## FISH LAKE: 2024 Water Quality Report Card



## Quick Facts

Surface Area: 171 acres Watershed Area: 699 acres Average Depth: 14 feet Maximum Depth: 28 feet WATERSHED DISTRICT

Fish Lake lies in the southern part of the watershed near Spring Lake Town Hall. The outlet of Fish Lake flows north through Buck Lake and into Spring Lake. Fish Lake has a small watershed that consists mostly of large acre lots and a couple farms.

Fish Lake has been on the state's impaired waters list for excess nutrients since 2005, though its water quality has hovered near state standards. In 2019, the District implemented a shoreline and native prairie planting at Spring Lake Town Hall to reduce erosion and improve wildlife habitat. Farmers have also used alum logs and water quality inlets to reduce nutrient and sediment runoff. These efforts contributed to Fish Lake meeting state standards in 2023 for the first time since 2011, with nutrient levels showing a slow, improving trend. A new lake management plan was implemented in 2024, the details of which can be viewed on the back of this page.

Water Quality Indicator	Risk to Water Quality	Grade (2022-2024)	10-Year Water Quality Avg (2015-2024)	10-Year Trend	
PHOSPHORUS	Phosphorus is needed by plants and animals to survive but can cause algae blooms if there is too much phosphorus available. Sources of high phosphorus include fertilizer, human and animal waste, and soil erosion.	C	<u> </u>	No Trend	
Chloren CHL-A	Chlorophyll-a is a measure of the amount of algae in a lake. Some algae is normal in a healthy lake, but high concentrations threaten aquatic life and can impede on recreation and enjoyment of the lake. Some can even create harmful toxins.	С		O** Improving	
CLARITY	Water clarity is affected by the abundance of algae and sediment in the water column. It is dependent on factors such as nutrients, temperature, wind, rain, and boat traffic. Low clarity means less sunlight to power photosynthesis in aquatic plants, which help keep the lake healthy.	С		O <sup>**</sup>	

Grading Scale				Graph Explanation		
Excellent	Good	Average	Marginal	Poor		The <b>solid blue line</b> shows the annual change in water quality over a ten year span. The lower the line, the healthier the lake.
A All or most samples meet	B Many samples meet or are	C Some samples meet or are	D Many samples do not meet	F Most samples do not meet the		The District's goal is for the blue line to be below the <b>red line</b> , which is the water quality standard and the point at which the waterbody is not considered polluted.
the desired threshold.	near the desired threshold.	near desired threshold.	the desired threshold.	desired threshold.	$\checkmark$	The <b>blue dotted-line</b> is the trend line. A decreasing trend line shows improvement in the health of the lake over time.

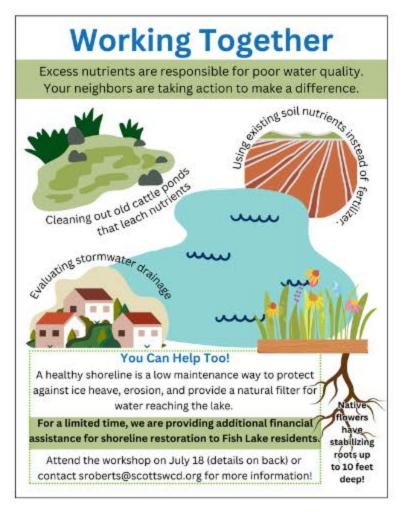
## FISH LAKE: Management Plan Highlight

## **Fish Lake Management Plan**

The District has been working to reduce the excess nutrients flowing into Fish Lake from runoff. Reducing runoff of excess nutrients requires landowner leadership and changes in land management. The graphic to the right was mailed to lakeshore owners as part of a Lakeshore Restoration Workshop invitation.

In 2024, the District partnered with many residents to reduce the nutrients running through their land:

- Two lakeshore residents were offered financial and technical assistance to complete shoreline stabilization projects.
- Two properties with historic manure deposits initiated management strategies to restore the land to balanced nutrient levels.
- The District also began a study of the Lake Ridge neighborhood stormwater system.



The District plans to continue to support other nutrient runoff initiatives, please reach out if you'd like to learn about financial assistance for shoreline stabilization or other conservation projects!