

# Public Scoping Comments on the Lake Okeechobee System Operating Manual (LOSOM)

**Submitted to:**

Dr. Ann Hodgson  
U.S. Army Corps of Engineers  
Jacksonville District  
P.O. Box 4970, Jacksonville, FL 32232-0019  
LakeOComments@usace.army.mil

**Submitted by:**

Palm Beach County



**Prepared by:**

Jeremy McBryan, PE, CFM  
County Water Resources Manager  
Palm Beach County  
301 North Olive Avenue, 11<sup>th</sup> Floor  
West Palm Beach, Florida 33401  
jmc Bryan@pbcgov.org  
561-355-4600

**April 22, 2019**

## Introduction

Palm Beach County appreciates the opportunity to provide public scoping comments to the U.S. Army Corps of Engineers (Corps) on the ongoing re-evaluation of Lake Okeechobee operations, referred to as the Lake Okeechobee System Operating Manual (LOSOM). Palm Beach County, with more than 1.4 million residents, is the third most populous county in Florida with an economy sustained by real estate development, tourism and agriculture. In fact, Palm Beach County leads the state in agricultural productivity and produces more winter vegetables than any other county in the United States east of the Mississippi River.

Palm Beach County also has a proven record of leadership in land and water resources protection. Palm Beach County, in collaboration with state and local partners, has invested over \$500 million in the acquisition, restoration and management of 32,000 acres of natural areas and invested approximately \$88 million to restore the Lake Worth Lagoon.

Lake Okeechobee is an integral component of the Comprehensive Everglades Restoration Plan (CERP) and is critical to meeting the environmental restoration and water supply needs of South Florida. Lake Okeechobee is the liquid heart of an integrated regional water management system and is essential and interconnected to communities, businesses, public water supply utilities, and ecosystems throughout Palm Beach County. In addition, Palm Beach County residents, taxpayers and visitors depend on predictable and reliable water supplies to sustain a robust and diverse economy. As such, ongoing planning activities to re-evaluate Lake Okeechobee operations, along with current Lake Okeechobee operations, are top priorities for Palm Beach County.

On March 12, 2019, the Palm Beach County Board of County Commissioners adopted Resolution 2019-0379 (see Attachment 1) opposing drastically lowering Lake Okeechobee to levels not supported by sound science, outlining concerns, communicating priorities and providing recommendations on Lake Okeechobee operations, specifically as it relates to LOSOM.

Palm Beach County respectfully requests that future Lake Okeechobee operations be implemented to maximize the protection of water supplies to ensure existing and future permitted water allocations are available, minimize the potential for water use restrictions, and avoid widespread damage to the economy and ecosystems such as Lake Okeechobee, the Lake Worth Lagoon and the Loxahatchee River.

## Comprehensive Strategy Needed

### *Issues and Concerns*

Excess freshwater during the wet season and inadequate freshwater during the dry season along with excess nutrients in surface water bodies is a widespread, complex, multi-dimensional problem that requires focused investment and regional-scale and local-scale water storage infrastructure and water quality treatment strategies. CERP is the roadmap to addressing these issues. However, the pace of CERP implementation has been disappointingly slow, with many projects delayed indefinitely or re-formulated with reduced scopes. In addition, project elements

with desirable benefits that were approved as part of the original plan are routinely screened out due to projected costs or self-imposed planning schedule constraints.

No estuary or community should have to endure short-term toxic algae bloom conditions or long-term water quality degradation that have resulted due to the cumulative impacts of decades of excess stormwater flows via the regional water management system. Unfortunately, instead of looking toward a comprehensive regional strategy, much recent discussion has focused on drastically lowering Lake Okeechobee in an attempt to implement zero Lake Okeechobee discharges to the St. Lucie estuary. This approach is disingenuous and creates unrealistic expectations.

Lake Okeechobee's authorized project purposes include flood control, water supply, recreation, navigation, environmental effects to fish and wildlife, and cultural and recreational resources. However, Lake Okeechobee operations cannot resolve the region's water resources challenges by itself. While some reductions to the coastal estuaries are possible by reducing Lake Okeechobee water levels, the risk to public water supplies, and related economic impacts to South Florida communities that would result, changes the balance of the Central and Southern Florida (C&SF) Project's and Lake Okeechobee's multiple authorized purposes. Lowering Lake Okeechobee has the potential to negatively affect public water supply utilities, businesses and communities throughout Palm Beach County.

