

Upper Ocklawaha Basin Management Action Plan (BMAP) Annual Meeting
Florida Department of Environmental Protection (DEP)
June 22, 2022, via GoToWebinar
1:00 pm – 2:31 pm

Attendees

Beth Alvi, Audubon	Kenneth Hayman, DEP
Suzanne Archer, SJRWMD	Janet Hearn, ATM-Geosyntec
Lisa Bally, RES	Cori Hermle, FDACS
Sean Beaudet, Lake County	Moirra Homann, DEP
Steve Beck, FWC	Mitchell Katz, Orange County
Scott Bisping, FWC	Tracy Kelley, Wildwood
Julie Bortles, Orange County	Kevin Koehler, Dewberry
Hseth Burch, Ocoee	Emily Lawson, Orange County
Tiffany Busby, Wildwood Consulting	Jen Lomberg, Matanzas Riverkeeper
Lauren Campbell, DEP	Erich Marzolf, SJRWMD
Cathie Catasus, Lake County	Lori McCloud, SJRWMD
Sheryn Chester, Citizen	Patrick McCord, FWC
Carolyn Ciarlariello, DEP	Nicholas Mcray, Lake County
Mike Collazo, Florida Senate	Gabrielle Milch, St. Johns Riverkeeper
Susan Davis, SJRWMD	Nicole Morgan, DEP
Dean Dobberfuhr, SJRWMD	Jessica Mostyn, DEP
Lauren Dorval, FDACS	Claire Muirhead, SJRWMD
Pamela Dugan, Eutrophix	Kevin O'Donnell, DEP
Richard Earp, Apopka	Benjamin Ralys, DEP
Yesenia Escribano, FDACS	Charles Shinn, Florida Farm Bureau
Chris Farrell, Audubon	Jess Stempfen, FDACS
Jessica Fetgatter, DEP	David Taylor, DEP
David Frady, DEP	Jennifer Thera, FDACS
Melissa Fuller, Eustis	Scott Towler, Government Services Group
Rolly Fulton, Citizen	Diana Turner, DEP
Roxanne Groover, FOWA	Christine Vrabec, Marion County
Samuel Hankinson, DEP	Eden Yarborough, SJRWMD
Madeline Hart, FDACS	

Welcome

Tiffany Busby welcomed everyone and reviewed the GoToWebinar features. Tiffany noted that Jessica Fetgatter is the basin coordinator and provided her email address at Jessica.Fetgatter@FloridaDEP.gov. Jessica can also be reached by phone at 850-245-8107.

Statewide Annual Report Update

Jessica Fetgatter reminded everyone that the initial BMAP was adopted in 2007 to address nutrient impairments in 10 waterbodies. The most recent BMAP amendment was adopted in 2019. In 2014, priority waterbodies were selected that included Lake Carlton, Lake

Harris, Trout Lake, and the Palatlahaha River. The 2019 amendment added the impaired waters of Lake Dehnam, Lake Roberts, and Marshall Lake.

Jessica reviewed the annual progress report for the waterbodies – some waters are impaired only for total phosphorus (TP) and some waterbodies are impaired for both TP and total nitrogen (TN). She reviewed the cumulative reductions achieved and the number of projects in each status category. This summary includes 303 completed projects.

Jessica reviewed the [Upper Ocklawaha Story Map](#) and described the updates that are being made by July 1, 2022. Jessica noted that in the update, monitoring information has been added that shows the surface water quality stations and the flow stations within the basin. This information is not posted yet but will be updated online by July 1.

Jessica also showed snapshots of the [Statewide Annual Report \(STAR\)](#). This is the fifth annual report in the statewide format, as required by the Florida Legislature. The report includes information on the BMAPs, statewide, and corresponds to the prior calendar year for reporting. For STAR 2021, the data through 2021 were collected from local entities. In November 2021, a request to review the project data was sent out and the due date for responses was January 14, 2022. The report was compiled and by July 1, 2022, the report will be submitted to the Governor and Florida Legislature and web posted.

The STAR process began in 2015 when all the BMAP updates were compiled into one report. In 2021, an online portal was created to collect and update project information. A pilot version of the portal was tested starting in November 2021. For STAR 2022, all entities will use the portal to review and submit project updates. To access the project data, an FDEP Business Portal account and login is needed. Jessica urged everyone who will be editing or updating BMAP project information to sign up for an FDEP Business Portal login now and no later than July 31, 2022. This login will provide access to the BMAP project data when the portal reopens.

