

Instructions: Bold fields must be completed.

Station Summary

Waterbody Name BLACK RIVER	Waterbody ID Code 2836900	Sample ID (YYYYMMDD-CY-FD) 20161006-16-02
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Sampling Location At old campground at end of E. Manitou Valley Rd.	Database Key 134667233
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SWIMS Station ID 10039686	SWIMS Station Name BLACK RIVER 1MI W OF STH 35 AND MANITOU VALLEY RD
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Latitude 46.54593	Longitude -92.13725	Lat/Long Determination Method (circle) SWIMS SWDV <u>GPS</u>	Datum Used if using GPS <u>WGS84</u> or NAD83
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Basin (WMU) LAKE SUPERIOR	Watershed Name BLACK AND UPPER NEMADJI RIVER	County DOUGLAS
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Sample and Site Descriptors

Sample Collector (Last Name, First) CRAIG P ROESLER, MADELINE E ROBERTS	Project Name BLACK RIVER TWA TALU 2016
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Sampling Device

Kick Net
 Surber Sampler
 Eckman
 Ponar
 Artificial Substrate
 Hess Sampler
 Other: _____

Habitat Sampled

Riffle
 Run
 Pool
 Other
 Shoreline Composite
 Proportionally-Sampled Habitat
 Littoral Zone
 Profundal Zone
 Wetland

Total Sampling Time (min) 1	Estimated Area Sampled (m²) 1	Number of Samples in Composite 3	Replicate No. <u>1</u> of <u>1</u>
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Reason For Sampling

Least Impacted Reference
 Baseline
 Impact / Treatment Site
 Control Site
 Trend
 Other: _____

Water Temp. (C) 12.7	D.O. (mg/l) 9.9	D.O. (%sat.)	pH (su)	Conductivity (umhos/cm) 83	Transparency (cm) 92
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Water Color <input type="checkbox"/> Clear <input type="checkbox"/> Turbid <input checked="" type="checkbox"/> Stained	Estimated Stream Velocity (m/s) <input type="checkbox"/> Slow (< 0.15 m/s) <input type="checkbox"/> Moderate (0.15 m/s - 0.5 m/s) <input checked="" type="checkbox"/> Fast (> 0.5 m/s)
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Measured Velocity 1.8	circle units m/s or <u>f/s</u>	Average Stream Depth of reach (m) 0.3	Average Stream Width of reach (m) 7.5
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Composition of Substrate Sampled (Percent):

Bedrock: _____ Boulders (basketball or larger): _____ Rubble (tennisball to basketball): 70 Gravel (ladybug to tennisball): 30
 Sand: _____ Clay: _____ Silt/Muck: _____ Overhanging Vegetation: _____
 Aquatic Macrophytes: _____ Leaf Snags: _____ Coarse Woody Debris: _____ Other (_____): _____

Embeddedness of Substrate at Sample Site (%) 20
Canopy Cover at Sample Site (%) 15

Stream and Watershed Descriptors

N = Not a problem
 U = Uncertain
 PL = Present, Low Impact
 PH = Present, High Impact

Factors that may be influencing Water Resource Integrity		Local	Water-shed	Factors that may be influencing Water Resource Integrity		Local	Water-shed
Biological				Chemical			
Algae: - Diatoms / Periphyton				Chlorine			
- Filamentous Algae				Dissolved Oxygen			
- Planktonic Algae				Nutrients (P, N...)			
Iron Bacteria				Toxics: - Inorganic (Metals)			
Macrophytes				- Organic (PCBs, pesticides...)			
Slimes				Other - Specify:			
Other - Specify:				Sources of Stream Impacts			
				Bank Erosion			
				Point Source - Specify:			
				Pasturing of Livestock			
Physical				Runoff: - Barnyard			
Bank Erosion				- Construction			
Channelization: - Upstream				- Cropland			
- Downstream				- Urban			
Hydraulic Scour / Channel Incision				Septic Systems			
Impoundment: - Upstream				Tile Drainage - Organic Soils			
- Downstream				- Mineral Soils			
Low Flow				Springs			
Sedimentation				Tributary(s)			
Sludge				Wetland			
Thermal				Other - Specify:			
Turbidity							
Other - Specify:							

Comments

Special Instructions for Laboratory

For Lab Use Only

Sample Sorter <i>Andrew Mohlmann</i>	Taxonomist <i>Dimick, Jeffrey</i>	Estimated Percent of Sample Sorted <i>7%</i>
Date Processed <i>11/21/16</i>	Specimens Saved <i>subsample archived in ABC until Feb 2020</i>	

CI = 204