

Lake Improvement Study for Eagle Lake

Waterford, Michigan

A Lake Improvement Study for Eagle Lake was conducted in order to make recommendations and define the scope of a Lake Improvement Plan to meet the requirements of the Inland Lake Improvement Act, Part 309 of Public Act No. 451, 1994.



Spalding DeDecker Associates, Inc. (SDA) worked with the Eagle Lake Improvement Board to identify the major concerns associated with the usage of the lake including aesthetics, fishing, swimming, and boating.

SDA performed multiple activities in the development of the Study. The basis for the study was the development of a lake bottom contour map and an aquatic plant inventory map. These maps helped identify the locations within the lake for water quality and sediment analysis and recommendations for control and/or removal of the aquatic weeds.

The feasibility of raising the lake level was evaluated based on the hydrologic and geographic features associated with the lake because the lake depth was a major concern.

The Eagle Lake Improvement Board implemented an aeration system to control weeds, algae, and sediment depths. SDA provided an analysis and recommendations regarding the effectiveness of the existing aeration system and also recommended modifications to that system.

Implementing the Lake Improvement Program required a monetary assessment to the residents who would directly benefit from the program. Legal lake access rights were evaluated and a list of assessable parcels and an assessment map were developed. Finally, a short and long-term budget was developed for fee allocation among the residents within the Lake Improvement District.

OWNER / CLIENT

Eagle Lake Improvement Board

PROJECT START - END

December 2006 - October 2007

SDA PROJECT NO.

MN06-005