Jessica added that portal training will be held in October and the portal will re-open in mid-November for updates. The STAR 2022 updates are due no later than January 13, 2023, and all updates will be made in the DEAR – Restoration Project Data Portal. If you do not already have an FDEP Business Portal login, you can create one here: <https://www.fldepportal.com/DepPortal/go/home>.

All users must register for the FDEP Project Portal to have access to the BMAP project information. Please contact your coordinator if you use a different email address. Also, if you have additional staff or contractors helping with project updates, we need to know that. Tiffany emphasized that there is a two-step process for getting access to the BMAP database. The first step is to obtain an [FDEP Business Portal login](#), if you do not already have one. The second step is for Jessica to notify her DEP computer folks who needs access to the database. Please let Jessica know who on your staff (or consultants) needs access to your project information, so she can request access for you through your FDEP Business Portal login.

Q: Tracy Kelley asked if the City of Wildwood is already registered, are they awaiting a map?

A: Jessica said she had emailed back some information, but she will check on her response and make sure it was sent. Jessica noted the BMAP Project Portal is not yet open; lead entities will receive an email notice when it is opened and is ready for updates.

Clean Waterways Act Requirements

Jessica explained that the Clean Waterways Act requires that DEP incorporate local wastewater treatment plans and onsite sewage treatment and disposal system (OSTDS) remediation plans into all nutrient BMAPs by July 1, 2025. Jessica added that DEP held a statewide webinar a few months ago to review these requirements and request that local entities use existing information, collect new information, and/or provide these plans to DEP prior to the deadline. Jessica noted that the webinar materials are available online here, including the presentation materials and the recording of the webinar:

http://publicfiles.dep.state.fl.us/DEAR/BMAP/2025%20BMAP%20Updates/Meetings/2022/Clean%20Waterways%20Act_WWTF%20and%20OSTDS%20Requirements_March%2031/.

St. Johns River Water Management District (SJRWMD) Updates

Jian Di provided an update on the Ocklawaha Chain of Lakes water quality. Jian reviewed a map of the lakes and their locations. Next, he reviewed the TP loading for Lake Apopka. He showed a chart that demonstrated the loading; chlorophyll-a concentrations; and TP concentrations over time (1989 to 2021). The chart included the TP total maximum daily load (TMDL) concentration of 55 micrograms per liter ($\mu\text{g/L}$) and a TP loading of 15.900 metric tons per year (MT/yr). The lake is not yet meeting the TMDL concentration nor loading but the concentration and loading have generally decreased since 1989. The source categories that are exceeding the TP allocations are atmospheric deposition and stormwater runoff.

The Lake Beauclair chart was shown next. The TP target is 32 ($\mu\text{g/L}$) and the chlorophyll-a target is 30 $\mu\text{g/L}$. The lake is meeting the chlorophyll-a target but not the TP target. The 2021 loading was lower than the annual loading target, but the 2017 to 2021 average loading was still greater than the loading target.

Jian displayed the Lake Dora chart. The TP concentration target is 31 $\mu\text{g/L}$ and chlorophyll-a concentration was 29 $\mu\text{g/L}$. Lake Dora was not meeting either target in 2021. The TP loading target was met in 2021 but the 2017 to 2021 average loading was still greater than the loading target. He noted that the 2017 Hurricane Irma contributed high loads.

The Lake Harris chart was then reviewed. The TP concentration target is 26 $\mu\text{g/L}$ and chlorophyll-a was 22 $\mu\text{g/L}$. Lake Harris was not meeting either target in 2021. The TP loading target was not met in 2021 and also not with the 2017 to 2021 average loading. The TP loads have decreased since the 1990s, primarily due to elimination of discharges from the Harris Bayou Restoration Area. The remaining discharges from that area now flow to Lake Griffin. The atmospheric deposition to Lake Harris is over 30 percent of the total loading, as the lake is quite

large. Stormwater runoff is estimated to be 31 % of the total loading. The Palatlahaha discharges to Lake Harris are 15 % of the loading.

The Lake Eustis loading was shown. The TP concentration target is 25 µg/L and chlorophyll-a was 20 µg/L. Lake Eustis was not meeting either target in 2021. The TP loading target was not met in 2021 and also not meeting the target with the 2017 to 2021 average loading, although the values were close to the targets. Lake Dora and Lake Harris are major contributors to Lake Eustis.

The Lake Griffin chart was also reviewed. The TP target is 32 (µg/L) and the chlorophyll-a target is 30 µg/L. The lake is meeting the chlorophyll-a target and the TP target in 2021 but not for the 2017 to 2021 average (although it was close to meeting the concentration targets). The 2021 loading was higher than the annual loading target and the 2017 to 2021 average loading was greater than the loading target. The restoration of the Emerald restoration area and the Harris Bayou have lowered the loads to this lake.

