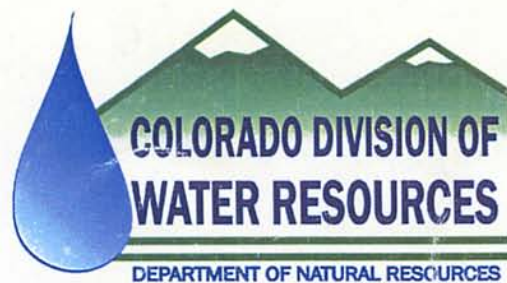




# STREAM FLOW DATA for COLORADO

## Water Year 2002

Compiled by the  
Hydrographic Branch  
Edited by Dave  
Dzurovich



Governor Bill Owens  
State of Colorado

Executive Director Greg E. Walcher  
Department of Natural Resources

State Engineer Paul D. Simpson  
Division of Water Resources

# STATEWIDE HYDROGRAPHIC STAFF

Jack Byers, Deputy State Engineer

Chief Hydro, (Position Vacant)

## DENVER

David Hutchens  
Dave Dzurovchin  
Jana Riedesel

## ALAMOSA

Craig Cotten  
Scott Veneman  
Stan Ditmars  
Lee Conner

## GREELEY

Robert Cooper  
M. L. Cunning  
Rodger Burcher  
Merlin Friedrichsen  
George Sievers  
David Ellington  
Russell Stroud

## MONTROSE

Jerry Thrush  
Steven Tuck

## PUEBLO

Bill Tyner  
Thomas Ley  
Lou Schultz  
Anthony Gutierrez  
Adam Adame

## GLENWOOD SPRINGS

George Wear

## STEAMBOAT SPRINGS

Erin Light

## DURANGO

Scott Brinton

## TABLE OF CONTENTS

06694650	SOUTH FORK SOUTH PLATTE RIVER BELOW ANTERO RESERVOIR .....	1
06694920	SOUTH PLATTE RIVER ABOVE SPINNEY MOUNTAIN RESERVOIR, CO .....	2
06695000	SOUTH PLATTE RIVER ABOVE ELEVENMILE CANYON RESERVOIR, NEAR HARTSEL, CO .....	3
06696000	SOUTH PLATTE RIVER (BELOW ELEVENMILE RESERVOIR) NEAR LAKE GEORGE, CO .....	4
06701500	SOUTH PLATTE RIVER BELOW CHEESMAN LAKE, CO .....	5
06706000	NORTH FORK SOUTH PLATTE RIVER BELOW GENEVA CREEK, AT GRANT, CO .....	6
06707500	SOUTH PLATTE RIVER AT SOUTH PLATTE, CO .....	7
06707501	SOUTH PLATTE RIVER BELOW STRONTIA SPRINGS RESERVOIR, CO .....	8
06708000	SOUTH PLATTE RIVER AT WATERTON, CO .....	9
06709610	SOUTH PLATTE RIVER BELOW CHATFIELD RESERVOIR, CO .....	10
06710500	BEAR CREEK AT MORRISON, CO .....	11
06711500	BEAR CREEK AT MOUTH, AT SHERIDAN, CO .....	12
06714000	SOUTH PLATTE RIVER AT DENVER, CO .....	13
	STRAIGHT CREEK TUNNEL AT EAST PORTAL EISENHOWER TUNNEL .....	14
06720000	CLEAR CREEK AT DERBY, CO .....	15
06720500	SOUTH PLATTE RIVER AT HENDERSON, CO .....	16
	MIDDLE ST. VRAIN CREEK NR. PEACEFUL VALLEY, CO .....	17
	SOUTH ST. VRAIN CREEK NEAR WARD, CO .....	18
	LEFTHAND DIVERSION AT SO. ST. VRAIN CREEK NEAR WARD, CO .....	19
06724000	ST. VRAIN CREEK AT LYONS, CO .....	20
06725500	MIDDLE BOULDER CREEK AT NEDERLAND, CO .....	21
06727000	BOULDER CREEK NEAR ORODELL, CO .....	22
06729450	SOUTH BOULDER CREEK BELOW GROSS RESERVOIR NEAR COAL CREEK, CO .....	23
	SOUTH BOULDER CREEK DIVERSION NEAR ELDORADO SPRINGS, CO .....	24
06729500	SOUTH BOULDER CREEK NEAR ELDORADO SPRINGS, CO .....	25
06730300	COAL CREEK NEAR PLAINVIEW, CO .....	26
06731000	ST. VRAIN CREEK AT MOUTH, NEAR PLATTEVILLE, CO .....	27
	WIND RIVER NEAR ESTES PARK, CO .....	28
	WIND RIVER BY-PASS NEAR ESTES PARK, CO .....	29
06733000	BIG THOMPSON RIVER (ABOVE LAKE ESTES) AT ESTES PARK, CO .....	30
06734500	FISH CREEK NEAR ESTES PARK, CO .....	31
06735500	BIG THOMPSON RIVER (BELOW LAKE ESTES) NEAR ESTES PARK, CO .....	32
06734900	OLYMPUS TUNNEL (ESTES FOOTHILLS CANAL) AT LAKE ESTES, CO .....	33
06736000	NORTH FORK BIG THOMPSON RIVER AT DRAKE, CO .....	34
	DILLE TUNNEL (EAST PORTAL) NEAR DRAKE, CO .....	35
06738000	BIG THOMPSON RIVER AT MOUTH OF CANYON, NEAR DRAKE, CO .....	36
	BUCKHORN CREEK NEAR MASONVILLE, CO .....	37
	CHARLES HANSEN FEEDER CANAL BELOW BIG THOMPSON SIPHON NEAR DRAKE, CO .....	38
06738100	CHARLES HANSEN FEEDER CANAL WASTEWAY TO BIG THOMPSON NEAR DRAKE, CO .....	39
06738100	CHARLES HANSEN FEEDER CANAL POWER PLANT TO BIG THOMPSON RIVER .....	40
	BOULDER CREEK FEEDER CANAL NEAR LYONS, CO .....	41
	ST. VRAIN SUPPLY CANAL NEAR LYONS, CO .....	42
	LITTLE THOMPSON RIVER @ CANYON MOUTH NEAR BERTHOUD, CO .....	43
06744000	BIG THOMPSON RIVER AT MOUTH NEAR LA SALLE, CO .....	44
06752000	CACHE LA POUFRE RIVER AT MOUTH OF CANYON, NEAR FORT COLLINS, CO .....	45
06752500	CACHE LA POUFRE RIVER NEAR GREELEY, CO .....	46
06754000	SOUTH PLATTE RIVER NEAR KERSEY, CO .....	47
06758500	SOUTH PLATTE RIVER NEAR WELDONA, CO .....	48
06759910	SOUTH PLATTE RIVER AT BALZAC, CO .....	49
06763990	SOUTH PLATTE RIVER AT JULESBURG, CO. CHANNEL NO 2 .....	50
06763990	SOUTH PLATTE RIVER AT JULESBURG, CO. CHANNEL NO 1 .....	51
06763980	SOUTH PLATTE RIVER AT JULESBURG, CO. CHANNEL NO 4 (INCLUDES FLOW FROM CHANNEL NO 3) .....	52
06764000	SOUTH PLATTE RIVER AT JULESBURG, CO (COMBINED) .....	53
	TRANSMOUNTAIN DIVERSIONS INTO THE SOUTH PLATTE BASIN IN COLORADO .....	54
	AURORA HOMESTAKE PIPELINE ABOVE ELEVENMILE RESERVOIR .....	55
09042000	EAST PORTAL HOOSIER PASS TUNNEL NEAR ALMA, CO .....	56
09046000	BOREAS PASS DITCH AT BOREAS PASS, CO .....	57
09050590	HAROLD D. ROBERTS TUNNEL NEAR GRANT, CO .....	58
09047300	VIDLER TUNNEL NEAR ARGENTINE PASS, CO .....	59
09021500	BERTHOUD PASS DITCH AT BERTHOUD PASS, CO .....	60
09022500	EAST PORTAL MOFFAT TUNNEL NEAR ROLLINSVILLE, CO .....	61
09013000	ALVA B. ADAMS TUNNEL AT EAST PORTAL .....	62
09010000	GRAND RIVER DITCH AT LA POUFRE PASS, CO .....	63
06745500	CAMERON PASS DITCH AT CAMERON PASS, CO .....	64
06746000	MICHIGAN DITCH AT CAMERON PASS, CO .....	65
06746500	SKYLINE DITCH NEAR CHAMBERS LAKE, CO .....	66
06747000	LARAMIE-POUDRE TUNNEL NEAR CHAMBERS LAKE, CO .....	67
	BOB CREEK DITCH NEAR GLENDEVEY, CO .....	68
	DEADMAN DITCH NEAR DEADMAN PARK, CO .....	69
06750500	WILSON SUPPLY DITCH NEAR EATON RESERVOIR, CO .....	70
	PIONEER DITCH AT HEADGATE NEAR LAIRD, CO .....	71
	PIONEER DITCH AT COLORADO-NEBRASKA STATE LINE .....	72
07082500	LAKE FORK CREEK BELOW SUGAR LOAF DAM NEAR LEADVILLE, CO .....	73
07084500	LAKE CREEK ABOVE TWIN LAKES RESERVOIR, CO .....	74
	LAKE CREEK BELOW TWIN LAKES RESERVOIR, CO .....	75
07086000	ARKANSAS RIVER AT GRANITE, CO .....	76
07086500	CLEAR CREEK ABOVE CLEAR CREEK RESERVOIR, CO .....	77
	CLEAR CREEK BELOW CLEAR CREEK RESERVOIR, NEAR GRANITE, CO .....	78
07089520	COTTONWOOD CREEK AT BUENA VISTA, CO .....	79
07091000	CHALK CREEK AT NATHROP, CO .....	80
07091500	ARKANSAS RIVER AT SALIDA, CO .....	81

07093700	ARKANSAS RIVER NEAR WELLSVILLE, CO .....	82
07095000	GRAPE CREEK NEAR WESTCLIFFE, CO .....	83
07096000	ARKANSAS RIVER AT CANON CITY, CO .....	84
07097000	ARKANSAS RIVER AT PORTLAND, CO .....	85
07099400	ARKANSAS RIVER ABOVE PUEBLO, CO .....	86
07111000	HUERFANO RIVER AT MANZANARES CROSSING NEAR REDWING, CO .....	87
07114000	CUCHARAS RIVER AT BOYD RANCH NEAR LA VETA, CO .....	88
	OXFORD FARMERS DITCH NEAR NEPESTA, CO .....	89
07117000	ARKANSAS RIVER AT NEPESTA ROAD BRIDGE NEAR NEPESTA, CO (RIVER ONLY) .....	90
07117000	ARKANSAS RIVER AT NEPESTA ROAD BRIDGE NEAR NEPESTA, CO (COMBINED) .....	91
07119700	ARKANSAS RIVER BELOW CATLIN DAM, NEAR FOWLER, CO .....	92
07119705	CATLIN CANAL, NEAR FOWLER, CO .....	93
07119700	ARKANSAS RIVER BELOW CATLIN DAM, NEAR FOWLER, CO (COMBINED) .....	94
07120500	ARKANSAS RIVER NEAR ROCKY FORD, CO .....	95
07122400	CROOKED ARROYO NEAR SWINK, CO .....	96
07123000	ARKANSAS RIVER AT LA JUNTA, CO .....	97
07123675	HORSE CREEK AT HIGHWAY 194 NR LAS ANIMAS, CO (WY2001) .....	98
07123675	HORSE CREEK AT HIGHWAY 194 NR LAS ANIMAS, CO (WY2002) .....	99
07124500	PURGATOIRE RIVER AT TRINIDAD, CO .....	100
07126500	PURGATOIRE RIVER AT NINEMILE DAM, NEAR HIGBEE, CO (RIVER ONLY) .....	101
07126500	NINEMILE CANAL BELOW NINEMILE DAM NEAR HIGBEE, CO .....	102
07126500	PURGATOIRE RIVER AT NINEMILE DAM, NEAR HIGBEE, CO (COMBINED) .....	103
	PURGATOIRE RIVER BELOW HIGHLAND DAM NEAR LAS ANIMAS, CO (WY2001) .....	104
	HIGHLAND CANAL BELOW HIGHLAND DAM NEAR LAS ANIMAS, CO (WY2001) .....	105
	PURGATOIRE RIVER BELOW HIGHLAND DAM NEAR LAS ANIMAS, CO (COMBINED)(WY2001) .....	106
	PURGATOIRE RIVER BELOW HIGHLAND DAM NEAR LAS ANIMAS, CO (WY2002) .....	107
	HIGHLAND CANAL BELOW HIGHLAND DAM NEAR LAS ANIMAS, CO (WY2002) .....	108
	PURGATOIRE RIVER BELOW HIGHLAND DAM NEAR LAS ANIMAS, CO (COMBINED)(WY2002) .....	109
07134125	ARKANSAS RIVER BELOW X-Y DITCH DAM NR CARLTON, CO .....	110
09061500	COLUMBINE DITCH NEAR FREEMONT PASS, CO .....	111
09062000	EWING DITCH AT TENNESSEE PASS, CO .....	112
09062500	WURTZ DITCH NEAR TENNESSEE PASS, CO .....	113
	WURTZ DITCH EXTENSION NEAR LEADVILLE, CO AT TENNESSEE PASS .....	114
09063700	HOMESTAKE TUNNEL NEAR GOLD PARK, CO .....	115
09077160	BOUSTEAD TUNNEL AT EAST PORTAL NEAR LEADVILLE, CO .....	116
09077500	BUSK-IVANHOE TUNNEL AT EAST PORTAL NEAR MALTA, CO .....	117
09073000	TWIN LAKES TUNNEL AT EAST PORTAL NEAR TWIN LAKES, CO .....	118
09115000	LARKSPUR DITCH NEAR MARSHALL PASS, CO .....	119
08213500	RIO GRANDE AT THIRTYMILE BRIDGE, NEAR CREEDE, CO .....	120
08214500	NORTH CLEAR CREEK BELOW CONTINENTAL RESERVOIR, CO .....	121
08217500	RIO GRANDE RIVER AT WAGONWHEEL GAP, CO .....	122
08218500	GOOSE CREEK AT WAGONWHEEL GAP, CO .....	123
08219500	SOUTH FORK RIO GRANDE AT SOUTH FORK, CO .....	124
08220000	RIO GRANDE RIVER NEAR DEL NORTE, CO .....	125
08220500	PINOS CREEK NEAR DEL NORTE, CO .....	126
08221500	RIO GRANDE NEAR MONTE VISTA, CO .....	127
	RIO GRANDE AT RIO GRANDE-ALAMOSA COUNTY LINE, CO .....	128
08223000	RIO GRANDE AT ALAMOSA, CO .....	129
	CLOSED BASIN PROJECT CANAL NEAR ALAMOSA, CO .....	130
08224500	KERBER CREEK NEAR VILLA GROVE, CO .....	131
	GARNER CREEK NEAR VILLA GROVE, CO .....	132
	MAJOR CREEK NEAR VILLA GROVE, CO .....	133
	COTTON CREEK NEAR MINERAL HOT SPRINGS, CO .....	134
	WILD CHERRY CREEK NEAR CRESTONE, CO .....	135
	RITO ALTO CREEK NEAR CRESTONE, CO .....	136
	SAN ISABEL CREEK NEAR CRESTONE, CO .....	137
08227000	SAGUACHE CREEK NEAR SAGUACHE, CO .....	138
08227500	NORTH CRESTONE CREEK NEAR CRESTONE, CO .....	139
	SOUTH CRESTONE CREEK NEAR CRESTONE, CO .....	140
	WILLOW CREEK NEAR CRESTONE, CO .....	141
	SPANISH CREEK NEAR CRESTONE, CO .....	142
08229500	COTTONWOOD CREEK NEAR CRESTONE, CO .....	143
	DEADMAN CREEK NEAR CRESTONE, CO .....	144
	BIG SPRING CREEK AT MEDANO RANCH NEAR GREAT SAND DUNES NATIONAL MONUMENT .....	146
08230500	CARNERO CREEK NEAR LA GARITA, CO .....	147
08231000	LA GARITA CREEK NEAR LA GARITA, CO .....	148
08236000	ALAMOSA CREEK ABOVE TERRACE RESERVOIR, CO .....	149
08236500	ALAMOSA CREEK BELOW TERRACE RESERVOIR, CO .....	150
08238000	LA JARA CREEK AT GALLEGOS RANCH, NEAR CAPULIN, CO .....	151
	SOUTH CHANNEL NORTON DRAIN DITCH NEAR LA SAUSES, CO .....	152
	NORTON DRAIN NEAR LA SAUSES, CO .....	153
08240000	RIO GRANDE ABOVE MOUTH OF TRINCHERA CREEK, NEAR LASAUSES, CO .....	154
08240500	TRINCHERA CREEK ABOVE TURNERS RANCH, NEAR FORT GARLAND, CO .....	155
08241000	TRINCHERA CREEK ABOVE MOUNTAIN HOME RESERVOIR, CO .....	156
08241500	SANGRE DE CRISTO CREEK NEAR FORT GARLAND, CO .....	157
08242500	UTE CREEK NEAR FORT GARLAND, CO .....	158
08243500	TRINCHERA CREEK BELOW SMITH RESERVOIR, NEAR BLANCA, CO .....	159
08245000	CONEJOS RIVER BELOW PLATORO RESERVOIR, CO .....	160
08246500	CONEJOS RIVER NEAR MOGOTE, CO .....	161
08247500	SAN ANTONIO RIVER AT ORTIZ, CO .....	162
08248000	LOS PINOS RIVER NEAR ORTIZ, CO .....	163
08248500	SAN ANTONIO RIVER AT MOUTH, NEAR MANASSA, CO .....	164
08249000	CONEJOS RIVER NEAR LASAUSES, MAIN (NORTH) CHANNEL, CO .....	165

08249000	CONEJOS RIVER NEAR LASAUSES, SECONDARY (SOUTH) CHANNEL, CO	166
08249000	CONEJOS RIVER NEAR LASAUSES, CO (COMBINED)	167
08250000	CULEBRA CREEK AT SAN LUIS, CO	168
08251500	RIO GRANDE NEAR LOBATOS, CO	169
09118200	TARBELL DITCH NEAR COCHETOPA PASS, CO	170
09121000	TABOR DITCH AT SPRING CREEK PASS, CO	171
09341000	TREASURE PASS DITCH AT WOLF CREEK PASS, CO	172
09347000	DON LA FONT DITCH NO.1 AT PIEDRA PASS, CO	173
09347000	DON LA FONT DITCH NO.2 AT PIEDRA PASS, CO	174
09347000	DON LA FONT DITCH, COMBINED, AT PIEDRA PASS, CO	175
09348000	WILLIAM'S CREEK-SQUAW PASS DITCH AT SQUAW PASS, CO	176
09351500	PINE RIVER WEMINUCHE PASS DITCH AT WEMINUCHE PASS, CO	177
09351500	WEMINUCHE PASS DITCH AT WEMINUCHE PASS, CO	178
09131490	MUDDY CREEK ABOVE PAONIA RESERVOIR	179
09131500	MUDDY CREEK BELOW PAONIA RESERVOIR	180
	ABC LATERAL NEAR MONTROSE, CO	181
	SOUTH CANAL NEAR MONTROSE, CO	182
	REDLANDS CANAL NEAR GRAND JUNCTION, CO	183
	UNCOMPAHGRE RIVER NEAR OLATHE, CO	184
	BLUE RIVER AT HIGHWAY 9 BRIDGE BELOW BRECKENRIDGE, CO	185
	ROARING FORK RIVER BELOW MAROON CREEK NEAR ASPEN, CO	186
09080300	ROCKY FORK CREEK NEAR MEREDITH, CO	187
09238500	WALTON CREEK NEAR STEAMBOAT SPRINGS, CO	188
06616500	MICHIGAN RIVER NEAR MEADOW CREEK RESERVOIR	189
06617100	MICHIGAN RIVER NEAR WALDEN, CO	190
06617500	ILLINOIS RIVER NEAR RAND	191
	DOLORES TUNNEL OUTLET NEAR DOLORES, CO	192
	LONE PINE CANAL BELOW GREAT CUT DIKE NEAR DOLORES, CO	193
	DOLORES RIVER BELOW MCPHEE RESERVOIR NEAR DOLORES, CO	194
	BLANCO DIVERSION NEAR PAGOSA SPRINGS, CO	195
09343300	RIO BLANCO BELOW BLANCO DIVERSION DAM, NEAR PAGOSA SPRINGS, CO	196
	RIO BLANCO AT MOUTH NEAR TRUJILLO, CO	197
09344000	NAVAJO RIVER AT BANDED PEAK RANCH, NEAR CHROMO, CO	198
	OSO DIVERSION NEAR CHROMO, CO	199
09344400	NAVAJO RIVER BELOW OSO DIVERSION DAM, NEAR CHROMO, CO	200
	LITTLE OSO DIVERSION NEAR CHROMO, CO	201
09345200	LITTLE NAVAJO RIVER BELOW LITTLE OSO DIVERSION DAM NEAR CHROMO, CO	202
09362750	FLORIDA RIVER ABOVE LEMON RESERVOIR NEAR DURANGO, CO	203
	FLORIDA RIVER BELOW LEMON RESERVOIR NEAR DURANGO, CO	204
09357500	ANIMAS RIVER AT HOWARDSVILLE, CO	205
	LA PLATA AND CHERRY CREEK DITCH NEAR HESPERUS, CO	206
	PINE RIDGE DITCH NEAR HESPERUS, CO	207
09365500	LA PLATA RIVER AT HESPERUS, CO	208
	CHERRY CREEK AT THE MOUTH NEAR RED MESA, CO	209
	LONG HOLLOW AT THE MOUTH NEAR RED MESA, CO	210
	PIONEER DITCH AT THE COLORADO-NEW MEXICO STATELINE	211
	ENTERPRISE DITCH AT THE COLORADO-NEW MEXICO STATELINE	212
09366500	LA PLATA RIVER AT COLORADO-NEW MEXICO STATE LINE	213
09370000	MANCOS RIVER NEAR MANCOS, CO	214



PLATTE RIVER BASIN

06694650 SOUTH FORK SOUTH PLATTE RIVER BELOW ANTERO RESERVOIR

LOCATION.--Lat 38°33'26", long 105°53'22", 1500 ft below Antero Reservoir.

