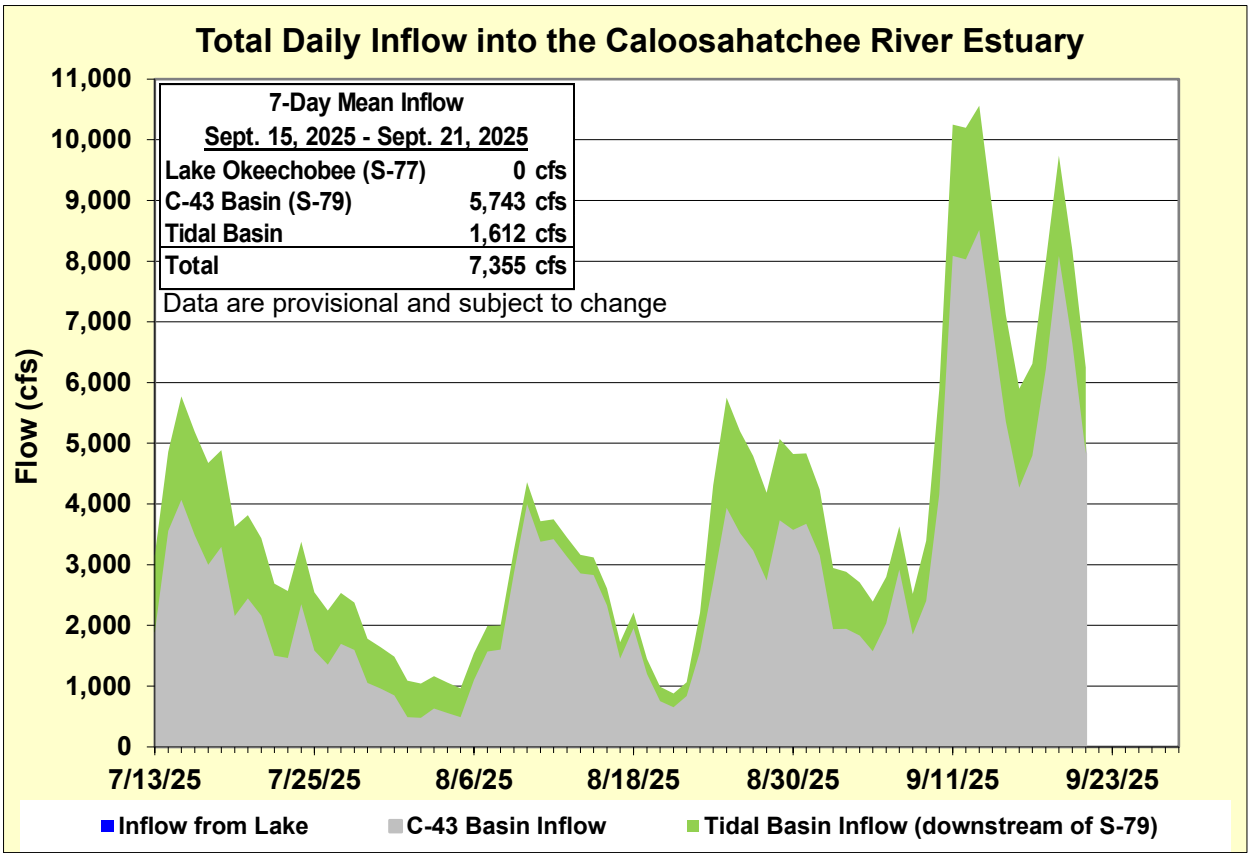

Figure ES-7. Total daily inflows from Lake Okeechobee, and runoff from the C-43 and Tidal basins into the Caloosahatchee River Estuary.

Table ES-2. Seven-day mean salinity at six monitoring sites in the Caloosahatchee River Estuary. Current means are in bold font; previous week's means are in parentheses. The envelope in the upper estuary sites is for the protection of tape grass and the envelope in the lower estuary is the optimum salinity range for adult eastern oysters (*Crassostrea virginica*). Data are provisional.

Sampling Site	Surface	Bottom	Optimum Envelope
S-79 (Franklin Lock)	**0.1** (0.2)	**0.1** (0.2)	0.0 – 10.0
Val I-75	**0.2** (0.2)	**0.2** (0.2)	0.0 – 10.0
Fort Myers Yacht Basin	**0.2** (0.3)	**0.2** (0.4)	0.0 – 10.0
Cape Coral	**1.4** (4.8)	**2.2** (6.0)	10.0 – 25.0
Shell Point	**15.8** (18.9)	**18.1** (20.6)	10.0 – 25.0
Sanibel	**24.5** (25.9)	**26.8** (25.4)	10.0 – 25.0

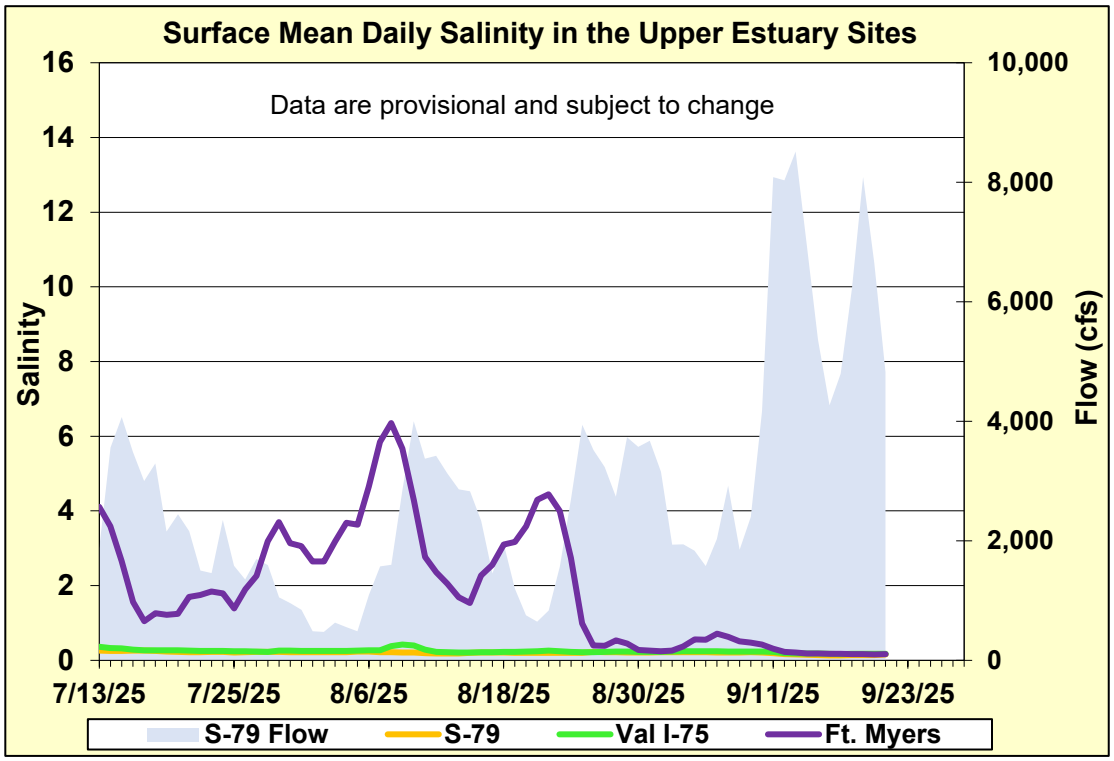

Figure ES-8. Mean daily salinity at upper Caloosahatchee River Estuary monitoring sites and mean daily flow at S-79.

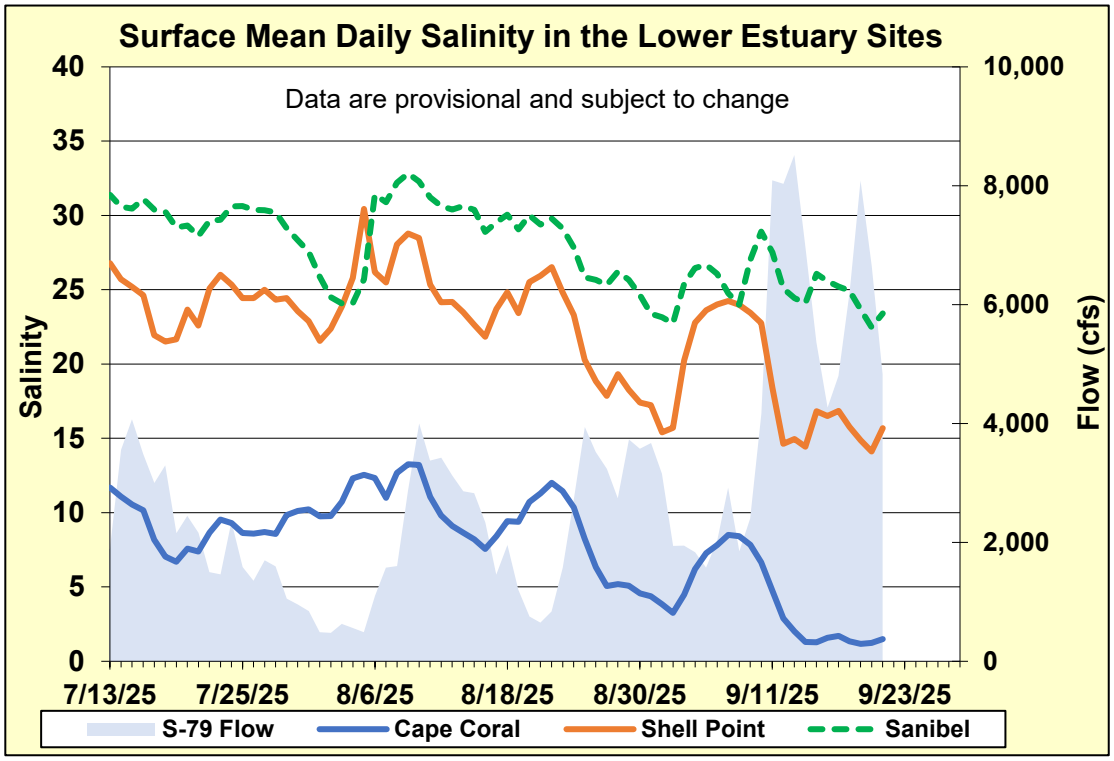

Figure ES-9. Mean daily surface salinity at lower Caloosahatchee River Estuary monitoring sites and mean daily flow at S-79.

