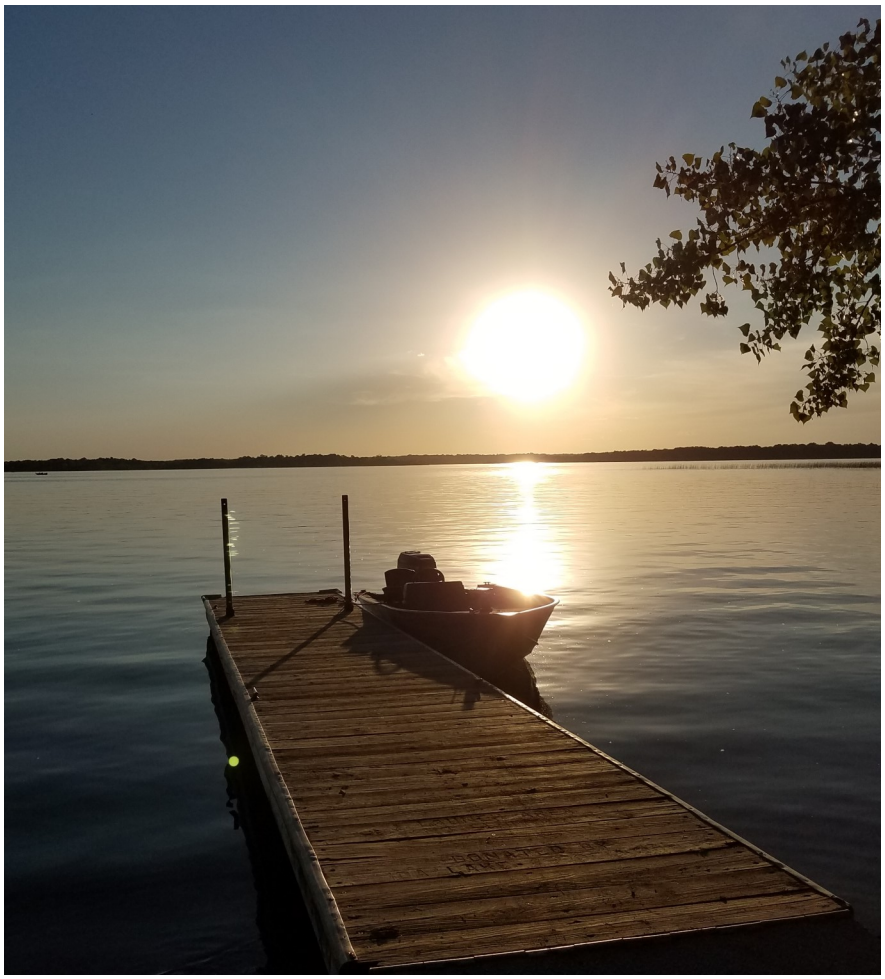
Ida Lake

(Douglas County)

Curlyleaf Pondweed Survey

Post-Treatment Inspection & Delineation



Survey Date: June 27, 2018

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Report Date: July 8, 2018

Introduction

AIS Consulting Services completed a Curlyleaf Pondweed (CLP) post-treatment inspection and delineation on Ida Lake (Douglas County) on June 27, 2018. The purpose of the survey was to evaluate treatment success of a May 29th herbicide treatment for Curlyleaf Pondweed, and to map the distribution and abundance of additional areas of Curlyleaf Pondweed to inform future treatment options. This report summarizes the results of the survey, and provides some recommendations on areas to focus management.

Methods

Protocol for the survey followed the DNR Guidance for Delineating Invasive Aquatic Plants for Management. We maneuvered our boat in a meandering pattern across the actual littoral area of the lake, the depth where vegetation is growing (≤ 20 ft. depth). We used our sonar unit, visual assessment and rake tosses to identify locations of CLP. Water clarity was very good during the survey.

Each area searched was marked with a waypoint. If CLP was found, depth was also taken and an estimated density rating was established based on the scale below.