DRAINAGE AREA.--N/A

GAGE.--Satellite monitoring and graphic recorder on a 12 foot Parshall flume with a wooden shelter, concrete well and staff gage. The weekly recorder has an expanded scale (One division equals 0.02 ft.) which can be read to 0.005 foot. A 15 ft. wide by-pass channel, closed by adjustable gate, is cut into the bank about 40 ft. above the flume. The new Cipolletti outlet weir has not yet been fully approved for operation even though the approach velocity problems have been improved. Gage is owned and maintained by the Denver Water Dept.

REMARKS.--Primary record is hourly data taken from satellite readings with chart back up. DCP data usually agrees with chart data to within ±0.02 foot, but chart frequently shows corrections when changed. Chart values were used for the period May 1, through June 16, 2002 when the shaft encoder inoperable. The record is good. A baffle has been installed in the stilling basin above the Cipoletti weir. Measurements to confirm the final rating are yet to be made. Record developed and satellite monitoring maintained by Rodger Burcher.

RATING TABLE.--STD12FTPF USED FROM 01-OCT-2001 TO 11-APR-2002
PlaantVar USED FROM 11-APR-2002 TO 16-JUL-2002
STD12FTPF USED FROM 16-JUL-2002 TO 30-SEP-2002

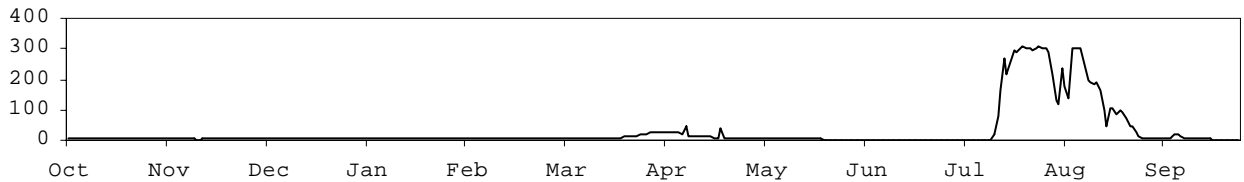
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002
MEAN VALUES

Table with 13 columns: DAY, OCT, NOV, DEC, JAN, FEB, MAR, APR, MAY, JUN, JUL, AUG, SEP. Rows include daily discharge values and summary statistics (TOTAL, MEAN, AC-FT, MAX, MIN).

WTR YR 2002 TOTAL 10904.7 MEAN 29.9 MAX 305 MIN 1.4 AC-FT 21630

MAX DISCH: 312 CFS AT 09:00 ON Jul. 25, 2002 GH 3.29 FT. SHIFT -0.02 FT.
MAX GH: 3.29 FT. AT 09:00 ON Jul. 25, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06694920 SOUTH PLATTE RIVER ABOVE SPINNEY MOUNTAIN RESERVOIR, CO

LOCATION.--Lat 38°59'10", long 105°40'52".

DRAINAGE AREA.--N/A

GAGE.--Graphic water-stage recorder and satellite monitoring at a 25-foot concrete Parshall flume with a wooden shelter and concrete well with inside electric tape gage and in-flume staff gage. Gage is operated and equipment is maintained by the city of Aurora.

REMARKS.--Record is taken from hourly satellite readings and is complete except for November 9, 2001 to April 25, 2002, when the station was closed for the winter. The record is good, except for November 9 - April 25 which is estimated, and October 24-27 and November 4, & 5 which were rated 'poor' due to possible ice-effects. Satellite daily gage heights agree with chart data to  $\pm 0.02$  ft. Record developed by Rodger Burcher.

RATING TABLE.--STD25FTPF USED FROM 01-OCT-2001 TO 07-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

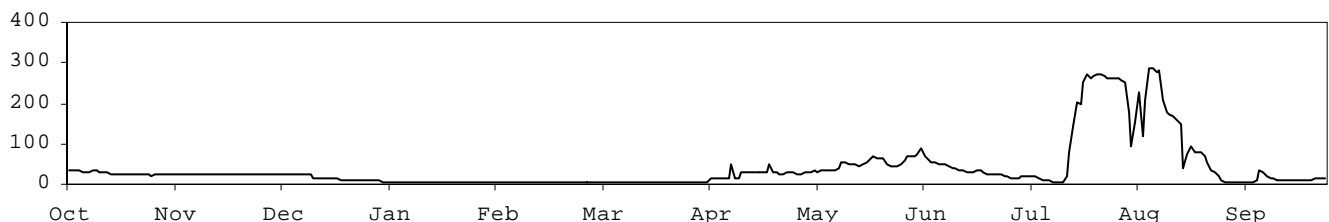
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	36	26	25	5	5	5	5	26	67	17	260	6.7
2	36	25	25	5	5	5	5	29	70	16	258	5.1
3	34	26	25	5	5	5	5	32	71	14	254	3.9
4	33	25	25	5	5	5	5	32	75	18	177	3.7
5	32	24	25	5	5	5	15	33	89	19	95	3.5
6	32	25	25	5	5	5	15	32	70	20	152	2.8
7	32	25	25	5	5	5	15	34	59	20	227	2.6
8	33	27	25	5	5	5	15	35	55	19	118	2.7
9	33	25	25	5	5	5	15	36	52	15	207	3.7
10	31	25	25	5	5	5	15	35	51	12	285	12
11	29	25	15	5	5	5	50	34	50	11	286	33
12	28	25	15	5	5	5	15	38	47	9.1	279	28
13	27	25	15	5	5	5	15	56	44	6.9	281	21
14	26	25	15	5	5	5	30	53	40	5.1	206	16
15	27	25	15	5	5	5	30	51	39	4.8	179	14
16	26	25	15	5	5	5	30	47	36	3.9	173	11
17	26	25	15	5	5	5	30	48	33	19	166	8.6
18	26	25	15	5	5	5	30	45	30	78	157	8.2
19	24	25	10	5	5	5	30	49	28	142	149	10
20	23	25	10	5	5	5	30	54	31	204	39	12
21	25	25	10	5	5	5	30	61	35	200	73	11
22	26	25	10	5	5	5	50	69	33	254	94	10
23	26	25	10	5	5	5	30	65	29	274	81	9.8
24	25	25	10	5	5	5	29	65	26	261	78	11
25	22	25	10	5	5	5	26	62	25	269	78	11
26	24	25	10	5	5	5	27	51	23	273	70	11
27	26	25	10	5	5	5	29	46	23	270	54	13
28	27	25	10	5	5	5	29	44	23	265	36	16
29	26	25	10	5	---	5	28	45	21	260	31	16
30	27	25	10	5	---	5	27	50	19	261	18	16
31	27	---	5	5	---	5	---	57	---	263	10	---
TOTAL	875	753	495	155	140	155	705	1414	1294	3503.8	4571	333.3
MEAN	28	25	16	5	5	5	23.5	46	43	113	147	11.1
AC-FT	1740	1490	982	307	278	307	1400	2800	2570	6950	9070	661
MAX	36	27	25	5	5	5	50	69	89	274	286	33
MIN	22	24	5	5	5	5	5	26	19	3.9	10	2.6

WTR YR 2002 TOTAL 14394.1 MEAN 39.4 MAX 286 MIN 2.6 AC-FT 28550

MAX DISCH: 298 CFS AT 00:30 ON Jul. 21, 2002 GH 2.05 FT. SHIFT 0 FT.

MAX GH: 2.05 FT. AT 00:30 ON Jul. 21, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





## PLATTE RIVER BASIN

06695000 SOUTH PLATTE RIVER ABOVE ELEVENMILE CANYON RESERVOIR, NEAR HARTSEL, CO

**LOCATION.**--Lat 38°58'03", long 105°34'51", in NE¼ sec. 32, T.12 S., R.73 W., Park County, Hydrologic Unit 10190001, on left bank 200 ft downstream from highway bridge, 2.5 mi upstream from water line of Elevenmile Canyon Reservoir, at elevation 8,561 ft. and 13 mi southeast of Hartsel.

**DRAINAGE AREA AND PERIOD OF RECORD.**--880 mi<sup>2</sup>; 1933 to present.

**GAGE.**--Water-stage recorder with satellite telemetry in a wooden shelter at a 25' Parshall flume. Datum of gage is 8,612.83 ft. (Denver Board of Water Commissioners Datum). Station is owned and maintained by the Denver Water Dept. Satellite telemetry is maintained by the U. S. Army Corps of Engineers and the USGS.

**REMARKS.**--Primary record is hourly data taken from satellite readings, with chart back-up. Record is complete and reliable. Spinney Reservoir is 2 miles upstream. Spinney release keeps this gage open year round. The record is good. Record is developed by Rodger Burcher.

**RATING TABLE.**--STD25FTPF USED FROM 01-OCT-2001 TO 24-JUL-2002  
 PLAHARVS01 USED FROM 24-JUL-2002 TO 10-SEP-2002  
 STD25FTPF USED FROM 10-SEP-2002 TO 07-OCT-2002

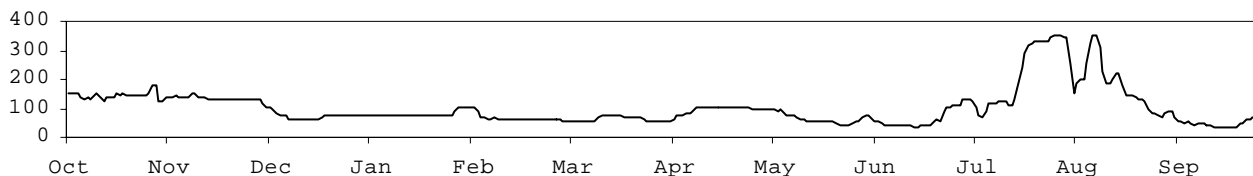
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	152	137	105	74	103	59	55	99	53	113	349	75
2	150	135	105	76	102	54	55	99	67	113	350	72
3	152	142	100	77	102	54	55	99	79	130	346	82
4	152	138	85	77	87	52	55	99	77	130	343	90
5	137	140	78	77	68	54	61	99	64	128	258	90
6	133	139	78	77	66	54	73	100	54	122	155	70
7	137	140	74	78	61	54	73	93	56	101	183	53
8	131	151	63	79	61	53	78	96	47	74	198	53
9	145	149	62	78	66	55	81	81	38	68	197	51
10	150	141	62	78	61	54	81	75	38	87	252	54
11	139	141	63	77	61	54	92	77	38	115	322	48
12	127	141	62	77	61	54	102	76	38	119	349	42
13	135	134	63	77	61	66	102	70	38	118	349	45
14	137	129	62	77	61	77	102	62	38	124	311	45
15	136	129	62	77	61	77	102	60	38	124	225	45
16	151	130	62	77	61	77	102	56	38	123	186	42
17	142	130	62	77	61	77	102	57	38	109	187	38
18	149	130	68	77	61	77	102	56	37	107	198	37
19	144	130	74	76	61	77	102	56	37	132	218	34
20	144	130	74	76	61	77	102	57	40	188	224	34
21	144	130	74	76	61	72	102	56	42	241	177	34
22	144	130	74	76	61	68	101	56	40	290	145	34
23	144	130	74	77	61	67	101	56	40	315	145	34
24	143	130	74	76	62	68	101	57	52	323	145	34
25	143	130	74	76	62	68	101	51	59	333	140	34
26	153	129	74	77	63	68	101	40	57	333	134	51
27	177	129	74	76	61	61	101	40	89	334	133	46
28	177	129	74	89	61	55	101	40	106	334	121	65
29	127	129	74	105	---	55	100	39	101	334	95	65
30	124	117	74	105	---	55	99	47	112	342	80	66
31	141	---	74	105	---	55	---	53	---	349	80	---
TOTAL	4460	4019	2278	2477	1879	1948	2685	2102	1651	5853	6595	1563
MEAN	144	134	74	80	67	63	90	68	55	189	213	52
AC-FT	8850	7970	4520	4910	3730	3860	5330	4170	3270	11610	13080	3100
MAX	177	151	105	105	103	77	102	100	112	349	350	90
MIN	124	117	62	74	61	52	55	39	37	68	80	34

WTR YR 2002 TOTAL 37510 MEAN 103 MAX 350 MIN 34 AC-FT 74400

MAX DISCH: 354 CFS AT 02:00 ON Aug. 1, 2002 GH 2.22 FT. SHIFT 0.06 FT.  
 MAX GH: 2.22 FT. AT 02:00 ON Aug. 1, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06696000 SOUTH PLATTE RIVER(below Elevenmile Reservoir) NEAR LAKE GEORGE, CO

**LOCATION.**--Lat 38°54'19", long 105°28'22". in SW¼ sec. 20, T.13 S., R.72 W., Park County, Hydrologic Unit 10190001, on left bank 700 ft downstream from Elevenmile Canyon Reservoir and 8.2 mi southwest of town of Lake George.

**DRAINAGE AREA AND PERIOD OF RECORD.**--963 mi<sup>2</sup>. October 1929 to current year. Monthly data only for some periods.

**GAGE.**--Water-stage recorder and satellite monitoring in a wooden shelter at a 15' Parshall flume with outside staff gage. Elevation of gage is 8,458 ft from topographic map. Station is owned and maintained by the Denver Water Dept.

**REMARKS.**--Record is taken from hourly satellite data and is complete and reliable. A number of small encoder corrections were made, including 2 of note: A -0.05 ft correction was made on August 5 and applied back to the last visit on July 24. This correction was made during a period of "painting" record and should be considered less reliable. Also, a datum correction was used for a flume cleaning on May 30 and was applied back to the previous visit May 6. This is also considered a less reliable correction. The record is good, except for May 6-20 and July 24-August 5 which are fair due to corrections made. Record developed by Rodger Burcher.

**RATING TABLE.**--STD15FTPF USED FROM 01-OCT-2001 TO 07-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

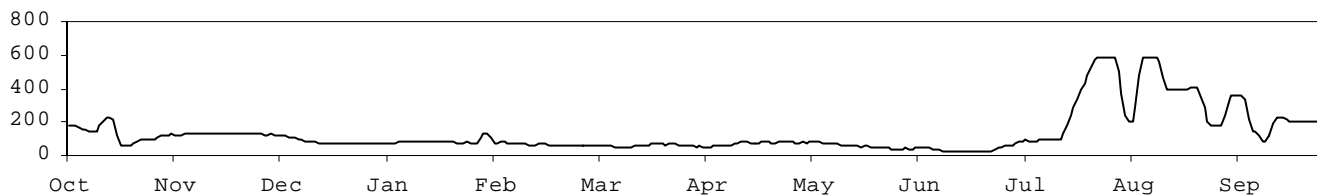
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	174	124	121	74	110	60	58	76	41	56	588	182
2	183	122	116	75	70	61	52	76	42	60	589	182
3	176	125	115	76	75	59	54	79	40	65	505	233
4	168	126	110	76	78	59	53	77	41	73	365	328
5	158	128	107	78	79	56	52	80	46	80	233	363
6	153	129	103	78	77	55	53	79	46	88	198	362
7	148	130	98	78	75	55	55	81	45	90	198	360
8	144	132	92	78	74	54	55	82	44	88	281	359
9	143	136	88	78	70	53	59	76	42	82	473	329
10	180	136	84	80	68	52	61	74	36	86	585	213
11	205	136	82	81	67	51	62	69	34	96	582	139
12	222	136	79	82	65	51	65	68	32	97	583	139
13	230	135	77	81	65	51	73	67	29	96	583	118
14	215	135	75	80	65	53	76	65	27	96	581	84
15	118	134	74	80	68	56	78	62	27	97	567	83
16	55	134	74	80	67	60	81	59	26	99	466	122
17	57	134	73	79	66	61	78	57	26	100	394	197
18	62	133	71	79	65	63	76	56	25	132	393	230
19	65	134	72	78	65	65	72	55	23	181	395	230
20	73	131	71	79	65	66	75	53	21	235	397	229
21	82	130	72	78	63	66	78	57	22	281	397	213
22	91	130	72	77	62	66	79	55	23	336	400	203
23	97	131	71	76	63	67	78	47	22	391	400	202
24	101	128	72	77	62	65	76	48	22	431	402	201
25	96	128	72	78	62	68	75	50	23	473	403	201
26	99	127	71	77	61	68	78	48	24	526	402	201
27	109	123	72	77	61	68	82	45	27	578	351	200
28	119	124	72	77	61	65	80	43	38	591	286	201
29	124	126	74	107	---	61	78	41	46	590	199	200
30	123	125	74	134	---	60	78	40	51	589	183	200
31	127	---	74	136	---	59	---	40	---	588	183	---
TOTAL	4097	3902	2578	2564	1929	1854	2070	1905	991	7371	12562	6504
MEAN	132	130	83	83	69	60	69	62	33	238	405	217
AC-FT	8130	7740	5110	5090	3830	3680	4110	3780	1970	14620	24920	12900
MAX	230	136	121	136	110	68	82	82	51	591	589	363
MIN	55	122	71	74	61	51	52	40	21	56	183	83

WTR YR 2002 TOTAL 48327 MEAN 132 MAX 591 MIN 21 AC-FT 95860

MAX DISCH: 601 CFS AT 11:45 ON Jul. 27, 2002 GH 4.28 FT. (Corrected) SHIFT 0.04 FT.

MAX GH: 4.28 FT. AT 11:45 ON Jul. 27, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06701500 SOUTH PLATTE RIVER BELOW CHEESMAN LAKE, CO

**LOCATION.**--Lat 39°12'33", long 105°16'02", in SE¼NW¼ sec.6, T.10 S., R.70 W., Jefferson County, Hydrologic Unit 10190002, on left bank 1,400 ft downstream from toe of Cheesman Dam and 3.8 mi southwest of Deckers.

**DRAINAGE AREA AND PERIOD OF RECORD.**--1,752 mi<sup>2</sup>. Oct.1, 1924-May13, 1956 at site 370 feet upstream and 0.50 ft. higher. May 14, 1956 to present at current site. Unreliable record from 1909 to 1924 unpublished.

**GAGE.**--Water-stage recorder with satellite telemetry in a wooden shelter at a 30 ft Parshall flume. Datum of gage is 6,609 ft. Station is owned and maintained by the Denver Water Dept. Satellite telemetry is maintained by the U.S. Army Corps of Engineers and the USGS.

**REMARKS.**--The primary record is hourly data taken from satellite monitoring with chart back up. Satellite data agreed with the recorder data within ±0.02 foot. The record is reliable and complete. The record is good. Record developed by Rodger Burcher.

**RATING TABLE.**--PLACHECO11 USED FROM 01-OCT-2001 TO 03-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

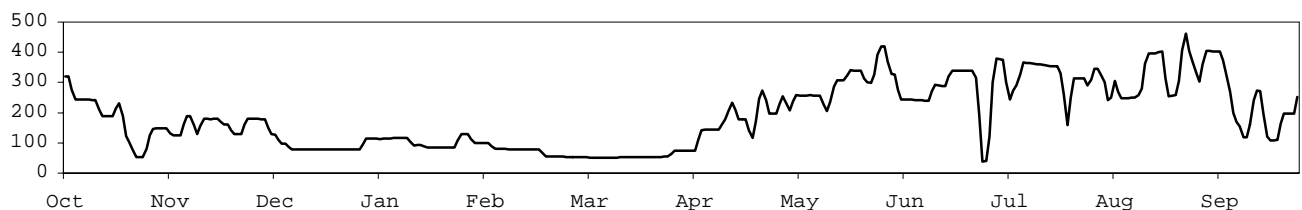
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	319	132	130	110	99	53	75	254	368	121	346	302
2	319	124	128	108	99	53	75	228	329	301	346	361
3	275	124	111	110	99	53	75	207	327	379	322	405
4	243	124	98	109	88	53	75	238	275	377	300	404
5	243	160	98	108	81	50	75	258	244	375	241	403
6	243	189	86	108	81	50	110	257	244	300	250	403
7	243	189	78	108	81	50	143	257	244	244	305	403
8	243	158	78	108	80	51	144	256	244	273	269	372
9	242	130	78	108	78	51	144	258	242	291	247	327
10	242	157	78	106	78	51	144	257	242	327	248	269
11	210	181	78	92	78	51	144	257	242	367	247	199
12	189	181	78	83	78	51	144	257	240	364	249	170
13	189	179	78	84	78	51	162	226	240	365	251	154
14	189	180	78	84	78	52	179	205	272	363	258	119
15	189	180	78	84	78	53	210	235	292	361	280	119
16	214	170	79	84	78	53	234	287	290	360	363	160
17	230	160	79	84	78	53	209	308	289	357	397	241
18	189	160	79	84	78	53	177	308	289	355	397	273
19	123	142	79	84	65	53	178	307	320	354	397	272
20	101	130	79	84	56	53	178	324	340	353	400	197
21	79	130	79	84	56	53	142	341	339	353	403	121
22	52	130	79	84	56	53	117	338	338	331	313	107
23	53	160	79	84	56	54	171	338	338	263	254	109
24	53	181	79	84	56	54	245	338	338	159	256	110
25	81	181	78	109	56	54	274	314	338	251	259	163
26	126	180	78	130	54	54	241	300	338	313	305	198
27	147	180	78	130	53	55	196	299	316	313	406	196
28	148	179	92	130	53	56	196	327	192	313	461	196
29	148	179	111	113	---	64	196	391	39	313	405	196
30	148	151	110	99	---	75	229	420	41	291	370	253
31	148	---	110	99	---	75	---	420	---	309	333	---
TOTAL	5618	4801	2721	3076	2049	1685	4882	9010	8190	9796	9878	7202
MEAN	181	160	88	99	73	54	163	291	273	316	319	240
AC-FT	11140	9520	5400	6100	4060	3340	9680	17870	16240	19430	19590	14290
MAX	319	189	130	130	99	75	274	420	368	379	461	405
MIN	52	124	78	83	53	50	75	205	39	121	241	107

WTR YR 2002 TOTAL 68908 MEAN 189 MAX 461 MIN 39 AC-FT 136700

MAX DISCH: 469 CFS AT 11:45 ON Aug. 27, 2002 GH 2.48 FT. SHIFT -0.01 FT.

MAX GH: 2.48 FT. AT 11:45 ON Aug. 27, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06706000 NORTH FORK SOUTH PLATTE RIVER BELOW GENEVA CREEK, AT GRANT, CO

**LOCATION.**--Lat 39°27'26", long 105°39'29" in NW¼ sec. 10, T.7 S., R.74 W., Park County, Hydrologic Unit 10190002, on left bank at Grant, 1,550 ft downstream from Geneva Creek, and 1.3 mi downstream from east portal of Harold D. Roberts tunnel.

**DRAINAGE AREA AND PERIOD OF RECORD.**--127 mi<sup>2</sup>; 1948 to present.

**GAGE.**--Water-stage recorder with satellite telemetry in a wooden shelter at a concrete control section. Station is owned and maintained by the Denver Water Dept. Satellite telemetry is maintained by the U.S. Army Corps of Engineers and the USGS.