Lake Yale, which discharges to Lake Griffin, was shown. The TP concentration target is 20 µg/L and chlorophyll-a was 14 µg/L. Lake Yale was meeting the chlorophyll-a concentration target but not the TP concentration target in 2021. The lake also met the chlorophyll-a 2017 to 2021 average concentration target. The TP loading target was not met in 2021 and also not meeting the target with the 2017 to 2021 average TP loading – the TP loading was almost double the TMDL targets. The lake was treated with herbicide and stocked with grass carp in the late 1990s; water quality has deteriorated since then. In 2017, Hurricane Irma caused an increased lake state which might have led to the declining chlorophyll-a concentration in recent years.

Jian showed the Lake Weir chart. The concentrations and loadings have increased over time. The TP concentration target is 10 µg/L and chlorophyll-a was 6 µg/L. Lake Weir did not meet the chlorophyll-a target nor the TP concentration target in 2021. The lake also did not meet the chlorophyll-a 2017 to 2021 average TP concentration target. The TP loading target was not met in 2021 and Lake Weir was also not meeting the target with the 2017 to 2021 average TP loading. The atmospheric deposition may be important to this lake and also the groundwater concentrations.

Lake Weir also has a total nitrogen (TN) TMDL, so a separate TN chart was provided. Jian noted that before 2001 all the TN loadings were below the TMDL target. After that time, they exceeded the TMDL target. The TN target is 0.68 mg/L. In 2021 the lake did not meet the TN concentration target nor the loading target. Atmospheric deposition is a relatively large source for Lake Weir.

Lake Carlton is a small lake (less than 400 acres) and the loading over the years has not changed that much. The water quality has improved over time because of the improvements in Lake Beauclair. Stormwater runoff is important for Lake Carlton. The TP concentration target is 32 µg/L and chlorophyll-a target is 30 µg/L. Lake Carlton met the chlorophyll-a target but not the TP target in 2021. Lake Carlton also did not meet the 2021 TP loading target.

Trout Lake charts for TP, chlorophyll-a, and TN were shown. Trout Lake did not meet TP, chlorophyll-a, nor the TN concentration targets. Water quality is generally improving but is still not meeting the targets.

Lake Denham charts were provided for TP, Chlorophyll-a, and TN. Lake Denham did not meet TP, chlorophyll-a, and TN concentration targets. Loading data are not yet available for Lake Denham.

Jian showed bar charts that demonstrate the 2021 annual TP load departure from the TMDL targets, by lake. Lake Carlton has the worst TP load departure and Lake Dora has the best TP load conditions. Jian also showed the 2021 annual TP concentration departure from the TMDL targets, by lake. Trout Lake is the most over the TP concentration target. Lake Griffin is the best, followed by Lake Carlton. The worst TP concentration exceedances are Trout Lake, Lake Denham, and Lake Weir.

Jian provided a summary slide that noted the TP load in lakes Apopka, Beauclair, and Dora met or almost met their respective TMDL targets. Conversely, Lake Carlton and Lake Yale greatly exceeded their 2021 TMDL loading targets. In terms of 2021 TP concentrations, Trout Lake, Lake Denham, and Lake Weir had the largest exceedance of their TP concentration targets and, thus, the worst water quality. Lake Griffin did the best with TP concentrations, followed by Lake Carlton, Lake Eustis, Lake Beauclair, and Lake Yale.

Jian can be reached via email at JD@sjrwmd.com.

Q: Mitchell Katz noted that internal recycling is a major source of TP (e.g., Lake Jesup). Mitchell asked, "Did the SJRWMD estimate the TP loading from internal recycling?"

A: Jian answered that a good example is Lake Apopka where the watershed loading for the lake is almost meeting the TMDL loading but the TP concentration is still high. The elevated TP concentration is due to the internal TP loading. Jian added the TMDL estimates focused on the watershed loads and not estimating the internal loads within the lakes.

Q: Charles Shinn asked about Lake Weir's data and how is the septic tank data so consistent from year to year? Is it due to modeling?

A: Jian noted the septic system loads are based on the numbers of homes in the 2017 survey data. Then a formula is used to calculate those loads. These can be updated and SJRWMD continues to seek better methods to update and calculate these kinds of inputs.

Q: Mitchell Katz had comments about Lake Carlton. When the Nutrient Reduction Facility (NURF) feeds "clean" water to Lake Beauclair there is a seiche effect that feeds a portion of the clean water to Lake Carlton. Mitchell added that he thinks that keeping the NURF running is key to water quality improvements in these lakes.

