## **MEETING NOTES**

## SOUTH CAROLINA ELECTRIC & GAS COMPANY SALUDA HYDRO PROJECT RELICENSING FRESHWATER MUSSEL/BENTHIC MACROINVERTEBRATE TECHNICAL WORKING COMMITTEE

SCE&G Offices at Carolina Research Park May 3, 2006

Final csb 6-2-06

## ATTENDEES:

Bill Argentieri, SCE&G Shane Boring, Kleinschmidt Associates Jeni Summerlin, Kleinschmidt Associates Dick Christie, SCDNR Amanda Hill, USFWS Steve Summer, SCANA Services Tom Eppink, SCANA Services Jim Glover, SCDHEC Ron Ahle, SCDNR Sam Drake, L. Murray Assoc.

### ACTION ITEMS:

- Incorporate additional detail from J. Alderman into mussel survey study plan *Shane Boring*
- Distribute 1987 DHEC LSR Study Report (Younginer 1987) to TWC *Shane Boring*
- Provide LSR macroinvertebrate data for years not covered by Shealy Env. reports *Steve Summer*
- Draft study plan for LSR macroinvertebrate sampling
- Shane Boring/Jeni Summerlin
- Conduct literature review for appropriate method for reservoir macroinvertebrate sampling *Shane Boring/Jeni Summerlin*
- Contact Dave Caughlin regarding macroinvert methods used on Catawba-Wateree reservoirs *Shane Boring/Jeni Summerlin*
- Draft strawman for macroinvertebrate sampling plan for Lake Murray *Shane Boring*
- Coordinate with Shealy Environmental to determine suitable upstream/downstream locations for multi-habitat macroinvert sampling in the LSR *Steve Summer*

DATE OF NEXT MEETING:	July 2
	(Fresh Resou

July 26, 2006 at 9:30 am (Freshwater Mussels, RT&E Species, Terrestrial Resources TWC's)

Location: SCE&G Offices at Carolina Research Park 111 Research Drive Columbia, SC 29203



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### **MEETING NOTES:**

These notes serve to be a summary of the major points presented during the meeting and are not intended to be a transcript or analysis of the meeting.

Shane Boring opened the meeting at 9:15 AM. Jim Glover provided a copy of the 1987 SCDHEC study discussed at the last Freshwater Mussels/Benthic macroinvertebrate TWC meeting (Younginer 1987; See March 8, 2006, meeting notes and action items). Shane noted that he would scan the report and distribute it electronically to the TWC members.

### **Reconnaissance Mussel Survey**

Shane noted that since the last meeting he had contacted John Alderman, who subsequently provided a proposal for performing a reconnaissance mussel survey for Lake Murray, the Lower Saluda River (LSR), and the Congaree River. The draft mussel survey study plan was then distributed to the group for review (Attachment A). Shane noted that the draft had been reviewed and approved by John Alderman and subsequently distributed to the TWC for review via e-mail on April 24<sup>th</sup>. He added that to date, the only comments received on the study plan were from American Rivers (Gerrit Jobsis).

The group then briefly reviewed comments received from American Rivers on the draft study plan (Attachment B). Amanda Hill added that, in addition to the information requested by Gerrit, she would like for the plan to include an explanation of how survey sites will be chosen in Lake Murray. Specifically, she enquired as to which habitat types will be surveyed in the lake and how many representative sites will be surveyed for each of these habitat types. Amanda also noted the need for a map showing the sampling locations and that the final report should include not only the species encountered, but also the numbers of live and dead specimens, the depth found, and the location. Shane noted that he would get further clarification from John Alderman regarding these items. He added that he would work directly with the TWC through e-mail to finalize the study plan as soon as possible, noting John Alderman's desire to get surveys underway prior to significant rises in lake level due to spring rains.

