

Instructions: Bold fields must be completed.

Station Summary		
Waterbody Name PINE RIVER	Waterbody ID Code 247800	Sample ID (YYYYMMDD-CY-FD) 20171027-70-02
Sampling Location		Database Key 149424413

SWIMS Station ID 703073	SWIMS Station Name LOWER PINE RIVER AT 19TH DRIVE		
Latitude 44.202354	Longitude -89.22731	Lat/Long Determination Method (circle) SWIMS SWDV GPS	Datum Used if using GPS WGS84 or NAD83
Basin (WMU) WOLF RIVER	Watershed Name PINE AND WILLOW RIVERS	County WAUSHARA	

Sample and Site Descriptors	
Sample Collector (Last Name, First) DAVID BOLHA	Project Name EAST DISTRICT NC STREAM STRATIFIED SITES 2017

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) 5	Estimated Area Sampled (m <sup>2</sup> ) 3.0	Number of Samples in Composite 1	Replicate No. _____ of _____
--------------------------------	---	-------------------------------------	------------------------------

Reason For Sampling

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

Water Temp. (°C) 47.00F	D.O. (mg/l) 8.8	D.O. (%sat.) 75.8	pH (su) 7.8	Conductivity (umhos/cm) 402.2	Transparency (cm) 120
----------------------------	--------------------	----------------------	----------------	----------------------------------	--------------------------

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) 1.5	Average Stream Width of reach (m) 6.0
---	--	--

Composition of Substrate Sampled (Percent):

Bedrock: \_\_\_\_\_ Boulders (basketball or larger): \_\_\_\_\_ Rubble (tennisball to basketball): 30 Gravel (ladybug to tennisball): 50  
 Sand: 20 Clay: \_\_\_\_\_ Silt/Muck: \_\_\_\_\_ Overhanging Vegetation: \_\_\_\_\_  
 Aquatic Macrophytes: \_\_\_\_\_ Leaf Snags: \_\_\_\_\_ Coarse Woody Debris: \_\_\_\_\_ Other ( \_\_\_\_\_ ): \_\_\_\_\_

Embeddedness of Substrate at Sample Site (%) 50     
 Canopy Cover at Sample Site (%) 0

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

Comments

Special Instructions for Laboratory

**For Lab Use Only**

Sample Sorter <i>Kayla Wolcott</i>	Taxonomist <i>Dimick, Jeffrey</i>	Estimated Percent of Sample Sorted 70%
Date Processed 07/10/18	Specimens Saved Subsample archived in dBL until Nov 2021	

E1=312

Taxa	Life Stage	Bench Tally	Count	Taxonomic Reference	Condition	Unique Taxon
<i>Baetis brunneicollis</i>	L	III	4	Klub 2016		
<i>B. tricaudatus</i>	L	II	2	"		
<i>B. flavistriga</i> group	L	II	2	"		
<i>Brachycentrus americanus</i>	L	I	1	Hils 1985		
<i>B. occidentalis</i>	L	I	1	"		
<i>Ceratomyza</i>	L	II	2	Hils 1985		
<i>Ceratomyza slossomae</i>	L	I	1	Sim Hils 1986		
Ephydriidae	L	I	1	cont Mer 2008		
<i>Simulium vittatum</i> species complex	L	X-1	16	Adi et al 2004		
<i>Anopheles</i>	L	II	2	Hils 1985		
<i>Limnephila</i>	L	I	1	"		
<i>Gammarus pseudolimnoides</i>	A	88-1	76	Hils 1972		
Caecidotea	A	I	1	Will 1972	imm	
Mermithidae	A	II	2	Poinar 1981		
<del>Spint 43 Chironomidae</del>	L	-11-10				
<i>Coachmanella</i> 08270700	L	I	1	cran Epi 2013		
<i>Pogastia</i>	L	III	8	Stethander 2013		
<i>Procladius olivaceus</i>	L	I	1	Stethander 2013a		
<i>Orthocladius</i> 08300000	L	III	3	Cranston 2013		
<i>Brillia</i>	L	III	3	Anders+3 2013		
<i>Corynoneura</i>	L	II	2	"		
<i>Eukiefferella</i>	L	II	2	"	mt indet/imm	N
<i>Ed. claripennis</i> group	L	I	1	"		
<i>Rhectocentrus</i>	L	I	1	"		
<i>Thienemannella</i>	L	I	1	"	dam	
<i>Tuctenia bavaria</i> group	L	-	5	Bode 1983		
<i>Natocladius</i>	L	I	1	Anders+3 2013	imm	
<i>Orthocladius</i> ( <i>Orthocladius</i> )	L	III	4	"		
Chironominae 08330000	L	-1	6	Cranston 2013	mt indet/imm	N
<i>Cladotanytarsus</i>	L	8 III	33	Epi et al 2013		
<i>Micropsectra</i>	L	III	3	"		
<i>Paratanytarsus longistylus</i>	L	-II	7	"		
<i>Paratendipes</i>	L	I	1	"		
<i>Polypedilum</i> ( <i>Uresipedilum</i> ) <i>aviceps</i>	L	8601	101	Bolton 2012		
<i>Rhectanytarsus</i>	L	8	40	Epi et al 2013		

>3 taxa, TVAL ≤ 210

12 < (0.1 × 308)