PORTNEUF RIVER BASIN

13075500 PORTNEUF RIVER AT POCATELLO, ID

WATER-QUALITY RECORDS

PERIOD OF RECORD.--October 1965 to July 1981, October 1990 to September 1991, October 1992 to September 1993, October 1994 to current year.

PERIOD OF DAILY RECORD.--
WATER TEMPERATURE: May to September, 1996 (discontinued).

INSTRUMENTATION.--Temperature recording data logger.

EXTREMES FOR CURRENT YEAR.--
WATER TEMPERATURE: Maximum, 24.1 °C, July 14, 27.

WATER-QUALITY DATA, WATER YEAR OCTOBER 1995 TO SEPTEMBER 1996

DATE	TIME	DIS-CHARGE, INST. CUBIC FEET PER SECOND (00061)	SPE-CIFIC CON-DUCT-ANCE (US/CM) (00095)	PH WATER WHOLE FIELD (STAND-ARD UNITS) (00400)	TEMPER-ATURE AIR (DEG C) (00020)	TEMPER-ATURE WATER (DEG C) (00010)	TUR-BID-ITY (NTU) (00076)	OXYGEN, DIS-SOLVED (MG/L) (00300)	OXYGEN, DIS-SOLVED (PER-CENT SATUR-ATION) (00301)	COLI-FORM, FECAL, 0.7 UM-MF (COLS./ 100 ML) (31625)	STREP-TOCOCCI FECAL, KF AGAR (COLS. PER 100 ML) (31673)
APR											
24...	1315	588	564	8.3	16.5	9.5	36	11.1	115	190	100
MAY											
21...	1445	1110	392	8.1	17.0	10.5	97	8.0	85	190	470
JUN											
20...	1040	324	534	8.3	12.0	15.0	20	7.9	93	170	260
JUL											
17...	1410	103	584	8.3	25.0	21.0	2.2	9.7	129	220	K110
AUG											
21...	1415	68	650	8.5	22.0	18.5	2.8	11.7	149	180	200
SEP											
17...	1315	220	705	8.1	7.5	11.5	25	9.1	98	800	K2100

DATE	HARD-NESS TOTAL (MG/L AS CACO3) (00900)	CALCIUM DIS-SOLVED (MG/L AS CA) (00915)	MAGNE-SIUM, DIS-SOLVED (MG/L AS MG) (00925)	SODIUM, DIS-SOLVED (MG/L AS NA) (00930)	SODIUM PERCENT (00932)	POTAS-SIUM, DIS-SOLVED (MG/L AS K) (00935)	BICAR-BONATE WATER WH FET FIELD MG/L AS HCO3 (00440)	ALKA-LINITY WAT WH TOT FET FIELD MG/L AS CACO3 (00410)
SEP								
17...	290	65	30	37	21	8.2	330	268

DATE	SULFATE DIS-SOLVED (MG/L AS SO4) (00945)	CHLO-RIDE, DIS-SOLVED (MG/L AS CL) (00940)	FLUO-RIDE, DIS-SOLVED (MG/L AS F) (00950)	SILICA, DIS-SOLVED (MG/L AS SIO2) (00955)	SOLIDS, RESIDUE AT 180 DEG. C DIS-SOLVED (MG/L) (70300)	SOLIDS, SUM OF CONSTI-TUENTS, DIS-SOLVED (MG/L) (70301)	SOLIDS, DIS-SOLVED (TONS PER AC-FT) (70303)	SOLIDS, DIS-SOLVED (TONS PER DAY) (70302)
SEP								
17...	38	47	0.30	30	419	419	0.57	249

DATE	NITRO-GEN, NITRITE DIS-SOLVED (MG/L AS N) (00613)	NITRO-GEN, NO2+NO3 DIS-SOLVED (MG/L AS N) (00631)	NITRO-GEN, AMMONIA DIS-SOLVED (MG/L AS N) (00608)	NITRO-GEN,AM-MONIA + ORGANIC TOTAL (MG/L AS N) (00625)	PHOS-PHORUS TOTAL (MG/L AS P) (00665)	PHOS-PHORUS ORTHO, DIS-SOLVED (MG/L AS P) (00671)	SEDI-MENT, SUS-PENDED (MG/L) (80154)	SEDI-MENT, DIS-CHARGE, SUS-PENDED (T/DAY) (80155)
APR								
24...	<0.01	0.71	0.020	0.8	0.21	0.03	204	324
MAY								
21...	0.02	0.41	0.060	1.1	0.28	0.03	312	935
JUN								
20...	<0.01	0.56	0.030	0.5	0.10	0.03	90	79
JUL								
17...	0.02	0.18	0.030	0.4	0.03	<0.01	19	5.3
AUG								
21...	<0.01	0.06	<0.015	0.4	0.03	<0.01	28	5.1
SEP								
17...	0.01	0.49	<0.015	0.7	0.11	0.03	84	50

K Results based on counts outside ideal colony range.

WATER TEMPERATURE, DEGREES CELSIUS, WATER YEAR OCTOBER 1995 TO SEPTEMBER 1996

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
		APRIL			MAY			JUNE	
1	---	---	---	---	---	---	14.8	11.7	13.0
2	---	---	---	---	---	---	16.4	12.9	14.3
3	---	---	---	---	---	---	16.9	14.6	15.7
4	---	---	---	---	---	---	17.5	15.6	16.6
5	---	---	---	---	---	---	17.5	16.1	16.7
6	---	---	---	---	---	---	16.9	15.3	16.0
7	---	---	---	---	---	---	17.0	15.1	16.0
8	---	---	---	---	---	---	17.8	16.9	17.3
9	---	---	---	---	---	---	18.2	16.7	17.5
10	---	---	---	---	---	---	18.2	16.7	17.5
11	---	---	---	---	---	---	18.2	17.0	17.8
12	---	---	---	---	---	---	18.2	17.2	17.7
13	---	---	---	---	---	---	17.8	17.0	17.5
14	---	---	---	---	---	---	18.3	16.9	17.6
15	---	---	---	---	---	---	18.8	17.5	18.0
16	---	---	---	---	---	---	19.4	17.3	18.3
17	---	---	---	---	---	---	19.9	17.8	18.9
18	---	---	---	---	---	---	18.6	16.6	17.9
19	---	---	---	---	---	---	17.0	14.6	16.0
20	---	---	---	---	---	---	17.7	14.3	16.2
21	---	---	---	---	---	---	18.3	15.4	16.9
22	---	---	---	---	---	---	18.5	16.7	17.3
23	---	---	---	12.2	10.3	11.0	17.8	15.1	16.4
24	---	---	---	11.5	10.6	11.1	19.3	15.8	17.4
25	---	---	---	11.9	10.9	11.4	20.1	16.2	18.1
26	---	---	---	11.9	10.6	11.2	19.4	16.4	18.1
27	---	---	---	12.6	10.3	11.1	19.8	16.7	18.2
28	---	---	---	12.9	11.7	12.3	18.6	16.6	17.6
29	---	---	---	12.5	11.4	11.9	19.1	15.0	17.2
30	---	---	---	12.0	10.5	11.3	20.4	16.4	18.4
31	---	---	---	13.6	10.5	11.7	---	---	---
MONTH	---	---	---	---	---	---	20.4	11.7	17.1