### **Benthic Macroinvertebrate Studies in the LSR**

Shane noted that TWC members were notified via e-mail on April 3rd, that the 2001, 2003, 2004 and 2005 LSR macroinvertebrate survey reports (prepared by Shealy Environmental) were available for download from the Kleinschmidt FTP site. Steve Summer noted that, while reports were only prepared for the above - referenced years, SCE&G has contracted with Shealy since 1999 to conduct macroinvertebrate sampling in the LSR. He added that initially a rapid bioassessment (multi-habitat) method was used prior to implementation of the current Hester Dendy methods. Steve noted that he would try to find the data from the surveys not summarized in the reports and distribute it to the group.



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### SCE&G Offices at Carolina Research Park May 3, 2006

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The group then briefly discussed the adequacy of these studies for characterizing the macroinvertebrate fauna of the LSR and potential impacts from project operations. Dick Christie noted that the current program, which uses Hester Dendy samplers, be continued in order to examine pre- vs. post-venting impacts to the macroinvert community. After some discussion, the group agreed that a study plan should be prepared to formalize the current sampling regime. In addition, Dick Christie and Steve Summer suggested adding an additional sampling location in the vicinity of Riverbanks Zoo. Steve S. noted that this could easily be coordinated with the field work associated with the temperature studies. Jim Glover noted that the addition of a multi-habitat component might be beneficial for providing a more complete picture of the macroinvert fauna and suggested an upstream and downstream site would be appropriate for the LSR. Steve Summer agreed to coordinate with Shealy to identify a suitable upstream and downstream site. Shane agreed to draft a study plan and distribute to the TWC.

### Benthic Macroinvertebrate Studies in Lake Murray

Sam Drake noted that, in addition to the LSR, some attention should be given to the lake fauna. Jim Glover noted that, because it is not a natural system, the usefulness of such a study was unclear considering most of the invert sampling methods for assessing the health of aquatic systems were developed for natural streams and rivers. Ron Ahle noted that the Florida Dept. of Environmental Protection has developed methods for their natural lakes that may prove applicable to reservoirs. Several group members cited use of an Echman Dredge as potentially more suitable for the reservoir than the artificial substrate method (i.e. Hester Dendy) being used for the LSR. Sam Drake noted that it may be beneficial to coordinate invert sampling sites in the lake with the Lake Murray Association, SCE&G, SCDHEC, and other water quality sampling locations. After additional discussion, Shane Boring was tasked with conducting a brief literature search for appropriate methods and to coordinate with Dave Caughlin at Duke Power to determine what methods, if any, were used for the Catawba-Wateree reservoirs. Following completion of the literature review, Shane agreed to prepare a strawman for the next TWC meeting detailing potential methods and number and locations of potential sampling locations.

### **Date/Location of Next Meeting**

The group agreed that the next meeting of the Freshwater Mussels/Benthic Macroinverts, RT&E Species, and Terrestrial Resources TWC's will occur on July 26, 2006 at the Research Park at 9:30 AM. Shane noted that an electronic meeting invitation will be issued to confirm the date with individual members and provide directions to the meeting site. The meeting adjourned at approximately 10:20 am.



# ATTACHMENT A

## MUSSEL SURVEY DRAFT STUDY PLAN

## Saluda Hydroelectric Project (FERC No. 516)

## Study Plan: Reconnaissance Survey of the Freshwater Mussel Fauna of the Lower Saluda and Congaree River, Lake Murray, and Selected Tributaries

Freshwater Mussels/Benthic Macroinvertebrate Technical Working Committee Draft – April 19, 2006

## I. <u>Study Objective</u>

The study objective will be to determine whether freshwater mussels occur in the Saluda Hydroelectric Project vicinity, and if so, provide a qualitative measure of species diversity, spatial distribution, and abundance.

## II. <u>Geographic and Temporal Scope</u>

Qualitative mussel surveys will focus on Lake Murray and selected major and minor tributaries (including the Saluda and Little Saluda rivers at the reservoir headwaters); the LSR from downstream of Saluda Hydro Dam to its confluence with the Broad River; and the Congaree River from its origin at the confluence of the Saluda and Broad rivers to approximately the I-77 bridge.

