

Appendix Table 1. ICI metrics and values from data collected NEORSD during 2012.

River Mile	Drainage Area (sq mi)	Number of				Percent:						Qual. EPT	ICI or Narrative
		Total Taxa	Mayfly Taxa	Caddisfly Taxa	Dipteran Taxa	Mayflies	Caddisflies	Tanytarsini	Other Dipt/NI	Tolerant Organisms			
Mill Creek (19-006)													
Year: 2012													
10.13	2.6	26(4)	1(0)	4(6)	14(4)	2.9(2)	3.7(6)	29.8(6)	62.8(2)	5.0(6)	3(0)	36	
8.30	3.9	29(4)	1(0)	4(6)	19(4)	24.3(6)	12.2(6)	13.0(4)	50.1(2)	10.3(4)	4(2)	38	
6.80	4.4	28(4)	1(0)	3(6)	15(4)	25.7(6)	3.2(6)	1.8(2)	69.3(0)	42.8(0)	4(2)	30	
3.15	13.6	28(4)	2(0)	4(6)	12(2)	6.0(2)	46.6(6)	9.0(2)	38.4(4)	1.2(6)	5(2)	34	
2.75	14.6	31(4)	2(0)	5(6)	16(4)	25.4(6)	23.8(6)	9.3(2)	41.5(4)	3.6(6)	5(2)	40	
0.70	18.2	25(4)	2(0)	5(6)	9(2)	14.4(4)	45.2(6)	1.6(2)	38.7(4)	1.4(6)	6(2)	36	
0.12	19.5	32(4)	2(0)	6(6)	18(4)	1.7(2)	8.5(6)	27.9(6)	61.9(2)	7.4(6)	6(2)	38	

Appendix Table 2. Macroinvertebrate taxa from NEORS sites during 2012.

River Code: 19-006		River: <i>Mill Creek</i>		Site ID:	12H121-12Q122
Site: Canal Rd.				Subsample:	Collector:
Collection Date: 07/30/2012		Latitude: 0.000000	Longitude: 0.000000	RM:	0.12
Taxa Code	Taxa	Qt./Ql.	Taxa Code	Taxa	Qt./Ql.
01801	Turbellaria	466 +	85821	Tanytarsus glabrescens group sp 7	851 +
03600	Oligochaeta	315 +	85840	Tanytarsus sepp	403 +
04962	Mooreobdella fervida	+	87501	Empididae	66
04964	Mooreobdella microstoma	12	95501	Planorbidae	8
05800	Caecidotea sp	39 +			
06700	Crangonyx sp	+	No. Quantitative Taxa:	32	Total Taxa: 43
08250	Orconectes (Procericambarus) rusticus	+	No. Qualitative Taxa:	26	ICI: 38
08601	Hydracarina	+	Number of Organisms:	5460	Qual EPT: 6
11120	Baetis flavistriga	23 +	QCTV:		33.1
11130	Baetis intercalaris	68 +			
22001	Coenagrionidae	+			
51600	Polycentropus sp	1			
52200	Cheumatopsyche sp	190 +			
52430	Ceratopsyche morosa group	38 +			
52450	Ceratopsyche sparna	2			
52530	Hydropsyche depravata group	159 +			
53800	Hydroptila sp	73 +			
65800	Berosus sp	1			
70600	Antocha sp	+			
71900	Tipula sp	4			
74501	Ceratopogonidae	+			
77120	Ablabesmyia mallochi	+			
77500	Conchapelopia sp	627 +			
77750	Hayesomyia senata or Thienemannimyia norena	358			
80410	Cricotopus (C.) sp	358			
80420	Cricotopus (C.) bicinctus	+			
80430	Cricotopus (C.) tremulus group	45			
81231	Nanocladius (N.) crassicornus or N. (N.) "rectinervis"	90			
82100	Thienemanniella sp	8			
82201	Tvetenia sp	45			
82730	Chironomus (C.) decorus group	+			
82820	Cryptochironomus sp	+			
83040	Dicrotendipes neomodestus	224 +			
84450	Polypedilum (Uresipedilum) flavum	492 +			
84470	Polypedilum (P.) illinoense	90			
84540	Polypedilum (Tripodura) scalaenum group	45 +			
84700	Stenochironomus sp	90			
85500	Paratanytarsus sp	179			
85625	Rheotanytarsus sp	90			

Appendix Table 2. Macroinvertebrate taxa from NEORS sites during 2012.