A: Jian responded yes, the NURF facility is a tremendous help for improving water quality in the downstream lakes.

Q: Mitchell asked for onsite sewage treatment and disposal systems (OSTDS), what attenuation, TP, and TN loading per capita parameters is SJRWMD using? Are you using DEP values? EPA values?

A: Jian responded that literature values were used but he does not know the values offhand. There are two ways SJRWMD uses to calculate OSTDS loads – using DEP values and a literature-based approach. Jian added that he thought his predecessor, Rolly Fulton, used a literature-based approach that allowed him to customize the loading estimates based on some local information.

Q: Mitchell noted that it appears SJRWMD is selling surplus properties. He asked is SJRWMD evaluating these properties for their potential for constructing water quality improvement projects before the sale?

A: Jian stated that the district's land operations staff have consulted with him about certain properties; they do consider the potential impacts on water quality from their properties.

Florida Department of Agriculture and Consumer Services (FDACS) Updates

Cori Hermle reviewed the agricultural land acres and enrollment numbers in the BMAP area. There are an estimated 18 % ag lands (based on FSAID VIII). Of the ag lands in the basin, 78 % are enrolled with 78,316 acres remaining to be enrolled. State owned lands are set aside from the unenrollable analysis. Of those unenrolled acres, about 56 % are potentially enrollable but 44 % are not (about 33,000 acres). Unlikely enrollable acres include slivers, conflicting tax classifications, or timberland and aquaculture lands that are enrolled through other programs. Cori showed information on the parcel sizes of the enrollable acres. Most of the parcels that need to be enrolled are between one and 25 acres.

The Clean Waterways Act gave a time limit to verify the status of implementation. The law requires IV site visits every two years. Of this effort, 97 % are completed. Cori reviewed the outreach efforts conducted by FDACS. These efforts include frequently asked questions, technical assistance, a YouTube playlist, and continue collaboration with the University of Florida-Institute of Food and Agricultural Sciences (UF-IFAS) Extension. Cori also provided the link to the FDACS research webpage, and she reviewed the research priorities.

There is an annual legislative report; the 2021 report will be posted on the FDACS website by July 1, 2022. She reviewed the general contents of the report and noted there is an interactive story map also. See <https://www.fdacs.gov/Divisions-Offices/Agricultural-Water-Policy>.

Cori can be reached by phone 850-688-6156 or via email at Corinne.Hermle@fdacs.gov.

Unenrolled Agricultural Producer Enforcement

David Frady introduced himself and that he works closed with FDACS staff to get unenrolled parcels into compliance. David explained that DEP is in charge of enforcement action on those parcels that are not enrolled in agricultural BMPs where they are required by the BMAP. David reviewed the general process for working with an enrolled parcel and getting them into compliance. FDACS provides to DEP a list of parcels and case files of those parcels that FDACS believes are not enrolled. One of the difficulties is that the local property appraisers' sites are out of date. There are many sales of agricultural lands. The big first step is verifying the status of the parcels. Then the approach is to use education first and then enforcement.

The approach is to first send a compliance assistance letter that explains that compliance is needed. Most of these parcels are small properties. The biggest challenge is getting the owner or

manager on the phone and talk to them, so they understand this is a legal obligation and a benefit to them and to the environment.

For those that are still out of compliance after the education phase, then DEP moves into compliance mode. DEP focuses on large parcels, so the effort is more worthwhile. DEP has recently engaged a contractor to knock on doors and to speak to these property owners.

David can be reached at 850-245-8559 or via email at David.Frady@floridaDEP.gov.

Q: Jen Lomberk asked if there is a timeline for updating the current agricultural BMP manuals.

A: Cori replied there is not a set timeline for updating the BMP manuals but when there are substantial technical improvements that need to be included, the manuals are updated. The Sod Manual and Cattle Manual (previously called the “Cow-Calf Manual”) will be the next BMP manuals to be updated.

Adjournment

The meeting adjourned at 2:31 pm.

Action Items

Jessica--Check on the email response to Tracy Kelley/City of Wildwood and make sure it was sent.

All--Everyone who will be editing or updating BMAP project information should sign up for an FDEP Business Portal login now and no later than July 31, 2022. Also, once you have a login, please notify Jessica Fetgatter that you and any of your colleagues and consultants that will be updating project information will need access to your entity's project data.

All – Continue to follow information on the Clean Waterways Act requirements and the need for local OSTDS and wastewater remediation plans to be included in the BMAP by July 2025.