The study will be conducted during Spring 2006 (May through early June).

## III. <u>Methodology</u>

Qualitative surveys to determine the presence of freshwater mussels will be conducted at suitable habitat sites in the Lower Saluda and Congaree rivers (see Section II above for geographic scope), as well as above Saluda Dam in Lake Murray and in the following Lake Murray tributaries: Beaver Dam Creek, Bush River, Big Creek, Buffalo Creek, Camping Creek, Bear Creek, Little Hollow Creek, Hollow Creek, Clouds Creek, Big Creek, Little Saluda River, Indian Creek, and Saluda River (7-8 total survey days).

All surveys will be led by John Alderman of Alderman Environmental Services, Inc. (Pittsboro, NC), with assistance from Kleinschmidt and/or SCE&G staff. Surveys will conducted from a canoe, boat, or by wading, and will utilize mask and snorkel, tactile, visual, and/or SCUBA methods to search for mussels. At each survey site, potential mussel habitat will be identified, photographed, and Geographic Information System (GPS) coordinates recorded. When found, mussels will be identified to species, length measured (sample measured when high abundances present), and a catch-per-unit-effort determined. All live mussels will be returned to the collection site.

## IV. <u>Schedule and Required Conditions</u>

Surveys will begin in May 2006 and will take a maximum of two weeks to complete. Study methodology, timing, and duration may be adjusted based on consultation with the resource agencies and interested stakeholders. A final report summarizing the study findings will be issued within 90 days of completion. All data collected will be provided in electronic format to agencies and interested stakeholders.

## V. <u>Use of Study Results</u>

Study results will be used as an information resource during discussion of relicensing issues with the SCDNR, USFWS, Wildlife and Fisheries RCG, Freshwater Mussels/Benthic Macroinvertebrate TWC, and other relicensing stakeholders.

## VI. <u>Study Participants</u>

NAME	ORGANIZATION	PHONE	E-MAIL
	Water Quali	ity Technical Working	Committee
Jim Glover	SCDHEC	(803) 898-4081	gloverjb@dhec.sc.gov
Gerrit Jobsis	Am. Rivers/CCL	(803)771-7114 x 22	gjobsis@americanrivers.org
Ron Ahle	SCDNR	(803)734-2728	<u>ahler@dnr.sc.gov</u>
Amanda Hill	USFWS	(843)727-4707,	<u>Amanda_Hill@fws.gov</u>
		x303	
Shane Boring	Kleinschmidt	(803)822-3177	Shane.Boring@KleinschmidtUSA.com
Stephen E.	SCANA Services	(803)217-7357	summer@scana.com
Summer			
Jennifer Price	SCDNR	(803)353-8232	pricej@dnr.sc.gov
		Applicant Contacts	
William Argentieri	SCE&G	(803)217-9162	bargentieri@scana.com
Randy Mahan	SCANA Services	(803)217-9538	rmahan@scana.com