River Code: 19-006		River: <i>Mill Creek</i>		Site ID:	12H123-12Q124	
Site:				Subsample:	Collector: RAM, JG	
Collection Date: 07/31/2012		Latitude: 41.42400	Longitude: -81.6376	RM: 0.70		
Taxa Code	Taxa	Qt./Ql.	Taxa Code	Taxa	Qt./Ql.	
01801	Turbellaria	904 +				
03600	Oligochaeta	56 +	No. Quantitative Taxa: 25 Total Taxa: 35			
04935	Erpobdella punctata punctata	2 +	No. Qualitative Taxa: 27 ICI: 36			
04964	Mooreobdella microstoma	+	Number of Organisms: 4452 Qual EPT: 6			
05800	Caecidotea sp	+	QCTV: 35.2			
06700	Crangonyx sp	3				
08250	Orconectes (Procericambarus) rusticus	+				
08601	Hydracarina	16 +				
11120	Baetis flavistriga	219 +				
11130	Baetis intercalaris	423 +				
21300	Hetaerina sp	1				
22001	Coenagrionidae	1				
52200	Cheumatopsyche sp	1001 +				
52430	Ceratopsyche morosa group	844 +				
52450	Ceratopsyche sparna	65 +				
52530	Hydropsyche depravata group	89 +				
53800	Hydroptila sp	12				
69400	Stenelmis sp	+				
71900	Tipula sp	+				
77500	Conchapelopia sp	144 +				
80410	Cricotopus (C.) sp	+				
80430	Cricotopus (C.) tremulus group	+				
82220	Tvetenia discoloripes group	36 +				
83040	Dicrotendipes neomodestus	14 +				
84450	Polypedilum (Uresipedilum) flavum	518 +				
84470	Polypedilum (P.) illinoense	+				
84540	Polypedilum (Tripodura) scalaenum group	7 +				
85500	Paratanytarsus sp	+				
85625	Rheotanytarsus sp	22				
85821	Tanytarsus glabrescens group sp 7	29 +				
85840	Tanytarsus sepp	22				
87540	Hemerodromia sp	8 +				
96120	Menetus (Micromenetus) dilatatus	8				
96900	Ferrissia sp	8				
98001	Sphaeriidae	+				

Appendix Table 2. Macroinvertebrate taxa from NEORS sites during 2012.

River Code: 19-006		River: <i>Mill Creek</i>		Site ID:	12H125-12Q126	
Site:				Subsample:	Collector: RAM, JG	
Collection Date: 07/31/2012		Latitude: 41.44510	Longitude: -81.6271	RM: 2.75		
Taxa Code	Taxa	Qt./Ql.	Taxa Code	Taxa	Qt./Ql.	
01801	Turbellaria	92 +				
03000	Ectoprocta	+	No. Quantitative Taxa: 31 Total Taxa: 38			
03600	Oligochaeta	33 +	No. Qualitative Taxa: 27 ICI: 40			
04901	Erpobdellidae	5 +	Number of Organisms: 1715 Qual EPT: 5			
04935	Erpobdella punctata punctata	3	QCTV: 33.7			
05800	Caecidotea sp	1 +				
06700	Crangonyx sp	2 +				
08601	Hydracarina	8 +				
11120	Baetis flavistriga	411 +				
11130	Baetis intercalaris	25 +				
21300	Hetaerina sp	+				
22001	Coenagrionidae	+				
52200	Cheumatopsyche sp	142 +				
52430	Ceratopsyche morosa group	35				
52450	Ceratopsyche sparna	35 +				
52530	Hydropsyche depravata group	156 +				
53800	Hydroptila sp	40				
71300	Limonia sp	8				
71900	Tipula sp	+				
74100	Simulium sp	+				
77500	Conchapelopia sp	75				
79100	Thienemannimyia group	+				
80310	Cardiocladius obscurus	7 +				
80410	Cricotopus (C.) sp	34				
80420	Cricotopus (C.) bicinctus	14 +				
80430	Cricotopus (C.) tremulus group	48 +				
82220	Tvetenia discoloripes group	7				
83040	Dicrotendipes neomodestus	21				
84450	Polypedilum (Uresipedilum) flavum	274 +				
84460	Polypedilum (P.) fallax group	7				
84470	Polypedilum (P.) illinoense	7				
84540	Polypedilum (Tripodura) scalaenum group	34 +				
85500	Paratanytarsus sp	21				
85821	Tanytarsus glabrescens group sp 7	69 +				
85840	Tanytarsus sepp	69 +				
87540	Hemerodromia sp	8 +				
96120	Menetus (Micromenetus) dilatatus	24 +				
98200	Pisidium sp	+				

Appendix Table 2. Macroinvertebrate taxa from NEORS sites during 2012.