**REMARKS.**--The primary record is hourly data taken from satellite monitoring with chart back up. It is complete. The shaft encoder was accurate to ± 0.01 ft. The record is complete and reliable. Rapid changes in stage are caused by the regulation of Roberts Tunnel, ½ mile upstream. When Roberts tunnel is operating, the gage is free from ice. The record is good. Record developed by Rodger Burcher.

**RATING TABLE.**--PLAGRACO12 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

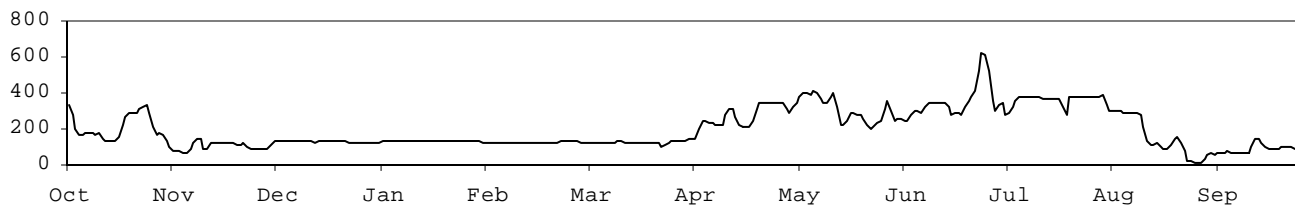
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	328	83	130	126	127	128	135	350	355	518	374	16
2	274	73	133	129	126	126	138	315	295	357	374	15
3	202	73	134	129	126	126	145	288	239	302	374	29
4	169	72	133	129	126	126	145	320	252	332	386	52
5	172	71	133	129	126	126	141	350	255	348	332	62
6	173	89	131	129	126	126	196	380	249	282	300	61
7	173	122	132	129	126	126	244	402	244	284	297	62
8	173	148	130	129	126	127	242	402	274	327	298	63
9	172	148	129	129	126	126	236	393	295	360	295	66
10	175	85	129	129	126	126	231	409	295	383	291	76
11	150	91	129	129	125	126	226	401	290	382	288	69
12	136	127	129	129	126	126	225	372	322	381	286	70
13	134	124	127	130	126	128	224	340	347	378	286	71
14	136	124	129	129	126	128	276	347	346	377	285	68
15	138	122	129	129	126	126	308	379	345	377	273	65
16	160	121	129	129	126	126	309	403	345	374	215	65
17	221	121	129	129	126	125	265	319	343	366	138	105
18	268	122	129	129	126	123	223	224	339	367	116	139
19	286	118	129	129	126	123	213	226	318	365	116	146
20	288	116	129	129	126	123	213	246	282	366	117	121
21	289	115	129	129	126	123	210	292	293	370	98	95
22	315	123	129	129	126	125	245	285	285	370	84	94
23	327	104	127	129	127	127	311	281	281	324	84	92
24	330	88	126	129	129	126	346	279	326	280	110	92
25	286	92	126	129	129	125	347	257	357	377	145	92
26	212	89	126	129	129	105	345	217	374	380	154	97
27	172	88	126	129	129	113	347	198	413	377	126	98
28	173	88	126	129	129	127	345	219	524	376	73	98
29	172	92	126	129	---	129	347	238	617	374	18	97
30	137	116	126	129	---	130	350	239	614	374	18	92
31	100	---	126	129	---	131	---	308	---	374	16	---
TOTAL	6441	3145	3995	3997	3544	3878	7528	9679	10114	11202	6367	2368
MEAN	208	105	129	129	127	125	251	312	337	361	205	79
AC-FT	12780	6240	7920	7930	7030	7690	14930	19200	20060	22220	12630	4700
MAX	330	148	134	130	129	131	350	409	617	518	386	146
MIN	100	71	126	126	125	105	135	198	239	280	16	15

WTR YR 2002 TOTAL 72258 MEAN 198 MAX 617 MIN 15 AC-FT 143300

MAX DISCH: 623 CFS AT 22:30 ON Jun. 28, 2002 GH 1.85 FT. SHIFT 0 FT.

MAX GH: 1.85 FT. AT 22:30 ON Jun. 28, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06707500 SOUTH PLATTE RIVER AT SOUTH PLATTE, CO

**LOCATION.**--Lat 39°24'33", long 105°10'10", SE¼ sec. 25, T.7 S., R.70 W., Jefferson County, Hydrologic Unit 10190002, on left bank at South Platte, 200 ft downstream from bridge on State Highway 75, and 400 ft downstream from North Fork.

**DRAINAGE AREA AND PERIOD OF RECORD.**--2,579 mi<sup>2</sup>; 1910 to present.

**GAGE.**-- A graphic water stage recorder and satellite monitoring equipment in a concrete shelter and CMP well. The Sutron 8004 DCP was replaced with an 8210. The primary gage is an electric tape gage mounted on the equipment shelf. The station was rebuilt with a 60" CMP well and concrete shelter in 1994. 120-volt electricity was installed in 2001. The cable way was rebuilt in 1995. The gage is on Denver Water Board property.

**REMARKS.**--The primary record is hourly data taken from satellite readings with chart back up. The record is complete. Open water record agrees with the chart to within ±0.02 ft. when pen corrections are applied. The record is reliable except for the following days when ice was thought to have affected the stage-discharge relationship: December 7, 2001 through March 10, 2002. The record is good for open water conditions. Station maintained and record developed by Rodger L. Burcher.

**RATING TABLE.**--PLASPLCO15 USED FROM 01-OCT-2001 TO 28-OCT-2002

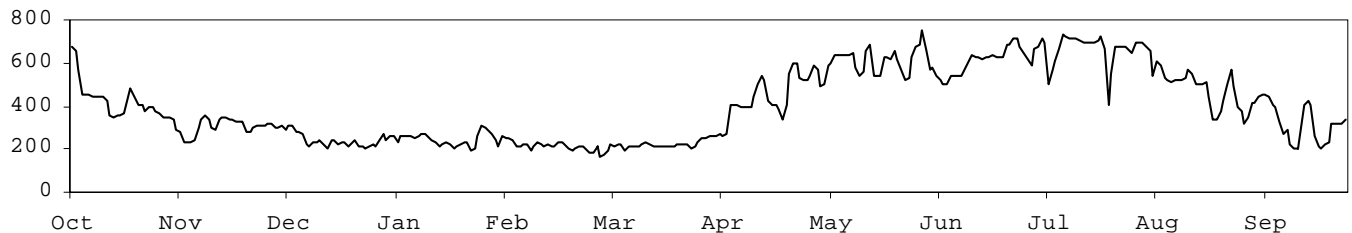
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	674	276	293	261	256	167	257	588	748	617	697	318
2	656	236	309	228	249	172	260	572	661	591	697	343
3	571	233	312	262	249	194	258	488	573	663	697	414
4	452	233	280	265	243	222	267	503	579	671	674	419
5	450	240	277	257	216	216	263	588	537	710	651	444
6	450	296	268	264	212	225	273	600	523	691	542	452
7	445	333	224	250	226	222	407	637	504	498	605	452
8	445	354	215	264	223	197	406	639	502	566	592	439
9	442	333	236	274	197	211	406	637	536	607	531	405
10	441	297	234	269	208	216	398	639	540	662	523	392
11	428	290	239	253	228	213	400	639	538	730	515	330
12	352	338	220	243	217	216	396	642	538	719	516	269
13	350	351	204	229	211	221	395	578	579	714	519	285
14	352	347	237	209	225	227	439	536	593	713	520	218
15	356	342	242	224	213	220	505	558	632	711	527	199
16	362	342	219	233	216	213	541	658	631	707	566	198
17	440	325	229	217	232	209	524	685	624	695	554	273
18	482	329	234	199	231	208	427	541	618	696	506	401
19	448	323	216	214	219	212	407	537	631	696	503	428
20	403	282	228	224	201	212	406	542	627	693	506	401
21	403	283	238	234	195	214	388	630	635	700	512	256
22	374	299	214	228	203	213	340	624	630	720	447	213
23	394	313	212	193	208	223	407	620	624	669	339	207
24	392	311	199	206	211	225	548	652	630	407	336	221
25	380	313	208	258	190	223	602	617	681	548	379	234
26	368	319	220	305	181	219	600	566	688	672	422	320
27	347	314	215	295	183	201	531	525	717	674	503	321
28	347	300	238	290	210	214	524	532	716	672	570	320
29	347	302	267	270	---	227	524	622	672	672	491	319
30	339	307	245	239	---	247	537	671	649	660	397	335
31	286	---	258	208	---	251	---	687	---	642	374	---
TOTAL	12976	9161	7430	7565	6053	6650	12636	18553	18356	20386	16211	9826
MEAN	419	305	240	244	216	215	421	598	612	658	523	328
AC-FT	25740	18170	14740	15010	12010	13190	25060	36800	36410	40440	32150	19490
MAX	674	354	312	305	256	251	602	687	748	730	697	452
MIN	286	233	199	193	181	167	257	488	502	407	336	198

WTR YR 2002 TOTAL 145803 MEAN 399 MAX 748 MIN 167 AC-FT 289200

MAX DISCH: 870 CFS AT 02:15 ON Jul. 22, 2002 GH 3.77 FT. SHIFT -0.07 FT.  
MAX GH: 3.77 FT. AT 02:15 ON Jul. 22, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06707501 SOUTH PLATTE RIVER BELOW STRONTIA SPRINGS RESERVOIR, CO

**LOCATION.**--Lat 39°26'00", long 105°07'30", SW¼SW¼ sec. 16, T.7 S., R.69 W., Douglas County, on right bank 1/4 mi downstream from Strontia Springs Dam.

**DRAINAGE AREA.**--N/A

**GAGE.**--A Stevens A-70 graphic water stage recorder, satellite monitoring data collection platform with digital shaft encoder installed in a formed concrete shelter. An adjustable reference point with a graduated tape on the float drive for the recorder is used for referencing. An adjustable reference for a drop tape is located below the well manhole. An outside staff gage is used as an additional reference. The gage and well are one-piece cast concrete, set on bedrock.

**REMARKS.**--Record is complete and reliable, except for the following periods when the stage-discharge relation was affected by ice: December 31; January 1-5, 14-25, 28, 31; February 1-15, 26-28; March 1-9. Flow past the gage is controlled by releases from Strontia Dam approximately 1500 feet upstream. The dam rarely spills. The record usually runs in steps from the releases. The new rating was developed and implemented. Station was maintained and record developed by R. E. Cooper.

**RATING TABLE.**--PLASTRCO02 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

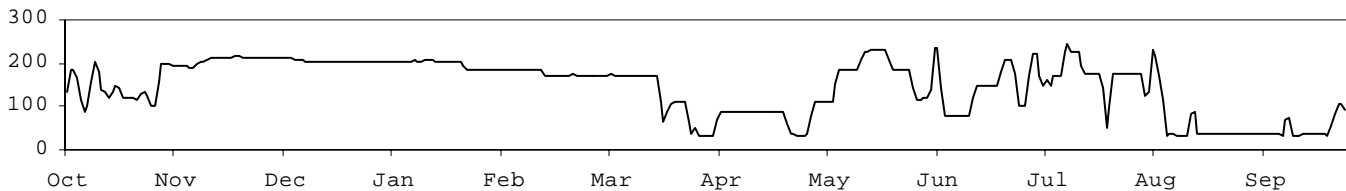
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	135	194	211	205	184	173	34	77	116	100	176	36
2	183	194	211	205	184	173	34	111	118	169	176	35
3	186	194	211	205	184	173	34	111	119	222	176	38
4	168	194	211	205	184	173	67	111	138	222	125	36
5	116	191	209	205	184	174	88	110	237	169	133	35
6	87	189	208	205	184	173	87	109	236	149	231	37
7	102	197	206	205	184	172	87	109	142	163	216	37
8	157	205	205	206	184	173	88	153	80	147	169	38
9	201	205	203	205	184	173	88	183	79	171	115	38
10	180	210	202	205	184	171	88	183	79	172	34	37
11	138	213	202	206	184	171	88	183	79	173	36	36
12	135	213	205	206	184	171	88	185	79	228	35	33
13	121	213	203	206	184	171	88	186	79	244	34	67
14	132	213	204	205	173	171	88	184	79	227	32	73
15	149	213	205	205	173	171	87	206	79	227	32	33
16	142	213	205	205	173	171	87	225	120	226	33	33
17	122	213	205	205	172	171	88	228	149	195	81	34
18	119	216	205	205	173	171	88	230	149	176	86	35
19	119	216	205	205	173	111	88	231	149	176	35	35
20	119	213	205	205	172	64	88	229	149	176	35	35
21	117	213	205	205	172	90	88	230	150	176	35	35
22	127	213	205	194	174	108	88	230	150	176	35	35
23	136	212	205	184	172	109	87	208	149	145	35	35
24	126	211	205	184	173	109	58	186	180	50	35	35
25	103	211	203	184	173	109	36	184	208	96	35	34
26	102	211	204	184	173	109	36	183	206	176	35	55
27	159	211	205	185	173	64	34	183	206	176	35	84
28	197	211	205	184	173	36	34	183	177	176	36	107
29	197	211	205	183	---	50	34	183	101	176	37	107
30	197	211	205	184	---	34	35	145	100	177	36	92
31	194	---	205	184	---	34	---	115	---	176	36	---
TOTAL	4466	6224	6373	6159	4984	4123	2103	5374	4082	5432	2380	1400
MEAN	144	207	206	199	178	133	70	173	136	175	77	47
AC-FT	8860	12350	12640	12220	9890	8180	4170	10660	8100	10770	4720	2780
MAX	201	216	211	206	184	174	88	231	237	244	231	107
MIN	87	189	202	183	172	34	34	77	79	50	32	33

WTR YR 2002 TOTAL 53100 MEAN 145 MAX 244 MIN 32 AC-FT 105300

MAX DISCH: 289 CFS AT 09:00 ON Aug. 6, 2002 GH 3.99 FT. SHIFT 0.02 FT.

MAX GH: 3.99 FT. AT 09:00 ON Aug. 6, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06708000 SOUTH PLATTE RIVER AT WATERTON, CO

**LOCATION.**--Lat 39°29'18", long 105°05'32", in NE¼ sec. 34, T.6 S., R.69 W., Jefferson County, Hydrologic Unit 10190002, on left bank 168 ft downstream from bridge on State Highway 221, 0.4 mi south of Waterton, 4.7 mi west of Louviers, and 6 mi upstream from Plum Creek.

**DRAINAGE AREA AND PERIOD OF RECORD.**--2,621 mi<sup>2</sup>; 1926 to present.

**GAGE.**--Graphic stage recorder, and satellite monitoring DCP with a phone modem (on separate floats)-- in a 60" galvanized, corrugated steel shelter and well. The primary reference is an electric drop tape. Datum of gage 5,484.43 ft National Geodetic Vertical Datum.

**REMARKS.**--The primary record is hourly data taken from satellite monitoring with chart back up. Due to an unusually large number of parity errors (large bogus values) in the satellite database, the record for December-September was worked from logged data from the DCP. The record is rated good except for December through March, which is fair and the following ice days which were estimated; December 13, 16, 19, 23, 29, 31; January 5, 6, 11, 12, 14, 15, 17, 18, 31; February 1-5, 10-16, 26, 27, 28; March 1, 2, 4-6. Station was maintained and record was developed by R.E.Cooper.

**RATING TABLE.**--PLAWATCO09 USED FROM 01-OCT-2001 TO 30-SEP-2002

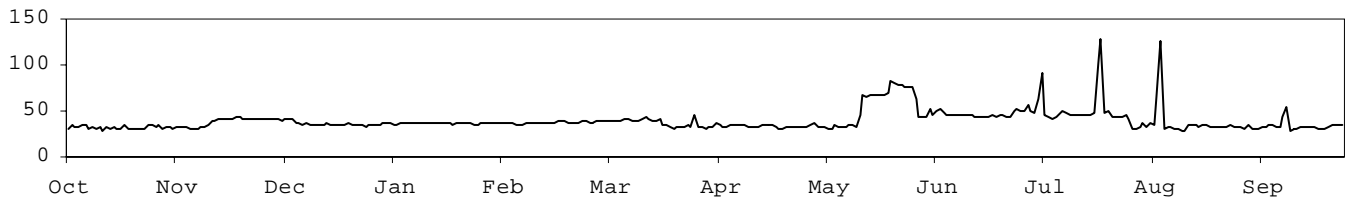
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	31	33	40	36	36	39	31	34	44	49	31	32
2	35	32	42	35	36	39	32	37	43	57	31	30
3	33	33	42	35	36	39	32	33	44	50	32	34
4	33	32	41	37	36	39	36	33	52	48	38	31
5	35	30	38	36	36	39	34	32	46	64	33	30
6	35	30	36	36	35	39	33	31	50	91	37	31
7	31	31	35	36	34	40	33	31	53	46	35	33
8	32	32	36	36	35	40	34	35	47	43	66	33
9	30	32	35	36	38	42	34	32	45	42	126	35
10	32	35	34	37	36	41	34	33	46	44	30	35
11	29	40	34	36	36	40	34	33	46	45	33	33
12	33	40	34	36	36	40	34	35	45	49	33	32
13	30	42	35	36	38	40	33	35	46	47	30	44
14	32	42	36	36	38	42	33	33	46	46	30	55
15	31	42	35	36	38	43	32	45	46	45	29	29
16	31	42	35	36	38	42	33	68	46	45	29	30
17	34	42	35	36	38	40	34	66	44	45	34	30
18	30	43	35	36	39	40	34	67	43	45	35	33
19	30	43	35	35	39	42	34	67	44	45	35	33
20	30	41	36	36	39	34	35	68	44	45	33	32
21	30	41	35	36	38	35	33	68	44	47	34	32
22	31	41	35	37	38	32	30	67	45	103	34	32
23	31	42	35	38	37	31	31	69	44	128	33	31
24	34	41	34	36	38	32	33	82	46	47	33	31
25	34	42	33	35	39	33	32	80	45	49	33	31
26	32	42	35	35	40	32	32	78	44	44	32	33
27	35	42	35	38	38	34	33	79	43	44	33	35
28	31	42	35	38	38	33	33	77	49	44	33	35
29	32	41	35	36	---	45	32	77	52	44	34	34
30	32	41	36	36	---	32	33	76	49	46	33	34
31	31	---	36	36	---	32	---	62	---	42	32	---
TOTAL	990	1152	1113	1120	1043	1171	991	1663	1381	1629	1144	1003
MEAN	32	38	36	36	37	38	33	54	46	53	37	33
AC-FT	1960	2280	2210	2220	2070	2320	1970	3300	2740	3230	2270	1990
MAX	35	43	42	38	40	45	36	82	53	128	126	55
MIN	29	30	33	35	34	31	30	31	43	42	29	29

WTR YR 2002 TOTAL 14400 MEAN 39.5 MAX 128 MIN 29 AC-FT 28560

MAX DISCH: 212 CFS AT 13:30 ON Jul. 22, 2002 GH 1.23 FT. (Corrected) SHIFT 0.02 FT.  
MAX GH: 1.23 FT. (Corrected) AT 13:30 ON Jul. 22, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06709610 SOUTH PLATTE RIVER BELOW CHATFIELD RESERVOIR, CO

LOCATION.--Lat 39°33'26", long 105°03'27", SE¼, sec. 1, T.6 S., R.69 W., Jefferson County, Hydrologic Unit 10190002.

DRAINAGE AREA.--3,018 mi<sup>2</sup>.

GAGE.--Steven's A-70 Graphic water-stage recorder with satellite telemetry with electric drop tape for reference.

REMARKS.--The primary record is hourly satellite data with chart back up. Encoder read correctly on 8 visits to the gage. Daily max and min values agreed with the corrected chart values to within +- 0.02 foot. No corrections to the encoder data were required all year. The control was cleaned of moss on all visits with no corrections observed. The record is complete and reliable. The record is good. Station maintained and record developed by Robert E Cooper.