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
		JULY			AUGUST			SEPTEMBER	
1	21.9	17.8	19.9	22.1	19.9	21.0	19.8	16.9	18.5
2	22.7	18.8	20.9	21.9	18.3	20.1	19.1	15.8	17.7
3	23.4	19.4	21.5	20.4	18.3	19.5	19.0	15.6	17.5
4	23.8	20.4	22.0	19.4	16.6	18.1	19.1	15.8	17.7
5	22.9	19.1	21.0	19.8	15.8	18.0	18.0	16.1	17.2
6	22.4	18.5	20.5	19.8	16.2	18.2	16.6	13.6	15.5
7	22.2	18.0	20.2	19.9	15.6	18.0	16.4	13.1	15.0
8	22.7	18.3	20.6	20.9	16.6	18.9	17.3	13.6	15.7
9	23.6	19.9	21.8	21.6	17.5	19.7	17.7	14.3	16.3
10	23.8	19.9	21.9	22.2	18.0	20.3	18.2	15.0	16.6
11	23.6	19.6	21.8	22.2	18.3	20.5	17.3	16.1	16.6
12	23.6	19.6	21.8	22.9	19.0	21.1	18.2	15.1	16.8
13	23.9	19.8	22.1	23.2	19.8	21.7	18.6	16.1	17.5
14	24.1	20.1	22.2	23.1	19.8	21.4	17.7	16.2	17.0
15	22.6	20.6	21.4	23.2	19.3	21.5	16.4	14.3	15.4
16	21.9	19.4	20.7	22.6	19.4	21.2	15.0	12.8	13.6
17	21.6	18.6	20.2	21.4	19.6	20.7	---	---	---
18	21.7	18.0	19.9	20.6	18.3	19.6	---	---	---
19	22.2	18.5	20.5	19.4	16.1	18.2	---	---	---
20	21.7	17.8	20.1	19.6	16.4	18.1	---	---	---
21	22.2	17.8	20.3	20.1	16.4	18.4	---	---	---
22	22.9	18.6	21.0	19.6	15.9	18.1	---	---	---
23	23.2	19.0	21.3	19.9	15.9	18.1	---	---	---
24	23.2	19.3	21.5	20.3	16.4	18.5	---	---	---
25	23.4	19.8	21.7	20.6	17.0	19.0	---	---	---
26	23.6	19.6	21.8	20.4	17.5	19.2	---	---	---
27	24.1	20.1	22.2	21.2	19.0	20.0	---	---	---
28	22.6	20.6	21.7	20.9	17.7	19.5	---	---	---
29	23.1	20.7	21.7	20.9	17.5	19.4	---	---	---
30	22.6	19.1	20.9	20.7	17.5	19.4	---	---	---
31	23.8	19.8	21.8	20.1	17.3	19.0	---	---	---
MONTH	24.1	17.8	21.2	23.2	15.6	19.5	---	---	---

BIOLOGICAL DATA, WATER YEAR OCTOBER 1995 TO SEPTEMBER 1996

DATE	TIME	ORGANISM	INDI-VIDUALS IN SAMPLE (NO.) (81614)	WEIGHT SAMPLE BIOTA TISSUE COMP. AVERAGE (GRAMS) (01373)	LENGTH SAMPLE BIOTA TISSUE COMP. AVERAGE (CM) (01371)	ALUMI-NUM, BIOTA, TISSUE, DRY WGT REC (UG/G) (49237)	ANTI-MONY, BIOTA, TISSUE, DRY WGT REC (UG/G) (49246)	ARSENIC BIOTA, TISSUE, DRY WGT REC (UG/G) (49247)	BARIUM, BIOTA, TISSUE, DRY WGT REC (UG/G) (49238)
SEP 09...	1400	Utah sucker liver	7	535	38	3.5	<0.3	0.5	0.3

DATE	BERYL-LIUM-, BIOTA, TISSUE, DRY WGT REC (UG/G) (49248)	BORON, BIOTA, TISSUE, DRY WGT REC (UG/G) (49239)	CADMIUM BIOTA, TISSUE, DRY WGT REC (UG/G) (49249)	CHROM-IUM-, BIOTA, TISSUE, DRY WGT REC (UG/G) (49240)	COBALT, BIOTA TISSUE, DRY WGT REC (UG/G) (49250)	COPPER, BIOTA, TISSUE, DRY WGT REC (UG/G) (49241)	IRON, BIOTA, TISSUE, DRY WGT REC (UG/G) (49242)	LEAD, BIOTA, TISSUE, DRY WGT REC (UG/G) (49251)	MANGAN-ESE, BIOTA, TISSUE, DRY WGT REC (UG/G) (49243)	MERCURY BIOTA, TISSUE, DRY WGT REC (UG/G) (49258)
SEP 09...	<0.3	0.5	1.2	0.8	0.3	88	570	<0.3	5.6	0.2