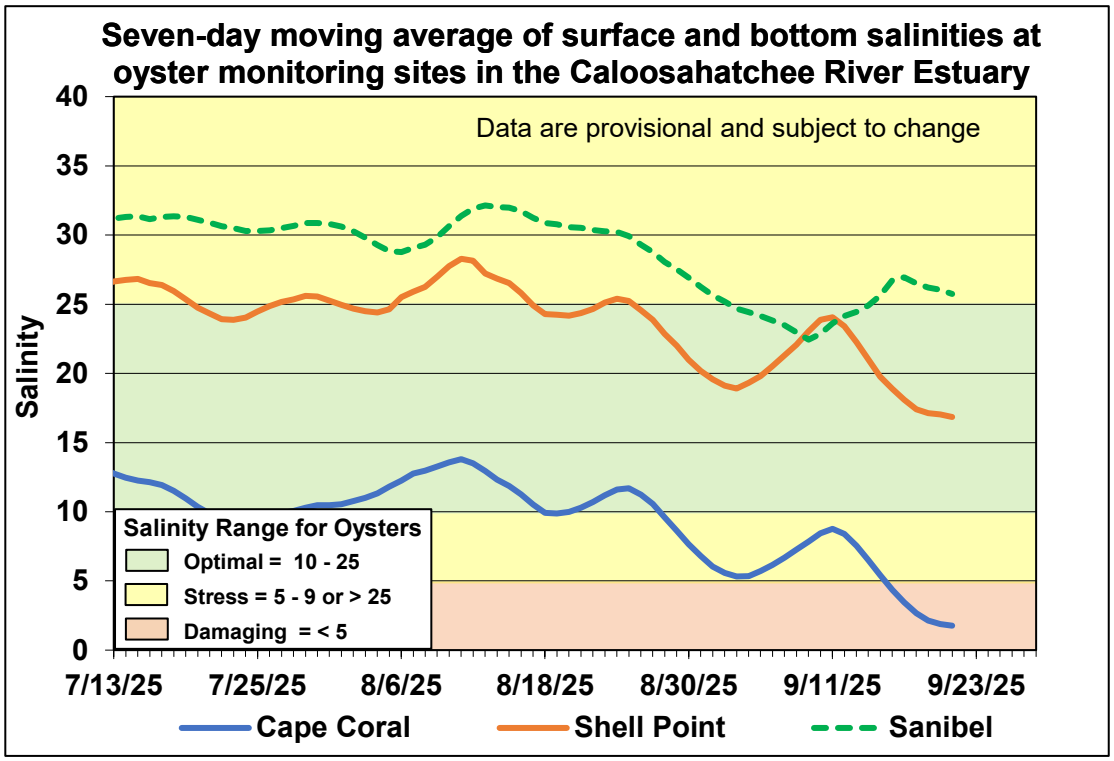

Figure ES-10. Seven-day moving average of surface and bottom salinities at Cape Coral, Shell Point, and Sanibel monitoring sites in the Caloosahatchee River Estuary.

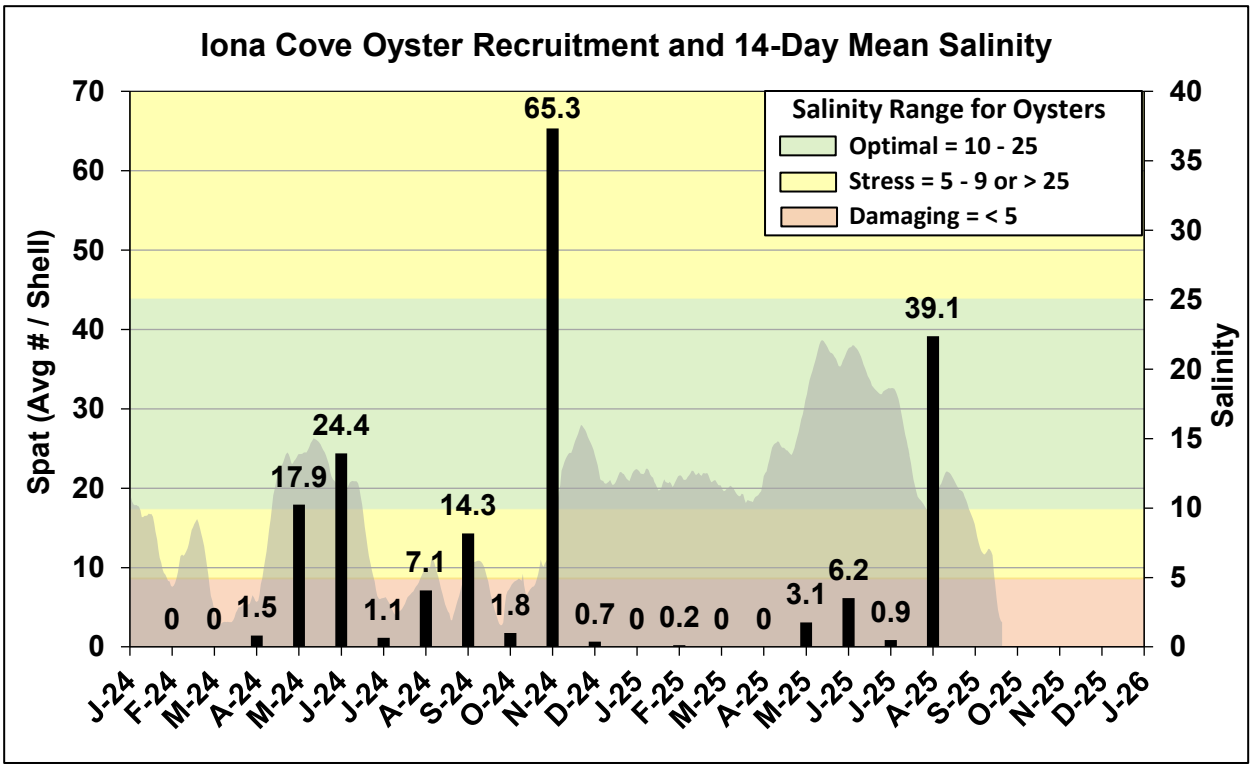

Figure ES-11. Mean oyster recruitment at the Iona Cove oyster monitoring station and 14-day mean salinity at Cape Coral.

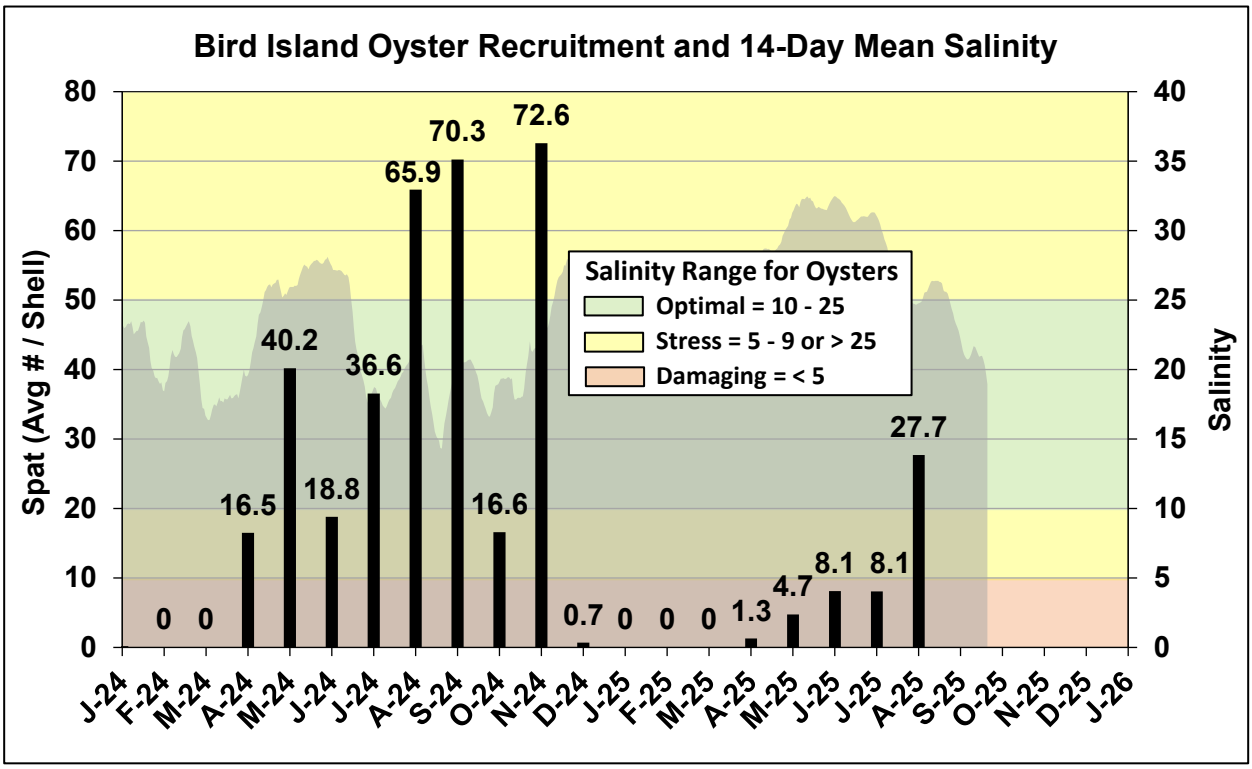

Figure ES-12. Mean oyster recruitment at the Bird Island oyster monitoring station and 14-day mean salinity at Shell Point.

Table ES-3. Predicted salinity at Val I-75 in the Caloosahatchee River Estuary at the end of the forecast period for various S-79 flow release scenarios.