# ATTACHMENT B

# AMERICAN RIVERS' COMMENTS ON DRAFT MUSSEL SURVEY STUDY PLAN

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From:	Gerrit Jobsis [SMTP:gjobsis@americanrivers.org]
To:	Shane Boring; Steve Summer; Amanda Hill; Bill Argentieri; Jennifer Price; Jim Glover; Randy Mahan; Ron Ahle
Cc:	Jennifer Summerlin
Subject:	RE: (Saluda Hydro) Mussel Recon Survey Study Plan (draft;04192006) alderman comments.doc
Sent:	4/26/06 1:13 PM Importance: Normal
Shane,	
This is a v	very general study plan without much detail.
I agree wi	ith the geographic area. I count 13 Lake Murray tributaries plus the lower Saluda and the Congaree rivers.
I agree wi may be ne	ith the temporal scope (late May - early June) for an initial effort. Based on the results, additional survey work reded in fall 2005 or perhaps a repeat of the survey in 2007.
I am conc time will unimpour	erned there may be future disagreement as to the adequacy of effort if more detail is not provided. How much be expended at each site? How far upstream will the surveys extend at the headwater tribs? To include aded reaches? How will the Lake Murray shoreline be surveyed with the current 6 to 7 foot drawdown?
Also we h expended map of pr	ave about 10 miles of the lower Saluda and 10 miles of the Congaree below the dam. How much effort will be at each of these rivers? What habitats will be surveyed? These things need detail before the study begins. A oposed study sites is also needed.
You aske discuss th the plan.	d for a quick turnaround, so I have provided one. Due to our move and other workload I have not been able to is with other stakeholder and agencies. I am especially interested in the opinion of the DNR and USFWS re
Genit	
We have :	moved! Please see our new address below.
<>>>>>>	******
Gerrit Jöb	isis
American	Rivers * Southeast Office
2231 Dev	ine Street, Suite 100 * Columbia, S.C. 29205
Telephon	e (803) 771-7114 * Fax (803) 771-7580
gjobsis@	americanrivers.org
li –	

-----Original Message-----From: Shane Boring [mailto:Shane Boring@KleinschmidtUSA.com] Sent: Monday, April 24, 2006 9:49 AM To: Steve Summer; Amanda Hill; Bill Argentieri; Gerrit Jobsis; Jennifer Price; Jim Glover; Randy Mahan; Ron Ahle; Shane Boring

Cc: Jennifer Summerlin Subject: (Saluda Hydro) Mussel Recon Survey Study Plan (draft;04192006) alderman comments.doc

Dear Freshwater Mussels/Benthic Macroinvertebrate TWC Member:

Attached for your review is the draft study plan for the freshwater mussel reconnaissance survey on Lake Murray and the Lower Saluda and Congaree Rivers. The draft has been reviewed by John Alderman, and his comments have been incorporated. We have tried to keep the study plan as brief as possible to facilitate a quick review, as John would like to get this study started ASAP while the rivers and Lake are still low and clear. We will discuss the study plan and hopefully get final approval from the TWC at next week's meeting (May 3 at Research Park). Thanks in advance for your input.

C. Shane Boring Environmental Scientist Kleinschmidt Associates 101 Trade Zone Dr., Suite-21A West Columbia, SC 29170 Phone: (803)822-3177 Fax: (803)822-3183

Mussel Recon Survey Study Plan (draft;04192006) alderman comments.doc <<Mussel Recon Survey Study Plan (draft;04192006) alderman comments.doc>>>