RATING TABLE.--PLACHACO03 USED FROM 01-OCT-2001 TO 30-SEP-2002

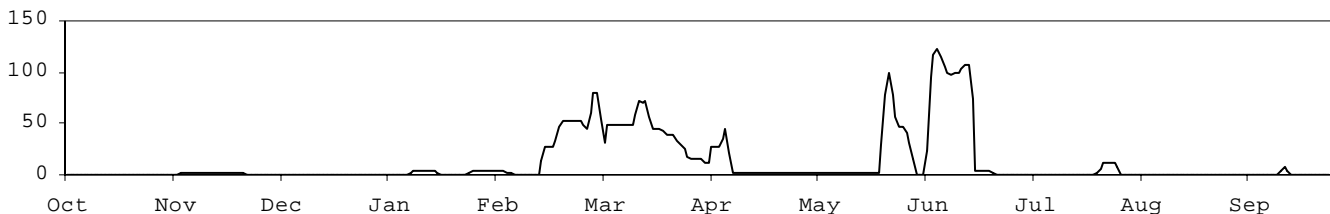
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.33	.19	.23	.12	4	60	15	1.4	31	.42	.79	.3
2	.33	.95	.19	.12	4.1	80	15	1.5	15	.42	.75	.25
3	.33	2.3	.2	.12	4.5	80	11	1.5	.62	.47	.7	.25
4	.36	1.8	.19	.12	3.6	54	11	1.5	.6	.5	.67	.21
5	.33	1.5	.16	.12	2.6	32	28	1.5	.55	.42	.65	.19
6	.28	1.5	.14	.12	2.2	49	28	1.5	23	.51	.62	.2
7	.22	1.5	.14	.12	.47	49	28	1.6	95	.43	.6	.25
8	.19	1.4	.16	1.6	.4	49	36	1.7	117	.42	.6	.25
9	.2	1.4	.14	4.3	.36	49	45	1.7	123	.42	.6	.25
10	.23	1.3	.18	4	.3	49	22	1.7	114	.45	.6	.27
11	.25	1.3	.19	4.2	.14	48	1.3	1.9	105	.51	.58	.25
12	.25	1.3	.19	4.3	.65	48	1.3	1.8	99	.48	.6	.38
13	.25	1.3	.18	4	.92	48	1.2	1.7	98	.51	.6	.22
14	.25	1.3	.19	3.5	.7	59	1.1	1.7	99	.51	.6	.19
15	.25	1.4	.2	3.6	14	72	1.1	1.6	99	.55	.64	.19
16	.25	1.4	.18	2.3	28	71	1.1	1.7	104	.59	.66	.3
17	.25	1.4	.13	.13	28	72	1.1	1.5	108	.6	.7	7.1
18	.25	1.5	.13	.12	28	56	1.2	1.5	108	.68	.67	4.3
19	.24	1.5	.13	.12	34	45	1.2	1.4	75	.75	.44	.24
20	.19	1.5	.13	.12	46	45	1.2	1.5	4.2	.79	.13	.21
21	.25	1.1	.13	.12	53	45	1.2	1.4	4.2	.79	.13	.27
22	.24	.22	.13	.11	53	42	1.1	1.4	4	.84	.5	.27
23	.2	.26	.13	.11	52	39	1.1	1.4	3.7	.88	.66	.26
24	.19	.2	.13	.11	53	39	1.2	.29	3.1	.97	.49	.23
25	.17	.21	.13	1.1	53	39	1.3	.78	2.1	1	.38	.09
26	.13	.25	.13	4.3	53	33	1.3	.99	.54	5.4	.37	.09
27	.13	.25	.13	4.5	49	29	1.2	.78	.42	12	.38	.08
28	.13	.25	.13	3.9	45	25	1.3	.57	.42	12	.3	.08
29	.13	.25	.13	4	---	18	1.4	.47	.37	12	.27	.08
30	.13	.25	.13	4	---	15	1.4	.47	.37	12	.3	.08
31	.12	---	.13	4	---	15	---	.40	---	.8	.3	---
TOTAL	7.05	30.98	4.81	59.38	613.94	1454	263.3	511.1	1438.19	76.31	16.28	20.03
MEAN	.23	1.03	.16	1.92	21.9	47	8.8	16.5	47.9	2.46	.53	.67
AC-FT	14	61	9.5	118	1220	2880	522	1010	2850	151	32	40
MAX	.36	2.3	.23	4.5	53	80	45	99	123	12	.79	7.1
MIN	.12	.19	.13	.11	.14	15	1.1	1.4	.37	.42	.13	.08

WTR YR 2002 TOTAL 4495.37 MEAN 12.3 MAX 123 MIN .08 AC-FT 8920

MAX DISCH: 129 CFS AT 14:00 ON Jun. 8, 2002 GH 1.88 FT. SHIFT 0.03 FT.  
MAX GH: 1.88 FT. AT 14:00 ON Jun. 8, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





PLATTE RIVER BASIN

06710500 BEAR CREEK AT MORRISON, CO

**LOCATION.**--Lat 39°39'11", long 105°11'42, in SE¼SW¼ sec. 35, T.4 S., R.70 W., Jefferson County, Hydrologic Unit 10190002, on left bank at Morrison, 180 ft upstream from bridge on State Highway 8 and 0.2 mi upstream from Mount Vernon Creek.

**DRAINAGE AREA AND PERIOD OF RECORD.**--164 mi<sup>2</sup>. Sporadic, incomplete data Sep. 1881 to Feb. 1902. Good data October 1919 to current year. Monthly data for some periods only. Some early years published as near Morrison, at Starbuck, at Idledale. Water quality data from Oct. 1976 to Sep. 1981.

**GAGE.**--Water-stage recorder with satellite telemetry, shaft encoder and Telemark in a 48-inch metal shelter and well. A new concrete wier was installed and put into operation Sep. 10, 2002.

**REMARKS.**--Hourly data is the primary record, taken from satellite monitoring with chart back-up. Mean daily values from the chart were used on the following days when the satellite record was missing: April 4-8. The record is complete except for the following period when both chart and satellite data were not reliable due to inlet isolation and control construction: August 27-31 September 1-10, 2002. The record is reliable except for the following periods during the winter period when ice accumulates on the control: November 22, 2001 to March 5, 2002 and March 8, 9. The record is rated as fair due to poor definition of the ratings at historic low flows. November 22 to March 5; March 8, 9; August 27 to September 13; September 19; and the instantaneous peak flow were estimated. Station maintained and record developed by Rodger Burcher.

**RATING TABLE.**--BCRMORCO21 USED FROM 01-OCT-2001 TO 26-AUG-2002  
BCRMORCO22 USED FROM 10-SEP-2002 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

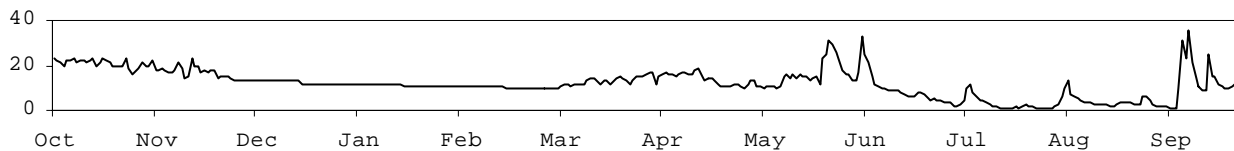
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	23	18	13	12	11	10	17	12	16	3.9	1	4.3
2	22	18	13	12	11	10	17	13	13	3.4	.94	3
3	21	19	13	12	11	10	12	13	13	2.1	1.5	2
4	20	18	13	12	11	10	15	11	17	2.1	2.4	2
5	22	17	13	12	11	11	16	11	33	2.6	5.8	2
6	22	17	13	12	11	12	17	10	25	4.8	10	2
7	23	18	13	12	11	12	16	11	21	10	13	1
8	21	21	13	12	11	11	16	11	15	12	7.2	1
9	22	19	13	12	11	12	15	11	12	7.9	6.5	1
10	22	14	13	12	11	12	16	10	11	6.3	5.1	10
11	21	15	13	12	11	12	17	11	10	4.8	4.1	31
12	22	23	13	12	11	12	17	15	10	4.6	3.9	23
13	23	20	13	12	11	13	16	16	9	3.8	3.7	36
14	20	20	13	12	11	14	16	14	9.1	2.6	3.2	21
15	21	17	13	12	11	14	18	16	8.9	1.5	3.1	14
16	23	18	12	11	10	13	19	14	8.7	1.4	3	11
17	22	17	12	11	10	12	15	16	8.2	1.3	2.3	9.2
18	21	18	12	11	10	13	13	15	7	1.2	2.3	8.5
19	20	18	12	11	10	13	14	15	6	.95	2.7	25
20	20	14	12	11	10	12	14	13	5.8	.62	2	15
21	20	15	12	11	10	13	13	14	6.5	.97	1.8	15
22	20	15	12	11	10	14	12	15	7.9	1.5	2.9	12
23	23	15	12	11	10	15	11	12	8.2	.88	3.5	11
24	19	14	12	11	10	14	11	23	7.2	2	3.2	10
25	16	13	12	11	10	13	11	25	5.2	2.8	3.3	10
26	18	13	12	11	10	12	11	31	4.8	2.2	3.3	11
27	19	13	12	11	10	13	12	29	4.9	1.9	3	12
28	21	13	12	11	10	15	12	26	4.1	1.1	3	12
29	20	13	12	11	---	15	11	23	4.1	.74	3	12
30	20	13	12	11	---	15	10	18	3.9	.96	6	11
31	22	---	12	11	---	16	---	16	---	1	6	---
TOTAL	649	496	387	356	295	393	430	490	315.5	93.92	122.74	338
MEAN	21	17	13	12	11	13	14	16	10.5	3.03	3.96	11.3
AC-FT	1290	984	768	706	585	780	853	972	626	186	243	670
MAX	23	23	13	12	11	16	19	31	33	12	13	36
MIN	16	13	12	11	10	10	10	10	3.9	.62	.94	1

WTR YR 2002 TOTAL 4366.16 MEAN 12 MAX 36 MIN .62 AC-FT 8660

MAX DISCH: 49.5 CFS AT 17:30 ON Sep. 13, 2002 GH 6.22 FT. SHIFT 0.04 FT.

MAX GH: 6.22 FT. AT 17:30 ON Sep. 13, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06711500 BEAR CREEK AT MOUTH, AT SHERIDAN, CO

**LOCATION.**--Lat 39°39'08", long 105°01'57", in NW¼NW¼ sec. 5, T,5 S., R.68 W., Arapahoe County, Hydrologic Unit 10190002 on left bank just downstream from bridge on South Lowell Blvd., at Highway Department maintenance building at northwest city limits of Sheridan, 1.3 mi upstream from mouth, and 2.1 mi west of city hall in Englewood.

**DRAINAGE AREA AND PERIOD OF RECORD.**--260 mi<sup>2</sup>. April to Nov. 1914, March 1927 to current year. Monthly data only prior to Oct. 1933.

**GAGE.**--Water-stage recorder with satellite telemetry, shaft encoder and Telemark in a 42-inch metal shelter and well with supplemental outside wire weight gage.

**REMARKS.**--The primary record is hourly data from satellite with chart back-up. The data is complete and reliable, except for the following days when the stage-discharge relationship was ice-affected: January 19, 20, 23, 24, 25; February 10, 2002. A correction of -0.02 ft. occurred when the control was cleaned of debris on the June 06 and October 15, 2002 measurements. The record is rated as good, except for the following days which were estimated: January 19, 20, 23, 24, 25; and February 10. Computed flow came so close to zero this year that it is entirely possible to visualize a condition where the only flow would be a small amount leaking under the control. The gage could not accurately record a flow like this. Station maintained and record developed by Robert E. Cooper.

**RATING TABLE.**--BCRSHECO32 USED FROM 01-OCT-2001 TO 15-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

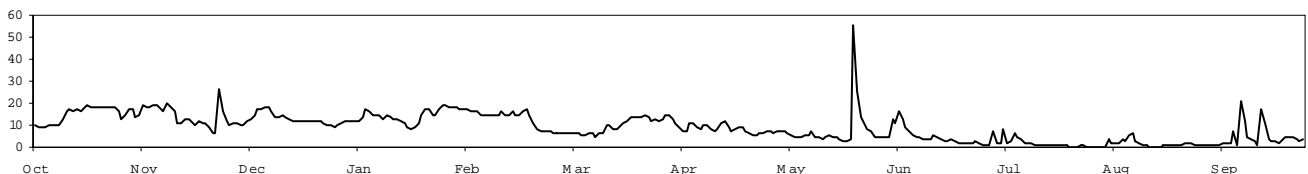
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	10	19	12	12	17	6	15	6.2	4.4	1.2	.24	.77
2	9.5	18	13	12	17	6.8	13	7.4	4.4	1.3	.12	.58
3	9.4	18	15	14	16	6	11	7.5	4.6	7.2	.12	.83
4	8.8	19	17	17	16	6.8	9.2	7.6	13	2	.17	.8
5	10	19	17	16	16	6.7	6.9	6.7	11	2.2	3.9	.93
6	10	17	18	15	15	6.1	7.5	5.7	16	8.6	1.7	1.2
7	10	16	18	15	15	5.6	11	5	13	2.1	1.4	1.4
8	9.7	20	16	15	15	5.5	11	4.6	9.2	2.4	1.6	1.5
9	13	18	14	13	15	6.6	9.2	4.7	7	6.1	3.5	2.2
10	16	16	14	15	15	6.2	8.3	5.3	5.6	5	2.6	7.4
11	17	11	15	14	15	4.8	9.7	5.5	4.2	3.3	5.6	1.3
12	16	11	14	13	16	6.3	9.6	7.2	4.3	1.5	6	21
13	17	13	13	13	15	6.7	8.4	4.6	4	1.5	2.3	12
14	16	13	12	12	15	10	7.1	4.3	3.9	1.4	1.7	4.3
15	17	12	12	11	16	9.7	8.2	4	4	1.3	1.3	3.3
16	19	10	12	9.5	15	8.2	11	4.4	5.4	1.3	.76	2.3
17	18	12	12	8.6	15	8	12	5.7	4.6	1.1	.35	1.1
18	18	11	12	9.1	16	9.9	9.4	4.2	3.3	.95	.35	17
19	18	11	12	11	17	11	7.7	4.2	2.9	1.2	.24	11
20	18	9.2	12	15	15	12	8	3.9	2.6	.8	.36	3.7
21	18	6.5	12	17	11	14	8.9	2.7	3.5	.51	.58	2.4
22	18	6.1	12	17	8.4	14	9	2.6	3	.82	1.3	2.3
23	18	26	11	15	7.4	14	7.1	3.3	2.2	.95	.78	1.7
24	18	16	10	15	7.1	14	6.1	55	2.1	.78	1	3.8
25	16	12	9.8	17	7.5	15	5.4	25	1.9	.36	.95	4.2
26	13	10	9.4	19	7.4	14	5.4	14	1.9	.23	.88	5
27	15	11	10	19	6.8	12	6.2	9.7	1.7	.45	2	4.4
28	17	11	11	18	6	13	6.7	7.9	2.9	.6	1.4	3.3
29	17	9.7	12	18	---	12	7.3	7.3	1.9	.68	1.7	3.1
30	14	10	12	18	---	13	6.9	5	1.3	.39	1.2	3.4
31	15	---	12	17	---	15	---	4.8	---	.24	.88	---
TOTAL	459.4	411.5	401.2	450.2	373.6	298.9	262.2	246	149.8	58.46	46.98	128.21
MEAN	14.8	13.7	12.9	14.5	13.3	9.6	8.7	7.9	5	1.89	1.52	4.27
AC-FT	911	816	796	893	741	593	520	488	297	116	93	254
MAX	19	26	18	19	17	15	15	55	16	8.6	6	21
MIN	8.8	6.1	9.4	8.6	6	4.8	5.4	2.6	1.3	.23	.12	.58

WTR YR 2002 TOTAL 3286.45 MEAN 9 MAX 55 MIN .12 AC-FT 6520

MAX DISCH: 750 CFS AT 17:45 ON Sep. 12, 2002 GH 4.86 FT. SHIFT 0.02 FT.

MAX GH: 4.86 FT. AT 17:45 ON Sep. 12, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06714000 SOUTH PLATTE RIVER AT DENVER, CO

**LOCATION.**--Lat 39°45'35", long 105°00'10", in NW¼SE¼ sec. 28, T.3 S., R.68 W., Denver County, Hydrologic Unit 10190003, on right bank 90 ft Upstream from Nineteenth Street Bridge in Denver and 0.4 mi downstream from Cherry Creek.

**DRAINAGE AREA AND PERIOD OF RECORD.**--3,861 mi<sup>2</sup>. May 1889 to Oct. 1890 sporadic record. July 1895 to current year continuous. Monthly data only for some periods.

**GAGE.**--Water-stage recorder with satellite telemetry in a 72"x72" precast concrete shelter on a 48" corrugated steel well. Station includes electric drop tape, telemark and outside wire weight gage.

**REMARKS.**--The primary record is hourly data taken from satellite monitoring with chart backup. Daily maximum & minimum stages for the satellite record checked to within +/- 0.02 with the chart. The record is complete and reliable. The record is considered good, except for flows above 473 cfs (including the recorded peak flow), which are fair due to lack of confirming measurements above 473 cfs. Record developed by Lee Cunning.

**RATING TABLE.**--PLADENCO33 USED FROM 01-OCT-2001 TO 10-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	112	113	109	111	117	158	123	78	112	65	47	53
2	110	106	111	107	119	182	133	103	115	61	42	52
3	110	105	112	108	120	200	131	97	101	77	52	52
4	109	105	115	110	119	241	124	95	432	70	65	50
5	142	108	124	115	105	179	135	89	163	98	139	50
6	120	101	123	118	100	165	140	86	119	437	85	50
7	118	108	124	119	99	165	145	85	158	136	63	48
8	115	228	120	120	109	163	146	86	191	92	58	56
9	121	118	119	118	108	181	156	94	206	73	58	60
10	123	111	124	157	110	165	152	94	199	211	54	161
11	125	104	107	143	110	155	141	101	201	177	52	90
12	119	102	118	131	110	148	121	167	187	85	54	392
13	122	107	110	130	110	154	112	111	180	80	57	454
14	124	104	101	128	109	209	104	93	179	70	51	115
15	139	103	112	124	113	212	99	101	176	63	43	87
16	126	101	139	123	123	196	94	124	182	62	47	81
17	124	95	145	126	129	184	90	155	193	60	48	70
18	121	120	128	119	135	194	86	117	180	55	48	193
19	121	129	121	114	155	205	91	108	178	54	49	259
20	119	110	118	117	140	167	87	106	177	55	52	94
21	116	101	120	117	147	162	87	100	98	54	71	81
22	117	101	124	117	146	165	79	85	146	65	80	80
23	119	273	123	131	145	159	69	88	89	61	78	81
24	118	134	115	125	147	159	67	851	81	55	65	78
25	117	112	113	140	163	155	69	246	73	50	60	73
26	112	126	116	136	165	154	73	199	81	47	57	103
27	111	118	117	130	154	139	76	190	70	54	61	89
28	110	107	117	126	149	129	80	149	68	65	119	90
29	116	104	118	121	---	122	76	139	84	65	268	91
30	120	107	112	120	---	122	66	126	68	60	122	92
31	119	---	115	119	---	122	---	120	---	56	66	---
TOTAL	3695	3561	3670	3820	3556	5211	3152	4383	4487	2713	2211	3325
MEAN	119	119	118	123	127	168	105	141	150	88	71	111
AC-FT	7330	7060	7280	7580	7050	10340	6250	8690	8900	5380	4390	6600
MAX	142	273	145	157	165	241	156	851	432	437	268	454
MIN	109	95	101	107	99	122	66	78	68	47	42	48

WTR YR 2002 TOTAL 43784 MEAN 120 MAX 851 MIN 42 AC-FT 86850

MAX DISCH: 2090 CFS AT 16:00 ON Sep. 13, 2002 GH 6.15 FT. SHIFT -0.01 FT.  
MAX GH: 6.15 FT. AT 16:00 ON Sep. 13, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.

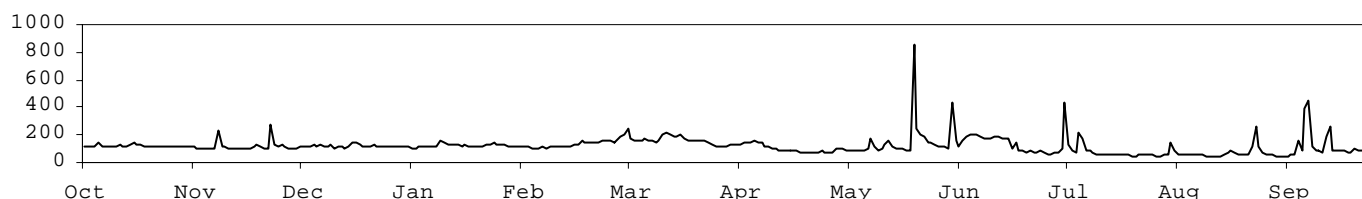


PLATE RIVER BASIN  
 STRAIGHT CREEK TUNNEL AT EAST PORTAL EISENHOWER TUNNEL

**LOCATION.**-- Lat 39°40'45", long 105°54'12", manhole is located in the East Portal CDOT parking lot between the East and West bound lanes.

**DRAINAGE AREA.**--Eisenhower Tunnel seepage with effluent from sewage treatment facility.

**GAGE.**-- A 12 inch Parshall flume located in a manhole in the CDOT parking lot between eastbound and westbound lanes of I-70. The tunnel pipeline is approximately 12 ft. underground.

**REMARKS.**-- The record is not rated for accuracy. The site does not have continuous record. Yearly data is based on the interpolation of 14 user-supplied instantaneous observations of flow. However, it is noted that weekly observations were made during May and June this year, which would make the data a little better than in previous years when once-monthly readings were made. The parking lot is covered with ice in the winter and such readings are not made. Gage height readings were made on the following days: September 19, 2001; May 2, May 10, May 17, May 24, June 3, June 12, June 20, June 28, July 12, July 18, August 16, September 27, October 7, 2002. An interpolated record of discharge was computed by entering zero gage height for all 365 days and then entering the gage heights observed above as shifts. This record is requested by DWR Division 5 and the Upper Colorado River Commission to complete their accounting of transmountain diversions. Record developed by Robert E. Cooper.

**RATING TABLE.**--STCTUNCO STD01FTP PAR USED FROM 01-OCT-2001 TO 07-OCT-2002

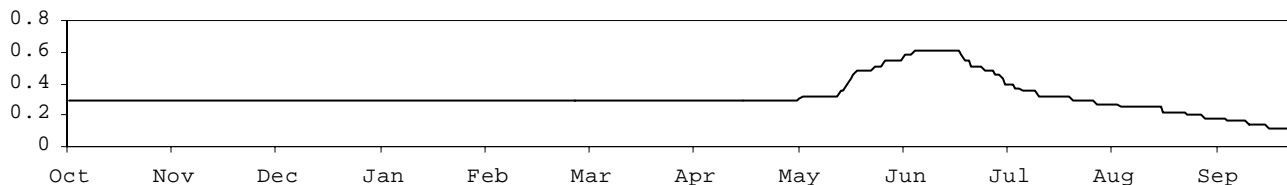
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
 MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.29	.29	.29	.29	.29	.29	.29	.29	.55	.48	.29	.2
2	.29	.29	.29	.29	.29	.29	.29	.29	.55	.48	.27	.2
3	.29	.29	.29	.29	.29	.29	.29	.29	.55	.46	.27	.18
4	.29	.29	.29	.29	.29	.29	.29	.29	.55	.46	.27	.18
5	.29	.29	.29	.29	.29	.29	.29	.29	.55	.43	.27	.18
6	.29	.29	.29	.29	.29	.29	.29	.31	.58	.4	.27	.18
7	.29	.29	.29	.29	.29	.29	.29	.32	.58	.4	.27	.18
8	.29	.29	.29	.29	.29	.29	.29	.32	.58	.4	.27	.18
9	.29	.29	.29	.29	.29	.29	.29	.32	.61	.37	.25	.18
10	.29	.29	.29	.29	.29	.29	.29	.32	.61	.37	.25	.16
11	.29	.29	.29	.29	.29	.29	.29	.32	.61	.35	.25	.16
12	.29	.29	.29	.29	.29	.29	.29	.32	.61	.35	.25	.16
13	.29	.29	.29	.29	.29	.29	.29	.32	.61	.35	.25	.16
14	.29	.29	.29	.29	.29	.29	.29	.32	.61	.35	.25	.16
15	.29	.29	.29	.29	.29	.29	.29	.32	.61	.35	.25	.16
16	.29	.29	.29	.29	.29	.29	.29	.32	.61	.32	.25	.14
17	.29	.29	.29	.29	.29	.29	.29	.32	.61	.32	.25	.14
18	.29	.29	.29	.29	.29	.29	.29	.35	.61	.32	.25	.14
19	.29	.29	.29	.29	.29	.29	.29	.35	.61	.32	.25	.14
20	.29	.29	.29	.29	.29	.29	.29	.4	.61	.32	.25	.14
21	.29	.29	.29	.29	.29	.29	.29	.43	.61	.32	.25	.14
22	.29	.29	.29	.29	.29	.29	.29	.46	.61	.32	.22	.12
23	.29	.29	.29	.29	.29	.29	.29	.48	.58	.32	.22	.12
24	.29	.29	.29	.29	.29	.29	.29	.48	.55	.32	.22	.12
25	.29	.29	.29	.29	.29	.29	.29	.48	.55	.32	.22	.12
26	.29	.29	.29	.29	.29	.29	.29	.48	.51	.29	.22	.12
27	.29	.29	.29	.29	.29	.29	.29	.48	.51	.29	.22	.12
28	.29	.29	.29	.29	.29	.29	.29	.51	.51	.29	.22	.12
29	.29	.29	.29	.29	---	.29	.29	.51	.51	.29	.2	.14
30	.29	.29	.29	.29	---	.29	.29	.51	.48	.29	.2	.16
31	.29	---	.29	.29	---	.29	---	.55	---	.29	.2	---
TOTAL	8.99	8.7	8.99	8.99	8.12	8.99	8.7	11.75	17.23	10.94	7.57	4.6
MEAN	.29	.29	.29	.29	.29	.29	.29	.38	.57	.35	.24	.15
AC-FT	18	17	18	18	16	18	17	23	34	22	15	9.1
MAX	.29	.29	.29	.29	.29	.29	.29	.55	.61	.48	.29	.2
MIN	.29	.29	.29	.29	.29	.29	.29	.29	.48	.29	.2	.12

WTR YR 2002 TOTAL 113.57 MEAN .31 MAX .61 MIN .12 AC-FT 225

MAX DISCH: 0.61 CFS AT 00:00 ON Jun. 10, 2002 GH 0.29 ft SHIFT 0 FT.  
 MAX GH: 0.29 ft FT. AT 12:00 ON Jun. 10, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06720000 CLEAR CREEK AT DERBY, CO

**LOCATION.**--Lat 39°49'42", long 104°57'30", in SW¼SW¼ sec. 36, T.2 S., R.68 W., Adams County, Hydrologic Unit 10190004, on right bank 875 ft downstream from York Street bridge, 0.5 mi upstream from mouth, and 2.5 mi west of Derby.