DATE	MOLYB-DENUM, BIOTA, TISSUE, DRY WGT REC (UG/G) (49252)	NICKEL, BIOTA, TISSUE, DRY WGT REC (UG/G) (49253)	SELEN-IUM, BIOTA, TISSUE, DRY WGT REC (UG/G) (49254)	SILVER, BIOTA, TISSUE, DRY WGT REC (UG/G) (49255)	STRON-TIUM, BIOTA, TISSUE, DRY WGT REC (UG/G) (49244)	VANA-DIUM BIOTA, TISSUE, DRY WGT REC (UG/G) (49465)	ZINC, BIOTA, TISSUE, DRY WGT REC (UG/G) (49245)	URANIUM BIOTA, TISSUE, DRY WGT REC (UG/G) (49257)	WATER, PRESENT BIO TIS DRY WGT REC PERCENT (49273)
SEP 09...	1.4	<0.3	5.4	0.6	0.8	0.5240	<0.3	80	

DATE	TIME	ORGANISM	INDI-VIDUALS IN SAMPLE (NO.) (81614)	WEIGHT SAMPLE BIOTA TISSUE COMP. AVERAGE (GRAMS) (01373)	LENGTH SAMPLE BIOTA TISSUE COMP. AVERAGE (CM) (01371)	ALDRIN, BIOTA, WH ORG WW, REC (UG/KG) (49353)	CIS-CHLOR-DANE, BIOTA, WH ORG WW, REC (UG/KG) (49380)	TRANS-CHLOR-DANE, BIOTA, WH ORG WW, REC (UG/KG) (49379)	DCPA, BIOTA, WH ORG WW, REC (UG/KG) (49378)	O,P'-DDT, BIOTA, WH ORG WW, REC (UG/KG) (49377)	P,P'-DDT, BIOTA, WH ORG WW, REC (UG/KG) (49376)
SEP 09...	1400	Utah sucker	7	564	29	<5.00	<5.00	<5.00	<5.00	<5.00	E13.0

DATE	P,P'-DDD, BIOTA, WH ORG WW, REC (UG/KG) (49375)	O,P'-DDD, BIOTA, WH ORG WW, REC (UG/KG) (49374)	O,P'-DDE, BIOTA, WH ORG WW, REC (UG/KG) (49373)	P,P'-DDE, BIOTA, WH ORG WW, REC (UG/KG) (49372)	DIEL-DRIN, BIOTA, WH ORG WW, REC (UG/KG) (49371)	ENDRIN, BIOTA, WH ORG WW, REC (UG/KG) (49370)	HEPTA-CHLOR, BIOTA, WH ORG WW, REC (UG/KG) (49369)	HEPTA-CHLOR EPOXIDE BIOTA, WH ORG WW, REC (UG/KG) (49368)	BENZENE HEXA-CHLORO-BIOTA, WH ORG WW, REC (UG/KG) (49367)	ALPHA-BHC, BIOTA, WH ORG WW, REC (UG/KG) (49366)	BETA-BHC, BIOTA, WH ORG WW, REC (UG/KG) (49365)	DELTA-BHC, BIOTA, WH ORG WW, REC (UG/KG) (49364)
SEP 09...	<5.00	<5.00	<5.00	47.0	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00

DATE	CHLOR, LINDANE BIOTA, WH ORG WW, REC (UG/KG) (49363)	METHOXY CHLOR, O,P'-, BIOTA, WH ORG WW, REC (UG/KG) (49362)	METHOXY NONA-P,P'-, BIOTA, WH ORG WW, REC (UG/KG) (49361)	MIREX, BIOTA, WH ORG WW, REC (UG/KG) (49360)	CIS-NONA-CHLOR, BIOTA, WH ORG WW, REC (UG/KG) (49359)	TRANS-CHLOR CHLOR, BIOTA, WH ORG WW, REC (UG/KG) (49358)	OXY-CHLORO DANE, BIOTA, WH ORG WW, REC (UG/KG) (49357)	PENTA ANISOLE BIOTA, WH ORG WW, REC (UG/KG) (49356)	PCB, BIOTA, WH ORG WW, REC (UG/KG) (49354)	TOXA-PHENE, BIOTA, WH ORG WW, REC (UG/KG) (49355)	LIPIDS, BIOTA, WH ORG WW, REC PERCENT (49289)
SEP 09...	<5.00	<5.00	<5.00	<5.00	<5.00	6.40	<5.00	<5.00	240	<200	4.20

BIOLOGICAL DATA, WATER YEAR OCTOBER 1995 TO SEPTEMBER 1996

FISH COLLECTION DATA

COLLECTION METHODS.--Electrofishing; backpack (11A).

LENGTH OF REACH.--160 m.

TIME ELAPSED FOR EACH METHOD.--Backpack (11A)-0.32 hours.

ANOMALY CODES.--AA-none; DE-deformities; ER-eroded fins; LE-lesions; TU-tumors; AL-anchor worms; BL-black spot; CL-leeches; IC-ich; NE-blind; PA-other parasites; PE-popeye.

HABITAT QUALITY INDEX.--53.

REMARKS.--Channelized, urban influence. One Common Carp, 2 Brown Trout, and one Cutthroat Trout were collected on Sept. 9, 1996, while collecting tissue samples for contaminant analysis.

ORGANISM **FAMILY** *GENUS SPECIES* (COMMON)	DATE	NUMBER OF INDIV-IDUALS	PERCENT COMPO-SITION	LENGTH RANGE TOTAL MM	WEIGHT RANGE IN GM	ORIGIN	TROPHIC GROUP OF ADULTS	TEMPER-ATURE PREFER-ENCE	NUMBER AND TYPE OF ANOMALY
	AUG.08								
Catostomidae (Suckers)									
Catostomus platyrhynchus (Mountain sucker)		1	.28	142	32	NATIVE	HERBIVORE	COLD	1-AA
Catostomus ardens (Utah sucker)		12	3.35	100-260	12-205	NATIVE	HERBIVORE	COLD	12-AA
Cottidae (Sculpins)									
Cottus bairdi (Mottled sculpin)		23	6.42	34-90	1-13	NATIVE	INVERTIVORE	COLD	23-AA
Cottus beldingi (Paiute sculpin)		8	2.23	70-82	6-11	NATIVE	INVERTIVORE	COLD	8-AA
Cyprinidae (Carps and minnows)									
Rhinichthys cataractae (Longnose dace)		27	7.54	48-94	1-9	NATIVE	HERBIVORE	COLD	24-BL, 3-AA
Richardsonius balteatus (Redside shiner)		58	16.2	40-95	1-9	NATIVE	INVERTIVORE	COLD	58-AA
Rhynichthys osculus (Speckled dace)		227	63.4	45-95	1-9	NATIVE	INVERTIVORE	COLD	227-BL
Gila atraria (Utah chub)		2	.56	144-153	47-48	NATIVE	OMNIVORE	WARM	2-AA

TOTAL NUMBER OF TAXA 8
TOTAL INDIVIDUALS 358

WATER-QUALITY RECORDS

PERIOD OF RECORD.--October 1965 to July 1981, October 1990 to September 1991, October 1992 to September 1993, October 1994 to September 1996 (discontinued).