# ATTACHMENT C

SCDHEC MACROINVERTEBRATE DATA FOR LOWER SALUDA RIVER TRIBUTARIES PROVIDED BY JIM GLOVER, SCDHEC

PHYLUM	CLASS	ORDER	FAMILY	ΤΑΧΑ	S-052	S-260	S-260	S-287	S-287	S-848	S-848
					7/1/1997	7/27/2001	7/3/1997	8/15/2003	7/3/1997	7/27/2001	7/1/1997
Annelida	Hirudinea	NA	NA	Hirudinea		7		9		1	
Annelida	Hirudinea	Rhynchobdellida	Glossiphoniidae	Placobdella sp.			1				
Annelida	Hirudinea	Rhynchobdellida	Glossiphoniidae	Placobdella papillata					2		
Annelida	Oligochaeta	Lumbriculida	Lumbriculidae	Lumbriculidae	1						
Annelida	Oligochaeta	NA	NA	Oligochaeta	2	7	5	21	2		10
Arthropoda	Crustacea	Amphipoda	Gammaridae	Crangonyx serratus	6						
Arthropoda	Crustacea	Decapoda	Cambaridae	Cambaridae		2	3			1	
Arthropoda	Crustacea	Decapoda	Cambaridae	Procambarus sp.		1					
Arthropoda	Hexapoda	Coleoptera	Dytiscidae	Coptotomus sp.						1	
Arthropoda	Hexapoda	Coleoptera	Elmidae	Ancyronyx variegatus	7			1		25	11
Arthropoda	Hexapoda	Coleoptera	Elmidae	Dubiraphia sp.						4	
Arthropoda	Hexapoda	Coleoptera	Elmidae	Dubiraphia vittatata	1		2		1		1
Arthropoda	Hexapoda	Coleoptera	Elmidae	Macronychus glabratus	36			1	1	19	2
Arthropoda	Hexapoda	Coleoptera	Elmidae	Microcylloepus pusillus	24					1	
Arthropoda	Hexapoda	Coleoptera	Elmidae	Stenelmis sp.	3	14	35	2	1	45	4
Arthropoda	Hexapoda	Coleoptera	Gyrinidae	Dineutus sp.	1						
Arthropoda	Hexapoda	Coleoptera	Haliplidae	Peltodytes sp.		1					
Arthropoda	Hexapoda	Coleoptera	Hydrophilidae	Berosus sp.			1				
Arthropoda	Hexapoda	Diptera	Chironomidae	Ablabesmyia mallochi		3	7	3	7	3	5
Arthropoda	Hexapoda	Diptera	Chironomidae	Brillia sp.							2
Arthropoda	Hexapoda	Diptera	Chironomidae	Chironomus sp.							2
Arthropoda	Hexapoda	Diptera	Chironomidae	Conchapelopia Group			6		6		11
Arthropoda	Hexapoda	Diptera	Chironomidae	Corynoneura sp.					1		
Arthropoda	Hexapoda	Diptera	Chironomidae	Cricotopus/Orthocladius			2	2		1	7
Arthropoda	Hexapoda	Diptera	Chironomidae	Cryptochironomus sp.		3				2	2
Arthropoda	Hexapoda	Diptera	Chironomidae	Cryptotendipes sp.		3					
Arthropoda	Hexapoda	Diptera	Chironomidae	Dicrotendipes sp.		3			1	1	
Arthropoda	Hexapoda	Diptera	Chironomidae	Labrundinia sp.				1			
Arthropoda	Hexapoda	Diptera	Chironomidae	Micropsectra sp.							1
Arthropoda	Hexapoda	Diptera	Chironomidae	Nanocladius sp.					1		

PHYLUM	CLASS	ORDER	FAMILY	ΤΑΧΑ	S-052	S-260	S-260	S-287	S-287	S-848	S-848
					7/1/1997	7/27/2001	7/3/1997	8/15/2003	7/3/1997	7/27/2001	7/1/1997
Arthropoda	Hexapoda	Diptera	Chironomidae	Natarsia sp.			3				
Arthropoda	Hexapoda	Diptera	Chironomidae	Omisus pica					1		
Arthropoda	Hexapoda	Diptera	Chironomidae	Parachironomus sp.					1		
Arthropoda	Hexapoda	Diptera	Chironomidae	Paratanytarsus sp.		4		1	3	3	
Arthropoda	Hexapoda	Diptera	Chironomidae	Paratendipes sp.				1			
Arthropoda	Hexapoda	Diptera	Chironomidae	Pentaneura sp.	1						
Arthropoda	Hexapoda	Diptera	Chironomidae	Phaenopsectra sp.							1
Arthropoda	Hexapoda	Diptera	Chironomidae	Polypedilum aviceps			1				1
Arthropoda	Hexapoda	Diptera	Chironomidae	Polypedilum convictum	1	29	2	10	14	25	7
Arthropoda	Hexapoda	Diptera	Chironomidae	Polypedilum fallax							2
Arthropoda	Hexapoda	Diptera	Chironomidae	Polypedilum halterale				2			
Arthropoda	Hexapoda	Diptera	Chironomidae	Polypedilum illinoense		13	9	1	9	1	2
Arthropoda	Hexapoda	Diptera	Chironomidae	Polypedilum scalaenum		1	3	1	1	1	1
Arthropoda	Hexapoda	Diptera	Chironomidae	Procladius sp.		2				1	
Arthropoda	Hexapoda	Diptera	Chironomidae	Rheocricotopus robacki		1	5		1		4
Arthropoda	Hexapoda	Diptera	Chironomidae	Rheotanytarsus sp.		24		11	59	4	10
Arthropoda	Hexapoda	Diptera	Chironomidae	Stenochironomus sp.				1			
Arthropoda	Hexapoda	Diptera	Chironomidae	Synorthocladius sp.					1		9
Arthropoda	Hexapoda	Diptera	Chironomidae	Tanytarsus sp.		3		3		5	4
Arthropoda	Hexapoda	Diptera	Chironomidae	Thienemaniella sp.							3
Arthropoda	Hexapoda	Diptera	Chironomidae	Thienemannimyia GR	1	10		1		13	
Arthropoda	Hexapoda	Diptera	Chironomidae	Tribelos jucundus		3			2		13
Arthropoda	Hexapoda	Diptera	Chironomidae	Tribelos sp.				3			
Arthropoda	Hexapoda	Diptera	Chironomidae	Xenochironomus sp.		1					
Arthropoda	Hexapoda	Diptera	Simuliidae	Simulium sp.	2	4	1	7	5	22	10
Arthropoda	Hexapoda	Diptera	Tipulidae	Hexatoma sp.		1					
Arthropoda	Hexapoda	Diptera	Tipulidae	Tipula sp.		3	4		1	11	2
Arthropoda	Hexapoda	Ephemeroptera	Baetidae	Baetis flavistriga		9				2	
Arthropoda	Hexapoda	Ephemeroptera	Baetidae	Baetis intercalaris	10				2		2
Arthropoda	Hexapoda	Ephemeroptera	Baetidae	Baetis pluto		2		2		6	