River Code: 19-006		River: <i>Mill Creek</i>		Site ID:	12H127-12Q128	
Site:				Subsample:	Collector: RAM, JG	
Collection Date: 07/31/2012		Latitude: 41.44220	Longitude: -81.6216	RM: 3.15		
Taxa Code	Taxa	Qt./Ql.	Taxa Code	Taxa	Qt./Ql.	
01320	Hydra sp	124				
01801	Turbellaria	240 +	No. Quantitative Taxa: 28 Total Taxa: 39			
03000	Ectoprocta	+	No. Qualitative Taxa: 26 ICI: 34			
03600	Oligochaeta	6 +	Number of Organisms: 2476 Qual EPT: 5			
04935	Erpobdella punctata punctata	4 +	QCTV: 32.6			
04964	Mooreobdella microstoma	19				
05800	Caecidotea sp	64 +				
06700	Crangonyx sp	+				
08601	Hydracarina	6 +				
11120	Baetis flavistriga	26 +				
11130	Baetis intercalaris	123 +				
21300	Hetaerina sp	+				
22001	Coenagrionidae	+				
22300	Argia sp	+				
23600	Aeshna sp	+				
23909	Boyeria vinosa	+				
52200	Cheumatopsyche sp	559 +				
52430	Ceratopsyche morosa group	20				
52450	Ceratopsyche sparna	20				
52530	Hydropsyche depravata group	554 +				
53800	Hydroptila sp	+				
68601	Ancyronyx variegata	+				
77500	Conchapelopia sp	122 +				
81231	Nanocladius (N.) crassicornus or N. (N.) "rectinervis"	5				
83040	Dicrotendipes neomodestus	25 +				
84300	Phaenopsectra obediens group	5				
84315	Phaenopsectra flavipes	10				
84450	Polypedilum (Uresipedilum) flavum	76				
84540	Polypedilum (Tripodura) scalaenum group	46 +				
85500	Paratanytarsus sp	46				
85625	Rheotanytarsus sp	10				
85821	Tanytarsus glabrescens group sp 7	51				
85840	Tanytarsus sepp	117 +				
87540	Hemerodromia sp	16 +				
95100	Physella sp	+				
96120	Menetus (Micromenetus) dilatatus	126 +				
96900	Ferrissia sp	24				
98001	Sphaeriidae	32				
98200	Pisidium sp	+				

Appendix Table 2. Macroinvertebrate taxa from NEORS sites during 2012.

River Code: 19-006		River: <i>Mill Creek</i>		Site ID:	12H129-12Q130	
Site:				Subsample:	Collector: JN, JB	
Collection Date: 07/31/2012		Latitude: 41.42330	Longitude: -81.5659	RM:	6.80	
Taxa Code	Taxa	Qt./Ql.	Taxa Code	Taxa	Qt./Ql.	
01801	Turbellaria	1 +				
03360	Plumatella sp	2 +	No. Quantitative Taxa: 28 Total Taxa: 39			
03600	Oligochaeta	66 +	No. Qualitative Taxa: 25 ICI: 30			
04664	Helobdella stagnalis	6 +	Number of Organisms: 505 Qual EPT: 4			
04935	Erpobdella punctata punctata	1	QCTV: 31.8			
04964	Mooreobdella microstoma	1 +				
06700	Crangonyx sp	+				
11120	Baetis flavistriga	130 +				
21200	Calopteryx sp	+				
21604	Archilestes grandis	+				
22001	Coenagrionidae	+				
22300	Argia sp	+				
52200	Cheumatopsyche sp	6 +				
52430	Ceratopsyche morosa group	+				
52530	Hydropsyche depravata group	8 +				
53800	Hydroptila sp	2				
74100	Simulium sp	15 +				
74501	Ceratopogonidae	1				
77120	Ablabesmyia mallochi	2				
77500	Conchapelopia sp	68 +				
78655	Procladius (Holotanypus) sp	+				
80310	Cardiocladius obscurus	+				
80410	Cricotopus (C.) sp	+				
80420	Cricotopus (C.) bicinctus	9 +				
81231	Nanocladius (N.) crassicornus or N. (N.) "rectinervis"	11				
82141	Thienemanniella xena	14				
82710	Chironomus (C.) sp	5 +				
83040	Dicrotendipes neomodestus	3				
84210	Paratendipes albimanus or P. duplicatus	2 +				
84300	Phaenopsectra obediens group	2				
84450	Polypedilum (Uresipedilum) flavum	3				
85500	Paratanytarsus sp	2				
85800	Tanytarsus sp	+				
85821	Tanytarsus glabrescens group sp 7	5				
85840	Tanytarsus sepp	2				
87540	Hemerodromia sp	+				
95100	Physella sp	135 +				
96900	Ferrissia sp	1				
98001	Sphaeriidae	2				

Appendix Table 2. Macroinvertebrate taxa from NEORS sites during 2012.