COLLECTION METHODS.--Composite of 5, 0.25 m^2 samples. Richest targeted habitat--riffles, whole sample.
MESH SIZE.--425 um.

AVERAGE DEPTH.--0.15 m.

AVERAGE PERCENT SHADING.--72.

AVERAGE VELOCITY.--0.61 m/s.

SUBSTRATE EMBEDDEDNESS CLASS RANGE.--5.

PERCENT FINES RANGE.--<10.

HABITAT QUALITY INDEX.--53.

REMARKS.--Urban influence, channelized with little habitat diversity.

BIOLOGICAL DATA, WATER YEAR OCTOBER 1995 TO SEPTEMBER 1996
BENTHIC INVERTEBRATE COLLECTION DATA

ORGANISM **TAXON** *GENUS SPECIES*	DATE AUG. 8	NUMBER OF INDIV-IDUALS	PERCENT COMPO-SITION	FUNC-TIONAL FEEDING GROUP	POLLU-TION TOLER-ANCE VALUE
NON-INSCETS					
Oligochaeta		278.6	2.5	CG	5
Fluminicola		64.29	0.58	SC	8
Acari		21.43	0.19	PA	5
EPHEMEROPTERA					
Baetis tricaudatus		300	2.7	CG	6
Stenonema		21.43	0.19	SC	5
TRICHOPTERA					
Brachycentrus occidentalis		21.43	0.19	OM	1
Hydropsyche		8851	79.58	CF	4
LEPIDOPTERA					
Petrophila		21.43	0.19	SC	5
COLEOPTERA					
Microcylloepus		407.2	3.66	SC	7
DIPTERA					
Hemerodromia		21.43	0.19	PR	6
Simuliidae		21.43	0.19	CF	6
Simulium		21.43	0.19	CF	6
CHIRONOMIDAE					
Cardiocladius		192.9	1.73	PR	5
Cricotopus		364.3	3.28	CG	7
Eukiefferiella		21.43	0.19	OM	8
Phaenopsectra		21.43	0.19	SC	7
Polypedilum		300	2.7	OM	6
Rheotanytarsus		21.43	0.19	CF	6
Thienemannimyia Gr.		42.86	0.39	PR	6
Tvetenia		107.2	0.96	CG	5

TOTAL NUMBER OF TAXA 20
TOTAL NUMBER OF ORGANISMS 11122/m^2
HILSENHOFF BIOTIC INDEX 4.43

EPT ABUNDANCE 9193/m^2
NUMBER EPT TAXA 4
SHANNON DIVERSITY INDEX (H) 1.42

COLLECTION METHODS.--Qualitative multiple habitat, relative abundance, whole sample.
MESH SIZE.--210 um.
GEAR TYPE.--D-frame net and visual collections.

REACH LENGTH.--320 m.

AVERAGE WIDTH.--NA.

HABITAT QUALITY INDEX.--53.

REMARKS.-- Urban influence, channelized with little habitat diversity.

BIOLOGICAL DATA, WATER YEAR OCTOBER 1995 TO SEPTEMBER 1996
BENTHIC INVERTEBRATE COLLECTION DATA

ORGANISM **TAXON** *GENUS SPECIES*	DATE AUG. 8	NUMBER OF INDIV-IDUALS	PERCENT COMPO-SITION	FUNC-TIONAL FEEDING GROUP	POLLU-TION TOLER-ANCE VALUE
NON-INSCETS					
Turbellaria		10	0.37	CG	4
Oligochaeta		155	5.73	CG	5
Hirudinea		30	1.11	PR	10
Sphaeriidae		55	2.03	CG	8
Fluminicola		1515	56.01	SC	8
Ostracoda		25	0.92	CG	8
ODONTA					
Gomphus		5	0.18	PR	5
Ophiogomphus		5	0.18	PR	4
EPHEMEROPTERA					
Baetis tricaudatus		80	2.96	CG	6
Stenonema		15	0.55	SC	5
Tricorythodes minutus		95	3.51	CG	4
TRICHOPTERA					
Hydropsyche		305	11.28	CF	4
Nectopsyche		55	2.03	OM	3
Oecetis		50	1.85	OM	8
Onocosmoecus unicolor		5	0.18	OM	1
Pycnopsyche		5	0.18	SH	11
COLEOPTERA					
Dubiraphia		25	0.92	CG	6
Microcylloepus		10	0.37	SC	7
DIPTERA					
Ephydridae		5	0.18	CG	6
Simuliidae		35	1.29	CF	6
CHIRONOMIDAE					
Chironomidae-pupae		10	0.37	UN	6
Cricotopus		20	0.74	CG	7
Cricotopus Trifascia Gr.		10	0.37	CG	6
Cryptochironomus		5	0.18	PR	8
Eukiefferiella		5	0.18	OM	8
Nilotanypus		5	0.18	PR	6
Phaenopsectra		5	0.18	SC	7
Polypedilum		95	3.51	OM	6
Rheotanytarsus		15	0.55	CF	6
Thienemanniella		10	0.37	CG	6
Thienemannimyia Gr.		20	0.74	PR	6
Tvetenia		20	0.74	CG	5

TOTAL NUMBER OF TAXA	32	EPT ABUNDANCE	610
TOTAL NUMBER OF ORGANISMS	2705	NUMBER EPT TAXA	8
HILSENHOFF BIOTIC INDEX	6.83	SHANNON DIVERSITY INDEX (H)	2.70