Scenario	Simulated S-79 Flow (cfs)	Tidal Basin Runoff (cfs)	Daily Salinity	30-Day Mean Salinity
A	450	887	0.3	0.2
B	750	887	0.3	0.2
C	1,000	887	0.3	0.2
D	1,500	887	0.3	0.2
E	2,000	887	0.3	0.2

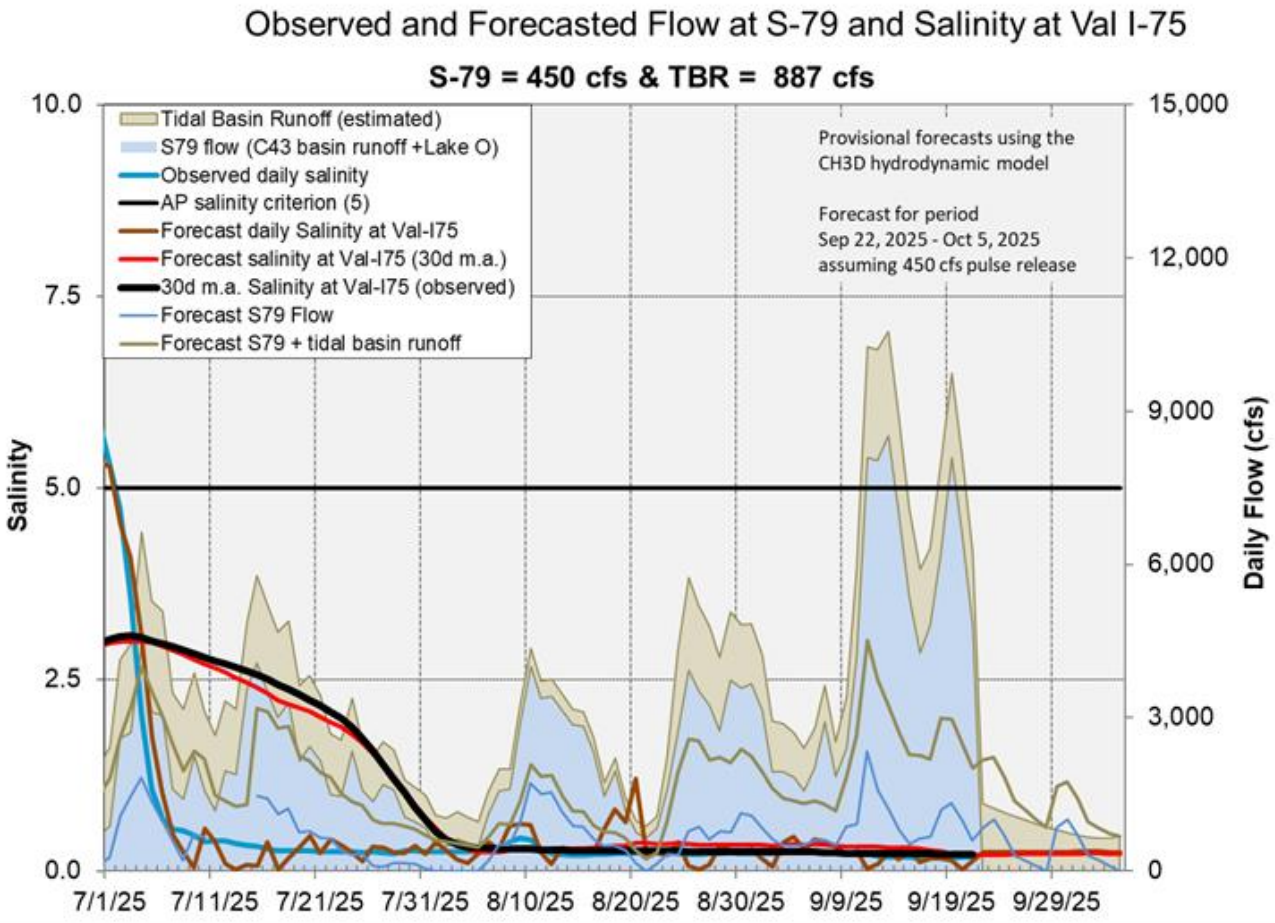

Figure ES-13. Surface salinity forecast at the Val I-75 site assuming a 450 cfs pulse release at S-79.

Stormwater Treatment Areas

STA-1E: STA-1E Central Flow-way is offline for construction activities. An operational restriction is in place in the Western Flow-way for post-construction vegetation grow-in. Online SAV treatment cells at target stage, EAV cells are slightly above target stage. The 365-day PLR for the Western and Eastern Flow-way is below 1.0 g/m^2/year (**Figure S-2**).

STA-1W: STA-1W Eastern Flow-way is online with restrictions for G-253 structure replacements. Treatment cells are at the target stage. Vegetation in the Western and Eastern Flow-ways is highly stressed. The 365-day PLRs for the Eastern and Northern Flow-ways are below 1.0 g/m^2/year. The 365-day PLR for the Western Flow-way is high (**Figure S-2**).

STA-2: Operational restrictions are in place in Flow-ways 2 and 4 for vegetation management activities and in Flow-way 3 for post-drawdown vegetation grow-in. Treatment cells are above target stage. The 365-day PLRs for all Flow-ways are below 1.0 g/m^2/year (**Figure S-3).**

STA-3/4: An operational restriction is in place in the Eastern Flow-way for post-drawdown vegetation grow-in. Treatment cells are above target stage. Vegetation in the Central Flow-way is highly stressed. The 365-day PLR for the Eastern, Central, and Western Flow-ways are below 1.0 g/m^2/year (**Figure S-3**).

STA-5/6: All treatment cells are above target stage. All treatment cells have highly stressed or stressed vegetation conditions. The 365-day PLRs for Flow-ways 1, 2, 3, 5, 6, 7, and 8 are below 1.0 g/m^2/year, and the 365-day PLRs for Flow-way 4 is high. (**Figure S-4**).

For definitions on STA operational language see glossary following figures

- Total WY2026 inflows to STAs (5/1/2025 to 9/21/2025): ~375,300 ac-ft
- Lake Okeechobee releases to FEBs/STAs
  - 9/15/2025 to 9/21/2025: 0 ac-ft
  - WY2026: ~ 32,000 ac-ft
- Extensive vegetation management activities underway to address stressed and highly stressed vegetation in EAV cells
- All treatment cells are at or above target water depth

Estimated Inflow and Outflow Volumes
Sept. 15 – Sept. 21, 2025 *Includes preliminary data*

	Total Inflow (acre-feet)	Total Outflow (acre-feet)
STA-1E	100	1,700
STA-1W	0	800
STA-2	5,200	11,500
STA-3/4	7,450	11,300
STA-5/6	2,900	2,600