**DRAINAGE AREA AND PERIOD OF RECORD.**--575 mi<sup>2</sup>; 1927 to present.

**GAGE.**--Graphic water-stage recorder with satellite monitoring DCP with digital shaft encoder and Telemark in a 60 inch corrugated metal shelter and well. Station at this datum since June 26, 1992. Primary reference is by electric drop tape.

**REMARKS.**--The primary record is hourly satellite data and mean daily gage heights from the chart. Daily maximum and minimum stages for the satellite record checked to within ± 0.02 with the chart. Where DCP data was missing, data was entered hourly from the chart. The clock stopped a few times during the season, but the satellite data was complete so no data was lost during these times. The record is good, except for December through February which is fair due to possible ice-effect. Station maintained and record developed by M.L. Cunning.

**RATING TABLE.**--CLEDERCO34 USED FROM 01-OCT-2001 TO 10-OCT-2002

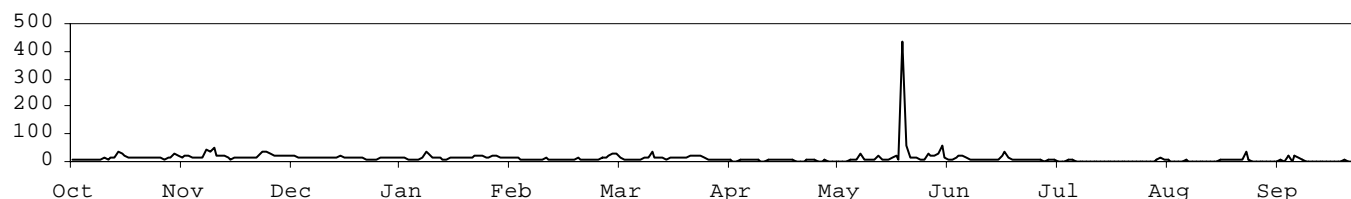
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	4.3	18	19	17	16	17	8.3	2.7	25	4.2	1.9	2
2	4.9	21	19	18	11	19	7.6	4.3	20	4.8	2.3	1.8
3	4.8	19	23	18	12	26	8.6	3.3	32	3.5	2.7	1.5
4	5	17	16	9.2	11	29	6.6	3	60	3.7	4.7	1.8
5	7.5	17	15	10	9.2	18	3.9	2.9	11	4.2	12	1.9
6	6.9	18	15	10	5.1	6	3.4	2.9	5.8	8.6	7.5	2
7	6	18	15	8.5	5.7	4	3.6	3.1	4.6	2.5	4.5	2.2
8	5.1	45	18	11	5.8	4	4.2	3.1	11	1.8	3.3	4.6
9	9.2	38	18	34	5	4.2	5.6	3.9	20	2.2	3.6	2.4
10	11	54	17	26	5	3.8	6.5	4.1	23	7.4	2.6	23
11	10	20	18	15	6.7	4.9	7.5	4.9	12	5.8	2.9	3.6
12	14	20	18	14	13	14	5.6	26	5.5	3.6	4.3	23
13	14	20	18	13	9.5	13	6	9.1	4.6	2.6	3.5	16
14	34	17	18	9.7	4.7	35	3.4	5.7	4.3	2.1	3.3	4.3
15	27	10	15	9.5	4.6	18	3.4	4.6	4.4	2	2.9	2.1
16	25	11	20	13	4.3	16	4	8.8	4.3	2.3	2.5	1.9
17	17	11	16	15	4.3	14	5.8	21	4.7	2.3	2.4	1.9
18	14	12	15	17	4.2	10	10	4.5	3.8	2.2	2.5	1.9
19	13	17	14	16	4.3	18	7.8	4.2	4.2	2.3	2.4	2.4
20	15	18	13	14	4.5	13	6.7	4.5	8	2.3	2.9	2
21	12	15	14	14	11	12	5.2	17	22	2.6	3.3	2
22	13	15	11	11	5.8	14	3.8	22	36	1.4	3.8	2.3
23	12	31	9.8	22	5.1	13	4.4	10	16	1.9	5.9	2.6
24	14	34	10	23	4.3	15	2.4	438	8	2.4	6.7	2
25	11	33	7.6	20	4.8	24	2.9	58	5.2	2.4	5.5	2.1
26	12	32	8.7	16	4	25	3.6	14	4.3	2.7	6.2	3.7
27	10	23	14	18	7.9	24	7.1	11	4.6	2.5	7.2	2.8
28	11	20	14	20	15	25	6.3	11	5	2.8	7.3	1.6
29	16	19	16	19	---	17	6.2	7.5	5.3	2.9	33	2.1
30	26	19	16	17	---	9.9	2.5	7.4	4.6	2.4	6.9	1.4
31	23	---	16	16	---	9	---	30	---	2.5	2.8	---
TOTAL	407.7	662	477.1	493.9	203.8	474.8	162.9	752.5	379.2	96.9	163.3	124.9
MEAN	13.2	22	15.4	15.9	7.3	15.3	5.4	24.3	12.6	3.1	5.3	4.2
AC-FT	809	1310	946	980	404	942	323	1490	752	192	324	248
MAX	34	54	23	34	16	35	10	438	60	8.6	33	23
MIN	4.3	10	7.6	8.5	4	3.8	2.4	2.7	3.8	1.4	1.9	1.4

WTR YR 2002 TOTAL 4399 MEAN 12.1 MAX 438 MIN 1.4 AC-FT 8730

MAX DISCH: 1110 CFS AT 02:45 ON May. 24, 2002 GH 3 FT. SHIFT -0.02 FT.  
MAX GH: 3 FT. AT 02:45 ON May. 24, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06720500 SOUTH PLATTE RIVER AT HENDERSON, CO

**LOCATION** --Lat 39°55'19", long 104°52'00", in SE¼NE¼ sec. 34, T.1 S., R.67 W., Adams County, Hydrologic Unit 10190003, on right bank 500 ft upstream from bridge on State Highway 22 and 0.2 mi northwest of Henderson.

**PERIOD OF RECORD AND DRAINAGE AREA.**--4,713 mi<sup>2</sup>. May 1926 to current year. Monthly data only prior to 1933. Periodic water quality data available starting in 1955.

**GAGE.**--Water-stage recorder with satellite telemetry, shaft encoder and Telemark in a 42-inch metal pipe shelter with electric drop tape and outside wire weight as additional reference. An Accubar was installed April 25, 1997 and run in parallel with the shaft encoder. The Accubar is used as primary record during periods of low flows when the well becomes isolated.

**REMARKS.**--Primary record is hourly readings, taken from satellite monitoring of the both the stilling well and Accubar, with chart back-up on the well. The well became isolated when the stage dropped below about 1.7 ft, which at very low flows can occur during a daily diurnal as Metro Wastewater flows pass the gage. A new rock control installed in March of 2002. The record is rated as fair from October 1 to March 10. The record was estimated from March 11 to April 15. The record is rated as good from April 16 to September 30. The peak of September 12 is also considered fair due to lack of confirming measurements made above 2,530 cfs. Station maintained and record developed by Lee Cunning.

**RATING TABLE.**--PLAHENCO31 USED FROM 01-OCT-2001 TO 17-MAR-2002  
PLAHENCO32 USED FROM 16-APR-2002 TO 03-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

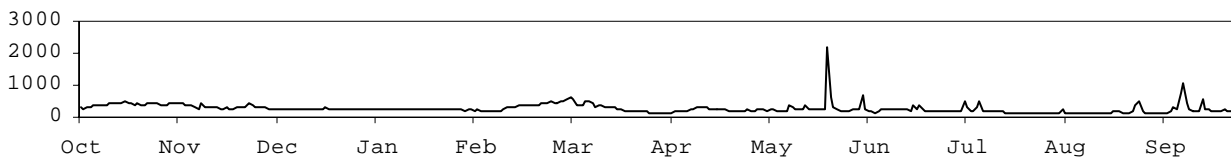
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	292	439	275	248	219	476	119	212	235	194	131	152
2	278	462	276	254	218	493	120	242	254	188	131	149
3	296	363	269	252	220	541	108	238	268	199	125	155
4	299	349	265	244	218	618	114	231	717	199	124	147
5	363	357	261	253	208	564	120	218	271	182	142	139
6	374	317	267	253	192	360	167	232	204	530	275	141
7	384	273	261	253	203	363	181	224	174	308	156	142
8	395	433	262	248	203	387	173	216	142	212	141	152
9	404	307	262	259	185	471	159	208	188	201	137	166
10	419	339	269	273	193	494	216	217	238	299	139	336
11	426	291	269	275	235	433	275	218	241	509	128	249
12	424	291	267	264	300	342	278	362	258	209	129	770
13	428	290	268	250	296	347	286	289	250	202	127	1070
14	445	281	265	239	293	392	286	247	232	185	127	429
15	481	270	258	236	314	333	297	240	220	180	125	227
16	444	284	267	245	352	329	300	255	220	170	119	173
17	422	269	297	249	368	322	269	389	263	171	113	167
18	402	276	279	257	374	295	257	271	231	165	112	169
19	407	296	267	246	400	277	254	246	212	150	120	541
20	404	284	269	245	378	226	254	239	359	154	119	271
21	400	283	264	245	379	190	241	239	270	131	121	223
22	416	290	252	246	378	192	238	254	351	150	185	208
23	431	433	251	242	429	194	213	225	248	139	175	213
24	432	351	256	247	427	190	201	2160	217	127	157	201
25	420	312	233	244	457	202	197	638	205	121	148	191
26	406	320	235	253	469	185	205	285	199	141	144	220
27	406	313	249	235	467	173	208	222	204	136	136	214
28	400	300	249	247	468	165	215	208	190	133	197	210
29	421	264	247	242	---	147	220	182	210	138	394	204
30	445	276	246	217	---	155	205	178	204	136	479	210
31	439	---	255	221	---	146	---	201	---	134	203	---
TOTAL	12403	9613	8110	7682	8843	10002	6376	9786	7475	6093	5059	7839
MEAN	400	320	262	248	316	323	213	316	249	197	163	261
AC-FT	24600	19070	16090	15240	17540	19840	12650	19410	14830	12090	10030	15550
MAX	481	462	297	275	469	618	300	2160	717	530	479	1070
MIN	278	264	233	217	185	146	108	178	142	121	112	139

WTR YR 2002 TOTAL 99281 MEAN 272 MAX 2160 MIN 108 AC-FT 196900

MAX DISCH: 4670 CFS AT 22:15 ON Sep. 12, 2002 GH 7.42 FT. SHIFT 0.03 FT.

MAX GH: 7.42 FT. AT 22:15 ON Sep. 12, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

MIDDLE ST. VRAIN CREEK NR. PEACEFUL VALLEY, CO

**LOCATION.**--Lat 40 07' 55", long 105 31' 00", NE1/4 NW1/4 Sec. 24, T.2 N., R.73 W.

**PERIOD OF RECORD AND DRAINAGE AREA.**--Gage established on May 14, 1998 by State of Colorado, Division of Water Resources personnel. This gage will be a partial year record station.

**GAGE.**--Graphic water-stage recorder and satellite monitoring DCP with shaft encoder in 48" diameter metal pipe shelter and well. DCP is the primary record with chart as a backup.

**REMARKS.**--The primary record is hourly data taken from satellite monitoring with chart back up. It is complete and reliable for October 1-19, May 28- September 30, except for October 19 when the station was closed, and May 28 when the station was opened. Rating No 3 is new this year. The record is good, except for October 19 and May 28 which were estimated. This gage is a partial year record station. Station maintained and record developed by Merlin Friedrichsen.

**RATING TABLE.**--MIDSTECO03 USED FROM 01-OCT-2001 TO 19-OCT-2001

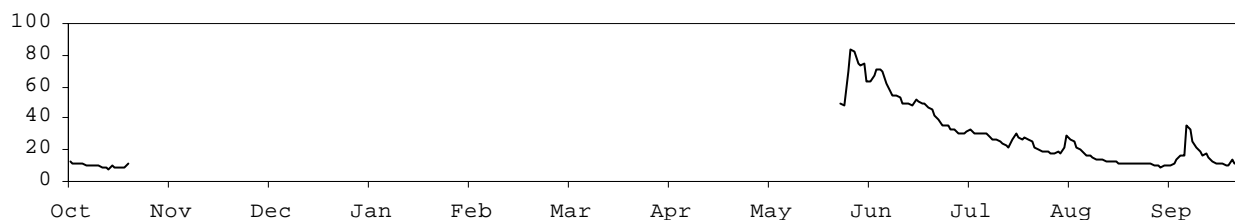
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	13	-	-	-	-	-	-	-	82	33	18	11
2	12	-	-	-	-	-	-	-	75	33	18	9.6
3	12	-	-	-	-	-	-	-	74	31	19	10
4	11	-	-	-	-	-	-	-	75	30	18	9.3
5	11	-	-	-	-	-	-	-	63	30	21	9.8
6	10	-	-	-	-	-	-	-	63	32	29	10
7	9.9	-	-	-	-	-	-	-	67	33	27	10
8	10	-	-	-	-	-	-	-	71	31	25	11
9	10	-	-	-	-	-	-	-	71	30	21	14
10	10	-	-	-	-	-	-	-	69	30	20	17
11	9.2	-	-	-	-	-	-	-	62	30	18	16
12	8.8	-	-	-	-	-	-	-	57	30	17	35
13	8	-	-	-	-	-	-	-	55	28	16	33
14	10	-	-	-	-	-	-	-	55	27	15	25
15	9.4	-	-	-	-	-	-	-	53	26	14	21
16	8.7	-	-	-	-	-	-	-	50	25	14	19
17	8.8	-	-	-	-	-	-	-	49	24	14	17
18	8.7	-	-	-	-	-	-	-	50	23	13	18
19	12	-	-	-	-	-	-	-	48	22	13	15
20	-	-	-	-	-	-	-	-	52	27	13	13
21	-	-	-	-	-	-	-	-	51	31	13	12
22	-	-	-	-	-	-	-	-	49	28	12	11
23	-	-	-	-	-	-	-	-	49	27	12	11
24	-	-	-	-	-	-	-	-	47	28	12	10
25	-	-	-	-	-	-	-	-	45	27	12	10
26	-	-	-	-	-	-	-	-	42	25	12	14
27	-	-	-	-	-	-	-	-	39	22	12	12
28	-	-	-	-	-	-	-	50	36	20	12	12
29	-	-	-	-	-	-	-	48	35	19	11	11
30	-	-	-	-	-	-	-	69	35	19	11	11
31	-	---	-	-	---	-	---	84	---	19	11	---
TOTAL	192.5	-	-	-	-	-	-	251	1669	840	493	437.7
MEAN	6.21	-	-	-	-	-	-	8.1	56	27	16	14.6
AC-FT	382	-	-	-	-	-	-	498	3310	1670	978	868
MAX	13	-	-	-	-	-	-	84	82	33	29	35
MIN	-	-	-	-	-	-	-	-	35	19	11	9.3

WTR YR 2002 TOTAL 3883.2 MEAN 10.6 MAX 84 MIN - AC-FT 7700

MAX DISCH: 105 CFS AT 22:00 ON May. 31, 2002 GH 2.62 FT. SHIFT -0.04 FT.  
MAX GH: 2.62 FT. AT 22:00 ON May. 31, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN  
SOUTH ST. VRAIN CREEK NEAR WARD, CO

**LOCATION.**--Lat 40°05'27", long 105°30'50"

**DRAINAGE AREA AND PERIOD OF RECORD.**--14.4 mi<sup>2</sup>; 1925-27,28-31, 54-73, 1992 to present

**GAGE.**--Graphic water-stage recorder and satellite monitoring DCP (8200) with shaft encoder in 42-inch diameter corrugated metal pipe shelter and well. DCP is primary record with chart as backup.

**REMARKS.**--The primary record is hourly satellite data with chart backup. Record is complete and reliable except for the following period: October 19, 2001 to May 3, 2002 when station was closed for winter. The record is good. This is a partial year record, re-established on May 15, 1992 by Division of Water Resources personnel after the USGS dropped publication. Station maintained and record developed by Merlin Friedrichsen.

**RATING TABLE.**--SSVWARCO10 USED FROM 01-OCT-2001 TO 28-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

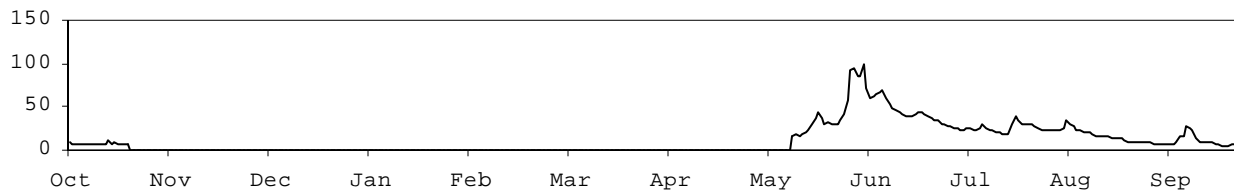
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	8.3	-	-	-	-	-	-	-	95	27	23	8.1
2	7.6	-	-	-	-	-	-	-	85	26	22	7.7
3	7.3	-	-	-	-	-	-	-	85	25	22	7
4	7	-	-	-	-	-	-	-	100	24	22	7
5	7	-	-	-	-	-	-	-	71	24	25	6.4
6	6.3	-	-	-	-	-	-	-	59	25	34	6.4
7	6.3	-	-	-	-	-	-	-	62	26	30	6.8
8	7	-	-	-	-	-	-	-	64	24	28	7.1
9	7.2	-	-	-	-	-	-	-	67	24	24	9.4
10	7.6	-	-	-	-	-	-	-	69	25	22	16
11	7.1	-	-	-	-	-	-	-	60	29	21	16
12	7.4	-	-	-	-	-	-	-	53	26	20	27
13	11	-	-	-	-	-	-	17	48	23	20	25
14	7.1	-	-	-	-	-	-	18	46	23	18	22
15	10	-	-	-	-	-	-	17	45	21	17	14
16	7.2	-	-	-	-	-	-	19	42	20	17	10
17	7	-	-	-	-	-	-	20	40	19	17	9.4
18	7	-	-	-	-	-	-	24	40	19	16	8.8
19	6.7	-	-	-	-	-	-	30	39	18	16	8.7
20	-	-	-	-	-	-	-	37	42	29	15	8.3
21	-	-	-	-	-	-	-	43	44	40	15	6.9
22	-	-	-	-	-	-	-	38	43	34	14	6.4
23	-	-	-	-	-	-	-	31	41	31	14	5.4
24	-	-	-	-	-	-	-	32	39	31	12	5.1
25	-	-	-	-	-	-	-	29	37	29	10	5.1
26	-	-	-	-	-	-	-	30	35	30	9.1	6.7
27	-	-	-	-	-	-	-	31	34	28	8.9	6.8
28	-	-	-	-	-	-	-	35	30	26	8.9	6.5
29	-	-	-	-	-	-	-	42	29	24	8.9	6.5
30	-	-	-	-	-	-	-	58	27	23	9.4	6.7
31	-	---	-	-	---	-	---	92	---	23	8.2	---
TOTAL	142.1	-	-	-	-	-	-	643	1571	796	547.4	293.2
MEAN	4.58	-	-	-	-	-	-	20.7	52	26	17.7	9.8
AC-FT	282	-	-	-	-	-	-	1280	3120	1580	1090	582
MAX	11	-	-	-	-	-	-	92	100	40	34	27
MIN	-	-	-	-	-	-	-	-	27	18	8.2	5.1

WTR YR 2002 TOTAL 3992.7 MEAN 10.9 MAX 100 MIN - AC-FT 7920

MAX DISCH: 107 CFS AT 04:00 ON Jun. 1, 2002 GH 2.72 FT. SHIFT 0.01 FT.

MAX GH: 2.72 FT. AT 04:00 ON Jun. 1, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





## PLATTE RIVER BASIN

## LEFTHAND DIVERSION AT SO. ST. VRAIN CREEK NEAR WARD, CO

**LOCATION.**--Lat 40°05'29", long 105°30'31", the gage is located ½ mile downstream from gage on S. St. Vrain Creek off Highway 72.

**PERIOD OF RECORD AND DRAINAGE AREA.**--Established station on May 21, 1992 at request of Water Commissioner for administration of water rights in District 5, Div. 1. This station is operated as a partial year record station usually from May to October.