Palm Beach County supports the implementation of water storage and water quality treatment projects in Lake Okeechobee tributary basins north of Lake Okeechobee. Unfortunately, the state of Florida's activities to implement water quality projects north of Lake Okeechobee appear to be stalled. In addition, legacy nutrients within Lake Okeechobee need to be addressed. While not necessarily a responsibility of the Corps, the ramifications of the lack of water quality progress north of and within Lake Okeechobee ultimately impacts all communities that rely on or receive Lake Okeechobee discharges.

#### *Desired Outcome*

- LOSOM should include a science-based evaluation that is transparent and acknowledges and balances all congressionally-authorized purposes of Lake Okeechobee operations.
- Performance measures should be developed and utilized that appropriately and accurately characterize impacts and risks to all communities as it relates to water supply, the environment, and the economy.
- Data and methods should be incorporated to ensure proposed operations improve Lake Okeechobee ecology, protect water supplies and are robust and resilient to expected climatic variability.
- Future Lake Okeechobee operations should assist in achieving restoration flows and other key ecosystem goals, including performance measures developed by CERP's Restoration Coordination & Verification (RECOVER) program.
- Future Lake Okeechobee operations should avoid and minimize damage to cultural resources (archeological and historical period resources) that can occur due to erosion and wave action at low lake levels.

- In addition, there should be a renewed focus on the implementation of comprehensive regional-scale and local-scale water storage and water quality improvement projects, specifically in Lake Okeechobee tributary basins north of the Lake.

## Water Supply

### *Issues and Concerns*

Palm Beach County is concerned that recent regional water management operations decisions to drastically lower Lake Okeechobee, in an attempt to reduce future undesirable Lake Okeechobee discharges to the coastal estuaries, were implemented without engaging or informing water utilities within Palm Beach County or other potentially affected stakeholders that rely on Lake Okeechobee for water supply.

Lake Okeechobee is essential to protecting the region's water supply infrastructure from saltwater intrusion by providing a source of freshwater to prevent the migration of saltwater into coastal wellfields. Palm Beach County is concerned about Lake Okeechobee operations that could result in increased risk of saltwater intrusion into coastal wellfields which would cause irreversible damage to freshwater supplies, affect the health and safety of residents, and result in the need for massive alternative water supply infrastructure investments.

The 2008 Lake Okeechobee Regulation Schedule (LORS2008) was implemented as an interim risk reduction measure to protect the public from the risk of catastrophic failure of the Herbert Hoover Dike (HHD) by lowering Lake water levels with the expectation that Lake Okeechobee operations would return to previous operations as incremental repairs to the HHD were completed.

Given the hundreds of millions of dollars appropriated and expended for CERP and HHD repairs, it is impossible to decouple Lake Okeechobee operations from Everglades Restoration. However, Palm Beach County is concerned that future Lake Okeechobee operations will erode CERP's intent and the state of Florida's legal obligation to ensure the provision of water supply and flood control.

Section 601(h)(5) of the Water Resources Development Act of 2000 (WRDA2000) included a Savings Clause linking operation of the regional water management system and implementation of CERP to guarantee to preserve existing legally authorized water supplies that existed at the time of WRDA2000 adoption and to provide for future water supply demands through the implementation of projects identified in WRDA2000 and implementing documents.

Any changes to Lake Okeechobee operations that fail to recognize that existing water supply regulation efforts are based on the Water Supply and Environmental (WSE) operational schedule as a starting point and that then mandate lower Lake levels without providing for the identification of new sources of water supply of comparable quantity and quality, as required by the Savings Clause, may result in disruption of the achievement of those regulatory requirements currently in place for water supply.

### *Desired Outcome*

- Data and methods should be incorporated to ensure proposed operations improve Lake Okeechobee ecology, protect water supplies and are robust and resilient to expected climatic variability.
- Lake Okeechobee operations should achieve all authorized purposes and continue to guarantee the commitments to the protection of water supply and flood control as envisioned in CERP.
- Future Lake Okeechobee operations should result in the reduced frequency and severity of water use restrictions/cutbacks on public water supply utilities and existing legal users, as compared to those which occur under LORS2008.
- Savings clause analyses should be conducted during LOSOM to ensure flood control and water supply protections are guaranteed, consistent with state and federal law and consistent with CERP's central tenet which was to supply water for future development.
- Future Lake Okeechobee operations should remain within authorized purposes and recognize that Lake Okeechobee operations are linked to the C&SF Project, CERP and all associated water supply planning and regulatory frameworks that rely on planned CERP infrastructure.
- A base condition for the re-evaluation of Lake Okeechobee operations should be established that recognizes the reliance of existing state and federal programs on WSE.
- Evaluations should include a base condition that recognizes the obligation to provide a 1 in 10 level of drought protection for existing legal users and incorporate performance measures to maintain those protections in order to fulfill the commitments of previous planning efforts.
- Any proposed changes to Lake Okeechobee operations should include performance measures that ensure improved levels of protection against saltwater intrusion and maintain the hydraulic gradient necessary to prevent saltwater intrusion into coastal wellfields.