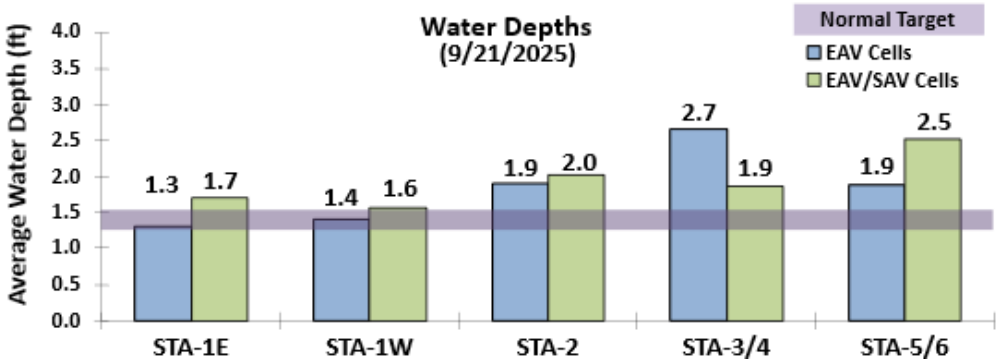

Figure S-1. STA depths and flow volumes

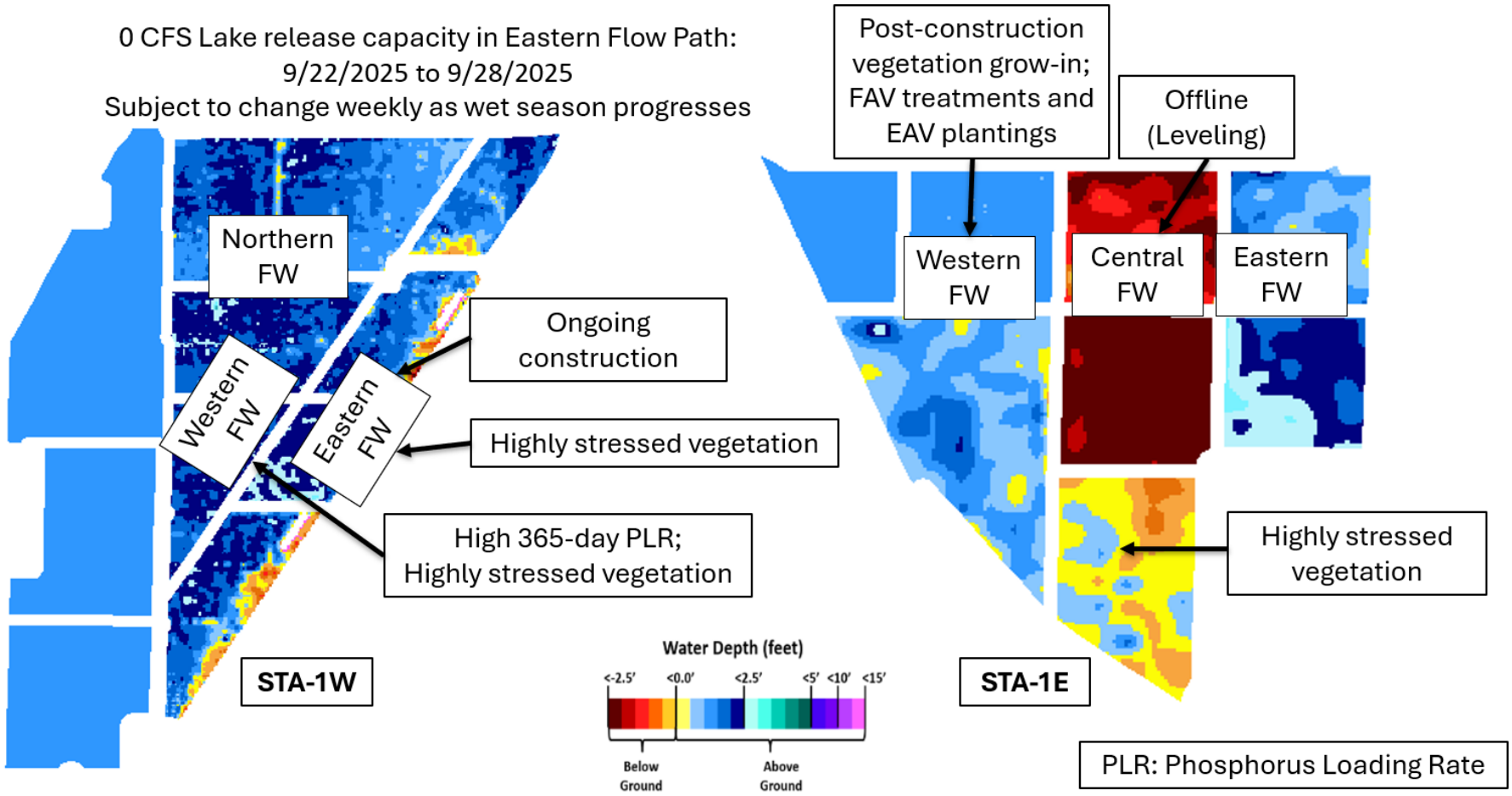

Figure S-2. Eastern Flow Path Weekly Status Report

100 CFS Lake release capacity in Central Flow Path:
9/22/2025 to 9/28/2025

- **100 CFS in STA-2**
- Subject to change weekly as wet season progresses

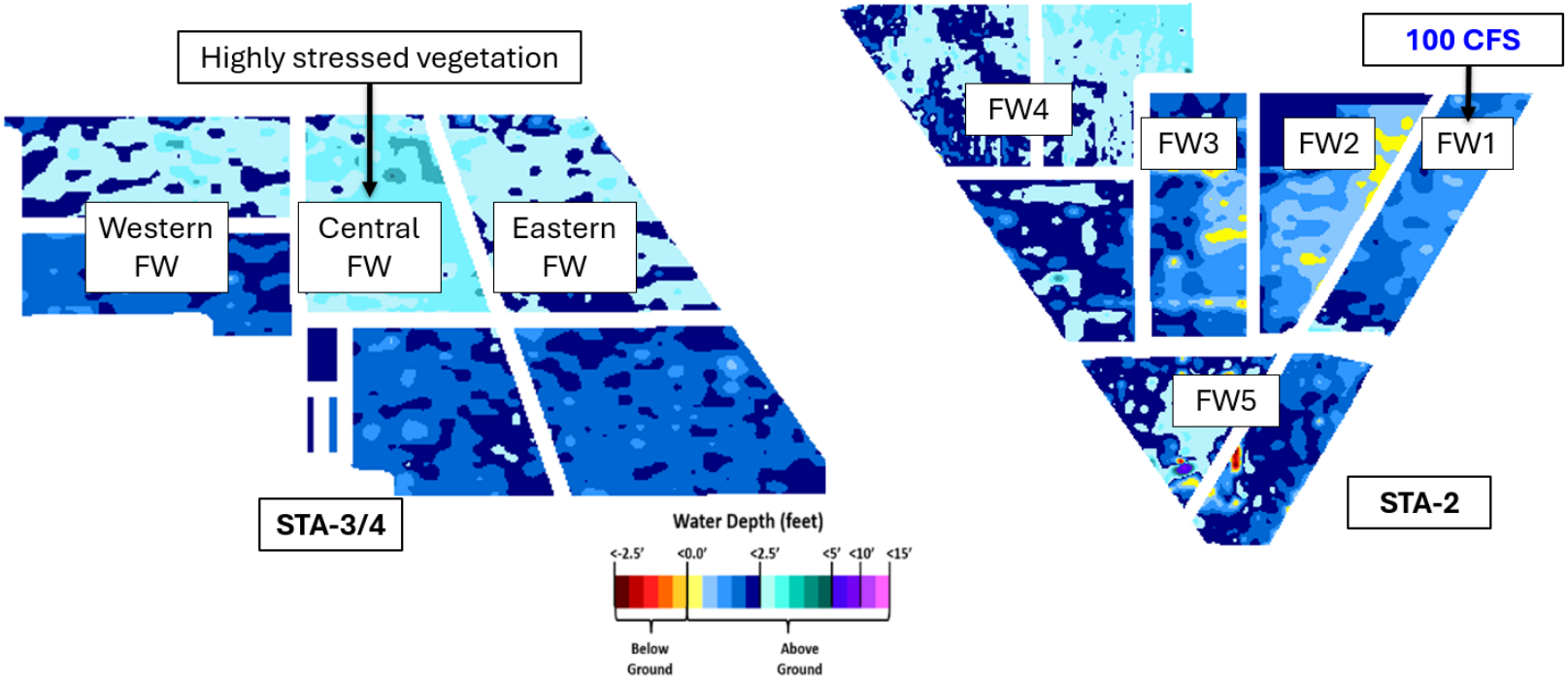

Figure S-3. Central Flow Path Weekly Status Report

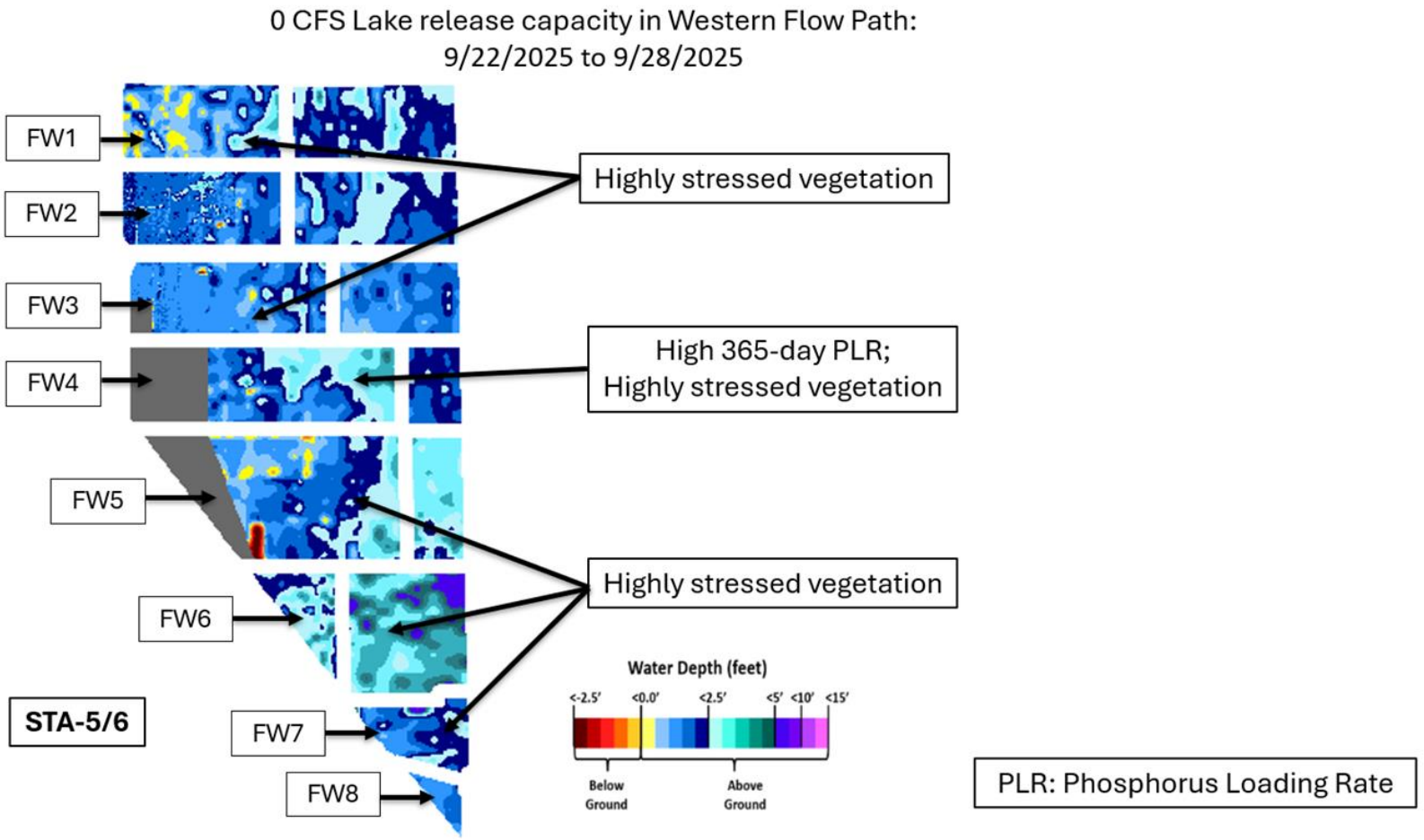

Figure S-4. Western Flow Path Weekly Status Report

Basic Concepts and Definitions for STA Weekly Status Report

- **Inflow**: Sum of flow volume at all inflow structures to an STA.
- **Lake Inflow**: Portion of the STA total inflow volume that originates from Lake Okeechobee.
- **Outflow**: Sum of flow volume at outflow structures from an STA.
- **Total Phosphorus** (TP): Total mass of phosphorus in all its forms; including particulate, dissolved, etc.
- **Inflow Concentration**: TP concentration is the mass of TP in micrograms per liter of water, µg/L or ppb. Inflow concentration refers to the flow-weighted mean TP from all inflow structures over a period of time.
- **Outflow Concentration**: The flow-weighted mean TP from all outflow structures over a period of time. The outflow concentration represents the reduction of inflow TP achieved by STA treatment of the inflow water.
- **WQBEL**: The STA outflow concentration that is required upon completion of the Restoration Strategies projects by December 2025. The outflow concentration shall not exceed 13 ppb as an annual flow weighted mean in more than 3 out of 5 water years on a rolling basis and shall not exceed 19 ppb as an annual flow weighted in any water year.
- **Flow-Way** (FW): One or more treatment cells connected in series. Cells typically have emergent aquatic vegetation (EAV) in the front portion of the flow-way followed by a mix of EAV and submerged aquatic vegetation (SAV)
- **Vegetation Status**: Healthy means the vegetation condition is good and will allow the STA to perform as designed. Stressed means the vegetation is showing signs of poor health, such as browning or areas of vegetation die-off, or the cell contains undesirable vegetation such as floating exotic vegetation requiring treatment. The TP reduction capability of the STA is affected when the vegetation condition is poor.
- **Phosphorus Loading Rate** (PLR): Mass of inflow TP in grams, divided by total treatment area of STA in square meters, per year. In general, a 365-day value of less than 1.0 is needed for an STA to perform optimally. A PLR of 2.0 is considered very high and a PLR of 3.0 is considered extremely high. The TP reduction capability of the STA is affected when the PLR is high, very high and extremely high.
- **Online**: Online status means the FW can receive and treat inflow.
- **Online with Restriction**: The FW can receive and treat inflow, but the amount of flow or water level may be limited temporarily. For example, a vegetation rehabilitation effort may require reduced flows through an area while the new plants are establishing, or nesting by protected species may require a certain water level not to be exceeded.
- **Offline**: The FW is unable to receive and treat inflow due to repairs, construction, or other prohibitive reasons.
- **Depth**: Difference between the average surface water level in a cell and the average ground elevation in that cell. Target depths, or depths between flow events, are between 1.25 ft to 1.5 ft. As depth approaches or drops below zero, an increasing percentage of the cell is considered dry and STA conditions deteriorate. An increase in depth above target depth is expected with increasing flow. However, as depth increases much above the target depth and is sustained over a period of time, it can be detrimental to vegetation health and overall STA treatment performance.
- **Note**: The data provided in this summary report were developed using a combination of provisional and quality-assured flow and water quality data. In some cases, best professional judgment was used to estimate missing data and revise questionable data. Values provided are not considered final but are appropriate for use in STA operational decision-making.