WATER-QUALITY DATA, WATER YEAR OCTOBER 1995 TO SEPTEMBER 1996

DATE	TIME	ORGANISM	INDI-VIDUALS IN SAMPLE (NO.) (81614)	WEIGHT SAMPLE BIOTA TISSUE COMP. AVERAGE (GRAMS) (01373)	LENGTH SAMPLE BIOTA TISSUE COMP. AVERAGE (CM) (01371)	ALUMI-NUM, BIOTA, TISSUE, DRY WGT REC (UG/G) (49237)	ANTI-MONY, BIOTA, TISSUE, DRY WGT REC (UG/G) (49246)	ARSENIC BIOTA, TISSUE, DRY WGT REC (UG/G) (49247)	BARIUM, BIOTA, TISSUE, DRY WGT REC (UG/G) (49238)
SEP									
09...	1400	Utah sucker liver	7	535	38	3.5	<0.3	0.5	0.3

DATE	BERYL-LIUM-, BIOTA, TISSUE, DRY WGT REC (UG/G) (49248)	BORON, BIOTA, TISSUE, DRY WGT REC (UG/G) (49239)	CADMIUM BIOTA, TISSUE, DRY WGT REC (UG/G) (49249)	CHROM-IUM-, BIOTA, TISSUE, DRY WGT REC (UG/G) (49240)	COBALT, BIOTA TISSUE, DRY WGT REC (UG/G) (49250)	COPPER, BIOTA, TISSUE, DRY WGT REC (UG/G) (49241)	IRON, BIOTA, TISSUE, DRY WGT REC (UG/G) (49242)	LEAD, BIOTA, TISSUE, DRY WGT REC (UG/G) (49251)	MANGAN-ESE, BIOTA, TISSUE, DRY WGT REC (UG/G) (49243)	MERCURY BIOTA, TISSUE, DRY WGT REC (UG/G) (49258)
SEP										
09...	<0.3	0.5	1.2	0.8	0.3	88	570	<0.3	5.6	0.2

DATE	MOLYB-DENUM, BIOTA, TISSUE, DRY WGT REC (UG/G) (49252)	NICKEL, BIOTA, TISSUE, DRY WGT REC (UG/G) (49253)	SELEN-IUM, BIOTA, TISSUE, DRY WGT REC (UG/G) (49254)	SILVER, BIOTA, TISSUE, DRY WGT REC (UG/G) (49255)	STRON-TIUM, BIOTA, TISSUE, DRY WGT REC (UG/G) (49244)	VANA-DIUM BIOTA, TISSUE, DRY WGT REC (UG/G) (49465)	ZINC, BIOTA, TISSUE, DRY WGT REC (UG/G) (49245)	URANIUM BIOTA, TISSUE, DRY WGT REC (UG/G) (49257)	WATER, PRESENT BIO TIS DRY WGT REC PERCENT (49273)
SEP									
09...	1.4	<0.3	5.4	0.6	0.8	0.5	240	<0.3	80

DATE	TIME	ORGANISM	INDI-VIDUALS IN SAMPLE (NO.) (81614)	WEIGHT SAMPLE BIOTA TISSUE COMP. AVERAGE (GRAMS) (01373)	LENGTH SAMPLE BIOTA TISSUE COMP. AVERAGE (CM) (01371)	ALDRIN, BIOTA, WH ORG WW, REC (UG/KG) (49353)	CIS-CHLOR-DANE, BIOTA, WH ORG WW, REC (UG/KG) (49380)	TRANS-CHLOR-DANE, BIOTA, WH ORG WW, REC (UG/KG) (49379)	DCPA, BIOTA, WH ORG WW, REC (UG/KG) (49378)	O,P'-DDT, BIOTA, WH ORG WW, REC (UG/KG) (49377)	P,P'-DDT, BIOTA, WH ORG WW, REC (UG/KG) (49376)
SEP											
09...	1400	Utah sucker	7	564	29	<5.00	<5.00	<5.00	<5.00	<5.00	E13.0

DATE	P,P'-DDD, BIOTA, WH ORG WW, REC (UG/KG) (49375)	O,P'-DDD, BIOTA, WH ORG WW, REC (UG/KG) (49374)	O,P'-DDE, BIOTA, WH ORG WW, REC (UG/KG) (49373)	P,P'-DDE, BIOTA, WH ORG WW, REC (UG/KG) (49372)	DIEL-DRIN, BIOTA, WH ORG WW, REC (UG/KG) (49371)	ENDRIN, BIOTA, WH ORG WW, REC (UG/KG) (49370)	HEPTA-CHLOR, BIOTA, WH ORG WW, REC (UG/KG) (49369)	HEPTA-CHLOR EPOXIDE BIOTA, WH ORG WW, REC (UG/KG) (49368)	BENZENE HEXA-CHLORO-BIOTA, WH ORG WW, REC (UG/KG) (49367)	ALPHA-BHC, BIOTA, WH ORG WW, REC (UG/KG) (49366)	BETA-BHC, BIOTA, WH ORG WW, REC (UG/KG) (49365)	DELTA-BHC, BIOTA, WH ORG WW, REC (UG/KG) (49364)
SEP												
09...	<5.00	<5.00	<5.00	47.0	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00

DATE	LINDANE BIOTA, WH ORG WW, REC (UG/KG) (49363)	METHOXY CHLOR, O,P'-, BIOTA, WH ORG WW, REC (UG/KG) (49362)	METHOXY CHLOR, P,P'-, BIOTA, WH ORG WW, REC (UG/KG) (49361)	MIREX, BIOTA, WH ORG WW, REC (UG/KG) (49360)	CIS-NONA-CHLOR, BIOTA, WH ORG WW, REC (UG/KG) (49359)	TRANS-NONA-CHLOR, BIOTA, WH ORG WW, REC (UG/KG) (49358)	OXY-CHLOR DANE, BIOTA, WH ORG WW, REC (UG/KG) (49357)	PENTA CHLORO ANISOLE BIOTA, WH ORG WW, REC (UG/KG) (49356)	PCB, BIOTA, WH ORG WW, REC (UG/KG) (49354)	TOXA-PHENE, BIOTA, WH ORG WW, REC (UG/KG) (49355)	LIPIDS, BIOTA, WH ORG WW, REC PERCENT (49289)
SEP											
09...	<5.00	<5.00	<5.00	<5.00	<5.00	6.40	<5.00	<5.00	240	<200	4.20

