

September 2015 WQ Program Field and Lab Audit

Passamaquoddy Tribe at Indian Township

After completing the fifth and final month of water quality sampling for the 2015 season, we have compiled the following information. This information is to be used to help measure the success of the 2015 season, and to determine if any changes need to be made for the 2016 season.

Sites: Twenty-two (**22**) total Water Quality sites are being sampled in 2015, all lakes and ponds. As we did in 2011-2014, nineteen of these sites are sampled twice a month, approximately every (15) days. The lakes being sampled twice a month are as follows: **Big Lake, Long Lake, Lewey Lake, Grand Falls Flowage, Junior Lake, Scraggly Lake, Sysladobsis Lake, Pocumcus Lake, Side Pistol Lake, Upper Chain Lake, Middle Chain Lake, Killman Pond, Shaw Lake, Mill Privilege Lake, Pleasant Lake, East Musquash Lake, West Musquash Lake, West Grand Lake, and Bassett Pond.** Bassett Pond is a small fishless pond that has been sampled to some extent the last two years. We were able to sample the Jackman area ponds twice in 2015.

Field Audit 100%: (41/41) We were able to sample all scheduled lakes and ponds in September this year. Weather was very warm and nice compared to usual September weather, making sampling days plentiful. Some water levels are quite low, but we were able to get boats in the water to sample, unlike some sampling events that were lost in September 2014. We found fresh water jellyfish in Mill Privilege Lake during both September visits, they ranged from dime to nickel size. We ended the year in Jackman during a significant rain event (Oct 1) getting to change a flat tire in the pouring rain. The last sample was taken on October 2nd.

Sampling equipment: The Pro-DO that was put into service starting July 2011 continues to be a reliable piece of equipment. The Conductivity meter was replaced in 2014 and is working well. Our pH probe and meter has been put back into service on June 11 and functioned great for the rest of the season, passing all QA/QC tests. Mark Richter ended the year as our field assistant. Mark started a new full time position elsewhere, so we will need to find a new field assistant for 2016.

Lab Audit 100%: (164/164) All samples have been processed and/or delivered on time this month that were collected. We process samples for 4 parameters in the lab: Total Phosphorus, Chlorophyll-a, True Color, and Alkalinity. TP is collected and mailed out to the Health and Environmental Testing Lab in Augusta (HETL) every two weeks. Chl-a is filtered and frozen here at the office by our field assistant Mark Richter and then mailed out with the TP samples to HETL. The data from August has arrived from the lab and has no issues to report.

Alkalinity is titrated in the office by Joe Musante and has had no problems to report. True Color is being done in the office also by Joe Musante using our DR2700 Spectrophotometer. The DR2700 is due for service this winter.