Everglades

Water Conservation Area Regulation Schedules

WCA-1: Stage at the 3-gauge average continues to increase; stages were 0.74 feet below the A1 Zone regulation line on Sunday, September 21, 2025. WCA-2A: Stage continues to rise, trending away from the A1 Zone regulation line at the 2-17 gauge and was above that line by 0.99 feet on Sunday. WCA-3A: The 3-gauge average remains in Zone B but continues to slowly ascend; on Sunday stages remained 0.79 feet below the Zone A regulation line. WCA-3A North: Stage at Gauge 62 (NW corner) continued to increase last week and remains below the Upper Schedule regulation line; on Sunday stage was 0.54 feet below that line. See **Figures EV-1** through **EV-4**.

Water Depths

The SFWDAT model output for September 21, 2025, illustrates continued rehydration of WCA-1. Drier conditions persist in Northeastern WCA-3A along the L-38W canal. Depths increased in WCA-3A North but remain relatively low in WCA-3A South which is limiting key aquatic prey production in this region. Big Cypress Basin near the Tamiami trail is drier than last month. Hydrologic connectivity has improved compared to one month ago in all three of the major sloughs within Everglades National Park (ENP). Conditions remain in the 10th percentile across WCA-3A South. WCA-1 and WCA-3A North remain below average. Everglades National Park exhibits both below (west) and above average depths (east). WCA-2A is primarily at or above average across most of that basin. See **Figures EV-5** through **EV-6**.

Taylor Slough and Florida Bay

Most stages decreased across Taylor Slough over the past week, and the average change was a decrease of 0.06 feet. Changes ranged from –0.15 feet at Taylor Slough Bridge (TSB) in the northern slough to +0.04 feet at P37 in the southern slough (**Figure EV-8 and Figure EV-9**). Taylor Slough water levels remain above the recent average (WY1993-2016) for this time of year by 3.8 inches compared to before the Florida Bay initiative (starting in 2017), a decrease of 1.1 inches relative to last week's comparison. The Craighead Pond (CP) and TSB stages remain below the estimated historical average (circa 1900) by 0.46 and 1.10 feet, respectively.

Average Florida Bay salinity was 26.5, a decrease of 3.8 from last week. Salinity changes ranged from −7.4 at Terrapin Bay (TB) in the central nearshore region to ±0.0 at Duck Key (DK) in the eastern region (**Figure EV-8**). Salinity is above the estimated historical average (circa 1900) and has dropped to below the WY2001-2016 Interquartile Range (IQR) 75th percentile in all three regions (**Figure EV-10**). Average Florida Bay salinity remains above its recent average (WY1993-2016) for this time of year by 1.2, a decrease of 1.8 relative to last week's comparison.

Salinity at the Taylor River (TR) station in the mangrove zone (tracked for the Florida Bay MFL) was 13.7, a decrease of 11.3 from last week (**Figure EV-11**). The 365-day moving sum of flow from the five major creeks (McCormick Creek, Taylor River, Mud Creek, Trout

Creek, West Highway Creek) was 225,436 acre-feet, an increase of 20,447 acre-feet from last week (**Figure EV-11**).

Average rainfall across Taylor Slough and Florida Bay was approximately 1.54 inches over the past week, based on the 18 gauges used for this report. Rainfall ranged from 0.56 inches at Joe Bay (JB) in the eastern nearshore region to 3.59 inches at Johnson Key (JK) in the western region (**Figure EV-12**). Wind directions and speeds in Florida Bay ranged from 0.4 mph N on September 15th to 22.1 mph N on September 19th (**Figure EV-12**).

Average daily flow from the five major creeks totaled 3,057 acre-feet, with net positive flows for the week. Total daily creek flow ranged from 1,497 acre-feet on September 15th to 3,754 acre-feet on September 18th (**Figure EV-13**). Average daily flow was 1,805 acre-feet below estimated historical levels (circa 1900). Average daily flow from the Alligator creek was 121 acre-feet, with net positive flows for the week (**Figure EV-13**).

Implications/considerations for water management.

- Average to above average rainfall within the EPA last two weeks has increased water depths across the region; but continued increases in depth (and associated hydroperiod) are required this wet season to support aquatic fauna recovery in the central Everglades.
    - WCA-3A South and WCA-3A North, east of the Miami canal, continue to experience unseasonably dry conditions.
    - Populations of prey, already heavily depleted by the extended dry down in the last dry season, are unlikely to recover for another year or even longer if water levels do not return to more average or above average conditions.
    - This has the potential to further extend the recent run of 4 consecutive poor wading bird nesting years into the 2026 and 2027 nesting seasons.
    - With the potential for another La Niña dry season, conserving water within the WCAs in the latter half of the wet season may prove ecologically beneficial to aquatic fauna and the predators that feed on them, as well as protect peat soil and facilitate post-wildfire recovery in those areas.

- Taylor Slough depths remain above the recent averages as are average salinities in Florida Bay.
    - All regions of the Bay have trended downward away from the hypersalinity threshold over the last two weeks and are now well within their respective IQRs.
    - Salinities in the central and western regions of the Bay approach the 50th percentile.
    - Florida Bay ecology will benefit from freshwater input to the system and direct rainfall.

- Conserving water in the WCAs while providing freshwater input to the sloughs of ENP will require careful consideration of a balance between the upstream and downstream ecological needs of the system.

Individual regional recommendations can be found in **Table EV-2**.

Table EV-2. Previous week's rainfall and water depth changes in Everglades basins.

Everglades Region	Rainfall (inches)	Stage change (feet)
WCA-1	1.58	+0.12
WCA-2A	1.03	+0.20
WCA-2B	2.37	+0.07
WCA-3A	1.37	+0.06
WCA-3B	2.63	N/A
ENP	1.74	+0.00

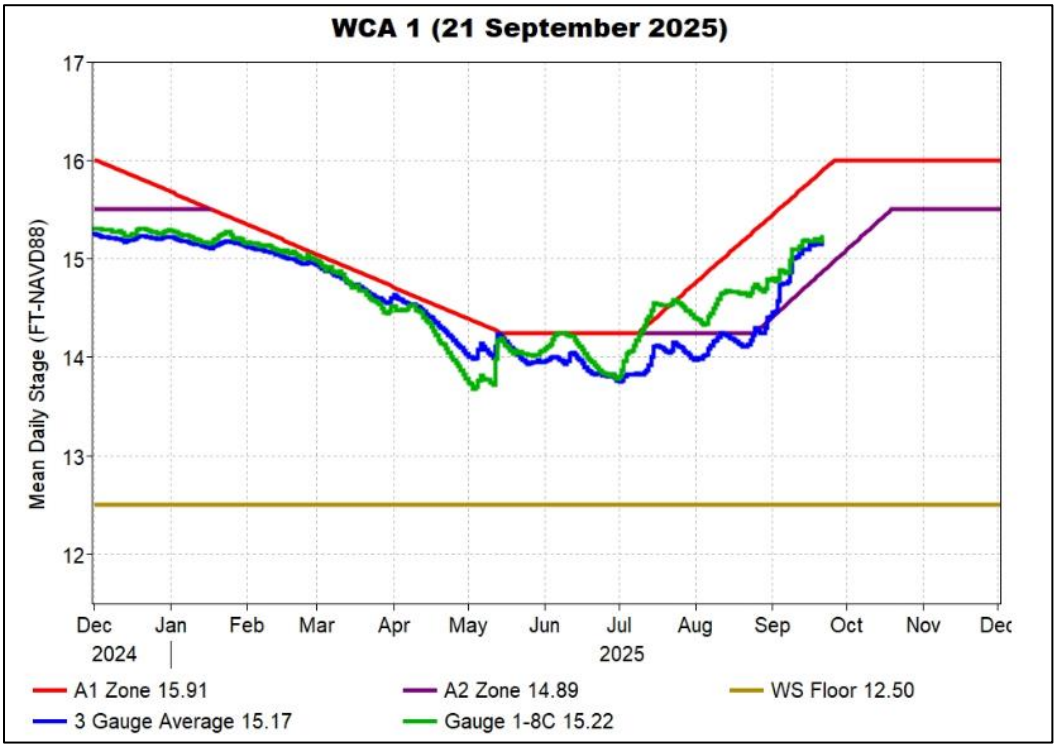

Figure EV-1. WCA-1 stage hydrographs and regulation schedule.

