



BIOLOGIST:
 Jake McNary
 (o): (888)493-8526
 Jake@waterandwetland.com



Call/Email with any questions!

FIELD NOTES SUMMARY

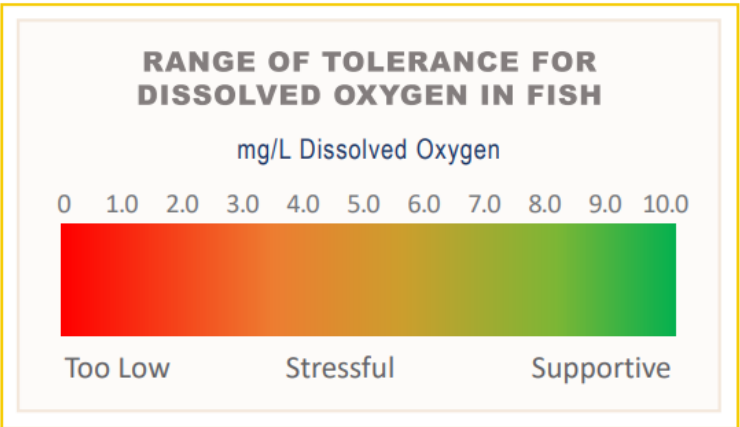
Customer: Town of Mendon
Pond Name: Lake Nipmuc
Site Location: Mendon, MA
Date: 8/22/25

On 8/22/25, Aquatic Field Biologist, Jake McNary, made a visit to Lake Nipmuc. The following services were completed during the visit:

Upon arrival to the site, a survey was conducted using visual observation paired with a standard throw-rake and handheld GPS/ArcGIS Field Maps, as applicable. Plants documented during the survey are documented in the table below. (*) denotes an invasive species. Invasive species are non-native to the ecosystem and are likely to cause economic harm, environmental harm, or harm to human health.

Species Identified	
Common Name	Latin Name
Purple Loosestrife*	<i>Lythrum salicaria</i>

While on-site, dissolved oxygen (DO) and temperature readings were collected using a calibrated YSI meter with optical sensor. Dissolved oxygen is the amount of oxygen in water that is available to aquatic organisms. DO is necessary to support fish spawning, growth, and activity. Tolerance varies by species, but the figure below provides a general range of fish tolerance (Source: epa.gov). Dissolved oxygen can be affected by many outside factors, such as: temperature, time of day, and pollution. Dissolved oxygen levels are typically lowest early in the morning. Healthy water should generally have concentrations of about 6.5-8+ mg/L.



Results from the visit are included in the table below:

Temperature & Dissolved Oxygen	
Surface Temp (°C)	Surface DO (mg/L)
22.5	7.23

A treatment was conducted for the control of target nuisance/invasive plant growth. The liquid contact herbicide(s) was applied using a treatment boat equipped with a foliar set up. This application methodology allows for even coverage within the treatment areas. The treatment was completed without issue. We anticipate plant die-off within just a few days to a few weeks.

Additional Notes from the Biologist
This site visit consisted of a survey of the shoreline and a purple loosestrife treatment. The survey was conducted in order to assess the extent of the purple loosestrife population and to determine treatment areas. The purple loosestrife was most dense around the northern cove and on the peninsula. There were also scattered patches of purple loosestrife along the entire shoreline that were treated when observed. Some plants were hand pulled if easy to reach. The prior treatment for pondweed growth appeared to have been effective as the pondweed densities were lower or eliminated in the target areas. Water clarity was good and dissolved oxygen readings maintained healthy levels. Overall, the visit went well, and the treatment was successful at targeting purple loosestrife.

As always, we will notify you prior to any upcoming visits, as applicable. Please feel free to reach out to us directly with any questions.

Photo 1



Photo 2



Photo 3



Photo 4



Photo 5