WATER TEMPERATURE, DEGREES CELSIUS, WATER YEAR OCTOBER 1997 TO SEPTEMBER 1998

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN
		MAY			JUNE	
1	---	---	---	13.4	11.0	12.2
2	---	---	---	13.5	11.2	12.4
3	---	---	---	13.5	11.2	12.3
4	---	---	---	12.9	11.2	11.9
5	---	---	---	12.0	10.3	11.1
6	---	---	---	11.8	10.6	11.3
7	---	---	---	12.6	10.0	11.1
8	---	---	---	13.1	11.4	12.3
9	---	---	---	13.1	11.5	12.1
10	---	---	---	12.1	10.0	10.9
11	---	---	---	10.6	9.0	9.8
12	---	---	---	11.4	9.5	10.3
13	---	---	---	11.5	9.8	10.6
14	---	---	---	9.8	8.7	9.2
15	---	---	---	10.0	8.4	9.2
16	---	---	---	11.7	9.6	10.4
17	---	---	---	11.7	10.7	11.0
18	---	---	---	11.8	10.1	11.0
19	---	---	---	14.0	11.0	12.3
20	---	---	---	14.6	12.9	13.9
21	---	---	---	14.5	11.4	13.0
22	---	---	---	11.4	10.4	10.7
23	---	---	---	10.6	9.8	10.1
24	---	---	---	12.4	10.1	10.8
25	---	---	---	13.8	11.4	12.4
26	---	---	---	13.8	12.4	13.1
27	---	---	---	12.4	10.9	11.6
28	---	---	---	13.8	10.9	12.0
29	---	---	---	14.0	13.1	13.7
30	13.1	10.6	12.0	13.8	12.6	13.1
31	---	---	---	14.1	12.1	13.1
MONTH	---	---	---	14.6	8.4	11.6

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
		JUNE			JULY			AUGUST			SEPTEMBER	
1	15.2	13.1	14.1	21.2	18.9	20.0	21.7	19.4	20.5	20.7	17.8	19.5
2	15.2	14.5	15.0	22.0	19.2	20.6	21.9	19.1	20.6	20.9	18.1	19.6
3	15.2	13.8	14.3	---	---	---	22.7	19.4	21.1	21.0	18.3	19.9
4	13.8	12.3	12.8	---	---	---	23.4	19.6	21.5	21.2	18.8	20.2
5	13.7	11.5	12.5	---	---	---	23.6	19.9	21.9	20.7	19.6	20.2
6	13.8	13.1	13.4	---	---	---	23.9	20.2	22.2	21.2	19.1	20.1
7	14.3	12.8	13.6	---	---	---	22.7	20.4	21.7	21.5	18.6	20.1
8	14.1	12.9	13.5	---	---	---	22.4	20.4	21.4	21.2	19.1	19.9
9	13.5	12.3	12.8	---	---	---	22.9	19.4	21.1	20.5	18.8	19.6
10	14.3	12.3	13.2	---	---	---	22.9	19.2	21.3	19.4	17.3	18.2
11	15.1	14.0	14.5	---	---	---	22.5	19.6	21.3	18.8	16.5	17.7
12	16.4	14.0	15.0	---	---	---	23.2	19.7	21.6	18.0	16.2	17.4
13	16.2	15.4	15.8	---	---	---	23.2	19.7	21.6	18.3	16.5	17.4
14	16.0	14.8	15.4	---	---	---	23.0	19.7	21.6	19.2	16.7	17.9
15	15.6	14.0	14.9	---	---	---	21.7	19.9	20.5	19.6	16.8	18.3
16	14.0	12.9	13.5	---	---	---	21.9	18.9	20.4	19.2	17.2	18.2
17	13.4	12.4	12.9	---	---	---	21.7	19.4	20.5	18.4	16.8	17.6
18	14.5	11.8	13.1	---	---	---	20.5	18.8	19.6	18.1	16.5	17.5
19	15.6	14.3	14.7	---	---	---	21.5	18.3	19.9	16.5	14.9	15.6
20	15.7	14.0	15.0	---	---	---	20.1	18.0	19.1	15.7	13.8	14.9
21	16.7	14.9	15.9	24.8	21.0	23.1	20.7	17.5	19.1	14.5	13.2	14.0
22	17.5	16.4	16.7	24.1	20.7	22.6	21.0	17.5	19.5	14.6	13.4	13.9
23	17.2	15.9	16.5	22.9	20.5	22.0	20.4	17.5	19.0	14.8	12.9	13.8
24	17.0	16.0	16.5	22.4	20.7	21.5	20.1	16.8	18.6	15.4	13.5	14.5
25	17.0	14.8	16.0	23.6	19.9	21.7	20.1	16.5	18.4	14.6	13.7	14.1
26	16.0	13.7	14.8	24.2	20.4	22.4	18.9	17.6	18.4	14.0	12.9	13.4
27	16.0	14.1	15.2	23.9	21.2	22.6	19.4	16.4	18.0	14.9	12.9	14.0
28	17.5	15.2	16.4	22.7	20.7	21.8	19.9	16.2	18.3	15.4	13.4	14.4
29	18.9	16.8	17.9	23.2	19.7	21.5	20.2	17.0	18.8	15.2	13.4	14.3
30	20.7	18.4	19.4	23.6	20.4	22.0	19.7	17.5	18.8	15.9	13.4	14.4
31	---	---	---	22.7	20.2	21.5	20.7	17.6	19.2	---	---	---
MONTH	20.7	11.5	14.8	---	---	---	23.9	16.2	20.2	21.5	12.9	17.0

WATER-QUALITY RECORDS

PERIOD OF RECORD.--Water years 1966 to July 1981, 1991, 1993, 1995-96, April to September 1998, April to September 2000 (discontinued).

PERIOD OF DAILY RECORD.--
WATER TEMPERATURE: May to September 1996, May to September 1998, April to September 2000 (discontinued).

INSTRUMENTATION.--Temperature recording data logger.

EXTREMES FOR PERIOD OF DAILY RECORD.--
WATER TEMPERATURE: Maximum, 25.6 °C Aug. 2, 2000.

