

Instructions: Bold fields must be completed.

| Station Summary | | | |
|---------------------------------------|-----------|--|--|
| Waterbody Name LITTLE RIVER | | Waterbody ID Code 441300 | Sample ID (YYYYMMDD-CY-FD) 20181001-43-04 |
| Sampling Location | | | Database Key 168757368 |
| SWIMS Station ID 10051436 | | SWIMS Station Name LITTLE RIVER 420M DS COUNTY HWY J | |
| Latitude | Longitude | Lat/Long Determination Method (circle) SWIMS SWDV GPS | Datum Used if using GPS WGS84 or NAD83 |
| Basin (WMU) GREEN BAY | | Watershed Name LITTLE RIVER | County OCONTO |

| Sample and Site Descriptors | |
|---|--|
| Sample Collector (Last Name, First) ANDREW HUDAK | Project Name LITTLE RIVER TWA ASSESSMENT 2018 |

Sampling Device

D-Frame 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) 3 | Estimated Area Sampled (m ²) 3 | Number of Samples in Composite 1 | Replicate No. <u>1</u> of <u>1</u> |
|--------------------------------|---|-------------------------------------|------------------------------------|

Reason For Sampling

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

| | | | | | |
|--------------------------|----------------------|-----------------------|-----------------|--------------------------------|---------------------------|
| Water Temp. (C) 10.08 | D.O. (mg/l) 11.22 | D.O. (% sat.) 99.0 | pH (su) 8.51 | Conductivity (umhos/cm) 635 | Transparency (cm) 7122 |
|--------------------------|----------------------|-----------------------|-----------------|--------------------------------|---------------------------|

| | |
|---|---|
| Water Color <input checked="" type="checkbox"/> Clear <input type="checkbox"/> Turbid <input type="checkbox"/> Stained | Estimated Stream Velocity (m/s) <input type="checkbox"/> Slow (< 0.15 m/s) <input checked="" type="checkbox"/> Moderate (0.15 m/s - 0.5 m/s) <input type="checkbox"/> Fast (> 0.5 m/s) |
|---|---|

| | | |
|---|---|---|
| Measured Velocity circle units m/s or f/s | Average Stream Depth of reach (m) .3 | Average Stream Width of reach (m) 14 |
|---|---|---|

Composition of Substrate Sampled (Percent):

Bedrock: _____ Boulders (basketball or larger): 10 Rubble (tennisball to basketball): 50 Gravel (ladybug to tennisball): 30
Sand: _____ Clay: _____ Silt/Muck: _____ Overhanging Vegetation: _____
Aquatic Macrophytes: _____ Leaf Snags: 10 Coarse Woody Debris: _____ Other (): _____

Embeddedness of Substrate at Sample Site (%) _____ Canopy Cover at Sample Site (%) 10

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

Comments

Special Instructions for Laboratory

For Lab Use Only

| | | |
|--------------------------------------|--|---|
| Sample Sorter <i>Jan Camarcho</i> | Taxonomist <i>Dimick, Jeffrey</i> | Estimated Percent of Sample Sorted <i>7%</i> |
| Date Processed <i>2/16/19</i> | Specimens Saved <i>Subsample archived in ABC until May 2022</i> | |

C3

266

| Taxa | Life Stage | Bench Tally | Count | Taxonomic Reference | Condition | Unique Taxon |
|---|------------|---------------|-------|---------------------|-----------|---------------------|
| <i>Paragnetina media</i> | L | | 2 | Hils 1995 | | |
| <i>Isopecta signata</i> | L | | 1 | Hils 1982 | | |
| <i>Taeniopteryx</i> | L | x- | 16 | Hils 1995 | imm | |
| Heptageniidae | L | | 1 | Kleb 2016 | dam | N |
| <i>Leucrocuta</i> | L | - | 9 | " | | HD |
| <i>Maccaffertium</i> | L | - | 9 | " | imm | HD , Y=6 |
| <i>M. medipunctatum</i> | L | x- | 19 | " | | |
| <i>M. vicarium</i> | L | | 1 | " | | |
| <i>Baetis flavistriga</i> species complex | L | - | 9 | " | | |
| <i>Acerpenna pygmaea</i> | L | | 1 | " | | |
| <i>Isaon anoka</i> | L | - | 6 | " | | |
| Leptophlebiidae | L | - | 6 | " | imm | |
| <i>Isonychia</i> | L | | 1 | " | dam | N |
| <i>I. rufa</i> | L | | 1 | " | | |
| Hydropsychidae | L | | 3 | Hils 1995 | imm | N |
| <i>Cheumatopsyche</i> | L | | 4 | " | | |
| <i>Hydropsyche</i> | L | | 5 | " | imm | N |
| <i>H. betteni</i> | L | x- | 21 | Schmitt 1986 | | |
| <i>Ceratopsyche</i> | L | x- | 13 | Hils 1995 | imm | N |
| <i>C. alhedra</i> | L | | 4 | Schmitt 1986 | | |
| <i>C. branta</i> | L | x- | 16 | " | | |
| <i>C. morosa bifida</i> form | L | | 2 | " | | |
| <i>C. sparna</i> | L | | 1 | " | | |
| Limnephilidae | L | | 1 | Hils 1995 | imm | |
| <i>Helichus striatus</i> | A | | 1 | Hils Schmitt 1982 | | |
| <i>Optioseius</i> | L | HD | 22 | " | imm | N |
| <i>O. fastidius</i> | L | | 4 | " | | |
| <i>O. trivittatus</i> | L, A | - | 7 | " | | |
| <i>Stenelmis</i> | L | o- | 27 | " | | N |
| <i>S. crenata</i> | A | | 3 | " | | |
| <i>Antocha</i> | L | - | 6 | Hils 1995 | | |
| <i>Tipula</i> | L | | 1 | " | | |
| <i>Atherix variegata</i> | L | x- | 16 | " | | |
| <i>Corynoneura</i> | P | | 1 | Ferris et al 2008 | | |
| <i>Gammarus pseudolimnoides</i> | A | | 1 | Hils 1972 | | |
| Dugesidae | A | | 4 | Thorp Rog 2016 | | |
| Naididae | A | | 3 | Brin Geld 1991 | | |