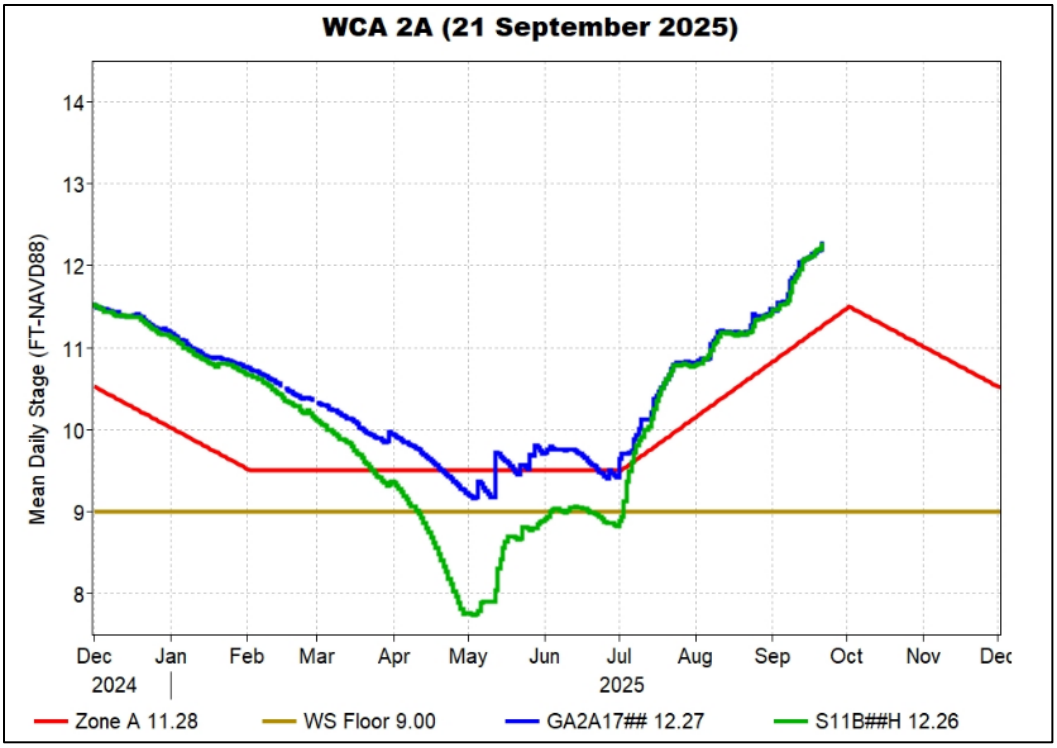

Figure EV-2. WCA-2A stage hydrographs and regulation schedule.

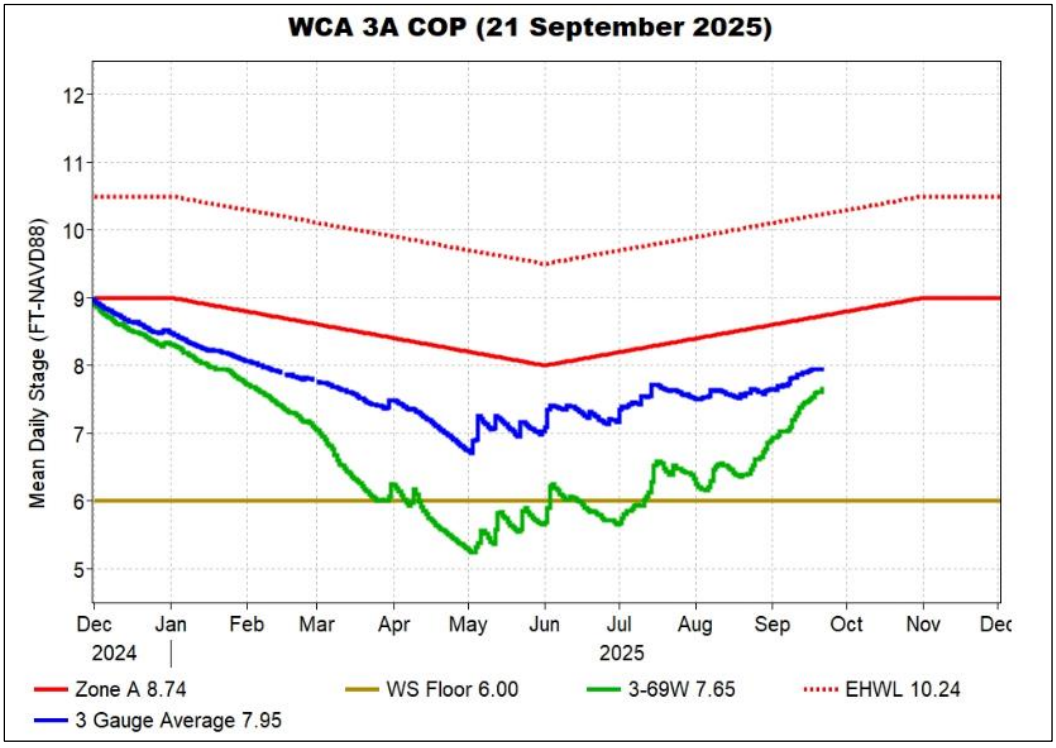

Figure EV-3. WCA-3A stage hydrographs (three-gauge average, 3-69W) and regulation schedule.

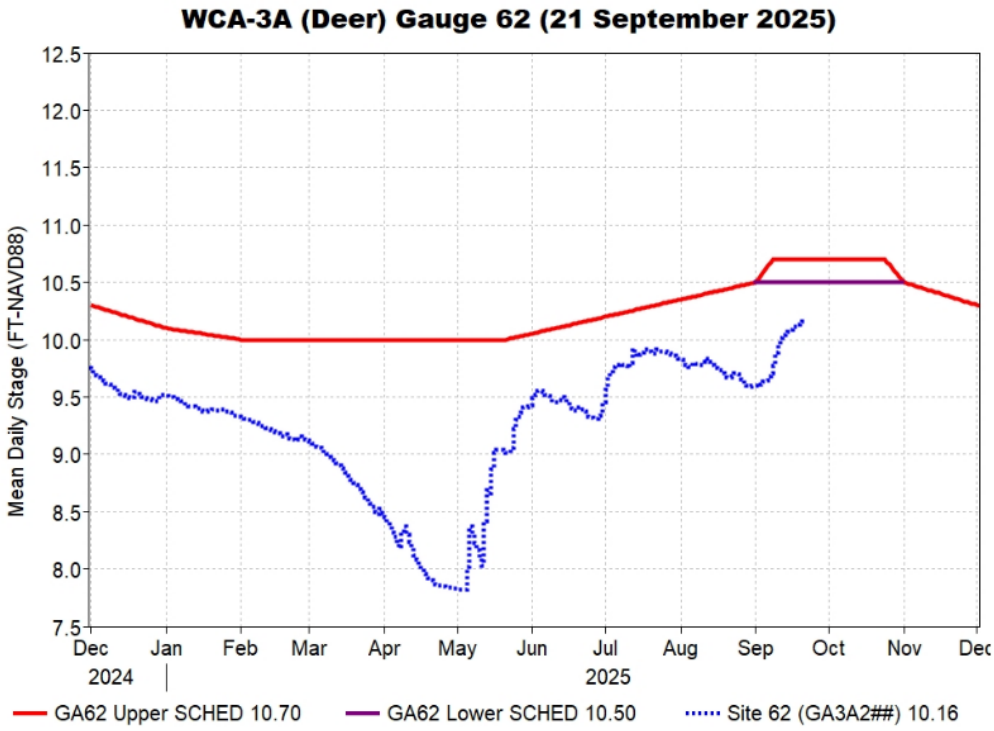

Figure EV-4. WCA-3A stage hydrograph (Deer gauge; Site 62) and GA62 regulation schedule.

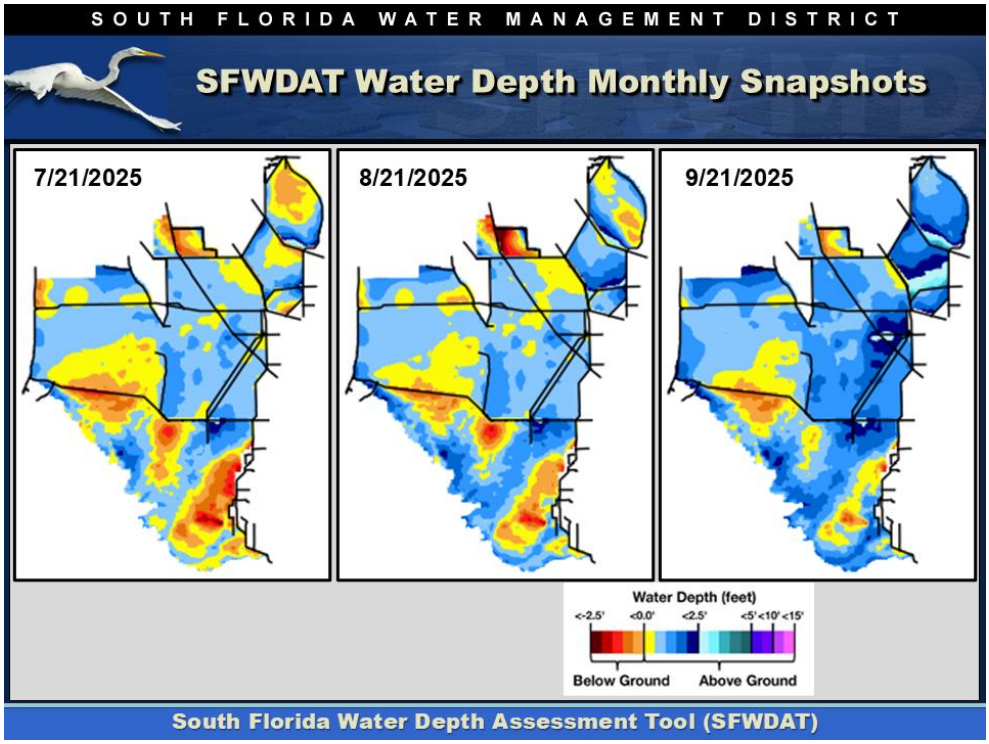

Figure EV-5. Everglades water depths from two months ago (left), one month ago (center) and present (right), based on SFWDAT.

