

Florida Department of Environmental Protection



Lake Okeechobee Basin Management Action Plan (BMAP) Overview

November 18, 2014





Presentation Overview

- Brief review of BMAP process
- Brief overview of BMAP document
- Summary of comments
- Next steps



Basis of BMAP

- BMAP contents and process are defined in Chapter 403.067, Florida Statutes
- Statute requires BMAP development to be a stakeholder-driven process
- BMAP is adopted by Secretarial Order
- Annual updates from stakeholders each year after adoption
- BMAP will be periodically updated
(Adaptive Management Approach)



THANK YOU FOR YOUR TIME!

- How we got here...

Stakeholder/Technical meetings:

- Initiated February 2013
 - Four additional meetings in 2013
- 2014
 - Four meetings held (January to April)
- September 17, 2014 – Presented draft BMAP
- Draft released for review to stakeholders November 7
- Comments received, discussions with numerous stakeholders
- ...today's meeting.



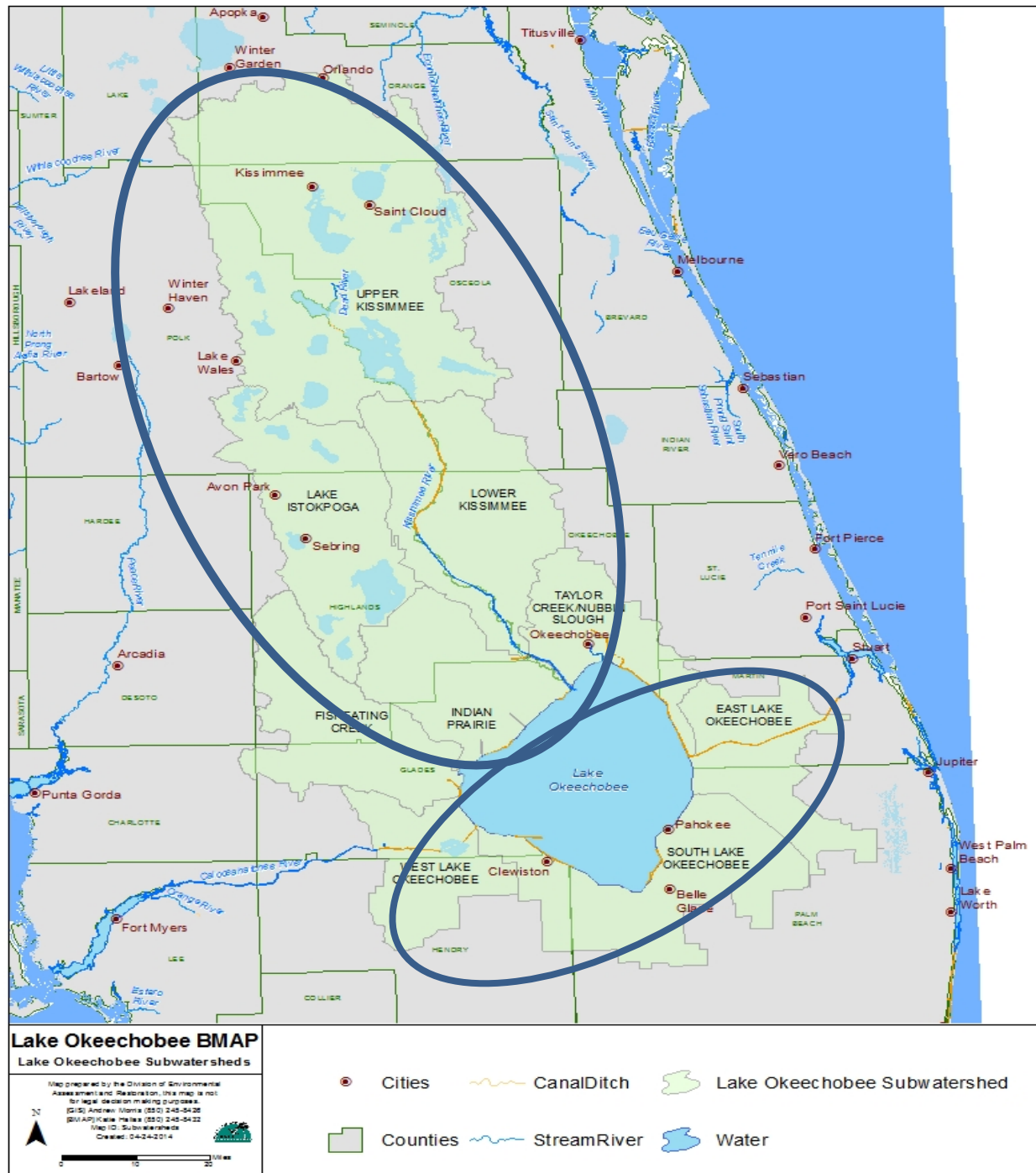
BMAP Document

Key Components of the BMAP Document

- Overall setting of the BMAP
- Assumptions/Considerations
- Projects/Load reductions
- Assessing progress/Updates



Lake Okeechobee Watershed (LOW) sub-watersheds





BMAP Document

Executive Summary

- Overall summary of BMAP document
- Excellent “briefing” document
- Covers short-term and longer term projects

Category	TP reduction (MT/yr)
Existing Load*	448.3
Reductions Needed to Achieve TMDL (105 MT**)	343.3
Total Reductions Achieved (Table ES-1 through Table ES-6)	103.46
Projects Under Development with Coordinating Agencies (Table ES-7)	45.81-48.13
Total Reductions (Table ES-1 through Table ES-7)	149.27-151.59 (43.5%-44.2%)
Total Reductions Remaining to Meet TMDL	191.71-194.03

*The existing load is the long-term average as calculated with the WAM load estimation tool. This is calculated using information only for the six northern sub-watersheds, although the TMDL applies to all nine sub-watersheds. The existing load will be updated to include all sub-watersheds once the WAM updates are complete.

**The 105 MT/yr applies to all of the sub-watersheds and is not an allocation to any collection of sub-watersheds.



BMAP Document

- Project Tables
 - Short term and longer term projects
 - Submitted by stakeholders
 - Current/Underdevelopment projects
 - Individual project information:
 - Location
 - Category/Type of project
 - Status/Costs
 - Estimated load reductions