## Additional Operational Flexibility

### *Issues and Concerns*

Palm Beach County has serious concerns regarding the Corps' use of LORS2008's additional operational flexibility during early 2019 and the decisions by the Corps and the South Florida Water Management District (SFWMD) to drastically reduce Lake Okeechobee water levels and discharge unnecessary and unwanted Lake Okeechobee water to the Lake Worth Lagoon. Based on the experience of 2019, water management operations under additional operational flexibility are too subjective and have the potential to deviate from balanced operations and be influenced by non-technical input. Also, due to the undefined nature of additional operational flexibility, its implementation may jeopardize project purposes and impact other resources and cannot be appropriately evaluated, and therefore, it may not adhere to the intent and purpose of the National Environmental Policy Act (NEPA).

### *Desired Outcome*

- The concept of additional operational flexibility needs to be re-evaluated and re-considered.
- Instead of ambiguous additional operational flexibility with undefined constraints, well-defined operational deviations should be pursued and associated impact evaluations should be conducted consistent with the intent and purpose of NEPA.

## Shared Adversity

### *Issues and Concerns*

Recent regional water management operations decisions reveal that an approach to reducing undesirable Lake Okeechobee discharges to the coastal estuaries is to direct Lake Okeechobee discharges to the Lake Worth Lagoon in Palm Beach County without engaging or informing potentially affected stakeholders, perhaps under the guise of “shared adversity”.

### *Desired Outcome*

- Future Lake Okeechobee operations should avoid and/or minimize Lake Okeechobee discharges to the Loxahatchee River and Lake Worth Lagoon, unless requested by stakeholders to assist in achieving key CERP RECOVER ecosystem goals.
- The concept of “shared adversity” needs to be reconsidered as its implementation results in harm to the Lake Worth Lagoon but provides no discernable reduction in impacts to the St. Lucie or Caloosahatchee estuaries due to the infrastructure constraints that exist within the regional water management system and the large amount of stormwater runoff that is generated in Lake Okeechobee tributary basins.
- If Lake Okeechobee operations have the potential to affect the Lake Worth Lagoon, the collection and reporting of water quality monitoring data essential to assess the conditions associated with freshwater discharges to the Lake Worth Lagoon consistent with other estuaries (e.g. St. Lucie and Caloosahatchee) should be implemented.
- If Lake Okeechobee operations have the potential to affect the Lake Worth Lagoon or existing legal users, additional venues for stakeholders to provide input on Corps/SFWMD operational decisions should be initiated.

## Economic Impacts

### *Issues and Concerns*

Palm Beach County, with more than 1.4 million residents, is the third most populous county in Florida with an economy sustained by real estate development, tourism and agriculture. Palm Beach County is a leading tourist destination for visitors from around the world and leads the state in agricultural productivity. Palm Beach County is also one of the top 10 agricultural producing counties in the nation with over \$2.5 billion in economic activity. Agricultural operations in the Everglades Agricultural Area (EAA) include four raw sugar mills, two sugar refineries, a rice mill and eight large fresh market vegetable packing and distribution facilities. This region is the nation’s top producer of fresh sweet corn and sugarcane and leads the state of Florida in the production of winter leaf crops, radishes, sod and rice. Palm Beach County also leads the state in sweet pepper, cucumber, eggplant, and herb production.

Palm Beach County residents, taxpayers and visitors depend on predictable and reliable water supplies to sustain a robust and diverse economy. If western Palm Beach’s County’s water supply were negatively affected due to Lake Okeechobee operations, the agricultural-based economy in the Glades region would be crippled. Palm Beach County is concerned that the reduced water supply reliability that occurred as a result of LORS2008 will continue or worsen under LOSOM.

Previous drought conditions have resulted in significant economic losses suffered by Lake Okeechobee-area tourism and recreation industries. Motels, fishing guides, ecotour operators, marinas, and other small businesses are not able to withstand sustained periods of low revenues and employee layoffs typically result. Palm Beach County is concerned that drastically lowering Lake Okeechobee would result in restrictions on recreational and commercial fishing, which would impact small businesses such as marinas, fishing guide services and the hospitality industry.