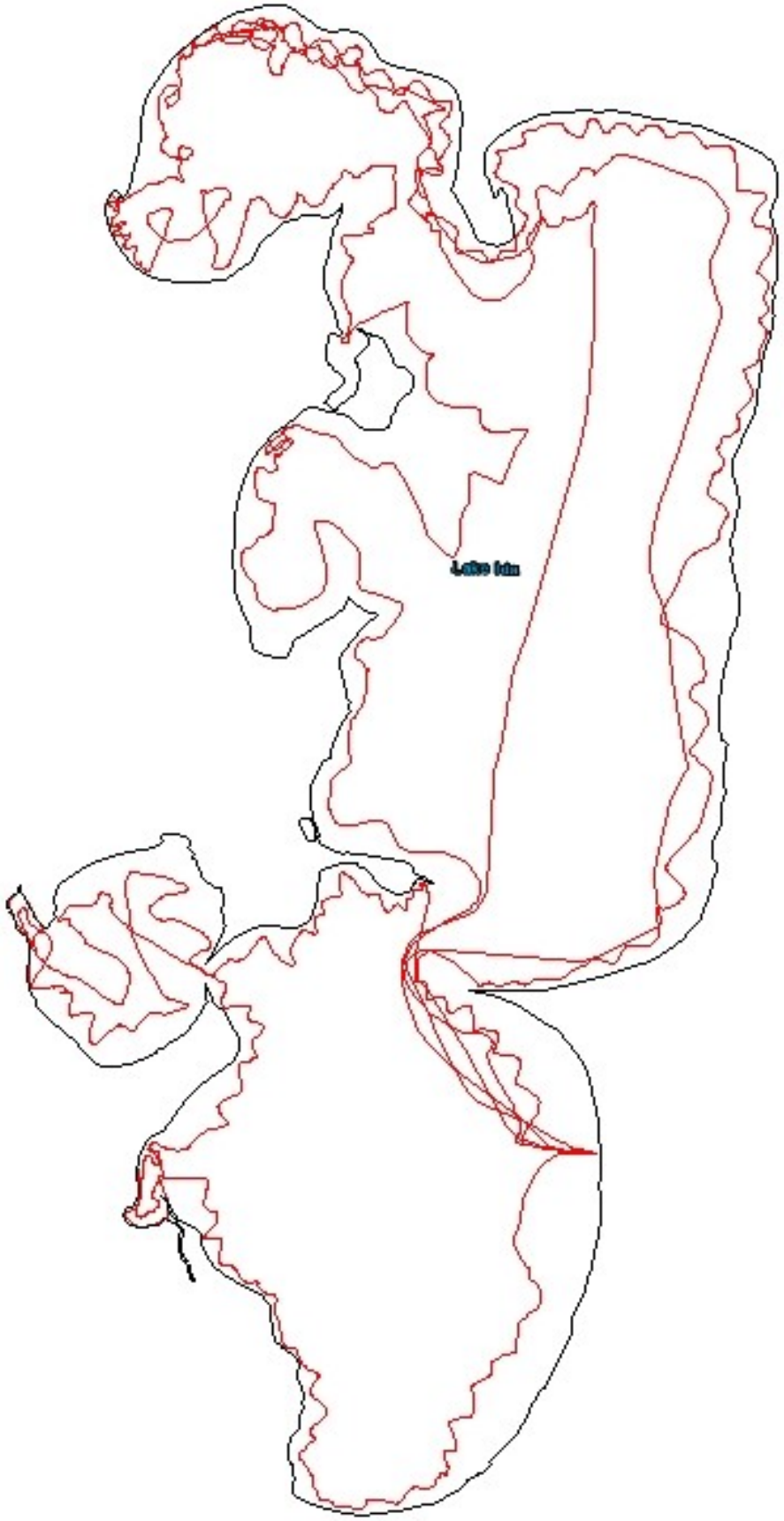
Estimated Density Ratings for Individual Points -

1 = Sparse; plants covering < 25% of rake head

2 = Common; plants covering 25% - 75% of the rake head

3 = Abundant; plants covering > 75% of the rake head

Figure 1. Tracks from survey



Results

Post-Treatment Inspection

Without knowing pre-treatment conditions, the post-treatment evaluation assesses CLP distribution just over 4 weeks after the treatment occurred. Overall, native plant abundance was high and CLP seemed pretty well controlled within the treatment areas.