River Code: 19-006		River: <i>Mill Creek</i>		Site ID:	12H131-12Q132	
Site:				Subsample:	Collector: JN, JB	
Collection Date: 07/31/2012		Latitude: 41.42330	Longitude: -81.5659	RM:	8.30	
Taxa Code	Taxa	Qt./Ql.	Taxa Code	Taxa	Qt./Ql.	
01801	Turbellaria	19 +	85840	Tanytarsus sepp	33	
03360	Plumatella sp	+	87540	Hemerodromia sp	33 +	
03600	Oligochaeta	34 +	95501	Planorbidae	1	
04901	Erpobdellidae	4 +				
06700	Crangonyx sp	+	No. Quantitative Taxa: 29		Total Taxa: 41	
08601	Hydracarina	+	No. Qualitative Taxa: 26		ICI: 38	
11120	Baetis flavistriga	471 +	Number of Organisms: 1940		Qual EPT: 4	
21200	Calopteryx sp	+	QCTV:		32.7	
21300	Hetaerina sp	+				
22001	Coenagrionidae	+				
22300	Argia sp	+				
23600	Aeshna sp	+				
52200	Cheumatopsyche sp	70 +				
52450	Ceratopsyche sparna	3				
52530	Hydropsyche depravata group	79 +				
53800	Hydroptila sp	84 +				
69400	Stenelmis sp	8 +				
70501	Tipulidae	1				
71900	Tipula sp	+				
77120	Ablabesmyia mallochi	22 +				
77500	Conchapelopia sp	341				
78401	Natarsia species A (sensu Roback, 1978)	+				
79100	Thienemannimyia group	+				
80410	Cricotopus (C.) sp	22				
80420	Cricotopus (C.) bicinctus	143 +				
80430	Cricotopus (C.) tremulus group	44 +				
80510	Cricotopus (Isocladius) sylvestris group	+				
81231	Nanocladius (N.) crassicornus or N. (N.) "rectinervis"	11				
82820	Cryptochironomus sp	11				
83040	Dicrotendipes neomodestus	55 +				
84210	Paratendipes albimanus or P. duplicatus	110 +				
84300	Phaenopsectra obediens group	22				
84450	Polypedilum (Uresipedilum) flavum	44				
84460	Polypedilum (P.) fallax group	11				
84470	Polypedilum (P.) illinoense	11				
84540	Polypedilum (Tripodura) scalaenum group	33				
85500	Paratanytarsus sp	77				
85821	Tanytarsus glabrescens group sp 7	143				

Appendix Table 2. Macroinvertebrate taxa from NEORS sites during 2012.

River Code: 19-006		River: <i>Mill Creek</i>		Site ID:	12H133-12Q134	
Site:				Subsample:	Collector: JN, JB	
Collection Date: 07/31/2012		Latitude: 41.44600	Longitude: -81.5312	RM: 10.13		
Taxa Code	Taxa	Qt./Ql.	Taxa Code	Taxa	Qt./Ql.	
01801	Turbellaria	45 +				
03600	Oligochaeta	32 +	No. Quantitative Taxa: 26 Total Taxa: 37			
06700	Crangonyx sp	2 +	No. Qualitative Taxa: 25 ICI: 36			
08601	Hydracarina	+	Number of Organisms: 1995 Qual EPT: 3			
11120	Baetis flavistriga	58 +	QCTV: 33.1			
21200	Calopteryx sp	+				
22001	Coenagrionidae	8 +				
22300	Argia sp	+				
23600	Aeshna sp	+				
42700	Belostoma sp	+				
51600	Polycentropus sp	1				
52200	Cheumatopsyche sp	16 +				
52530	Hydropsyche depravata group	48 +				
53800	Hydroptila sp	8				
68901	Macronychus glabratus	8				
69400	Stenelmis sp	+				
71900	Tipula sp	2 +				
74100	Simulium sp	+				
74501	Ceratopogonidae	+				
77500	Conchapelopia sp	255				
77750	Hayesomyia senata or Thienemannimyia norena	+				
78655	Procladius (Holotanypus) sp	+				
80420	Cricotopus (C.) bicinctus	51 +				
80430	Cricotopus (C.) tremulus group	68 +				
80510	Cricotopus (Isocladius) sylvestris group	17				
83040	Dicrotendipes neomodestus	136 +				
84210	Paratendipes albimanus or P. duplicatus	442 +				
84315	Phaenopsectra flavipes	34				
84450	Polypedilum (Uresipedilum) flavum	68				
84470	Polypedilum (P.) illinoense	+				
84540	Polypedilum (Tripodura) scalaenum group	51				
85500	Paratanytarsus sp	255				
85821	Tanytarsus glabrescens group sp 7	187 +				
85840	Tanytarsus sepp	153				
87540	Hemerodromia sp	24 +				
96120	Menetus (Micromenetus) dilatatus	24				
98001	Sphaeriidae	2				