



Town of Groton Massachusetts Great Pond Advisory Committee

Meeting Agenda and Minutes

September 15, 2016

Present

Chairman: Jim Luening

Members: Francoise Forbes, Marshal Giguere, Alex Woodle, Art Prest, Bill Strickland

Guests: Jack McCaffrey, Water Commissioner

Judy Anderson, Duck Pond

Mike Moore, Duck Pond

Meeting Caller to order at 7:05 by Jim

Financial: \$2385.000

Encumbered fund of \$2000.00 were transferred to the Groton Lakes Ass. to pay for the weed treatment.

Water Commission: (Jack Mccaffrey Chairman)The Water Department has been in a drought condition for 18 -36 Months. The Commission is working with Consultants to evaluate the conditions. Whitney well was extreme in July. They need to protect the aquifer and studying how to improve and need to determine if this condition is a trend or cyclic and what will happen if this trend continues.

1. The Commission is requesting to delay draw down in Lost Lake to November.
2. Consider not doing a drawdown or at least not do a complete draw down.

Alex indicated that this may be a problem due to ice conditions that will damage the shore line and this needs to be conveyed to shore residents. Art indicated it is not clear who is in control. Art George Day made the boards and Val Prest made the brackets. The town owns the land and Tom Delaney is in charge and has deferred to the Groton Lakes Association. Art also commented that he is concerned with his wells Alex asked if blocking the output of Whitney will help. Jim asked How much water Baddacook supplies? Baddacook supplies about 20%.

Jim took an action to talk to Brad Harper and Jack will send an Email discussing action 1 and 2.

Duck Pond: Judy Anderson indicated that the pond is down about 15" and the weeds are very bad. Alex indicated that the GPAC should consider having solitude do a survey. He also indicated that he has never been on Duck Pond, He and Bill took and action to look at the conditions.

The GPAC voted to expend funds to do a bathymetry study of Baddacook Pond and an initial study of Duck Pond. Jim Luening to the action to execute this action if it is within the budget of the GPAC.

Water-Shed Advisory Committee: Art indicated that the committee is developing a watershed protocol testing that will be submitted to the Town for approval.

Lost Lake: Art indicated that the nutrients level is very high and lots of Bladderwort. The Bladderwort is more dangerous for swimmers than fanwort or milfoil. They considered bringing the Harvester in and the Notice of Intent had expired and needed to be redone for future use.

Baddacook: Solitude had toured on 8/19/2016

Email from Marc Bellaud, 8.24.2016....

Jeff Castellani and I toured Baddacook Lake on August 19th. We went down to look at the Town's harvester and had an opportunity to speak with Bill Strickland.

Based on what we saw, we would not recommend pursuing a lake-wide program to remove the fanwort with harvesting followed by DASH. Our primary reason for not recommending this strategy is that the fanwort appears to be reach in the surface into water depths of 12 feet or more. The Town Harvester appears to only cut to a depth of 5 feet. SOLitude has a few larger harvesters that may cut to a depth of 7 feet, but still more than half of the fanwort infestation would not be able to be cut to water-sediment interface. This will limit the effectiveness of DASH. Costs for MWRA/DCR to use DASH to control fanwort on a 35-acre basin of Wachusett Reservoir have been several hundred thousand dollars per year. We feel that this approach is not likely to be financially viable or sustainable at Baddacook.

We would instead recommend that GPAC pursue funding for a demonstration project that could include several different elements. The details would need to be discussed and finalized, but some ideas that we discussed with Bill included:

1. Complete summer-long harvest targeting all areas of fanwort and milfoil infestation - This would undoubtedly require one or more staff to be committed to the project. One operator to run the harvester 40 hours per week and a second operator (and a pickup truck) to operate the trailer conveyor. If the harvester is running constantly, we would think that removal efficiency could approach 1-2 acres per day. A 12 or 16 week harvesting project should allow for all infested areas to be harvested 2-3 times or more during the summer. This would remove biomass and nutrients from the lake, and hopefully deplete the starch reserves in the plants' root structures so that there would be less growth in subsequent years.

2. Identify one or more 1-acre plots to attempt harvesting followed by DASH - This would allow this approach to be evaluated before it is considered on a larger scale. Estimated DASH costs for a 1-acre area following harvesting are expected to be in the \$7500 range.

3. Identify one or more 1-acre plots to try mechanical hydro-raking - This would focus on removing the plants, their root structures and some of the built up organic debris. Select locations could be considered where added depth would be beneficial.

The distribution of plant growth appeared to be very similar to what was mapped in 2011 and consequently we do not feel that an updated vegetation survey is necessary at this time. We think it might be more beneficial to perform updated bathymetric mapping. Having

updated depth contours of the lake will help determine the extent of management areas, will help identify where various demonstration efforts should be performed, and will delineate areas that should be avoided by the harvester due to limited water depth or underwater obstructions. We use BioBase mapping service that allows us to collect and process this information cost-effectively. The survey work would need to be done once the plant growth has senesced for the season, probably in late October or November. We could then provide a bathymetry map with 2 or 3 foot contour intervals. The cost for this bathymetry survey and preparation of a base contour map would be \$1250. Additional mapping requests will be quoted separately.

Please let us know if you have any questions or would like to discuss this further.

*Sincerely,
Marc*

*Marc Bellaud
President
SOLitude Lake Management*

Harvester: Bill indicated that the Harvesting is going very well with Aymerec Forbes. Francoise indicated that they worked very hard. The Harvester is functioning very well in spite of a slow start. Bill indicated that the areas harvested was the areas define in the NOI as a test and according to the documentation they areas could be expanded. Marshall needed to read the NOI. Bill Took an action to meet with Takashi of the Conservation Commission.

Vote to Adjourn by Alex, second Francoise all voted in favor.