**GAGE.**--A-71 continuous graphic chart recorder in a 42-inch corrugated shelter and concrete well with Data Collection Platform (DCP) as primary record. Primary reference is tape down from RP.

**REMARKS.**--Primary record is hourly satellite data. Daily mean chart data was used July 15-19, 2002 when the shaft encoder was off. The record is complete and reliable except for the following periods: October 19, 2001 thru May 13, 2002 when station was closed for the season. The Record is good during the period of record, except for October 19 and May 13 which were estimated. This is a partial year record station. Diversions continue through the winter when the station is closed for winter conditions. Station maintained and record developed by Merlin Friedrichsen.

**RATING TABLE.**--LEFTHDCO02 USED FROM 01-OCT-2001 TO 28-OCT-2002

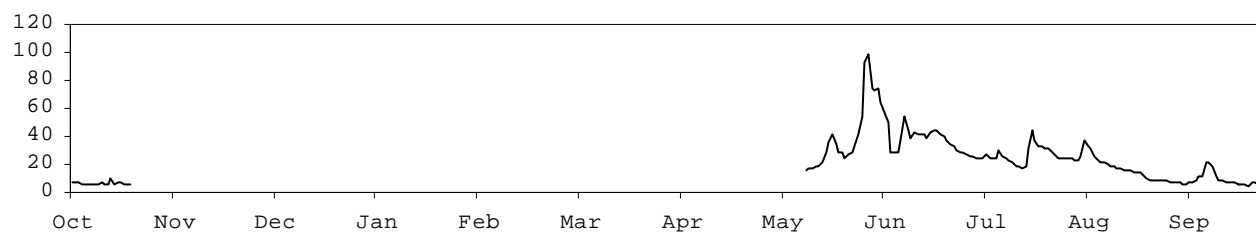
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	7.1								99	27	24	7.8
2	7.1								74	26	24	7.8
3	6.6								73	26	23	6.9
4	6.3								75	25	23	6.7
5	6.2								65	24	26	6.2
6	6.1								57	25	37	6.4
7	6								50	27	33	6.5
8	6.4								28	25	31	6.8
9	6.3								29	25	26	8.3
10	6.8								29	25	23	12
11	6.3								37	30	22	12
12	6.4								54	26	21	22
13	9.5							16	45	24	20	21
14	6.2							17	39	23	19	18
15	7.5							17	43	21	18	12
16	6.6							18	42	19	17	8.8
17	6.2							19	42	19	17	8
18	6.3							22	41	17	16	7.7
19	6							29	39	18	16	7.5
20								36	43	31	16	7.3
21								42	45	44	15	6.5
22								35	45	37	15	5.8
23								28	42	33	14	5.4
24								29	40	33	12	5.2
25								25	37	31	9.6	5
26								27	35	32	8.9	6.5
27								29	33	29	8.5	6.6
28								33	30	27	8.5	6.2
29								42	29	25	8.4	6.2
30								55	28	25	8.9	6.3
31								93	---	25	7.9	---
TOTAL	125.9	-	-	-	-	-	-	612	1368	824	568.7	259.4
MEAN	4.06	-	-	-	-	-	-	19.7	46	27	18.3	8.7
AC-FT	250	-	-	-	-	-	-	1210	2710	1630	1130	515
MAX	9.5	-	-	-	-	-	-	93	99	44	37	22
MIN	-	-	-	-	-	-	-	-	28	17	7.9	5

WTR YR 2002 TOTAL 3758 MEAN 10.3 MAX 99 MIN - AC-FT 7450

MAX DISCH: 105 CFS AT 02:00 ON Jun. 1, 2002 GH 2.08 FT. SHIFT -0.02 FT.  
MAX GH: 2.08 FT. AT 02:00 ON Jun. 1, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06724000 ST. VRAIN CREEK AT LYONS, CO

**LOCATION.**--Lat 40°13'05", long 105°15'34", in NW¼NW¼ sec. 20, T.3 N., R.70 W., Boulder County, Hydrologic Unit 10190005, on left bank 75 ft southwest of U.S. Highway 36 (State Highways 7 and 66) at southeast edge of Lyons, 400 ft upstream from St. Vrain Supply Canal, and 0.4 mi downstream from confluence of North and South St. Vrain Creeks.

**DRAINAGE AREA AND PERIOD OF RECORD.**--212 mi<sup>2</sup>. Aug. 1887 to Sep. 1891, June 1895 to current year. Monthly only data for some periods. Water quality data available from Oct. 1977 to Feb. 1981.

**GAGE.**--Water-stage recorder with satellite telemetry in timber shelter. The DCP is the primary record with chart recorder as backup. Supplemental outside staff gage.

**REMARKS.**--Primary record is hourly data taken from satellite monitoring with chart back up. The record is complete and reliable. December 11, 2001 and January 24, 2002 appear to have ice effect on the chart but in reality do not. The record is good. Station maintained and record developed by Merlin Friedrichsen.

**RATING TABLE.**--SVCLYOCO22 USED FROM 01-OCT-2001 TO 22-OCT-2002

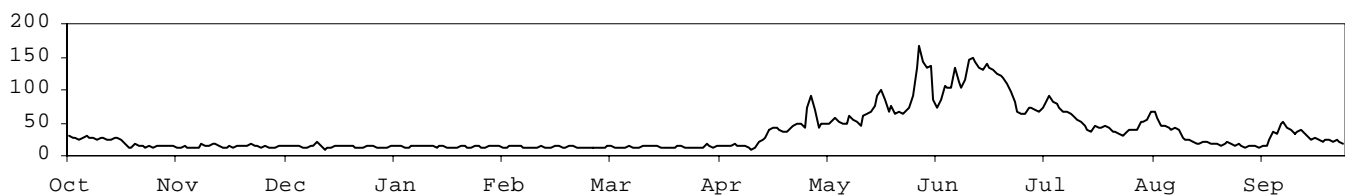
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	29	12	16	14	14	11	17	92	168	63	39	15
2	28	11	16	14	13	11	16	71	142	73	39	13
3	26	15	15	14	13	12	13	41	132	74	52	14
4	25	13	15	14	14	15	15	47	135	70	52	16
5	28	13	14	13	14	14	14	48	84	67	56	14
6	29	12	16	13	14	13	14	50	73	74	67	13
7	26	11	13	14	14	13	14	54	86	80	67	14
8	26	17	12	14	13	12	15	57	107	92	58	16
9	24	16	15	14	13	13	17	51	103	83	44	24
10	26	14	16	15	12	14	14	48	103	78	46	37
11	26	17	22	14	13	13	15	49	133	74	41	33
12	24	17	15	14	13	13	14	62	112	66	38	47
13	24	14	9.8	14	14	13	13	55	104	67	41	53
14	26	13	11	12	13	15	10	53	116	65	38	42
15	28	12	13	14	13	14	13	46	146	60	28	39
16	25	14	16	15	13	14	21	61	148	54	23	33
17	18	12	16	13	14	14	23	65	141	51	25	36
18	12	14	15	12	14	14	26	68	132	45	22	40
19	13	16	14	11	13	12	40	77	131	38	18	34
20	17	14	15	13	13	11	42	92	138	35	17	27
21	16	15	14	15	14	12	41	101	134	45	21	25
22	14	17	11	14	14	12	38	86	130	43	21	26
23	13	16	12	13	13	12	36	66	124	43	17	23
24	14	15	13	13	13	14	36	75	120	44	19	20
25	12	13	15	15	12	16	41	63	117	41	18	23
26	16	16	16	14	12	12	46	67	109	37	16	23
27	16	13	14	13	13	12	50	63	96	35	17	22
28	16	11	13	13	13	13	48	68	83	33	21	23
29	16	13	13	14	---	12	41	73	66	31	17	21
30	15	15	12	15	---	12	74	92	65	36	15	18
31	14	---	11	14	---	13	---	132	---	39	17	---
TOTAL	642	421	438.8	424	371	401	817	2073	3478	1736	1010	784
MEAN	21	14	14.2	14	13	13	27	67	116	56	33	26
AC-FT	1270	835	870	841	736	795	1620	4110	6900	3440	2000	1560
MAX	29	17	22	15	14	16	74	132	168	92	67	53
MIN	12	11	9.8	11	12	11	10	41	65	31	15	13

WTR YR 2002 TOTAL 12595.8 MEAN 34.5 MAX 168 MIN 9.8 AC-FT 24980

MAX DISCH: 190 CFS AT 00:45 ON Jun. 1, 2002 GH 3.8 FT. SHIFT 0 FT.  
MAX GH: 3.8 FT. AT 00:45 ON Jun. 1, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06725500 MIDDLE BOULDER CREEK AT NEDERLAND, CO

**LOCATION.**--Lat 39°57'42", long 105°30'14", in NE¼SE¼ sec. 13, T.1 S., R.73 W., Boulder County, Hydrologic Unit 10190005, on left bank at Nederland just downstream from North Beaver Creek at inlet to Barker Reservoir.

**DRAINAGE AREA.**--36.2 mi<sup>2</sup>.

**GAGE.**--Water-stage recorder and data collection platform in wooden shelter with concrete well at a compound sharp-crested weir. DCP is the primary record with chart recorder as backup. The DCP was upgraded to a High Data Rate (HDR) during the 2002 Water Year.

**REMARKS.**--Record is complete and reliable, except for the following periods, which are considered poor when the stage-discharge relation was affected by ice: December 6, 9-10, 14-15, 17-20, 29-30, 2001; January: 17, 19-21, 2002; February: 1-7, 9-11, 26-27, 2002; March: 1-3, 15-22, 24-26, 2002. The record is fair, except for the days listed above, which were estimated. Station maintained by Public Service Co and record developed by M.L. Cunning.

**RATING TABLE.**--BOCMIDCO07 USED FROM 01-OCT-2001 TO 30-SEP-2002

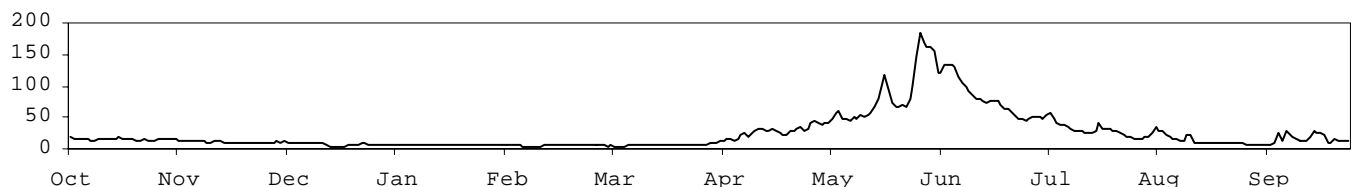
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	20	14	12	7.2	6.7	4.9	8.2	45	167	47	16	7.4
2	17	13	11	7.3	6.7	4.9	8.5	40	161	52	16	6.8
3	16	13	9.9	7.2	6.5	4.7	10	37	162	51	18	6.6
4	15	13	9.2	7.1	6.1	4.9	12	40	156	50	20	6.3
5	15	13	9.3	7	6.1	4.6	13	42	122	48	24	5.9
6	15	13	10	7.5	5.3	4.5	15	48	122	54	34	5.8
7	14	13	9.1	7.4	3.7	4.6	15	58	132	56	29	5.8
8	14	14	9.8	7.2	4.3	4.5	14	61	133	47	27	6.1
9	15	9.1	9.1	7.2	3.5	4.9	17	49	133	40	22	11
10	16	11	8.9	7.1	3.5	4.9	22	48	129	39	18	24
11	17	13	8.6	7.2	3.5	4.9	24	46	115	37	16	14
12	15	14	8.6	7	4.5	5	20	51	105	34	15	30
13	15	12	5.1	6.7	5.2	5.7	25	49	97	31	13	25
14	17	11	2.7	7	5.3	6.3	30	53	92	30	13	19
15	18	11	2.3	7.4	5	5.5	31	51	86	28	23	16
16	16	11	1.9	7.3	5.1	5.5	31	54	79	28	21	14
17	16	11	2.5	6.9	5.4	5.3	27	56	78	26	11	13
18	17	11	3.9	6.7	5.2	5.1	30	66	77	25	10	14
19	15	9.8	5.9	6.5	5	5.1	31	79	73	24	9.3	20
20	14	9.3	7.5	6.3	5.1	5.3	28	104	76	30	9.1	27
21	14	10	7.7	6.1	5	4.9	24	116	76	40	9.3	26
22	15	10	7.5	6	5.1	5.7	22	95	76	31	9.8	25
23	14	10	8.3	6.2	5.2	5.7	23	73	69	31	9.5	21
24	12	8.8	8	6.9	5.3	5.1	27	68	65	33	9.1	10
25	14	9.5	6.9	6.1	5.5	5.1	30	68	62	28	8.6	9.3
26	15	8.9	6.7	6.2	5.5	4.9	31	69	58	28	8.1	15
27	15	11	6.7	6.3	5.3	5.5	35	67	53	24	8.7	14
28	15	11	6.7	6.3	5.4	6.1	30	78	49	22	9.1	13
29	16	12	7.3	6.1	---	6.4	31	100	48	19	9	12
30	15	10	7.3	5.9	---	6.7	40	145	45	18	9	12
31	15	---	6.8	6.7	---	7	---	183	---	17	8	---
TOTAL	477	340.4	227.2	210	144	164.2	704.7	2139	2896	1068	462.6	435
MEAN	15	11.3	7.3	6.8	5.1	5.3	23.5	69	97	35	14.9	14.5
AC-FT	946	675	451	417	286	326	1400	4240	5740	2120	918	863
MAX	20	14	12	7.5	6.7	7	40	183	167	56	34	30
MIN	12	8.8	1.9	5.9	3.5	4.5	8.2	37	45	17	8	5.8

WTR YR 2002 TOTAL 9268.1 MEAN 25.4 MAX 183 MIN 1.9 AC-FT 18380

MAX DISCH: 222 CFS AT 20:15 ON May. 30, 2002 GH 2.23 FT. SHIFT 0 FT.  
MAX GH: 2.23 FT. AT 20:15 ON May. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06727000 BOULDER CREEK NEAR ORODELL, CO

**LOCATION.**--Lat 40°00'23", long 105°19'49", in NE¼SW¼ sec. 34, T.1 N., R.71 W., Boulder County, Hydrologic Unit 10190005, on left bank along State Highway 119, 0.7 mi southwest of old Orodell, 1.1 mi upstream from Fourmile Creek, and 2.9 mi southwest of courthouse in Boulder.

**DRAINAGE AREA.**--102 mi<sup>2</sup>.

**GAGE.**--Stevens A35 graphic water-stage recorder and Sutron 8210 DCP with shaft encoder in a 6 foot by 6 foot exposed aggregate concrete shelter with a 54-inch corrugated metal well. The data collection platform (DCP) provides the primary record. A High Data Rate (HDR) DCP was installed during this water year. The station now includes a pressure transducer installed by Urban Drainage and Flood Control District.

**REMARKS.**--Record is complete and reliable, except for the winter record where the station was off. Estimates for these days were taken from the daily average releases from Barker Reservoir provided from the City of Boulder caretaker of Barker Reservoir. These days are included in the following list: December 11, 2001 - March 31, 2002. Record is good, except for the period December 10, 2001 through April 1, 2002 in which the station was off and flows were estimated. Station maintained and record developed by M.L. Cuning.

**RATING TABLE.**--BOCOROCO13 USED FROM 01-OCT-2001 TO 01-OCT-2002

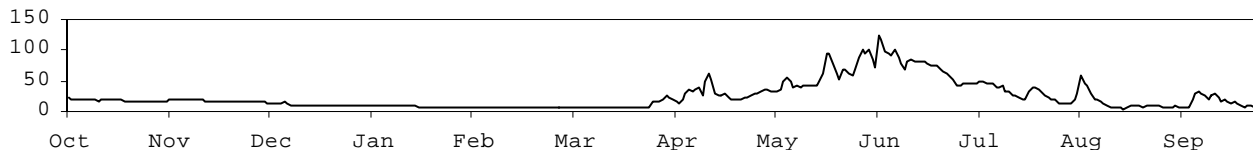
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	22	18	14	9	5	5	21	32	100	42	12	6.9
2	21	18	14	9	5	5	27	37	95	45	14	5.5
3	21	19	14	9	5	5	24	36	101	46	13	5.3
4	21	19	14	9	5	5	21	33	86	46	12	6.6
5	20	19	14	9	5	5	16	32	71	46	18	8.7
6	21	18	16	9	5	5	14	32	124	45	30	7.8
7	19	19	14	9	5	5	19	36	117	49	58	7.6
8	18	21	10	9	5	5	29	49	97	48	47	7.3
9	18	18	11	9	5	5	36	55	94	47	42	7.8
10	17	18	11	9	5	5	31	49	91	46	29	21
11	18	19	9	9	5	5	35	39	100	46	19	29
12	18	17	9	9	5	5	38	41	89	40	18	32
13	18	17	9	9	5	5	27	38	78	39	15	29
14	18	15	9	9	5	5	49	43	69	41	13	27
15	19	15	9	9	5	5	61	42	83	34	9	21
16	19	15	9	7	5	5	52	44	84	31	7.9	26
17	18	15	9	5	5	5	30	43	82	25	5.7	28
18	16	16	9	5	5	5	25	43	83	25	5.3	24
19	16	16	9	5	5	5	25	50	83	24	4.9	17
20	16	16	9	5	5	5	28	63	81	19	4.4	18
21	16	16	9	5	5	5	24	93	77	21	5.9	16
22	16	17	9	5	5	5	20	94	76	33	10	14
23	16	16	9	5	5	5	20	77	75	40	8.8	15
24	17	15	9	5	5	5	20	62	74	39	8.5	14
25	16	15	9	5	5	5	20	53	69	37	8.2	8.3
26	15	15	9	5	5	5	22	69	65	33	7.8	5.9
27	16	15	9	5	5	5	24	68	61	27	9.5	8.4
28	15	15	9	5	5	5	27	62	56	24	8.5	11
29	15	15	9	5	---	15	29	59	53	20	11	6.6
30	15	15	9	5	---	15	30	68	44	18	8.5	6.4
31	17	---	9	5	---	15	---	89	---	14	8.9	---
TOTAL	548	502	321	217	140	185	844	1631	2458	1090	472.8	441.1
MEAN	18	17	10.4	7	5	6	28	53	82	35	15.3	14.7
AC-FT	1090	996	637	430	278	367	1670	3240	4880	2160	938	875
MAX	22	21	16	9	5	15	61	94	124	49	58	32
MIN	15	15	9	5	5	5	14	32	44	14	4.4	5.3

WTR YR 2002 TOTAL 8849.9 MEAN 24.2 MAX 124 MIN 4.4 AC-FT 17550

MAX DISCH: 157 CFS AT 21:00 ON Jun. 3, 2002 GH 2.67 FT. SHIFT 0.02 FT.  
MAX GH: 2.67 FT. AT 21:00 ON Jun. 3, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



06729450 SOUTH BOULDER CREEK BELOW GROSS RESERVOIR NEAR COAL CREEK, CO

**LOCATION.**--Lat 39°56'19", long 105°20'55", SW¼ sec. 21, T.1 S., R.71 W., Boulder County. Measures releases from Gross Reservoir; which is filled by South Boulder Creek and transmountain diversions from Moffat Tunnel.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water stage recorder and satellite monitoring DCP with shaft encoder in timber shelter and concrete well at 25' Parshall flume with supplemental outside staff.. The primary reference is an electric tape gage. The DCP, updated to high data rate in 2002, is the primary record with chart backup. Station is owned and maintained by Denver Water Board personnel.

**REMARKS.**--The record is complete and reliable. The only noteworthy correction occurred on May 6, 2002, -0.03 feet for flume cleaning. This was applied back to February 6, 2002 the last time the flume was known to have been cleaned. The record is good. Record developed by M. L. Cunning.

**RATING TABLE.**--STD25FTPF USED FROM 01-OCT-2001 TO 30-SEP-2002

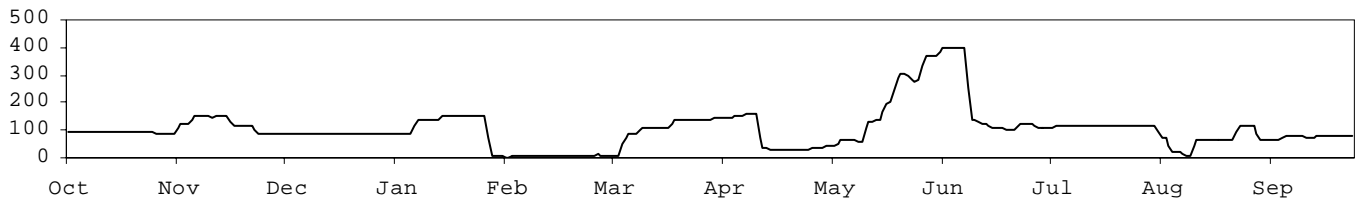
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	92	112	85	84	5.7	9.4	141	36	368	122	113	114
2	92	126	86	84	3	9	145	36	372	114	113	115
3	92	125	86	84	2.8	8.9	146	39	372	112	113	86
4	92	125	86	84	5	8.8	146	42	373	112	113	65
5	92	139	85	84	6.6	9	148	42	384	112	113	65
6	92	149	84	84	6.6	9	148	42	396	112	91	65
7	92	149	84	119	6.6	50	148	50	401	112	74	65
8	92	149	84	141	6.6	76	149	63	402	115	74	65
9	92	149	84	141	6.7	86	149	66	401	117	45	65
10	92	149	84	141	6.7	86	152	66	401	117	24	74
11	92	148	84	141	5.2	85	156	66	400	117	24	79
12	92	149	85	141	4.1	99	157	66	400	119	20	79
13	92	149	86	141	4.1	110	157	60	255	117	13	79
14	92	149	86	141	4.1	110	157	56	140	114	9.9	79
15	92	149	86	150	4.1	111	76	108	138	115	10	79
16	92	128	86	154	4.1	110	33	132	130	116	41	79
17	92	115	86	154	4.1	110	33	132	125	116	64	75
18	92	115	86	155	4.1	110	32	136	122	116	64	73
19	92	115	86	155	4.1	110	30	139	113	117	64	73
20	92	115	86	155	4.1	110	28	169	110	116	64	77
21	92	115	85	155	4.1	126	27	196	110	117	63	79
22	92	115	84	155	4.1	137	27	204	112	117	64	79
23	92	100	84	155	4.1	137	27	250	112	117	64	79
24	92	90	84	154	4.1	137	27	293	105	115	64	79
25	91	90	84	153	6.8	137	27	301	101	113	63	79
26	90	90	84	153	8.5	137	27	301	101	113	66	79
27	90	90	84	153	8.4	136	27	300	114	113	68	79
28	90	90	84	70	17	136	27	284	123	113	97	79
29	90	87	84	10	---	139	27	273	123	113	115	79
30	90	85	84	9	---	139	33	283	122	113	114	79
31	90	---	84	9	---	139	---	332	---	113	113	---
TOTAL	2839	3656	2630	3709	155.5	2917.1	2607	4563	6926	3565	2137.9	2341
MEAN	92	122	85	120	5.6	94.1	87	147	231	115	69	78
AC-FT	5630	7250	5220	7360	308	5790	5170	9050	13740	7070	4240	4640
MAX	92	149	86	155	17	139	157	332	402	122	115	115
MIN	90	85	84	9	2.8	8.8	27	36	101	112	9.9	65

WTR YR 2002 TOTAL 38046.5 MEAN 104 MAX 402 MIN 2.8 AC-FT 75470

MAX DISCH: 405 CFS AT 20:45 ON Jun. 7, 2002 GH 2.47 FT. SHIFT 0 FT.  
MAX GH: 2.47 FT. AT 20:45 ON Jun. 7, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

SOUTH BOULDER CREEK DIVERSION NEAR ELDORADO SPRINGS, CO

**LOCATION.**--Lat 39°56'00", long 105°18'10", SW¼ sec. 26, T.1 S., R.71 W., Boulder County. Diverts Denver Water Board rights released from Gross Reservoir to South Boulder Creek.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder at 12' Parshall flume in a timber shelter and concrete well with supplemental outside staff gage. Satellite monitoring installed Apr. 24, 1998 and DCP data is primary record with chart as back up. Station is owned and maintained by Denver Water Board personnel.