#### *Desired Outcome*

- Performance measures should be developed and utilized that appropriately and accurately characterize impacts and risks to all communities as it relates to the environment, businesses and the economy.
- Future Lake Okeechobee operations should minimize restrictions on navigation and recreational and commercial fishing and minimize related impacts to small businesses such as marinas, fishing guide services and the hospitality industry.

## Flood Risk and Flood Insurance

#### *Issues and Concerns*

Palm Beach County believes that the most recent version of the digital flood insurance rate maps (DFIRMs) for the Glades communities, located southeast of Lake Okeechobee in western Palm Beach County, remain insufficient due to the failure to incorporate necessary revisions based on completed and ongoing HHD rehabilitation activities by the Corps.

The population of the Glades communities is characterized by the state of Florida has having low to moderate household incomes, and its economy is primarily agriculture- and recreation-based. Long-term unemployment and pervasive poverty are huge challenges confronting the region. Since the DFIRMs do not consider the improvements to the HHD, the resultant flood zones and associated insurance rates resulted in negative impacts to an already economically depressed area. The impacts also have stifled the County's ability to attract businesses to the area and spur economic development in the region.

#### *Desired Outcome*

- Future Lake Okeechobee operations should reduce flood risk and flood insurance premiums for residents and businesses in the Glades communities.
- The Corps should work closely with the Federal Emergency Management Agency to complete the certification of repaired portions of the HHD and update DFIRMs.

## Conclusion

Palm Beach County appreciates the opportunity to provide public scoping comments on LOSOM. Lake Okeechobee is an integral component of Everglades Restoration and is critical to meeting the environmental restoration and water supply needs of South Florida. Palm Beach County residents, taxpayers and visitors depend on predictable and reliable water supplies to sustain a

robust and diverse economy. As stated above, ongoing planning activities to re-evaluate Lake Okeechobee operations, along with current Lake Okeechobee operations, are top priorities for the County.

Palm Beach County opposes drastically lowering Lake Okeechobee to levels not supported by sound science, which would induce drought conditions, impact the ability to deliver water to critical ecosystems, and result in significant environmental damage.

Palm Beach County hopes that any updates to Lake Okeechobee operations, in conjunction with commitments to fund and implement CERP projects, will result in ecosystem restoration, improved regional water management, and the continued commitment to water supply guarantees to existing legal users and the development of water resources projects to meet future demands as contemplated in CERP and WRDA2000.

In addition, Palm Beach County looks forward to collaborating with the Corps and SFWMD during future LOSOM workshops and sub-team meetings.



## RESOLUTION NO. 2019- 0379

**RESOLUTION OF THE BOARD OF COUNTY COMMISSIONERS OF PALM BEACH COUNTY, FLORIDA, ON THE RE-EVALUATION OF LAKE OKEECHOBEE OPERATIONS BY THE U.S. ARMY CORPS OF ENGINEERS PURSUANT TO THE NATIONAL ENVIRONMENTAL POLICY ACT ASSESSMENT FOR THE LAKE OKEECHOBEE SYSTEM OPERATING MANUAL**

**WHEREAS**, Lake Okeechobee is the liquid heart of an integrated regional water management system and is essential and interconnected to communities, businesses, public water supply utilities and ecosystems throughout Palm Beach County; and

**WHEREAS**, Lake Okeechobee is an integral component of the Comprehensive Everglades Restoration Plan (CERP) and is critical to meeting the environmental restoration and water supply needs of South Florida; and

**WHEREAS**, Lake Okeechobee is essential to protecting the region's water supply infrastructure from saltwater intrusion by providing a source of freshwater to prevent the migration of saltwater into coastal wellfields; and

**WHEREAS**, Lake Okeechobee's authorized project purposes include flood control, water supply, recreation, navigation, environmental effects to fish and wildlife, and cultural and recreational resources; and

**WHEREAS**, Section 1106 of the 2018 Water Resources Development Act (WRDA) directs the Secretary of the Army to expedite completion of the Lake Okeechobee regulation schedule to coincide with completion of the Herbert Hoover Dike project, and may include all relevant aspects of the CERP; and

**WHEREAS**, in January 2019, the County received notice from the U.S. Army Corps of Engineers (Corps) that, in accordance with Section 1106 of the 2018 WRDA, the Corps is beginning preparation of a National Environmental Policy Act (NEPA) assessment for the Lake Okeechobee System Operations Manual (LOSOM), which is to re-evaluate and define operations for the Lake Okeechobee regulation schedule that takes into account nearly complete additional infrastructure which will soon be operational components of the water management system; and

