



MEMORANDUM

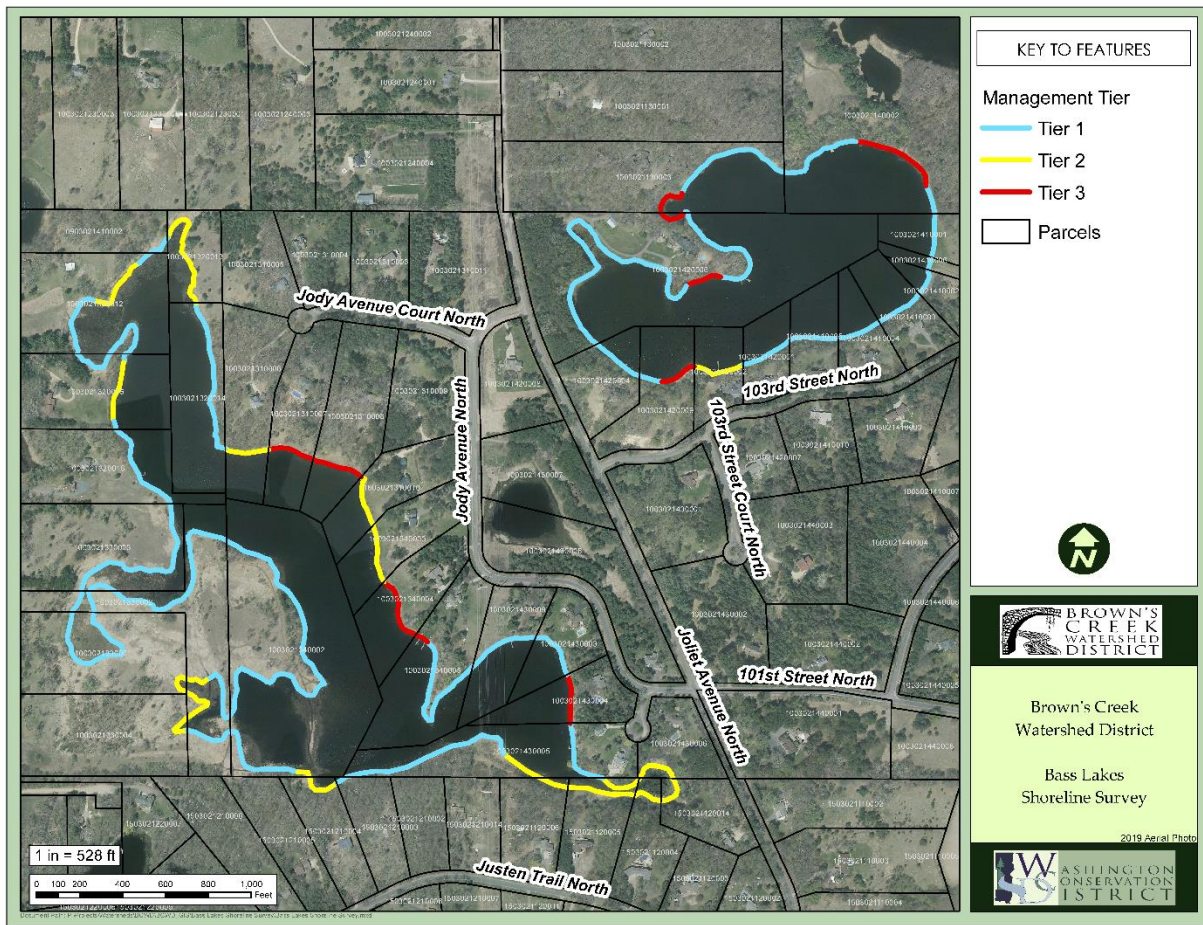
TO: BCWD Board of Managers
FROM: Rebecca Oldenburg-Downing, Senior Water Resource Specialist
DATE: April 18th, 2024
RE: **Shoreline Assessment Proposal 2024**

In order to better understand the current state condition of lakes’ shorelines a shoreline assessment is performed. This serves to as a tool to be able to engage landowners about shoreline education, as well as identifying areas for protection and restoration. A healthy shoreline can help prevent nutrient loading to the lake, create valuable habitat for wildlife, and serve as a deterrent for invasive species. The data generated from shoreline assessments may also be used for: targeting future critical habitat designations within lakes, creating lake management plans and watershed management/comprehensive plans, planning Aquatic Plant Management, evaluating trends in lakeshore habitat over time, and understanding trends in lake ecology (e.g., fish, wildlife, invasive species).

To perform a shoreline assessment survey, the Washington Conservation District (WCD) references the Wisconsin Department of Natural Resources Shoreland Habitat Monitoring Field Protocol, see table below. After the shoreline assessment is perform in the field and the shoreline has been scored, a map is produced to visually summarize the data, see map below. The WCD has performed eight shoreline assessment surveys on the behalf of BCWD in the past three years. The WCD would perform three shoreline assessment surveys in 2024 on Long Lake, Masterman Lake, and Wood Pile Lake.

Table 11 - Shoreline Habitat Assessment Rating Scheme

Rating	Color Designation on Map	Description	Rating Criteria		
			Tree Canopy	Manicured Lawn	Impervious Area
Tier 1 - Natural	Green	Parcel with Lower Potential for Nutrient Export	80 - 100%	0 - 20%	0 - 5%
Tier 2 - Moderate	Yellow	Parcel with Medium Potential for Nutrient Export - Shoreline BMP Recommended	40 - 80%	20 - 40%	5 - 20%
Tier 3 - Developed	Red	Parcel with Higher Potential for Nutrient Export - Shoreline BMP Highly Recommended	0 - 40%	40 - 100%	20 - 100%



The total cost for the shoreline assessment monitoring for 2024 is **\$518**. The funding for this work would come from the BCWD contingency reserve.

Shoreline Assessment Monitoring	Type	Labor	Travel Time/Mileage	Lab	Total	Notes
Long Lake	SAM	\$296	\$0	\$0	\$296	Shoreline assessment + map
Masterman	SAM	\$111	\$0	\$0	\$111	Shoreline assessment + map
Woodpile	SAM	\$111	\$0	\$0	\$111	Shoreline assessment + map
Total Monitoring Cost		\$518	\$0	\$0	\$518	