**REMARKS.**--DCP data is primary record with chart as backup. DCP record is complete and reliable. The record is good. Record developed by M.L.Cunning.

**RATING TABLE.**--BOSDELCO02 USED FROM 01-OCT-2001 TO 11-OCT-2002

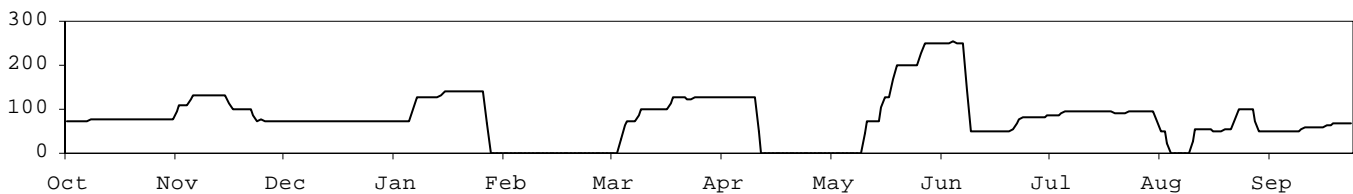
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	74	96	75	72	0	0	126	0	251	81	96	99
2	75	110	75	72	0	0	127	0	251	80	96	99
3	75	110	75	72	0	0	126	0	251	80	97	74
4	75	110	75	72	0	0	126	0	251	81	97	51
5	75	123	75	72	0	0	126	0	251	84	97	50
6	75	134	75	72	0	0	127	0	251	86	73	51
7	75	134	75	102	0	31	127	0	250	86	50	51
8	77	134	75	126	0	63	126	0	252	86	49	51
9	78	134	75	126	0	75	127	0	253	86	22	51
10	79	134	75	126	0	75	127	0	252	91	0	51
11	79	134	75	126	0	75	127	0	251	95	0	52
12	78	134	75	127	0	88	126	0	251	95	0	52
13	78	134	75	127	0	100	126	0	145	95	0	52
14	78	134	75	126	0	100	126	0	50	94	0	52
15	78	134	75	134	0	100	49	47	49	94	0	52
16	77	115	75	141	0	100	0	75	50	94	27	56
17	78	100	75	142	0	100	0	75	49	94	53	58
18	78	100	75	142	0	100	0	75	50	94	53	59
19	78	100	75	142	0	100	0	75	50	94	53	59
20	78	100	75	142	0	100	0	103	50	94	53	59
21	78	100	75	142	0	114	0	127	50	94	53	59
22	78	100	75	142	0	126	0	127	50	94	51	59
23	78	86	75	142	0	126	0	167	50	94	50	62
24	78	75	75	142	0	126	0	200	50	94	52	65
25	78	76	75	142	0	126	0	201	50	93	53	66
26	78	75	74	142	0	125	0	201	53	91	53	67
27	78	75	75	142	0	125	0	201	67	92	53	67
28	78	75	74	67	0	126	0	199	79	93	79	67
29	78	75	73	0	---	126	0	199	81	95	99	67
30	78	75	72	0	---	126	0	199	81	95	99	66
31	78	---	72	0	---	126	---	227	---	95	99	---
TOTAL	2396	3216	2315	3322	0	2579	1819	2498	4119	2814	1657	1824
MEAN	77	107	75	107	0	83.2	60.6	80.6	137	91	53.5	61
AC-FT	4750	6380	4590	6590	0	5120	3610	4950	8170	5580	3290	3620
MAX	79	134	75	142	0	126	127	227	253	95	99	99
MIN	74	75	72	0	0	0	0	0	49	80	0	50

WTR YR 2002 TOTAL 28559 MEAN 78.2 MAX 253 MIN 0 AC-FT 56650

MAX DISCH: 257 CFS AT 13:00 ON Jun. 8, 2002 GH 2.9 FT. SHIFT 0 FT.  
MAX GH: 2.9 FT. AT 13:00 ON Jun. 8, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06729500 SOUTH BOULDER CREEK NEAR ELDORADO SPRINGS, CO

**LOCATION.**--Lat 39°55'52", long 105°17'43", in SE¼ sec. 26, T.1 S., R.71 W., Boulder County, Hydrologic Unit 10190005, on left bank 0.2 mi downstream from South Draw, 1.0 mi west of Eldorado Springs, 1.8 mi downstream from South Boulder diversion canal, 5.0 mi south of Boulder, and 6.7 mi downstream from Gross Reservoir.

**DRAINAGE AREA.**--109 mi².

**GAGE.**--Water-stage recorder with satellite telemetry and shaft encoder in metal box shelter with supplemental outside chain gage. DCP is the primary record with chart recorder as backup.

**REMARKS.**--The record is good, except for the following days, which were estimated due to ice in well and on control and are considered poor. December 23, 2001 - March 7, 2002. There was an artificially created rock dam put in place by someone on August 16 between the gage and control, which created a higher pool elevation and gave artificially high Gage Heights. This rock dam was removed on August 22 and a datum correction of -0.17 was applied to this period of record. Station maintained and record developed by M.L.Cunning.

**RATING TABLE.**--BOCELSCO22 USED FROM 01-OCT-2001 TO 24-OCT-2001

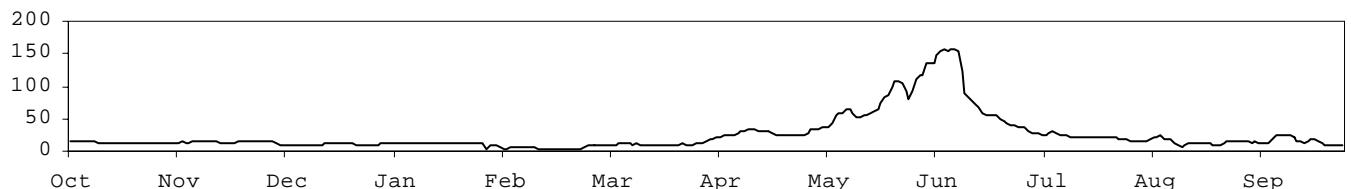
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	16	13	10	13	6	9	15	33	117	36	16	14
2	16	14	9.9	13	3	9	18	33	117	32	15	14
3	16	13	9.6	12	3	9	20	35	134	28	15	14
4	16	13	10	12	5	9	21	37	134	28	15	13
5	16	14	9.4	12	7	9	23	38	134	27	15	14
6	16	15	9.2	12	7	9	25	38	147	25	18	13
7	16	14	9	12	7	11	25	44	155	25	23	13
8	14	15	9	12	7	13	25	55	156	27	23	13
9	12	14	9	13	7	11	25	58	155	31	24	13
10	12	14	9	13	7	11	27	60	157	27	19	20
11	12	14	9	12	5	10	30	64	156	24	19	25
12	12	14	10	12	4	11	31	65	155	25	17	25
13	12	13	11	12	4	10	33	58	122	24	11	25
14	12	13	11	12	4	8.9	33	52	88	22	7.7	25
15	12	13	12	12	4	8.1	35	53	84	21	7.1	25
16	12	13	11	13	4	8.2	31	54	76	22	8	21
17	12	13	12	12	4	8.9	31	54	71	22	11	16
18	12	14	13	13	4	7.7	31	58	68	22	11	14
19	12	14	13	13	4	7.8	30	63	59	22	12	13
20	12	14	12	13	4	7.9	27	65	55	22	12	16
21	12	14	11	13	4	8.5	26	74	55	22	12	19
22	12	14	9	13	4	9.4	26	83	55	22	12	19
23	12	15	9	13	4	10	26	85	54	22	12	16
24	12	14	9	12	4	10	25	99	50	21	9.7	12
25	12	14	9	11	7	11	25	107	45	21	7.7	10
26	12	14	10	11	9	10	25	107	43	22	9	9.7
27	12	15	9	11	8	9.7	25	105	41	22	12	9.5
28	12	15	10	3	9	9.5	25	91	39	20	14	9.5
29	12	13	11	10	---	12	25	79	37	17	16	9.3
30	12	10	12	9	---	13	28	91	37	17	16	9.3
31	12	---	12	9	---	13	---	110	---	16	15	---
TOTAL	402	412	319.1	363	149	304.6	792	2048	2796	734	434.2	469.3
MEAN	13	14	10.3	11.7	5.3	9.8	26	66	93	24	14	15.6
AC-FT	797	817	633	720	296	604	1570	4060	5550	1460	861	931
MAX	16	15	13	13	9	13	35	110	157	36	24	25
MIN	12	10	9	3	3	7.7	15	33	37	16	7.1	9.3

WTR YR 2002 TOTAL 9223.2 MEAN 25.3 MAX 157 MIN 3 AC-FT 18290

MAX DISCH: 163 CFS AT 06:30 ON Jun. 8, 2002 GH 2.46 FT. SHIFT 0.06 FT. DATUM CORRECTION -0.01  
MAX GH: 2.46 FT. AT 06:30 ON Jun. 8, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06730300 COAL CREEK NEAR PLAINVIEW, CO

LOCATION.--Lat 39°52'41", long 105°16'38"

DRAINAGE AREA AND PERIOD OF RECORD.--15.1 mi<sup>2</sup>; 1959 to present.

GAGE.--Graphic water-stage recorder with satellite monitoring in a 42-inch diameter corrugated metal shelter. There is a supplemental outside staff gage.

REMARKS.--Hourly data from the DCP is the primary record, with the recorder as back up. DCP record is complete and reliable except for the following dates when the station was closed. October 18, 2001 through March 7, 2002 (NO DATA). Partial year record is good. Gage was operated as a partial year record this year due to the difficulties recording extremely low flows in the winter. Record was not developed for October 18, 2001 through March 7, 2002. Station maintained and record developed by M. L. Cunning.

RATING TABLE.--COCREPCO08 USED FROM 01-OCT-2001 TO 30-SEP-2002

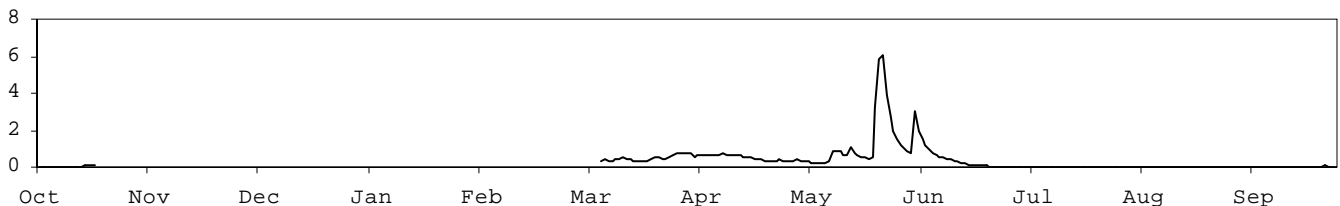
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.03	-	-	-	-	.81	.34	1	.01	0	0	0
2	.03	-	-	-	-	.8	.39	.87	0	0	0	0
3	.02	-	-	-	-	.58	.36	.75	0	0	0	0
4	.03	-	-	-	-	.61	.3	3	0	0	0	0
5	.05	-	-	-	-	.65	.29	2	0	0	0	0
6	.03	-	-	-	-	.68	.25	1.5	0	0	0	0
7	.03	-	-	-	-	.66	.24	1.2	0	0	0	0
8	.02	-	-	-	.34	.66	.24	.97	0	0	0	0
9	.03	-	-	-	.46	.63	.25	.77	0	0	0	0
10	.04	-	-	-	.36	.7	.25	.63	0	0	.01	0
11	.04	-	-	-	.35	.76	.31	.58	.01	0	0	0
12	.05	-	-	-	.4	.69	.83	.51	0	0	.01	0
13	.05	-	-	-	.48	.66	.83	.46	0	0	.01	0
14	.07	-	-	-	.57	.68	.87	.41	0	0	0	0
15	.06	-	-	-	.44	.68	.65	.37	0	0	0	0
16	.07	-	-	-	.39	.61	.66	.32	0	0	0	0
17	.1	-	-	-	.36	.53	1.1	.26	0	0	0	0
18	-	-	-	-	.34	.51	.78	.18	0	0	0	0
19	-	-	-	-	.32	.49	.64	.15	0	0	0	0
20	-	-	-	-	.33	.45	.59	.14	0	0	0	0
21	-	-	-	-	.36	.41	.57	.12	0	0	.01	0
22	-	-	-	-	.41	.39	.46	.11	0	0	.01	0
23	-	-	-	-	.5	.36	.5	.08	0	0	.02	0
24	-	-	-	-	.5	.37	3.2	.06	0	0	.01	0
25	-	-	-	-	.44	.37	5.8	.05	0	0	.02	0
26	-	-	-	-	.44	.36	6.1	.04	0	0	.05	0
27	-	-	-	-	.51	.38	3.9	.03	0	0	.06	0
28	-	-	-	-	.64	.34	2.7	.02	0	0	.05	0
29	-	-	-	---	.72	.32	2	.02	0	0	.05	0
30	-	-	-	---	.73	.31	1.5	.02	0	0	.05	0
31	-	---	-	---	.72	---	1.2	---	0	0	---	0
TOTAL	.75	-	-	-	11.11	16.45	38.1	16.62	.02	0	.36	0
MEAN	.02	-	-	-	.36	.55	1.23	.55	0	0	.01	0
AC-FT	1.5	-	-	-	.22	.33	.76	.33	.04	0	.7	0
MAX	.1	-	-	-	.73	.81	6.1	3	.01	0	.06	0
MIN	-	-	-	-	0	.31	.24	.02	0	0	0	0

WTR YR 2002 TOTAL 83.41 MEAN .23 MAX 6.1 MIN 0 AC-FT 165

MAX DISCH: 8.7 CFS AT 21:30 ON May. 25, 2002 GH 0.77 FT. SHIFT 0.06 FT.  
MAX GH: 0.77 FT. AT 21:30 ON May. 25, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





PLATTE RIVER BASIN

06731000 ST. VRAIN CREEK AT MOUTH, NEAR PLATTEVILLE, CO

**LOCATION.**--Lat 40°15'29", long 104°52'45", in SE¼NW¼ sec. 3, T,3 N., R.67 W., Weld County, Hydrologic Unit 10190005, on right bank 140 ft downstream from bridge on county road, 1.3 mi upstream from mouth, and 4.2 mi northwest of Platteville.

**DRAINAGE AREA AND PERIOD OF RECORD.**--976 mi<sup>2</sup>; 1927 to present.

**GAGE.**--Graphic water-stage recorder and satellite monitoring DCP in a 54 inch metal pipe shelter and well. A Sutron Accububbler was installed May 8, 2002 as a back up. Data collection platform is the primary record with graphic chart as backup. The primary reference for the Accububbler is the outside staff, which was installed in April at a datum 1.0 ft. lower so that lower stages could be recorded.

**REMARKS.**--The primary record is hourly satellite data from the stilling well for October 1 to March 31 (1900). From March 31 (2000) to September 30 the record is hourly satellite data from the bubblers. Daily maximum and minimum stages for the satellite record checked to within ± 0.02 with the chart except during periods in which the well was isolated. The record is Fair from October through March due to infrequent visits and measurements. From April through September the record is also Fair due to Bubbler gage operation in the low flow conditions seen this year. Station maintained and record developed by M. Lee Cunning.

**RATING TABLE.**--SVCPLACO27 USED FROM 01-OCT-2001 TO 18-OCT-2002

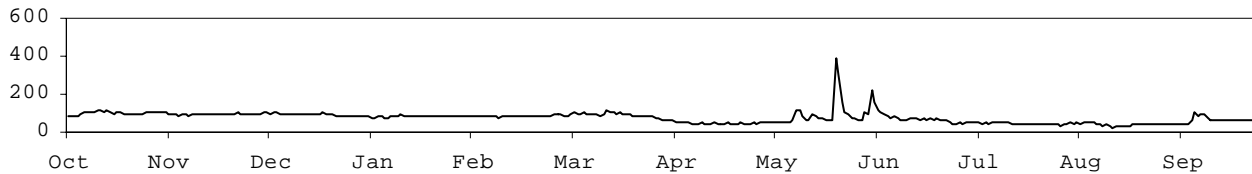
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	87	98	107	79	84	95	65	49	68	49	35	39
2	87	95	98	73	86	84	65	54	103	47	41	40
3	83	93	102	78	83	86	66	50	100	50	42	44
4	83	89	105	86	83	92	61	57	221	53	49	41
5	94	90	100	84	85	104	57	50	154	49	42	45
6	110	90	97	78	82	95	54	55	111	49	57	39
7	108	87	97	77	83	99	53	51	104	48	46	38
8	107	96	94	79	83	103	50	50	90	45	51	38
9	107	98	90	82	81	97	51	56	89	49	52	46
10	111	96	91	85	77	99	47	52	74	43	51	66
11	112	93	94	90	85	99	46	59	80	55	48	104
12	106	93	94	84	81	95	47	116	76	51	39	82
13	112	93	92	82	80	89	50	116	66	53	41	91
14	104	92	99	84	81	99	45	79	65	49	35	90
15	99	92	95	88	82	117	45	66	68	51	37	77
16	103	93	91	88	84	107	46	61	72	52	34	65
17	107	96	98	84	83	101	49	98	77	43	26	67
18	99	94	102	82	81	97	45	87	71	43	33	64
19	94	100	94	84	86	101	45	72	67	42	30	63
20	92	97	92	86	86	100	46	74	74	44	32	63
21	99	98	93	88	85	95	49	65	68	38	30	59
22	97	101	87	82	84	91	46	68	72	40	35	61
23	95	99	85	85	84	86	45	67	67	37	45	61
24	91	98	81	83	86	85	46	385	70	40	43	62
25	107	97	83	88	88	82	49	306	68	39	37	61
26	108	94	79	82	89	88	45	156	58	46	38	66
27	104	93	88	81	90	85	45	110	62	45	40	67
28	104	92	86	80	92	80	46	90	51	45	39	67
29	103	99	85	81	---	85	49	69	41	39	44	67
30	109	106	82	81	---	74	45	69	47	40	45	68
31	101	---	80	82	---	72	---	59	---	42	43	---
TOTAL	3123	2852	2861	2566	2354	2882	1498	2796	2434	1416	1260	1841
MEAN	101	95	92	83	84	93	50	90	81	46	41	61
AC-FT	6190	5660	5670	5090	4670	5720	2970	5550	4830	2810	2500	3650
MAX	112	106	107	90	92	117	66	385	221	55	57	104
MIN	83	87	79	73	77	72	45	49	41	37	26	38

WTR YR 2002 TOTAL 27883 MEAN 76.4 MAX 385 MIN 26 AC-FT 55310

MAX DISCH: 670 CFS AT 16:00 ON May. 24, 2002 GH 3.77 FT. SHIFT 0.01 FT.  
MAX GH: 3.77 FT. AT 16:00 ON May. 24, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

WIND RIVER NEAR ESTES PARK, CO

LOCATION.--Lat 40°19'38", long 105°34'53"

DRAINAGE AREA.--N/A

GAGE.--Graphic water-stage recorder with satellite telemetry in a wooden shelter with a concrete well and a 4' Parshall flume. The electric drop tape is the primary reference. The DCP is the primary record with chart backup. The Parshall flume and the well were replaced in August of 1995 due to extreme settling over the years.

REMARKS.--The record is hourly satellite data with chart back-up. It is complete and reliable except for the following days: November 1, 2001 thru April 16, 2002 when closed for winter. This is a partial year record station operated as part of the Colorado Big Thompson Project. The record is good, except for November 1 and April 16 which were estimated. Stream flows are affected by diversions above the station amounting to approximately 300 AF per water year. Station maintained and record developed by Merlin Friedrichsen.