Figure 2. DNR Permitted Areas For Treatment

(Areas circled were actually treated)

= 2018 Treated Areas

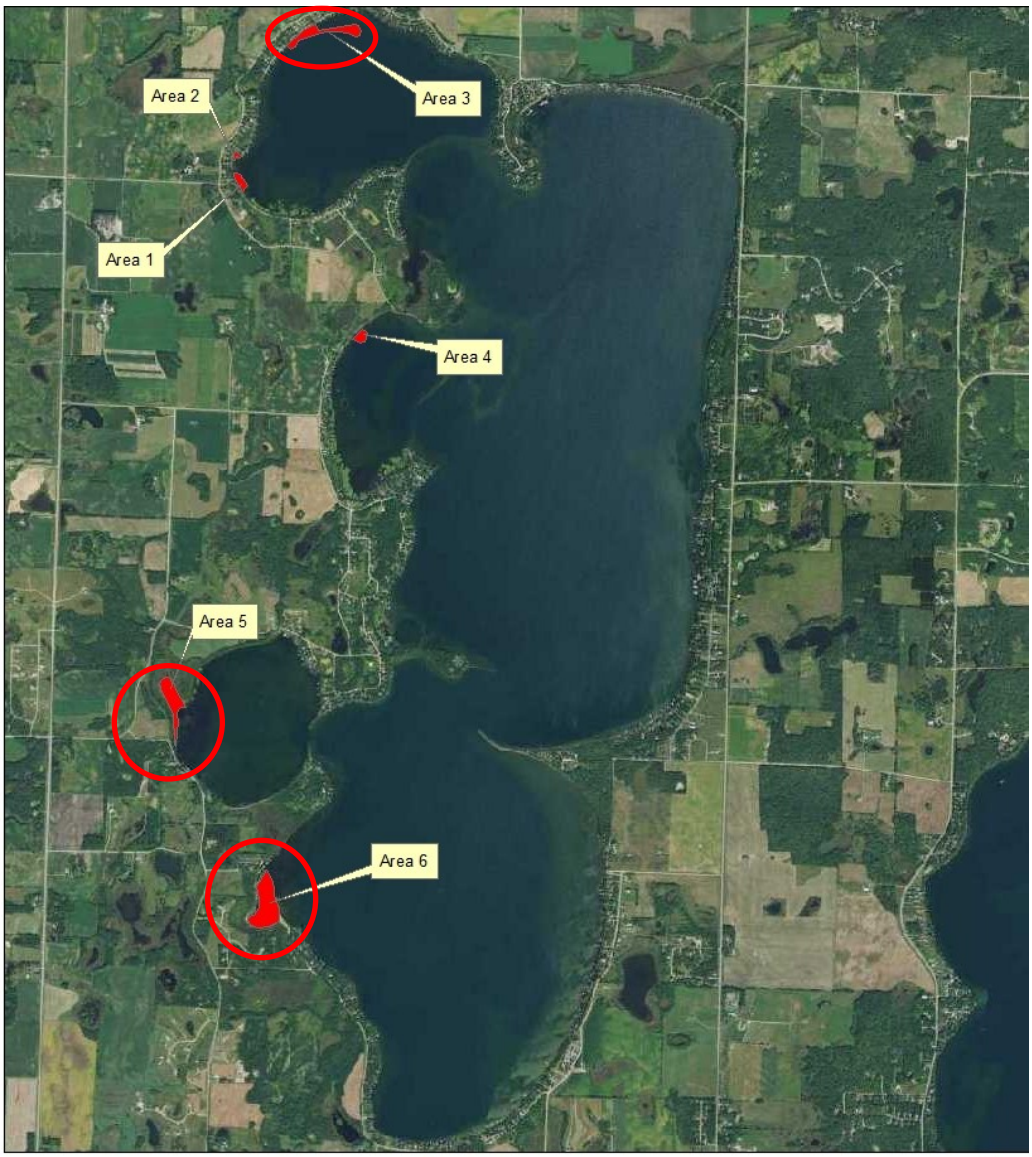
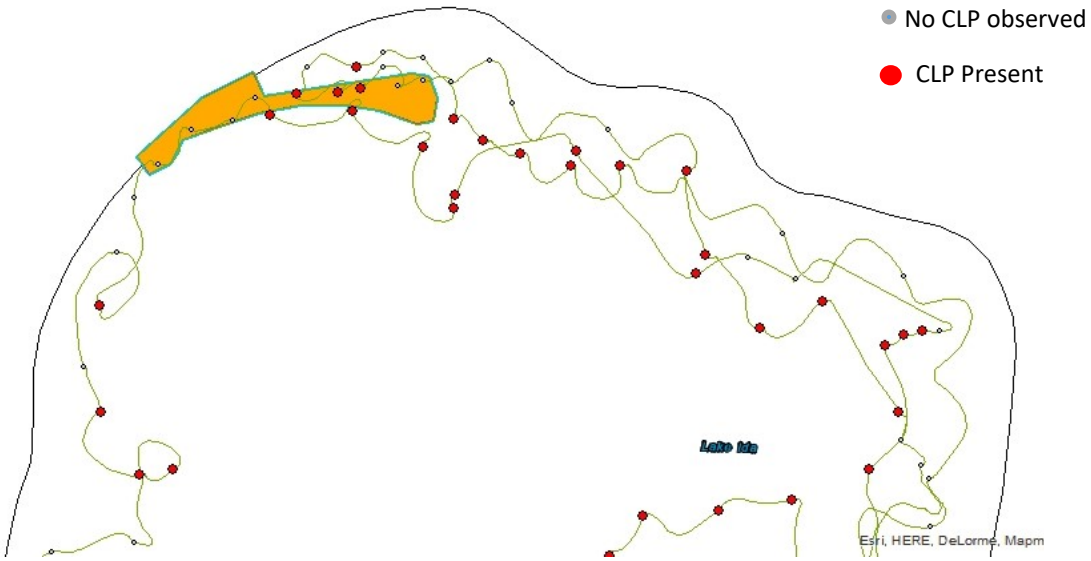
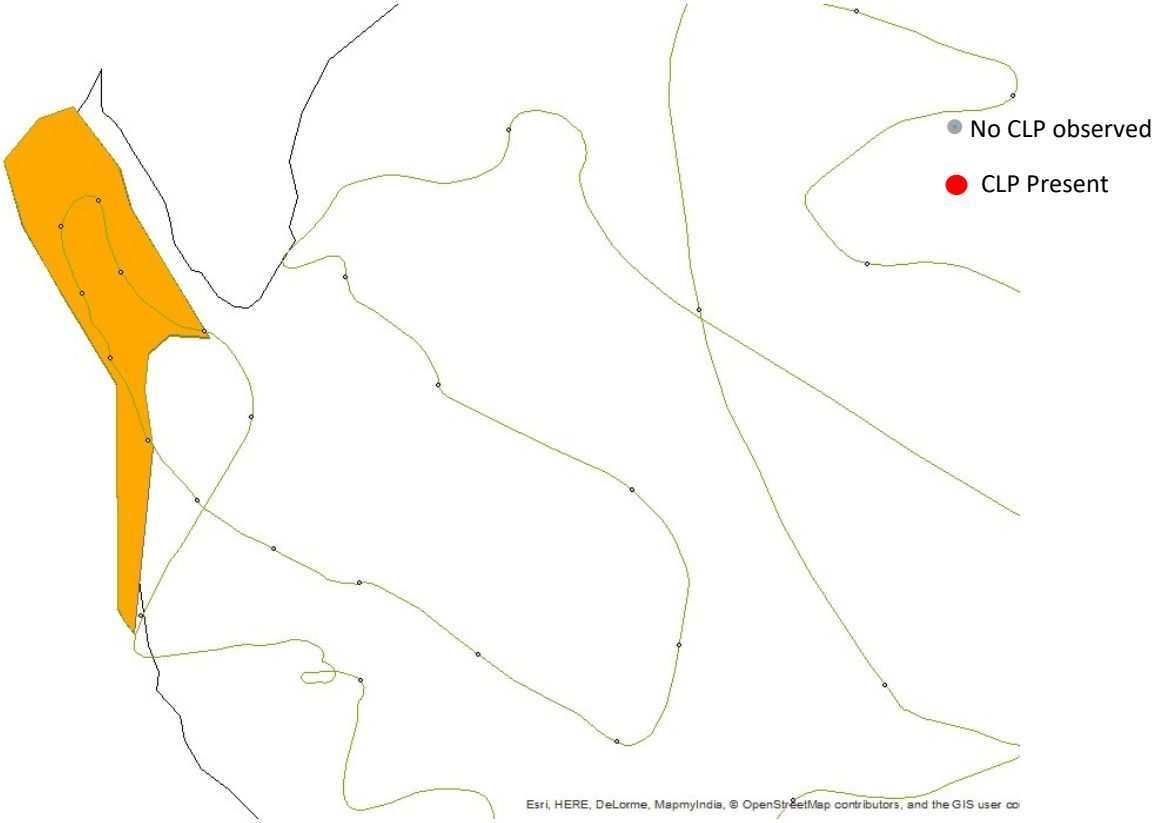