**WHEREAS**, rehabilitation activities on Lake Okeechobee's Herbert Hoover Dike by the Corps began in 2001 and are expected to be complete by 2022; and

**WHEREAS**, the Lake Okeechobee Regulation Schedule of 2008 (LORS08) was implemented as an interim measure to protect the public from the risk of catastrophic failure of the Herbert Hoover Dike; and

**WHEREAS**, Palm Beach County, in partnership with state and local partners, has invested over \$500 million in the acquisition, restoration and management of approximately 32,000 acres of natural areas and invested approximately \$88 million to restore the Lake Worth Lagoon; and

**WHEREAS**, Palm Beach County wishes to provide direction as to which measures that Palm Beach County supports and opposes in the Lake Okeechobee operations re-evaluation process and the resultant LOSOM.

**NOW THEREFORE, BE IT RESOLVED BY THE BOARD OF COUNTY COMMISSIONERS OF PALM BEACH COUNTY, FLORIDA**, that the Board hereby *supports* the following as it relates to the re-evaluation of Lake Okeechobee operations by the Corps:

1. A science-based evaluation that is transparent and acknowledges and balances all congressionally-authorized purposes of Lake Okeechobee operations; and
2. Performance measures that appropriately and accurately characterize impacts to all communities as it relates to water supply, the environment, and the economy; and
3. The incorporation of data and methods to ensure proposed operations improve lake ecology, protect water supplies and are robust and resilient to expected climatic variability; and

4. The implementation of water storage and water quality treatment projects in Lake Okeechobee tributary basins north of the Lake; and
5. Lake Okeechobee operations that reduce flood risk and flood insurance premiums for residents and businesses in the Glades communities located southeast of Lake Okeechobee; and
6. Lake Okeechobee operations that assist in achieving restoration flows and other key ecosystem goals, including performance measures developed by CERP's Restoration Coordination & Verification (RECOVER) program; and
7. The avoidance and/or minimization of Lake Okeechobee discharges to the Lake Worth Lagoon and the Loxahatchee River; and
8. Reductions in water use restrictions and cutbacks on public water utilities and existing permitted users, as compared to those which occur under LORS08.

**AND BE IT FURTHER RESOLVED** that the Board *opposes* the following as it relates to the re-evaluation of Lake Okeechobee operations by the Corps:

1. Drastically lowering Lake Okeechobee to levels not supported by sound science (e.g. 10.5 feet) which would induce drought conditions, impact the ability to deliver water to critical ecosystems, and result in significant environmental damage; and
2. Lake Okeechobee operations that result in increased risk of saltwater intrusion into coastal wellfields which would cause irreversible damage to freshwater supplies, affect the health and safety of residents, and result in the need for massive alternative water supply infrastructure investments; and
3. Lake Okeechobee operations that result in restrictions on recreational and commercial fishing, which would impact small businesses such as marinas, fishing guide services and the hospitality industry.

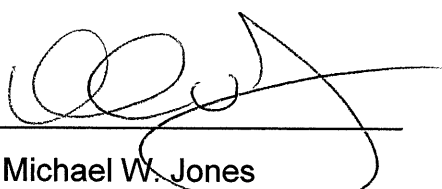
This Resolution shall become effective immediately upon its adoption.

The foregoing resolution was offered by Commissioner McKinlay, who moved its adoption. The motion was seconded by Commissioner Weiss, and upon being put to a vote, the vote was as follows:

|                                 |   |     |
|---------------------------------|---|-----|
| MACK BERNARD, Mayor             | - | Aye |
| DAVID KERNER, Vice Mayor        | - | Aye |
| COMMISSIONER HAL R. VALECHE     | - | Aye |
| COMMISSIONER GREGG K. WEISS     | - | Aye |
| COMMISSIONER ROBERT S. WEINROTH | - | Aye |
| COMMISSIONER MARY LOU BERGER    | - | Aye |
| COMMISSIONER MELISSA MCKINLAY   | - | Aye |

The Mayor thereupon declared the resolution duly passed and adopted on this 12th day of March, 2019.

APPROVED AS TO FORM AND  
LEGAL SUFFICIENCY

BY:   
Michael W. Jones  
Senior Assistant County Attorney

PALM BEACH COUNTY, FLORIDA  
BY ITS BOARD OF COUNTY  
COMMISSIONERS  
SHARON R. BOCK, CLERK

BY:   
Deputy Clerk