PHYLUM	CLASS	ORDER	FAMILY	ΤΑΧΑ	S-052 7/1/1997	S-260 7/27/2001	S-260 7/3/1997	S-287 8/15/2003	S-287 7/3/1997	S-848 7/27/2001	S-848 7/1/1997
Arthropoda	Hexapoda	Ephemeroptera	Baetidae	Labiobaetis propinguus	17			0,10,2000		2	2
Arthropoda	Hexapoda	Ephemeroptera	Caenidae	Caenis diminuta					1		
Arthropoda	Hexapoda	Ephemeroptera	Caenidae	Caenis sp.				19			
Arthropoda	Hexapoda	Ephemeroptera	Caenidae	Caenis hilaris							1
Arthropoda	Hexapoda	Ephemeroptera	Caenidae	Caenis diminuta/punctata			1			1	
Arthropoda	Hexapoda	Ephemeroptera	Heptagenidae	Stenonema modestum	6					10	2
Arthropoda	Hexapoda	Ephemeroptera	Isonychiadea	Isonychia sp.	2						
Arthropoda	Hexapoda	Ephemeroptera	Tricorythidae	Tricorythodes sp.	14						
Arthropoda	Hexapoda	Megaloptera	Corydalidae	Corydalus cornutus	2					2	
Arthropoda	Hexapoda	Megaloptera	Corydalidae	Nigronia serricornis	1						
Arthropoda	Hexapoda	Neuroptera	Sisyridae	Climacia areolaris					2		
Arthropoda	Hexapoda	Odonata	Aeshnidae	Basiaeschna janata		3	3				
Arthropoda	Hexapoda	Odonata	Aeshnidae	Boyeria vinosa	18	1	3		2		14
Arthropoda	Hexapoda	Odonata	Calopterygidae	Calopterygidae	2						
Arthropoda	Hexapoda	Odonata	Calopterygidae	Calopteryx sp.		3				17	1
Arthropoda	Hexapoda	Odonata	Calopterygidae	Hetaerina tittia	1						
Arthropoda	Hexapoda	Odonata	Coenagrionidae	Argia sp.	5	24	15	2	1	7	4
Arthropoda	Hexapoda	Odonata	Coenagrionidae	Coenagrionidae				2		17	
Arthropoda	Hexapoda	Odonata	Coenagrionidae	Enallagma sp.	2	22	6	6	2		3
Arthropoda	Hexapoda	Odonata	Coenagrionidae	Ischnura sp.						1	
Arthropoda	Hexapoda	Odonata	Coenagrionidae	Ischnura/Anomalagrion		2	10		4		1
Arthropoda	Hexapoda	Odonata	Corduliidae	Neurocordulia sp.	4		2		3		
Arthropoda	Hexapoda	Odonata	Corduliidae	Tetragoneuria sp.		2					
Arthropoda	Hexapoda	Odonata	Gomphidae	Gomphus sp.	3						2
Arthropoda	Hexapoda	Odonata	Gomphidae	Hagenius brevistylus							1
Arthropoda	Hexapoda	Odonata	Gomphidae	Progomphus sp.						3	
Arthropoda	Hexapoda	Odonata	Libellulidae	Libellulidae		1					
Arthropoda	Hexapoda	Odonata	Macromiidae	Macromia sp.	2				1		10
Arthropoda	Hexapoda	Trichoptera	Hydropsychidae	Cheumatopsyche sp.	29	95	2	49	60	55	5
Arthropoda	Hexapoda	Trichoptera	Hydropsychidae	Hydropsyche betteni	1	1	9			4	