BMAP Document

- Assessing Progress/Implementation
 - Water quality monitoring
 - Data management/Assessment
 - Key components for;
 - Identifying areas for increased/decreased implementation actions
 - Refining estimates/assumptions
 - Project(s) assessment
 - Annual reports from stakeholders
 - Periodic BMAP updates
 - Continuing efforts on project development



Comments Overview

- Comments on the BMAP document
 - More than 800 comments received
 - ~22 stakeholder groups
- The major categories of comments include:
 - Northern and Southern Sub-Watersheds
 - Project tables/Reduction calculations
 - WAM modeling
 - Legacy phosphorus
 - Total nitrogen
 - BMAP costs



Comments Overview

- Northern and Southern Sub-Watersheds
 - TMDL applies to entire watershed (north and south)
 - Projects currently focus on northern but BMAP includes northern and southern
 - Comments (confusion) addressed in the document and maps updated



Comments Overview

- Project Tables
 - Numerous requests to:
 - Revise/Update project lists
 - Revise table information/format
 - Revise load reduction calculations
 - Discussion(s) with stakeholders on specific comments
 - Revised tables/Information updated as necessary



Comments Overview

- WAM (Watershed Assessment Model)
 - Comments included:
 - Requests for additional information
 - Further explanation of specific modeling components
 - Numerous technical discussions to address questions
 - Updates included to address questions and concerns



Comments Overview

- Legacy Phosphorus
 - Legacy phosphorous is an issue in the basin
 - Additional information/literature provided - citations included in document
 - Ongoing effort (Coordinating Agencies)
 - Identify/Research sources
 - Study impact(s) to watershed



Comments Overview

- Total Nitrogen (TN)
 - TN is an issue in downstream estuaries
 - Projects that address TP typically also reduce TN
 - Provided estimates for TN reductions where information was available



Comments Overview

- BMAP Costs
 - Comments/Requests included:
 - Refined BMAP funding estimates
 - Lack of cost data
 - Better defining/explaining cost information in tables
 - Additional language added to document and tables
 - Additional tables added to address requests



Next Steps

- Document out for review...
 - Comments received
 - Revisions/updates
 - Adoption
 - Continued effort on project identification and development



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