EXTREMES FOR CURRENT YEAR.--
WATER TEMPERATURE: Maximum, 25.6 °C Aug. 2

WATER-QUALITY DATA, WATER YEAR OCTOBER 1999 TO SEPTEMBER 2000

DATE	TIME	DIS-CHARGE, INST. CUBIC FEET PER SECOND (00061)	SPE-CIFIC CON-DUCT-ANCE (US/CM) (00095)	PH WATER WHOLE FIELD (STAND-ARD UNITS) (00400)	TEMPER-ATURE AIR (DEG C) (00020)	TEMPER-ATURE WATER (DEG C) (00010)	TUR-BID-ITY (NTU) (00076)	OXYGEN, DIS-SOLVED (MG/L) (00300)	OXYGEN, DIS-SOLVED (PER-CENT SATUR-ATION) (00301)	COLI-FORM, FECAL, 0.7 UM-MF (COLS./ 100 ML) (31625)	STREP-TOCOCCI FECAL, KF AGAR (COLS. PER 100 ML) (31673)
APR											
26...	1308	437	511	8.3	16.0	12.3	6.8	9.0	98	82	60
MAY											
24...	1013	144	460	8.4	19.0	16.8	2.3	8.8	107	150	150
JUN											
14...	1055	99	539	8.4	20.8	16.1	1.5	9.6	114	210	180
JUL											
18...	1507	48	607	8.5	28.8	23.9	17.0	10.6	147	K1300	1900
AUG											
25...	0928	42	686	8.3	18.0	19.1	<.5	7.4	94	450	1100
SEP											
20...	1530	110	700	8.8	17.0	16.1	.6	8.7	104	K250	K700

DATE	HARD-NESS TOTAL (MG/L AS CACO3) (00900)	CALCIUM DIS-SOLVED (MG/L AS CA) (00915)	MAGNE-SIUM, DIS-SOLVED (MG/L AS MG) (00925)	SODIUM, DIS-SOLVED (MG/L AS NA) (00930)	SODIUM PERCENT (00932)	POTAS-SIUM, DIS-SOLVED (MG/L AS K) (00935)	ANC WATER UNFLTRD FET FIELD MG/L AS HCO3 (00440)	ANC UNFLTRD CARB FET FIELD MG/L AS CO3 (00445)
SEP								
20...	290	60.7	34.3	37.5	21	9.4	330	16

DATE	ANC WATER UNFLTRD FET FIELD MG/L AS CACO3 (00410)	SULFATE DIS-SOLVED (MG/L AS SO4) (00945)	CHLO-RIDE, DIS-SOLVED (MG/L AS CL) (00940)	FLUO-RIDE, DIS-SOLVED (MG/L AS F) (00950)	SILICA, DIS-SOLVED (MG/L AS SIO2) (00955)	SOLIDS, SUM OF CONSTI-TUENTS, DIS-SOLVED (MG/L) (70301)	SOLIDS, DIS-SOLVED (TONS PER AC-FT) (70303)	SOLIDS, DIS-SOLVED (TONS PER DAY) (70302)
SEP								
20...	298	41.7	47.4	.3	28.1	438	.60	130

DATE	NITRO-GEN, NO2+NO3 DIS-SOLVED (MG/L AS N) (00631)	NITRO-GEN, AMMONIA DIS-SOLVED (MG/L AS N) (00608)	NITRO-GEN,AM-MONIA + ORGANIC TOTAL (MG/L AS N) (00625)	PHOS-PHORUS TOTAL (MG/L AS P) (00665)	PHOS-PHORUS ORTHO, DIS-SOLVED (MG/L AS P) (00671)	SEDI-MENT, SUS-PENDED (MG/L) (80154)	SEDI-MENT, DIS-CHARGE, SUS-PENDED (T/DAY) (80155)
APR							
26...	.473	.006	.62	.124	.020	96	113
MAY							
24...	<.005	<.002	.33	.032	.006	13	5.1
JUN							
14...	.363	.011	.44	.039	.006	39	10
JUL							
18...	.046	.008	.61	.078	.008	39	5.1
AUG							
25...	.009	.017	.51	.071	.004	57	6.5
SEP							
20...	.053	.005	.37	.041	.002	60	18

K Results based on counts outside ideal colony range.

WATER TEMPERATURE, DEGREES CELSIUS, APRIL TO SEPTEMBER 2000

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN
		APRIL			MAY	
1	---	---	---	14.1	11.5	12.7
2	---	---	---	15.4	12.7	13.8
3	---	---	---	15.6	13.2	14.4
4	---	---	---	15.9	14.3	14.9
5	---	---	---	14.8	12.1	13.7
6	---	---	---	12.1	10.3	10.8
7	---	---	---	11.2	9.9	10.6
8	---	---	---	11.3	9.3	10.3
9	---	---	---	12.0	10.1	11.0
10	---	---	---	11.7	10.3	11.1
11	---	---	---	10.3	8.4	9.3
12	---	---	---	10.1	7.8	8.9
13	---	---	---	11.7	8.1	9.7
14	---	---	---	14.0	10.7	12.1
15	---	---	---	14.9	12.1	13.5
16	---	---	---	14.1	12.9	13.4
17	---	---	---	12.9	11.5	12.2
18	---	---	---	14.5	11.0	12.5
19	---	---	---	16.0	13.1	14.4
20	---	---	---	17.5	13.4	15.4
21	---	---	---	18.4	14.1	16.2
22	---	---	---	18.1	15.4	16.7
23	---	---	---	19.4	15.2	17.4
24	---	---	---	20.1	16.2	18.0
25	---	---	---	18.8	16.5	17.6
26	---	---	---	18.1	15.2	16.8
27	---	---	---	18.3	14.6	16.4
28	---	---	---	17.9	15.9	16.9
29	---	---	---	19.9	15.7	17.6
30	12.3	10.1	11.3	20.1	15.9	17.9
31	---	---	---	18.3	14.9	16.7
MONTH	---	---	---	20.1	7.8	14.0