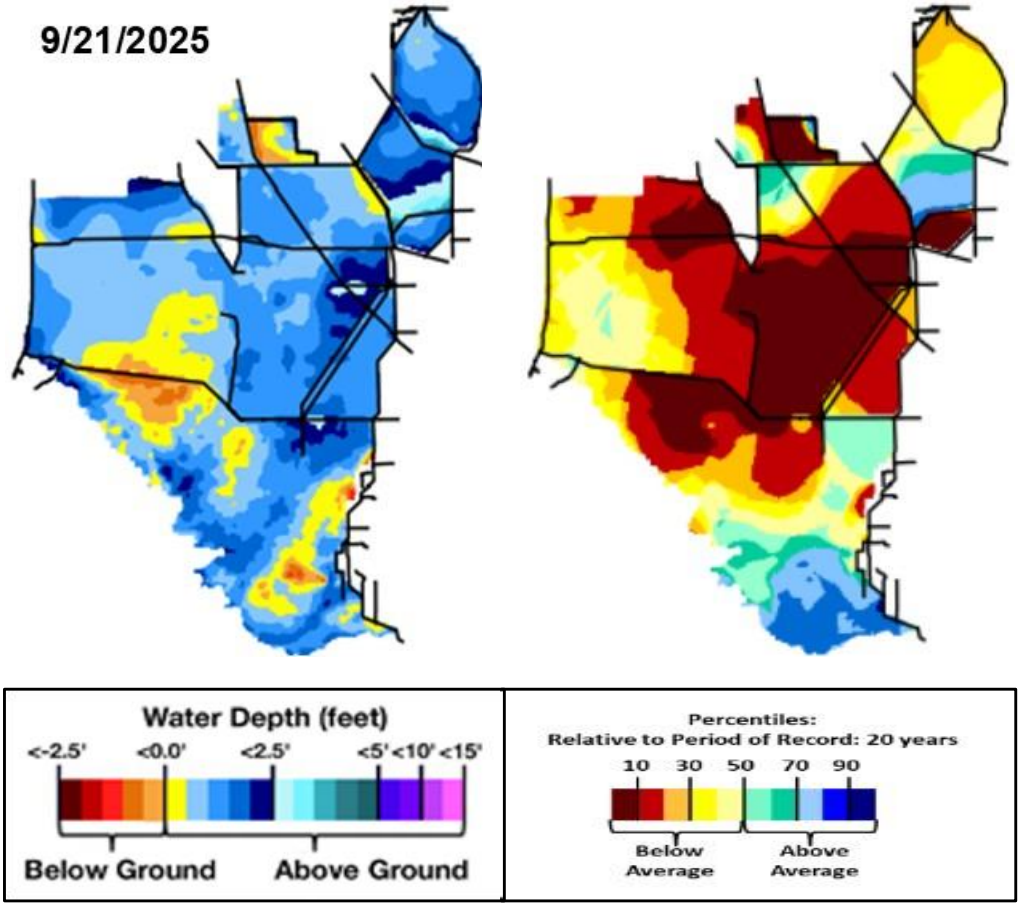

Figure EV-6. Present water depths (September 21, 2025) compared to the day of year relative to average (percentile) over the previous 20 years.

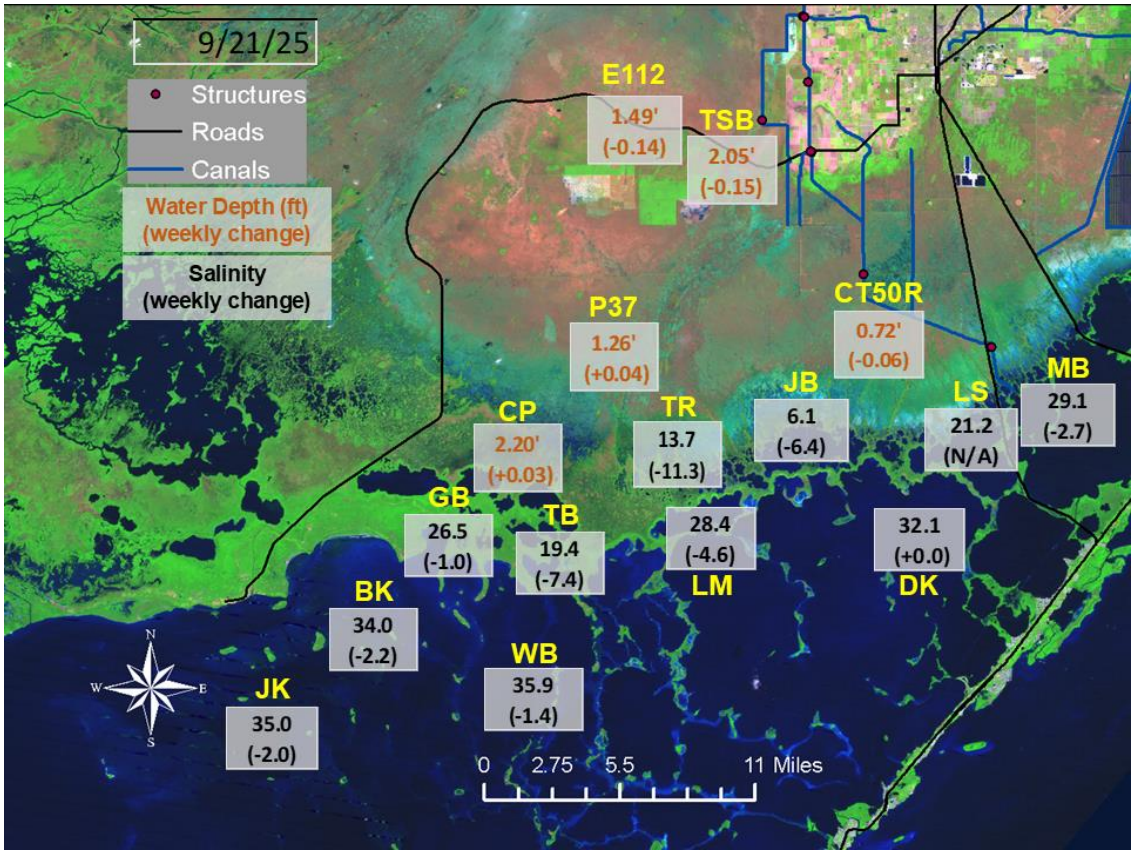

Figure EV-7. Taylor Slough water depths and Florida Bay salinities with changes since August 24th.

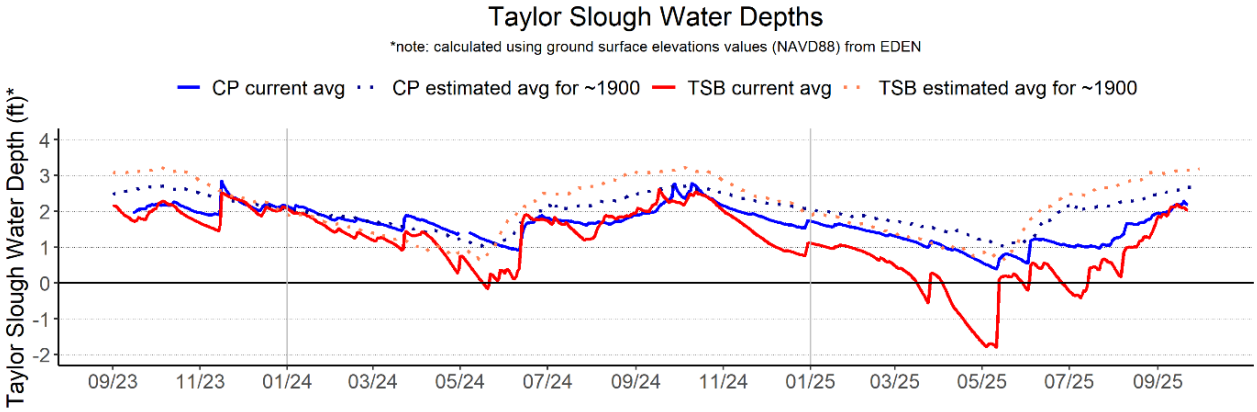

Figure EV-8. Taylor Slough water depth time series for Taylor Slough Bridge (TSB; northern slough) and Craighead Pond (CP; southern slough).

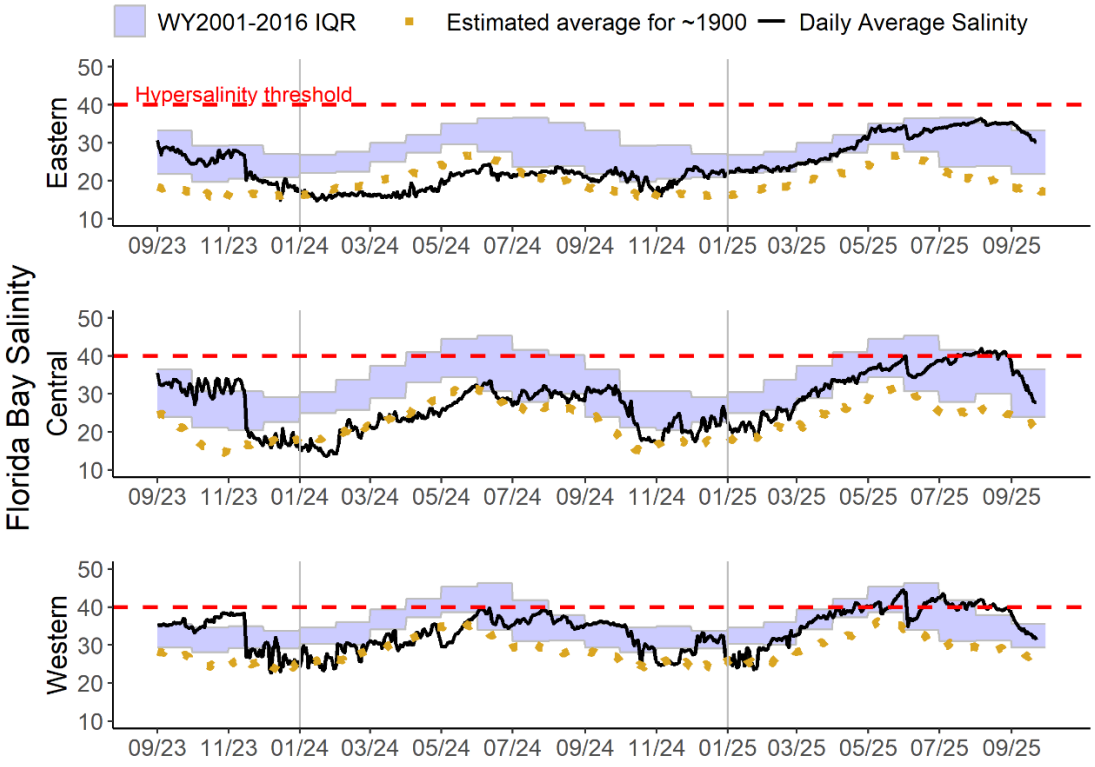

Figure EV-9. Eastern (top panel), Central (middle panel) and Western (bottom panel) Florida Bay daily average salinities with WY2001-2016 interquartile (25-75 percentile) ranges (IQR) and estimated historical daily average salinities. The hypersalinity threshold indicates the level at which salinities start to become harmful to seagrass.