Figure 3. Post-Treatment Results of CLP Treatment Area 3



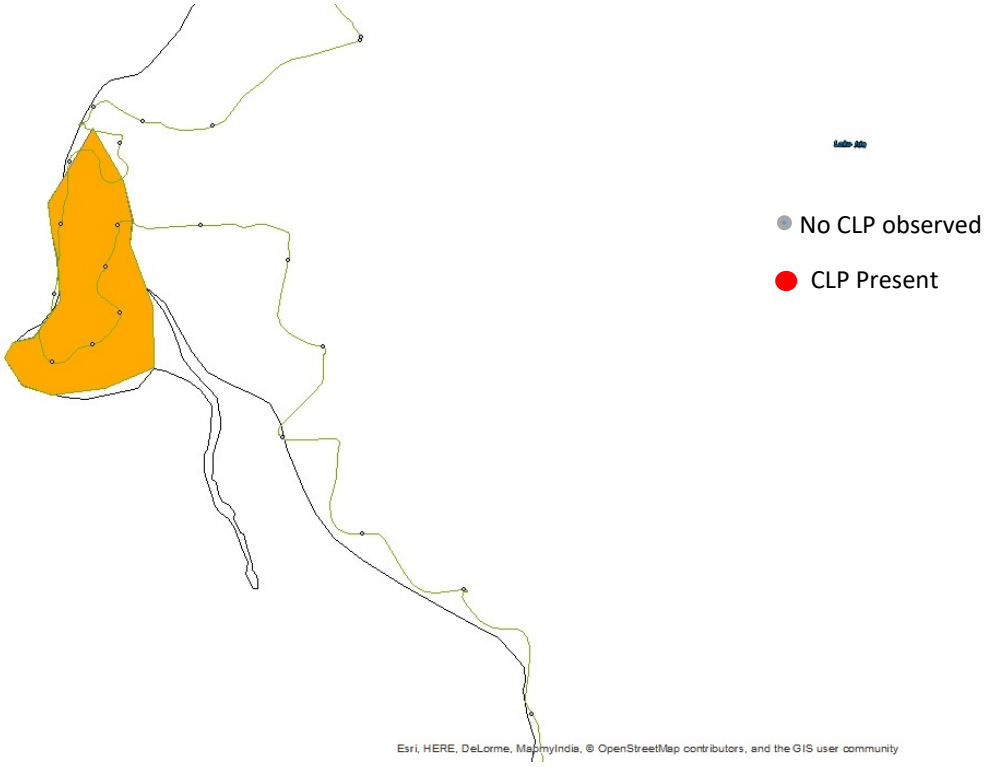
CLP was observed healthy and growing within half of treatment area 3, as well as throughout most of the bay in 10 to 18 feet of water. Without knowing pre-treatment CLP distribution, we cannot say how successful treatment was in this site.

Figure 4. Post-Treatment Results of CLP Treatment Area 5



No CLP was observed within treatment area 5. Vegetation was scattered, with yellow water lilies, narrow leaf pondweed and floating leaf pondweed present. Assuming CLP was present prior to treatment, treatment at this site appeared to be successful.