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
		JUNE			JULY			AUGUST			SEPTEMBER	
1	17.9	13.4	15.8	21.4	18.9	20.1	25.3	21.5	23.5	19.1	16.2	17.5
2	18.9	14.0	16.6	23.2	17.8	20.5	25.6	22.2	23.8	17.5	15.1	16.4
3	20.2	15.4	18.0	23.2	18.8	21.1	24.2	22.4	23.1	17.0	13.5	15.4
4	20.9	16.0	18.6	21.7	18.1	20.0	24.7	20.5	22.5	17.9	14.3	16.4
5	20.5	16.8	18.9	22.7	17.8	20.4	24.4	20.4	22.5	17.6	15.1	16.6
6	21.7	17.1	19.6	22.9	17.8	20.3	23.7	19.7	22.0	16.8	14.3	15.8
7	21.4	17.5	19.8	23.5	18.6	21.2	23.9	20.1	22.2	16.5	13.4	15.3
8	20.7	17.9	19.5	23.4	18.6	21.3	23.9	19.9	22.3	16.3	13.5	15.3
9	19.2	16.3	17.4	24.4	19.4	22.1	25.1	21.0	23.1	15.9	13.1	14.8
10	17.3	14.8	16.0	22.9	19.4	20.6	24.6	22.0	23.4	15.7	12.6	14.5
11	18.6	14.0	16.3	22.4	18.3	20.4	24.0	20.5	22.4	17.3	14.3	15.9
12	17.6	16.0	16.7	23.2	19.1	21.4	23.4	18.9	21.4	17.9	14.6	16.6
13	18.9	14.3	16.5	23.7	19.2	21.7	23.0	18.9	21.1	18.8	15.7	17.5
14	20.1	14.9	17.5	23.0	19.7	21.8	23.0	18.1	20.7	19.1	16.0	17.9
15	20.2	16.7	18.4	23.5	19.4	21.7	22.0	18.8	20.5	18.9	16.5	18.0
16	19.4	15.6	17.6	24.7	20.1	22.6	23.5	18.3	20.8	18.4	16.2	17.7
17	19.2	15.2	17.4	24.6	21.2	22.5	22.9	18.4	20.3	19.9	17.0	18.4
18	19.6	15.2	17.7	23.4	19.1	21.5	20.7	18.3	19.4	19.1	16.7	17.6
19	19.1	16.3	17.9	23.9	19.4	21.8	21.7	17.8	19.7	18.3	16.2	17.1
20	19.9	15.2	17.7	23.9	19.6	21.9	20.9	17.3	19.2	17.0	14.5	15.7
21	20.5	15.7	18.3	24.2	19.6	22.1	21.0	17.0	19.1	15.7	13.8	14.6
22	21.7	17.3	19.6	24.7	19.7	22.4	21.5	16.8	19.2	13.8	11.2	12.2
23	23.2	18.8	21.0	24.7	19.6	22.2	21.5	17.5	19.4	11.2	9.0	9.8
24	23.2	19.1	21.2	24.7	19.7	22.4	22.0	19.1	20.3	10.1	7.5	8.9
25	23.2	18.9	21.2	24.7	19.6	22.3	22.0	18.9	20.4	11.2	8.7	9.9
26	23.5	18.9	21.3	23.4	20.4	21.7	21.2	18.9	20.0	11.8	9.6	10.8
27	23.2	18.3	21.0	23.7	19.7	21.8	21.9	18.4	20.0	12.7	10.4	11.5
28	23.5	18.6	21.3	24.6	19.9	22.4	21.5	18.6	20.1	13.1	11.2	12.2
29	24.0	19.1	21.7	24.7	20.2	22.6	20.9	17.5	19.4	14.1	12.3	13.2
30	22.7	19.1	21.1	24.9	20.5	22.9	19.7	18.6	19.2	15.1	13.2	14.1
31	---	---	---	25.3	21.2	23.4	18.6	17.1	17.9	---	---	---
MONTH	24.0	13.4	18.7	25.3	17.8	21.6	25.6	16.8	20.9	19.9	7.5	14.9

WATER-QUALITY RECORDS

PERIOD OF RECORD.--Water years 1966 to July 1981, 1991, 1993, 1995-96, April to September 1998, April to September 2000 (discontinued).

PERIOD OF DAILY RECORD.--
WATER TEMPERATURE: May to September 1996, May to September 1998, April to September 2000 (discontinued).

INSTRUMENTATION.--Temperature recording data logger.

EXTREMES FOR PERIOD OF DAILY RECORD.--
WATER TEMPERATURE: Maximum, 25.6 ^{o}C Aug. 2, 2000.

COLLECTION METHODS.--Composite of 5, 0.25 m^2 samples. Richest targeted habitat--riffles.
MESH SIZE.--425 um.

AVERAGE DEPTH.--0.22 m.

AVERAGE PERCENT SHADING.--85.

AVERAGE VELOCITY.-- 0.52 m/s.

SUBSTRATE EMBEDDEDNESS CLASS RANGE.--5.

PERCENT FINES AVERAGE.--0.

BIOLOGICAL DATA, JULY 2000
BENTHIC INVERTEBRATE COLLECTION DATA

ORGANISM **TAXON** *GENUS SPECIES*	DATE JULY 17	OF INDIV-IDUALS	PERCENT COMPO-SITION
NON-INSECTS			
Ophidonais serpentina		6	0.28
Fluminicola n.sp. near fuscus		3	0.14
Acari		9	0.42
EPHEMEROPTERA			
Acentrella insignificans		6	0.28
Baetis tricaudatus		427	19.14
Tricorythodes		22	0.97
TRICHOPTERA			
Cheumatopsyche		3	0.14
Hydropsyche		1350	60.47
Hydroptila		12	0.55
Neotrichia		3	0.14
Ochrotrichia		9	0.42
LEPIDOPTERA			
Petrophila		6	0.28
COLEOPTERA			
Dubiraphia		6	0.28
Microcylloepus		173	7.77
Optioservus		6	0.28
DIPTERA			
Hemerodromia		9	0.42
Ephydridae		3	0.14
Psychoda		3	0.14
Simulium		68	3.05
CHIRONOMIDAE			
Chironomidae-pupae		6	0.28
Cardiocladius		3	0.14
Cricotopus		3	0.14
Orthocladius Complex		19	0.83
Parakiefferiella		3	0.14
Pseudochironomus		25	1.11
Rheotanytarsus		19	0.83
Thienemannimyia group		15	0.69
Tvetenia Discoloripes group		12	0.55

SUMMARY STATISTICS
TOTAL NUMBER OF TAXA 28
TOTAL INDIVIDUALS 2,232