PHYLUM	CLASS	ORDER	FAMILY	ΤΑΧΑ	S-052	S-260	S-260	S-287	S-287	S-848	S-848
					7/1/1997	7/27/2001	7/3/1997	8/15/2003	7/3/1997	7/27/2001	7/1/1997
Arthropoda	Hexapoda	Trichoptera	Hydropsychidae	Hydropsyche venularis	31						
Arthropoda	Hexapoda	Trichoptera	Leptoceridae	Nectopsyche exquisita	7						
Arthropoda	Hexapoda	Trichoptera	Leptoceridae	Oecetis persimillis	9						
Arthropoda	Hexapoda	Trichoptera	Leptoceridae	Triaenodes ignitus	20						
Mollusca	Gastropoda	Basommatophora	Physidae	Physella sp.		5	4		2		
Mollusca	Gastropoda	Basommatophora	Planorbidae	Helisoma anceps		4					
Mollusca	Pelecypoda	Heterodonta	Corbiculidae	Corbicula fluminea		17	1	6	3	7	9
Mollusca	Pelecypoda	Heterodonta	Sphaeriidae	Sphaeriidae					6		
				Count-	CA 3-032 3-260 3-260 3-260 3-267 3-267 3-646 3   r/1/1997 7/27/2001 7/3/1997 8/15/2003 7/3/1997 7/27/2001 7/   iropsyche venularis 31 7 7 7 7 7 7 7 7   iropsyche exquisita 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7	191					
				Taxa Richness-	33	38	28	26	35	35	41
				EPT-	11	4	3	5	3	7	5
				Biotic Index-	5.18	6.96	7.34	6.41	6.47	6.34	6.42
				EPT Score-	2.0	1.0	1.0	1.0	1.0	1.4	1.0
				<b>Biotic Index Score-</b>	5.0	2.0	2.0	3.0	2.6	3.0	3.0
				Combined Score-	3.3	1.5	1.5	2.0	1.8	2.2	2.0
				Bioclassification- Aquatic Life Use	Good-Fair	Poor	Poor	Fair	Fair	Fair	Fair
				Designation*-	PS	NS	NS	PS	PS	PS	PS
				*DC-Dentially Cymraetinau							

\*PS=Partially Supporting

\*NS=Not Supporting

STATION	COUNTY	LOCATION	LONG-DD	LAT-DD	<b>REFERENCE/TEST</b>
S-260	Lexington	Kinley Creek @ St. Andrews Rd	81.1491727	34.0470041	Test
S-287	Lexington	Rawls Creek @ SR 107	81.1863002	34.0538641	Test
S-848	Lexington	Fourteen Mile Creek @ SR 28	81.2026243	34.0094024	Test
S-052	Lexington	Twelve Mile Creek @ SR 106	81.1933733	34.0009869	Test