Figure 5. Post-Treatment Results of CLP Treatment Area 6



Some dead CLP stems were found within treatment area 6, pictures below. No healthy, actively growing CLP was observed. Overall, vegetation was scattered with Wild Celery and Yellow Water Lilies present. CLP treatment appeared to be successful.

CLP Delineation Results

Figure 6. CLP presence/absence from June 27, 2018 survey

Red dots indicated CLP observed

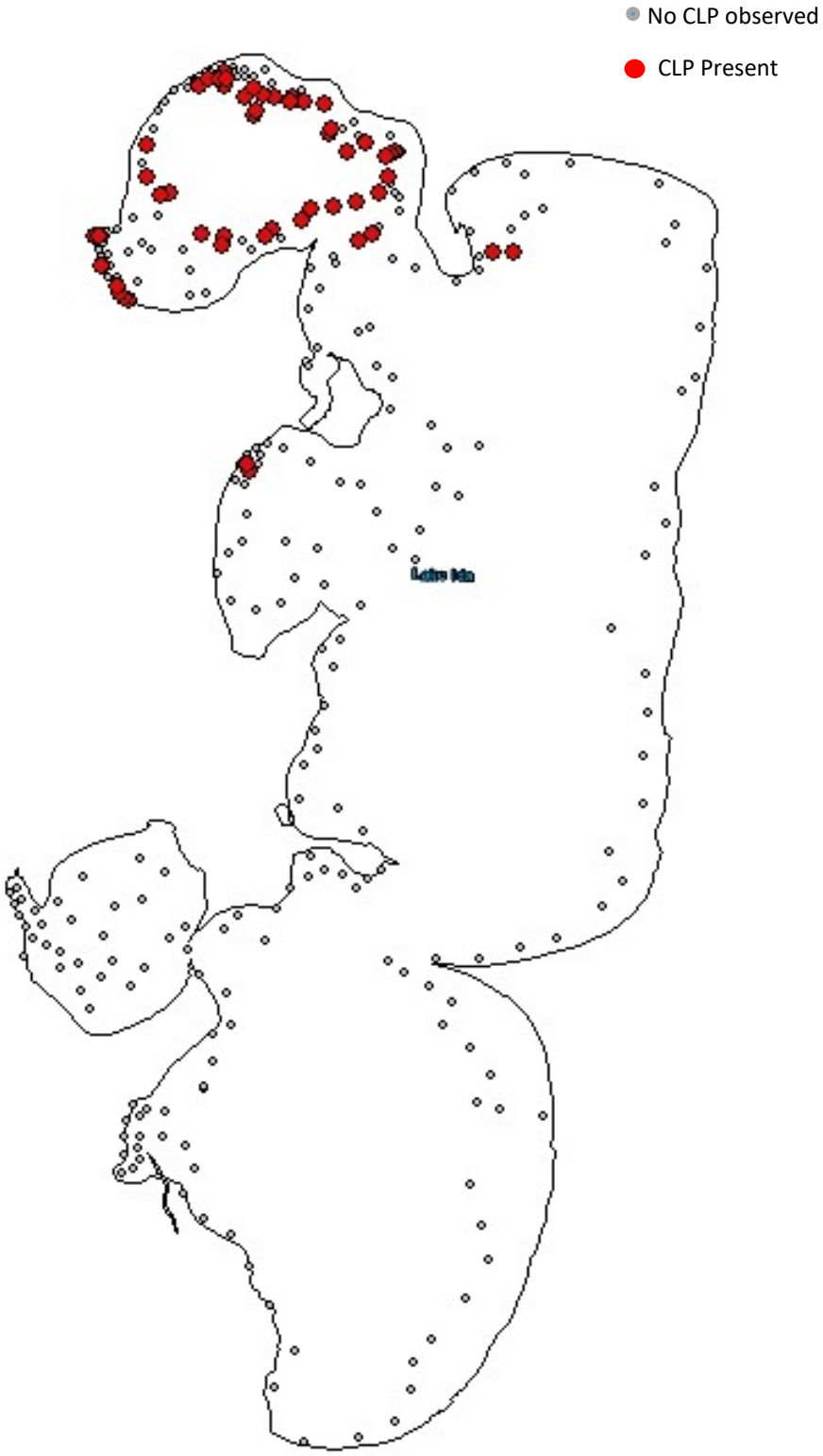


Figure 7. CLP Distribution

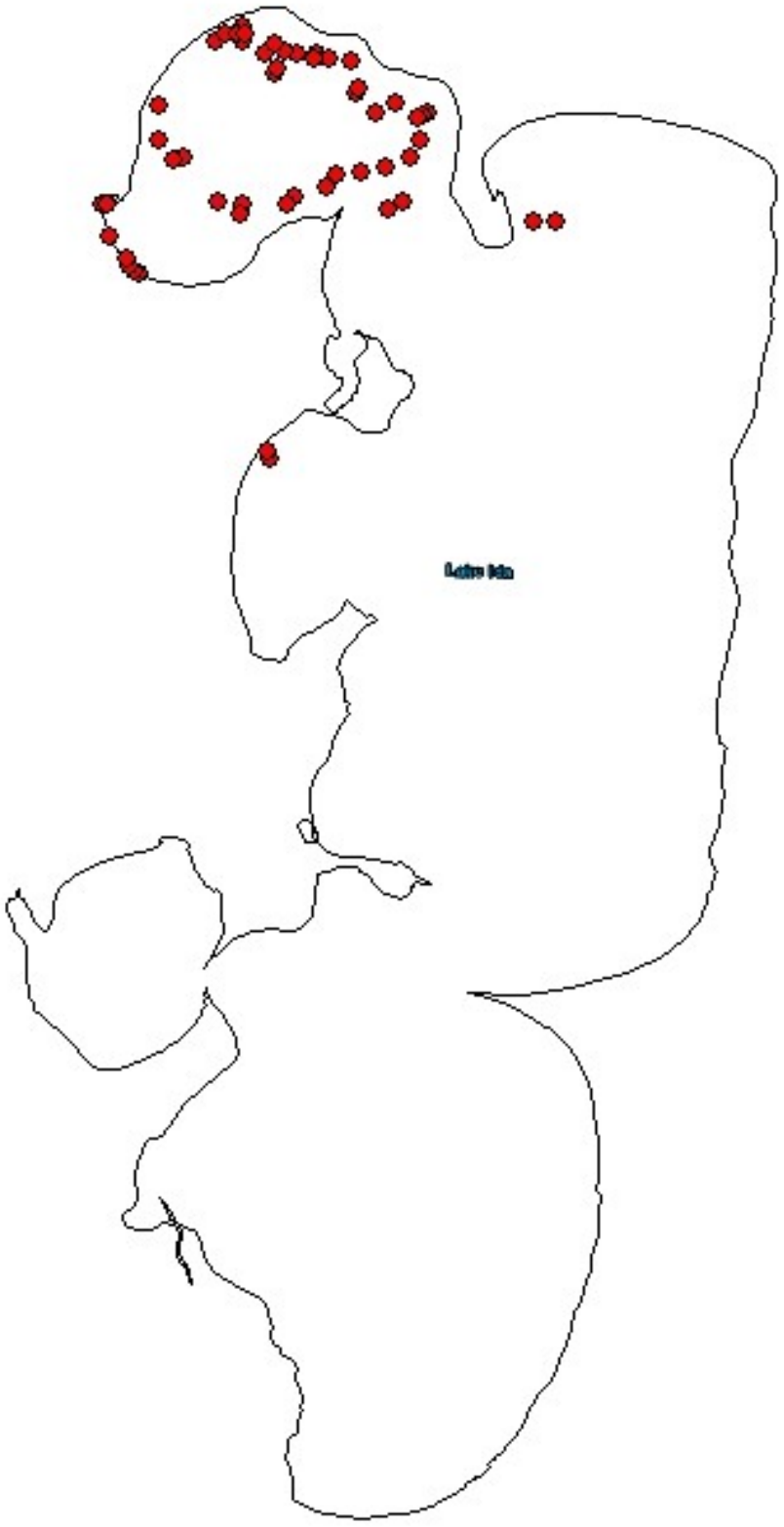
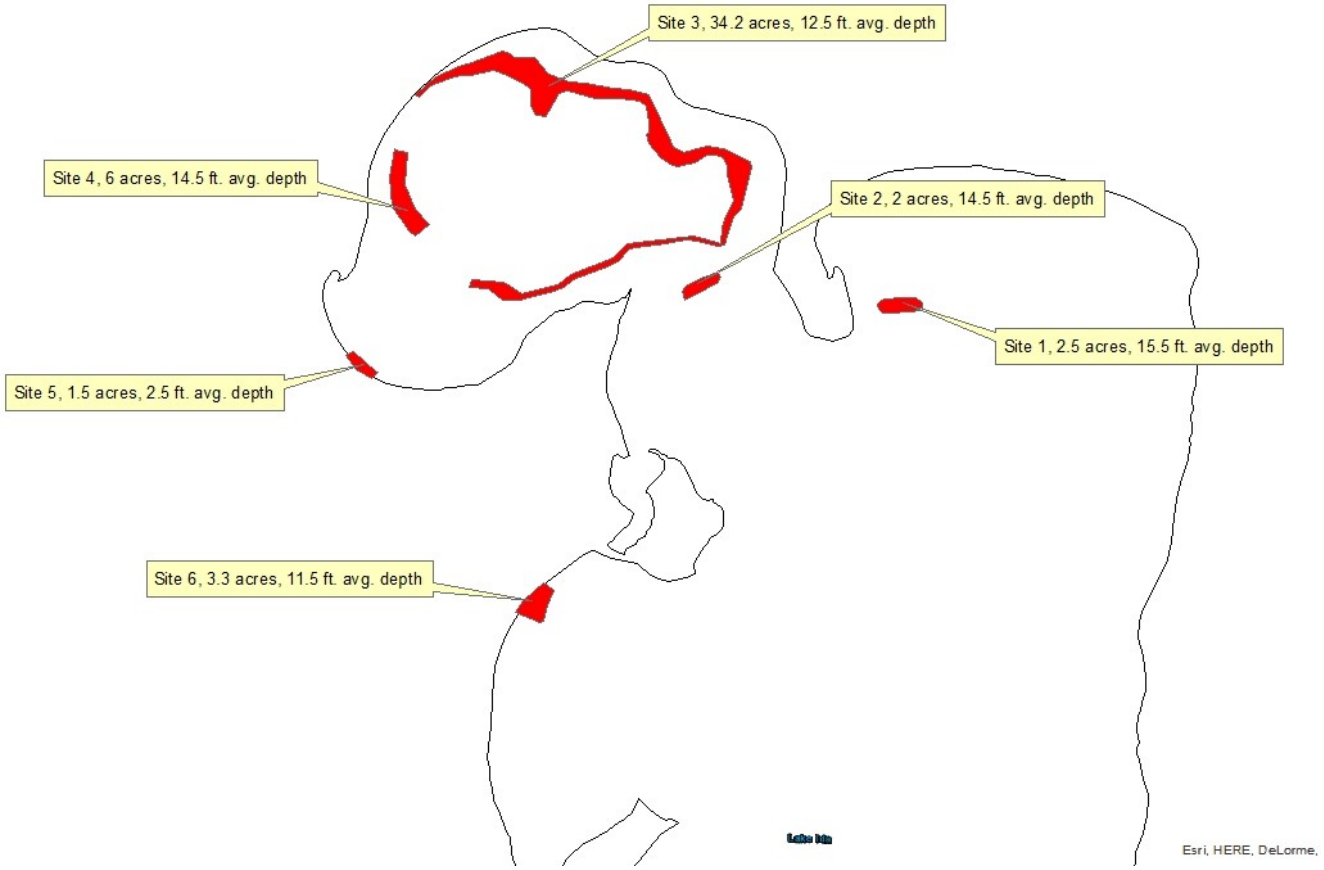


Figure 8. Potential CLP Management Areas



Curlyleaf Pondweed (CLP) was generally occupying deeper water, between 10 to 18 feet of water depth. CLP typically was about 6 to 8 feet tall in the deep water sites, so it was well below the surface of the water and was not providing any navigation concerns. Site 5 had scattered CLP occupying shallow water between 1 and 4 feet of water. Native plants were very abundant during the survey, and seem to be keeping CLP to deeper water depth locations. These native plant beds should be protected.