



On-Site Lake Evaluation Record

Lake Name: Pine Lake

County: Barry

State: MI

Evaluated by: Nate Karsten

Date: 5/21/15

Evaluations Performed

Aquatic Vegetation Evaluation

- Aquatic vegetation survey
- Aquatic vegetation brief check

Vegetation evaluation methods

- Visual evaluation
- Sample collection with rake
- Sonar profiling
- GPS-mapped sample locations

- Water quality sampling
 - On-site (Temperature, DO, Secchi disk)
 - Water samples collected for _____ analysis

- GPS data collection
 - Depth survey
 - Shoreline mapping
 - Reference point location
- Other _____

Overall Condition of Lake

- excellent (no problems or developing problems noted)
- very good (no immediate action required)
- fair (management required soon)
- poor (management needed as soon as possible)
- very poor (management action past due—IMMEDIATE response required)

Problems Noted

Excessive growth of exotic plants (mark locations on map)

- Eurasian watermilfoil
- curlyleaf pondweed
- other _____
- Excessive growth of native plants (note plant species and mark locations on map)
- Excessive filamentous algae growth (mark location on map)
- Poor water clarity
- Blue-green algal blooms

RECOMMENDATIONS

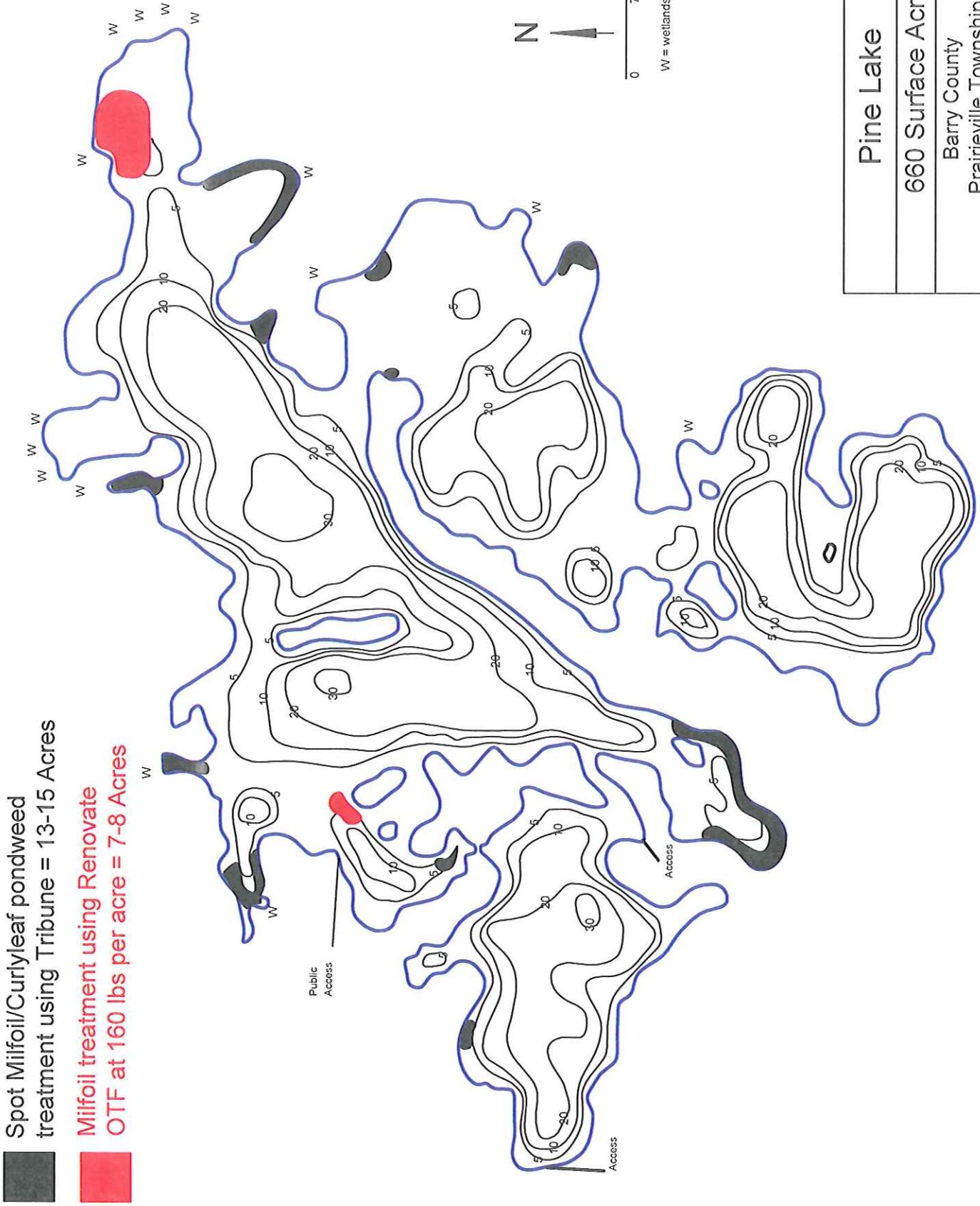
- Herbicide application (mark locations on map)
Need for herbicide treatments is: urgent, serious, moderate, slight
- Algaecide application (mark locations on map)
Need for algae treatments is: urgent, serious, moderate, slight
- Harvesting (mark locations on map)
Need for harvesting is: urgent, serious, moderate, slight
- Shoreline stabilization (mark locations on map)
Need for shoreline stabilization is: urgent, serious, moderate, slight
- Erosion control (mark locations on map)
Need for erosion control is: urgent, serious, moderate, slight
- Other _____

NOTES

The overall condition of Pine Lake is very good. Spot areas of Curlyleaf pondweed and Eurasian watermilfoil were found and should be treated during the initial treatment. Due to the mixed community we recommend treating with Tribune since it can control both species (in near shore areas). We have estimated that there are 13-15 acres requiring treatment. There are also two offshore/undeveloped areas of milfoil growth (marked in red). We recommend treating this with Renovate OTF at 160 lb/acre (7-8 acres). Renovate is a selective herbicide for milfoil and can also kill the root system.

Spot Milfoil/Curtlyleaf pondweed
treatment using Tribune = 13-15 Acres

Milfoil treatment using Renovate
OTF at 160 lbs per acre = 7-8 Acres



Pine Lake
660 Surface Acres
Barry County Prairieville Township T1N, R10W, Sect: 5,6,7,8
Professional Lake Management, P.O. Box 132, Caledonia, MI 49316 Phone (800) 382-4434