

Lake Massapoag Advisory Committee – Updates - 2022

September 30, 2022 Update

It has been a busy summer for LMAC, with much new data on lake and inflow water quality, summarized in the Lake Dashboard and Water Quality page. Big picture, the summer drought meant less rain, runoff, and harmful inflows through much of August compared to last year, with no significant cyanobacteria (blue-green algae) bloom vs. 2021.

However, Community Center Beach continued to experience frequent E. coli closures. Monthly testing during a rainstorm in late August, and post-rain testing after a heavy rainstorm in early September, resulted in high E. coli and phosphorus readings at many of the lake's inflows - underscoring the need to focus on limiting nutrient inflows from lawn fertilizers, and nutrients and bacteria from older septic systems, as top priorities.

The Lake Level and flume channel depth and flow are lower than ideal given the sustained drought this year. The heavy rain in early September fueled a couple of localized cyanobacteria blooms, but they dissipated quickly. Year to date Rainfall and Temperatures underscore the impact of the drought and heat on lake conditions.

LMAC produced and added new educational posters to the Memorial Beach Path kiosks, with help and information from DPW, NepRWA, Sharon Historical Society, and more. Electronic copies are available to organizations who want to print them for display. LMAC is hosting a Lake Information Walk and table at Sharon Day.

LMAC plans additional targeted testing, in addition to its final rounds of monthly inflow and professional lake site testing, in October, and a sediment grab in the Deep Hole to get a baseline measure of phosphorus accumulation. LMAC submitted an application to the MASSDEP 604b Water Quality Management Planning Grant to develop a Watershed-Based Plan in August. In September, New England Aquatic Services performed 8 days of Diver-Assisted Suction Harvesting (DASH) to remove fanwort in the South Cove. Significantly more days will be needed in the future to get ahead of invasive weeds in shallow areas of the coves.

Sustained effort and investments to safeguard lake water quality, limit excess nutrients, harmful bacteria, and invasive weeds will be needed for several years, as more intense weather associated with climate change increase the impact of rain, runoff and heat.

July 1, 2022 Update

On May 2nd, Sharon Town Meeting approved a Community Preservation Commission grant of \$24,500 for comprehensive lake testing, which is now underway, and for educational activities, including new posters in the beach path kiosks. Town Meeting also approved Article 15 to expand and update the membership and charge of the Committee, which is official when the Warrant is approved by the Attorney General.

The Committee held a Lake Information Walk April 24, which you can join via YouTube, and organized a "Citizen Science" Cyanobacteria Training with EPA on May 7; view the PowerPoint presentation here. Expanded testing began in May and June, with a professional testing firm collecting comprehensive water quality indicators at three in-lake sites, Conservation Dept. staff collecting phosphorus and E. coli

samples at 10 inflow and upstream sites to the lake, and a volunteer collecting a half dozen indicators at Sucker Brook monthly, which we added as a new site to NepRWA's Community Watershed Monitoring Network (CWMN) program. Sharon Board of Health continues its weekly beach E. coli testing and monthly E. coli testing at the inflow and upstream areas, and we are reporting integrated results for the various lake sites.

Click the tabs at left for the latest 2022 YTD data in 2021 - 2022 Lake Water Level, and 2021 - 2022 Lake Water Quality. You can view comparative data for the last five years in the tabs for both swimming and non-swimming (inflow and upstream) areas.

Because of Lake Massapoag's large watershed which brings runoff of excess nutrients during rainstorms, and large groundwater protection district which feeds the town's drinking water wells, we ask residents and businesses to do everything you can to help protect the lake and water supply. We invite you to download and print our new poster, Top Ten Things You Can Do to Protect Our Lake and post it on your refrigerator or other convenient place, and help spread the word. We invite residents, students, businesses, clubs, civic, community, and religious organizations to contact us with information and ideas on how you can help, lakecom@townofsharon.org. Thank you.

April 15, 2022 Update

The Lake Management Study Committee met four times since January to plan for the year ahead. See our new website, www.lakemassapoag.net, for easy-to-find information on the lake and how to help protect its future. Our activities include:

Warrant Article 15 to expand the membership and scope of the Committee;

Grant request to Community Preservation Committee (CPC) for expanded lake testing and education, and an increase in the annual budget for FY2023;

Plans for new posters at the beach kiosks, and community education;

Plans for expanded lake, inflow and upstream water quality/nutrient testing to develop an updated baseline of lake health, challenges, and hot spots;

Add Sucker Brook as a new site for NepRWA's CWMN program;

Plans for invasive weed removal in the S & Fletchers' coves Aug-Sept 2022;

Learn about identifying and treating cyanobacteria via contacting experts, webinars, "citizen science" initiatives, and using CyAN Web data to view seasonal fall/spring peaks in cyanobacteria blooms in the lake;

Graphing lake level, flume depth/flow, and temperature from flume house logs YTD to track impacts of rainfall, runoff, heat, and dry spells.

Upcoming Events:

- Lake Information Walk - April 24 10-11 am, Memorial Park Beach
- Town Meeting – votes on Warrant Article 15, CPC grant, and FY23 budget for LMSC
- EPA Training on Cyanobacteria Identification – May 7 10 am-1 pm, MYC, 58 Lakeview