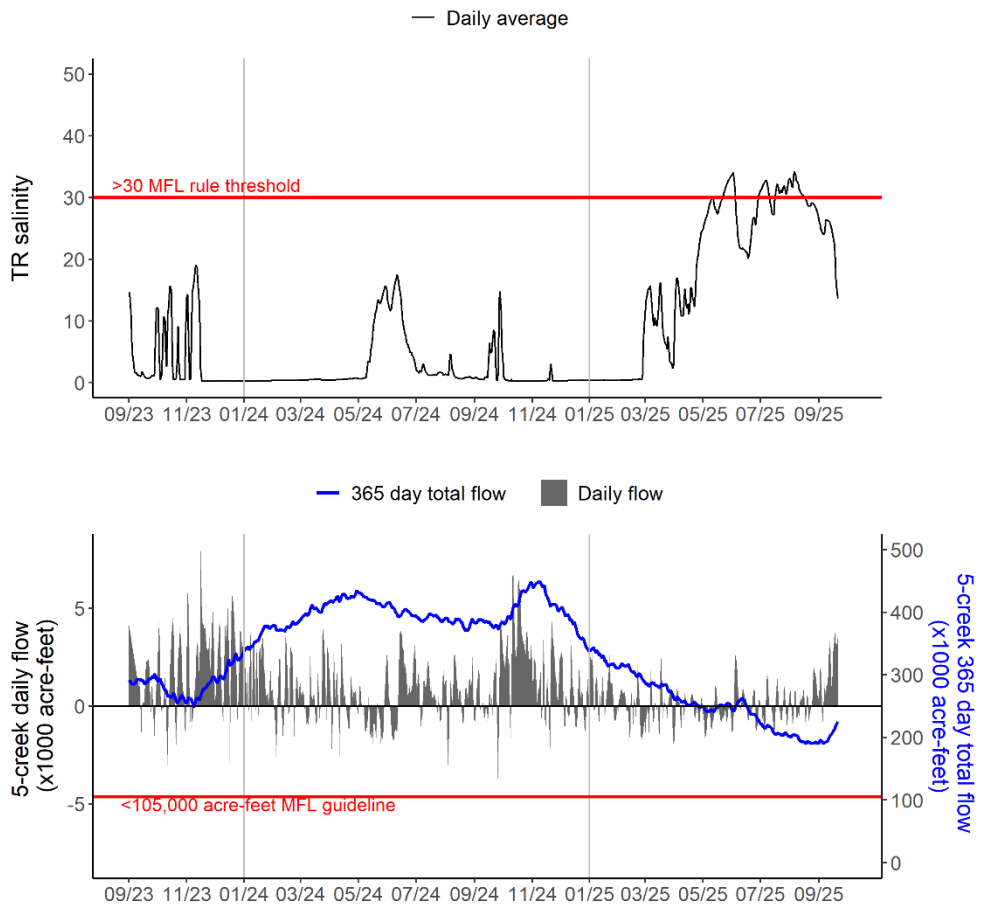

Figure EV-10. Salinity at Taylor River (TR; top) and creek inflow to Florida Bay (bottom) from the five major creeks (McCormick Creek, Taylor River, Mud Creek, Trout Creek, and West Highway Creek). The 30-day moving average salinity and 365-day total creek flow are tracked for the Florida Bay MFL criteria.

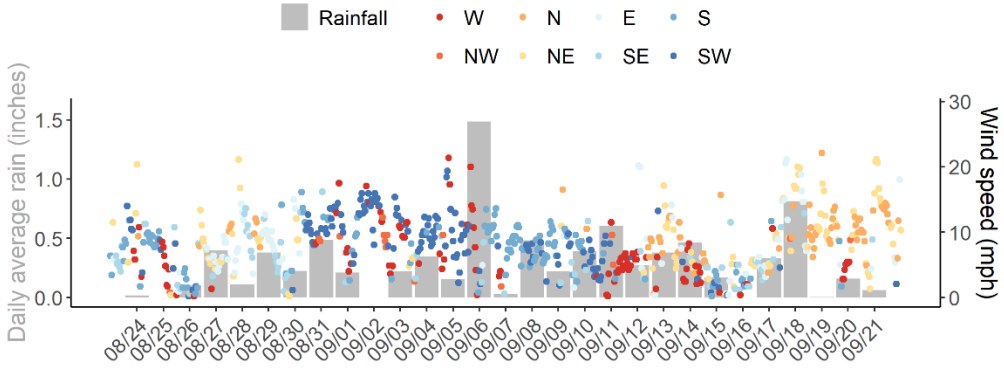

Figure EV-11. Daily average rain across Taylor Slough and Florida Bay, along with hourly average wind speed and direction (measured at Long Key) in Florida Bay over the past four weeks.

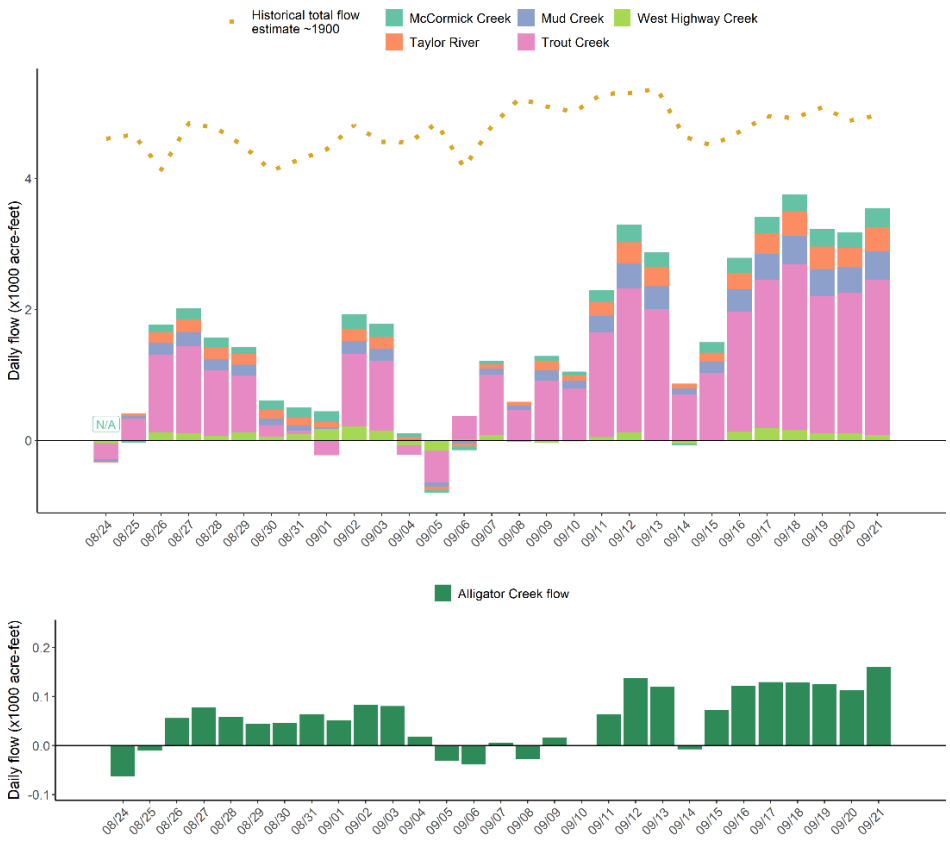

Figure EV-12. Top: daily average creek flow summed between the five major creeks with estimated historical daily flow over the past four weeks. Bottom: daily average creek flow from Alligator Creek over the past four weeks.

Table EV-2. Weekly water depth changes and water management recommendations

SFWMD Everglades Ecological Recommendations, September 23, 2025 (red is new)			
	Weekly change	Recommendation	Reasons
WCA-1	Stage increased by 0.12 feet	No recession and ascension rate no faster than 0.18 feet per week, or 0.36 feet per two weeks.	Protect within basin and downstream habitat and wildlife.
WCA-2A	Stage increased by 0.20 feet	No recession and ascension rate no faster than 0.18 feet per week, or 0.36 feet per two weeks.	Protect within basin and downstream habitat and wildlife.
WCA-2B	Stage increased by 0.07 feet	No recession and ascension rate no faster than 0.18 feet per week or 0.36 feet per two weeks.	Protect within basin and downstream habitat and wildlife.
WCA-3A NE	Stage decreased by 0.02 feet	No recession and ascension rate no faster than 0.18 feet per week or 0.36 feet per two weeks.	Protect within basin and downstream habitat and wildlife.
WCA-3A NW	Stage increased by 0.08 feet	No recession and ascension rate no faster than 0.18 feet per week or 0.36 feet per two weeks.	
Central WCA-3A S	Stage increased by 0.10 feet	No recession and ascension rate no faster than 0.18 feet per week or 0.36 feet per two weeks.	Protect within basin and downstream habitat and wildlife.
Southern WCA-3A S	Stage decreased by 0.08 feet		
WCA-3B	Stage increased by 0.11 feet	No recession and ascension rate no faster than 0.18 feet per week or 0.36 feet per two weeks.	Protect within basin and downstream habitat and wildlife.
ENP-SRS	Stage remained unchanged	Make discharges to ENP according to COP and TTFF protocol while considering upstream and downstream ecological conditions.	Protect within basin and upstream habitat and wildlife.
Taylor Slough	Stage changes ranged from -0.15 feet to +0.04 feet	Move water southward as possible.	When available, provide freshwater to promote water movement.
FB- Salinity	Salinity changes ranged from -7.4 to ±0.0	Move water southward as possible.	When available, provide freshwater to promote water movement.