RATING TABLE.--WINDESCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

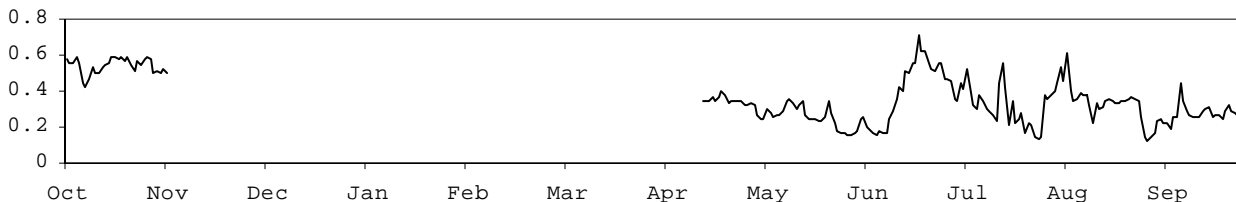
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.58	.5	-	-	-	-	-	.33	.16	.47	.36	.12
2	.56	-	-	-	-	-	-	.32	.17	.46	.38	.15
3	.56	-	-	-	-	-	-	.27	.18	.36	.4	.17
4	.59	-	-	-	-	-	-	.24	.25	.35	.44	.23
5	.55	-	-	-	-	-	-	.25	.26	.44	.53	.25
6	.45	-	-	-	-	-	-	.3	.2	.41	.46	.22
7	.42	-	-	-	-	-	-	.28	.18	.52	.61	.22
8	.47	-	-	-	-	-	-	.26	.17	.39	.4	.19
9	.53	-	-	-	-	-	-	.27	.16	.32	.35	.26
10	.5	-	-	-	-	-	-	.27	.18	.3	.36	.26
11	.5	-	-	-	-	-	-	.29	.17	.38	.39	.45
12	.53	-	-	-	-	-	-	.34	.17	.35	.38	.34
13	.54	-	-	-	-	-	-	.36	.25	.3	.38	.29
14	.56	-	-	-	-	-	-	.33	.29	.29	.32	.27
15	.59	-	-	-	-	-	-	.3	.36	.27	.22	.26
16	.59	-	-	-	-	-	.35	.32	.42	.23	.33	.26
17	.58	-	-	-	-	-	.35	.34	.4	.44	.3	.26
18	.59	-	-	-	-	-	.35	.27	.51	.56	.31	.29
19	.57	-	-	-	-	-	.37	.25	.5	.42	.35	.3
20	.59	-	-	-	-	-	.34	.25	.56	.21	.36	.31
21	.54	-	-	-	-	-	.37	.24	.56	.35	.34	.26
22	.51	-	-	-	-	-	.4	.23	.71	.22	.33	.27
23	.57	-	-	-	-	-	.38	.23	.62	.24	.33	.27
24	.54	-	-	-	-	-	.33	.26	.62	.28	.34	.25
25	.58	-	-	-	-	-	.34	.34	.55	.17	.35	.29
26	.59	-	-	-	-	-	.34	.28	.52	.22	.36	.32
27	.58	-	-	-	-	-	.34	.22	.51	.21	.37	.29
28	.5	-	-	-	-	-	.34	.18	.56	.15	.36	.28
29	.51	-	-	-	---	-	.32	.17	.55	.13	.34	.26
30	.5	-	-	-	---	-	.32	.17	.47	.14	.26	.29
31	.52	---	-	-	---	-	---	.16	---	.38	.15	---
TOTAL	16.79	.5	-	-	-	-	5.24	8.32	11.21	9.96	11.16	7.88
MEAN	.54	.02	-	-	-	-	.17	.27	.37	.32	.36	.26
AC-FT	.33	.1	-	-	-	-	.10	.17	.22	.20	.22	.16
MAX	.59	.5	-	-	-	-	.4	.36	.71	.56	.61	.45
MIN	.42	-	-	-	-	-	-	.16	.16	.13	.15	.12

WTR YR 2002 TOTAL 71.06 MEAN .19 MAX .71 MIN - AC-FT 141

MAX DISCH: 3.92 CFS AT 10:30 ON JUL. 3, 2002 GH 0.41 FT. SHIFT 0.00 FT.  
MAX GH: 0.41 FT. AT 10:30 ON JUL. 3, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

WIND RIVER BY-PASS NEAR ESTES PARK, CO.

LOCATION.--Lat 40°19'38", long 105°34'53"

DRAINAGE AREA.--N/A

GAGE.--Satellite Monitoring DCP in a metal shelter with a steel well and drop tape with a one foot cipoletti flume. A Data Collection Platform was the primary record. There is no graphic chart as backup. The DCP was installed in May, 2001.

REMARKS.--For October 1-November 1, 2001 and April 16 to September 30,2002 record was taken from mean daily chart gage heights of Wind River. The record is good. Stream flows are affected by diversions to Rams Horn Tunnel during years of sufficient flows for power generation for the USBR. WINDESCO data was used this water year for WINBYPCO since no diversions were made from Wind River because the flows were so low. WINBYPCO gage-heights were not collected. Station maintained and record developed by Merlin Friedrichsen

RATING TABLE.--

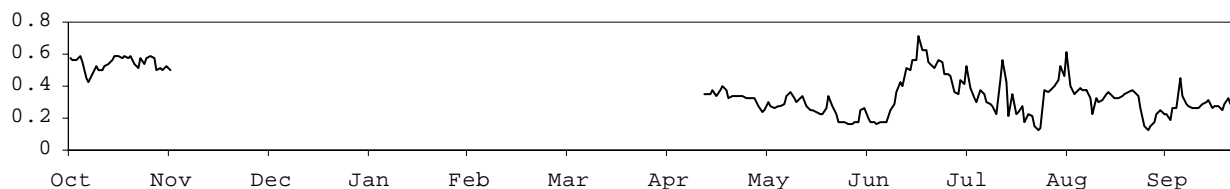
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.58	.5	-	-	-	-	-	.33	.16	.47	.36	.12
2	.56	-	-	-	-	-	-	.32	.17	.46	.38	.15
3	.56	-	-	-	-	-	-	.27	.18	.36	.4	.17
4	.59	-	-	-	-	-	-	.24	.25	.35	.44	.23
5	.55	-	-	-	-	-	-	.25	.26	.44	.53	.25
6	.45	-	-	-	-	-	-	.3	.2	.41	.46	.22
7	.42	-	-	-	-	-	-	.28	.18	.52	.61	.22
8	.47	-	-	-	-	-	-	.26	.17	.39	.4	.19
9	.53	-	-	-	-	-	-	.27	.16	.32	.35	.26
10	.5	-	-	-	-	-	-	.27	.18	.3	.36	.26
11	.5	-	-	-	-	-	-	.29	.17	.38	.39	.45
12	.53	-	-	-	-	-	-	.34	.17	.35	.38	.34
13	.54	-	-	-	-	-	-	.36	.25	.3	.38	.29
14	.56	-	-	-	-	-	-	.33	.29	.29	.32	.27
15	.59	-	-	-	-	-	-	.3	.36	.27	.22	.26
16	.59	-	-	-	-	-	.35	.32	.42	.23	.33	.26
17	.58	-	-	-	-	-	.35	.34	.4	.44	.3	.26
18	.59	-	-	-	-	-	.35	.27	.51	.56	.31	.29
19	.57	-	-	-	-	-	.37	.25	.5	.42	.35	.3
20	.59	-	-	-	-	-	.34	.25	.56	.21	.36	.31
21	.54	-	-	-	-	-	.37	.24	.56	.35	.34	.26
22	.51	-	-	-	-	-	.4	.23	.71	.22	.33	.27
23	.57	-	-	-	-	-	.38	.23	.62	.24	.33	.27
24	.54	-	-	-	-	-	.33	.26	.62	.28	.34	.25
25	.58	-	-	-	-	-	.34	.34	.55	.17	.35	.29
26	.59	-	-	-	-	-	.34	.28	.52	.22	.36	.32
27	.58	-	-	-	-	-	.34	.22	.51	.21	.37	.29
28	.5	-	-	-	-	-	.34	.18	.56	.15	.36	.28
29	.51	-	-	-	---	-	.32	.17	.55	.13	.34	.26
30	.5	-	-	-	---	-	.32	.17	.47	.14	.26	.29
31	.52	---	-	-	---	-	---	.16	---	.38	.15	---
TOTAL	16.79	.5	-	-	-	-	5.24	8.32	11.21	9.96	11.16	7.88
MEAN	.54	.02	-	-	-	-	.17	.27	.37	.32	.36	.26
AC-FT	33	1	-	-	-	-	10	17	22	20	22	16
MAX	.59	.5	-	-	-	-	.4	.36	.71	.56	.61	.45
MIN	.42	-	-	-	-	-	-	.16	.16	.13	.15	.12

WTR YR 2002 TOTAL 71.06 MEAN .19 MAX .71 MIN - AC-FT 141

MAX DISCH 3.92 CFS AT 10:30 ON Jul. 3, 2002 GH n/a SHIFT n/a

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



06733000 BIG THOMPSON RIVER(above Lake Estes) AT ESTES PARK, CO

**LOCATION.**--Lat 40°22'42", long 105°30'48", in NW¼NW¼ sec. 30, T.5 N., R.72 W., Larimer County on right bank in Estes Park, 600 ft downstream from bridge on State Highways 7 and 66, 900 ft downstream from Black Canyon Creek, and 0.3 mi northwest of Estes Power Plant. Station is upstream from Lake Estes.

**DRAINAGE AREA AND PERIOD OF RECORD.**--137 mi<sup>2</sup>. October 1946 to current year.

**GAGE.**--Water-stage recorder with satellite telemetry, at 15' Parshall flume with overflow weirs and supplemental outside gage. DCP is the primary record. Datum of gage is 7,492.5 ft above National Geodetic Vertical Datum of 1929.

**REMARKS.**--Primary record is hourly data taken from satellite monitoring with chart as backup. Record is complete and reliable except for the following periods: November 28-30, 2001--Inlets frozen; November 30, 2001 to April 4, 2002--Station was closed for winter. Record is good, except for November 28--April 4, 2002 which was estimated for winter record. Station maintained and record developed by Merlin Friedrichsen.

**RATING TABLE.**--BTABESCO09 USED FROM 01-OCT-2001 TO 30-NOV-2001

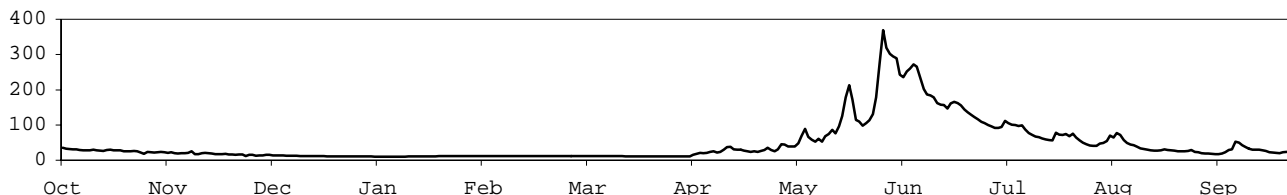
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	35	21	15	10	12	12	11	45	319	100	41	23
2	33	23	14	10	12	12	11	44	302	96	41	20
3	32	20	14	10	12	12	11	39	295	92	47	19
4	31	19	14	10	12	12	11	39	289	92	49	19
5	31	20	14	10	12	12	15	39	243	94	54	18
6	29	20	13	10	12	12	18	48	236	112	70	17
7	28	21	13	10	12	12	21	69	252	105	64	17
8	28	25	13	10	12	12	20	89	260	101	77	19
9	28	17	13	10	12	12	21	66	272	100	72	23
10	30	17	12	10	12	12	24	58	266	97	57	29
11	28	20	12	11	12	12	25	53	234	99	49	31
12	27	21	12	11	12	12	22	61	202	87	44	53
13	26	20	12	11	12	12	24	53	187	77	43	50
14	29	19	12	11	12	12	30	68	184	72	38	43
15	30	17	12	11	12	12	37	74	179	67	34	37
16	28	17	12	11	12	11	38	86	162	65	32	33
17	28	17	12	11	12	11	31	76	158	62	30	30
18	28	18	11	11	12	11	30	96	157	59	28	30
19	25	16	11	11	12	11	30	125	147	57	27	30
20	25	16	11	12	12	11	27	179	161	56	27	28
21	25	15	11	12	12	11	25	213	166	78	28	26
22	26	16	11	12	12	11	24	172	162	73	31	23
23	25	16	11	12	12	11	25	114	156	72	29	22
24	22	12	11	12	12	11	24	110	144	74	28	21
25	18	15	11	12	12	11	26	98	136	68	27	20
26	24	15	11	12	12	11	29	105	129	75	25	23
27	23	13	11	12	12	11	35	113	122	64	25	24
28	22	14	11	12	12	11	29	131	116	56	25	24
29	23	14	11	12	---	11	25	179	109	50	26	23
30	24	15	11	12	---	11	31	276	105	45	29	23
31	23	---	11	12	---	11	---	369	---	42	24	---
TOTAL	834	529	373	343	336	356	730	3287	5850	2387	1221	798
MEAN	27	18	12	11	12	12	24	106	195	77	39	27
AC-FT	1650	1050	740	680	666	706	1450	6520	11600	4730	2420	1580
MAX	35	25	15	12	12	12	38	369	319	112	77	53
MIN	18	12	11	10	12	11	11	39	105	42	24	17

WTR YR 2002 TOTAL 17044 MEAN 46.7 MAX 369 MIN 10 AC-FT 33810

MAX DISCH: 491 CFS AT 01:00 ON May. 31, 2002 GH 3.81 FT. SHIFT 0 FT.  
MAX GH: 3.81 FT. AT 01:00 ON May. 31, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06734500 FISH CREEK NEAR ESTES PARK, CO

LOCATION.--Lat 40°22'06", long 105°29'35", SW¼ sec. 29, T.5 N., R.72 W.

DRAINAGE AREA AND PERIOD OF RECORD.--16.9 mi<sup>2</sup>; 1946 to present.

GAGE.--Graphic water-stage recorder and satellite monitoring in a concrete well and shelter at a 5' Parshall flume. The electric drop tape is the primary reference. There is a supplemental outside staff gage.

REMARKS.--The primary record is hourly data from satellite monitoring with chart back up. The record is complete and reliable except for the following periods: November 1, 2001 to April 4, 2002 when the station was closed for the winter. This is a partial year record station operated as part of the Colorado Big Thompson Project. The record is good, except for November 1 and April 4, which were estimated. Station maintained and record developed by Merlin Friedrichsen.

RATING TABLE.--FISHESCO06 USED FROM 01-OCT-2001 TO 30-SEP-2002

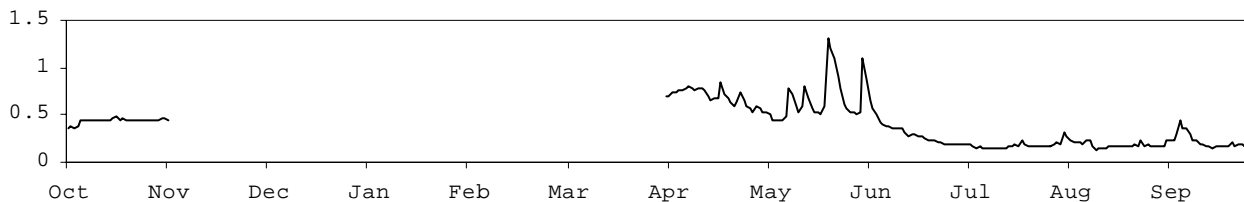
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.36	.44						.53	.52	.19	.17	.17
2	.37							.6	.5	.19	.19	.17
3	.36							.58	.53	.2	.22	.17
4	.37						.7	.52	1.1	.2	.2	.17
5	.44						.7	.52	.89	.19	.32	.17
6	.44						.73	.51	.66	.19	.27	.23
7	.44						.75	.44	.57	.18	.24	.23
8	.44						.76	.44	.5	.17	.22	.23
9	.44						.76	.44	.43	.15	.22	.29
10	.44						.78	.44	.4	.16	.21	.44
11	.44						.81	.48	.39	.15	.2	.36
12	.44						.78	.79	.37	.15	.23	.36
13	.44						.77	.71	.36	.15	.23	.29
14	.44						.78	.6	.35	.15	.17	.23
15	.46						.78	.52	.36	.15	.13	.23
16	.49						.77	.6	.35	.15	.14	.2
17	.45						.69	.8	.32	.15	.14	.19
18	.47						.65	.67	.28	.15	.15	.16
19	.45						.67	.58	.3	.16	.16	.17
20	.44						.67	.52	.29	.16	.17	.15
21	.44						.84	.52	.27	.19	.17	.16
22	.44						.71	.5	.27	.17	.16	.16
23	.44						.67	.59	.25	.24	.17	.17
24	.44						.63	1.3	.23	.19	.17	.17
25	.44						.6	1.2	.23	.17	.17	.17
26	.44						.64	1.1	.23	.17	.17	.21
27	.44						.75	.91	.21	.17	.18	.17
28	.44						.66	.78	.22	.17	.17	.19
29	.44						.59	.61	.2	.16	.23	.2
30	.47						.58	.58	.18	.16	.17	.17
31	.47						---	.53	---	.17	.18	---
TOTAL	13.52	.44					19.22	19.91	11.76	5.3	5.92	6.38
MEAN	.44	.02					.64	.64	.39	.17	.19	.21
AC-FT	27	.9					38	39	23	11	12	13
MAX	.49	.44					.84	1.3	1.1	.24	.32	.44
MIN	.36							.44	.18	.15	.13	.15

WTR YR 2002 TOTAL 82.45 MEAN .23 MAX 1.3 MIN AC-FT 164

MAX DISCH: 1.56 CFS AT 18:00 ON May. 24, 2002 GH 0.2 FT. SHIFT 0 FT.  
MAX GH: 0.2 FT. AT 18:00 ON May. 24, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06735500 BIG THOMPSON RIVER(below Lake Estes) NEAR ESTES PARK, CO

**LOCATION.**--Lat 40°22'35", long 105°29'06", in NE¼NE¼ sec. 29, T.5 N., R.72 W., Larimer County, Hydrologic Unit 10190006, on right bank 100 ft upstream from Dry Gulch, 600 ft downstream from Olympus Dam, and 2.0 mi east of Estes Park.

**DRAINAGE AREA.**--155 mi<sup>2</sup>. Area at site used Jan. 29, 1934, to Mar. 21, 1951, 162 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder and Satellite Monitoring DCP in a concrete shelter and well at a 15-foot Parshall Flume. Sutron 8210 DCP has a speech modem card and telephone access. There is a supplementary outside gage.

**REMARKS.**--The primary record is hourly data taken from satellite monitoring with chart backup. No corrections to tape were required all year, and daily maximum & minimum stages for the satellite record checked to within +- 0.02 with the chart. Record is complete and reliable. The record is good. Station maintained and record developed by Merlin Friedrichsen.

**RATING TABLE.**--BTBLES010 USED FROM 01-OCT-2001 TO 30-SEP-2002

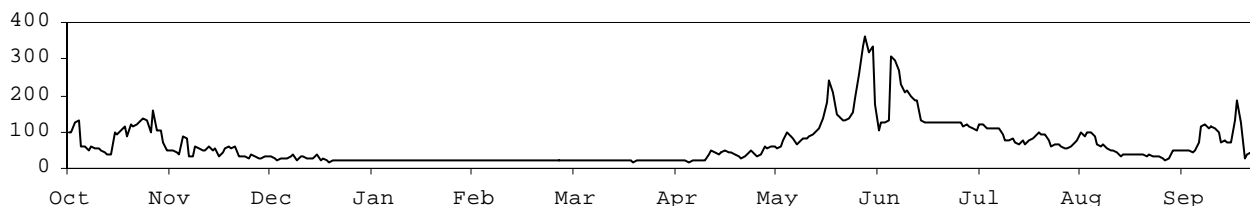
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	97	50	33	22	23	20	21	38	332	126	60	28
2	99	50	35	22	22	21	21	59	362	117	56	22
3	128	46	30	22	22	20	21	54	319	123	53	30
4	134	38	24	21	23	21	21	59	334	114	61	51
5	61	86	30	22	23	21	22	58	174	108	70	50
6	61	80	28	22	22	21	22	57	104	106	79	51
7	50	33	29	21	22	20	22	61	125	121	100	51
8	58	34	35	21	23	21	22	74	125	118	89	50
9	55	59	38	23	23	21	19	100	134	109	99	49
10	54	55	24	23	22	21	20	85	305	109	101	44
11	51	51	31	22	22	21	20	82	295	110	87	47
12	44	52	32	23	22	22	20	67	266	110	68	71
13	39	60	28	21	22	22	20	76	229	109	61	117
14	39	50	26	21	22	22	21	84	208	92	65	120
15	98	55	27	22	22	22	36	81	211	78	54	110
16	92	35	36	22	22	22	51	86	197	76	50	114
17	102	46	21	22	22	22	45	93	188	81	51	110
18	115	57	26	21	22	22	41	104	184	71	44	96
19	90	59	24	23	21	21	46	108	132	68	35	69
20	119	55	14	21	22	21	48	138	127	77	40	77
21	114	62	22	20	21	21	42	180	126	67	36	72
22	121	31	23	21	23	21	45	243	127	79	36	69
23	132	31	22	20	22	19	36	210	126	82	37	131
24	135	33	21	22	22	20	33	150	127	90	36	184
25	131	25	23	22	22	20	28	142	126	97	37	125
26	96	36	23	22	21	21	35	130	126	95	36	30
27	161	31	22	23	20	21	36	134	125	93	35	38
28	106	30	21	22	20	21	50	135	126	76	36	46
29	104	28	22	22	---	21	37	151	127	62	34	41
30	72	33	22	22	---	21	35	190	125	65	33	42
31	52	---	22	23	---	20	---	256	---	64	33	---
TOTAL	2810	1391	814	676	615	650	936	3485	5612	2893	1712	2135
MEAN	91	46	26	22	22	21	31	112	187	93	55	71
AC-FT	5570	2760	1610	1340	1220	1290	1860	6910	11130	5740	3400	4230
MAX	161	86	38	23	23	22	51	256	362	126	101	184
MIN	39	25	14	20	20	19	19	38	104	62	33	22

WTR YR 2002 TOTAL 23729 MEAN 65 MAX 362 MIN 14 AC-FT 47070

MAX DISCH: 372 CFS AT 01:00 ON Jun. 2, 2002 GH 3.2 FT. SHIFT 0 FT.  
MAX GH: 3.2 FT. AT 01:00 ON Jun. 2, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06734900 OLYMPUS TUNNEL (ESTES FOOTHILLS CANAL) AT LAKE ESTES, CO

**LOCATION.**--Lat 40°22'30", long 105°29'13", in SE¼NW¼ sec. 29, T.5 N., R.72 W., Larimer County, Hydrologic Unit 10190006, at tunnel entrance at south end of Olympus Dam on Lake Estes, 1.9 mi east of Estes Park.

**GAGE.**--Graphic water-stage recorder with satellite monitoring DCP with shaft encoder in a concrete shelter with supplemental outside staff gage. The DCP is the primary record.

**REMARKS.**--Primary record is hourly data taken from satellite monitoring with graphic chart as back up. (Hourly chart values were used May 17-20). The record is complete and reliable. The chart scale is 1 inch = 1 ft water, so chart mean GH's can only be read to +-0.03 ft. Also, all gage heights of 0.33 ft. or less are considered to be zero because of well conditions. The record is good. This station is operated in cooperation with the USBR for the Colorado--Big Thompson Project. Station maintained and record developed by Merlin Friedrichsen.

**RATING TABLE.**--OLYTUNCO05 USED FROM 01-OCT-2001 TO 30-SEP-2002

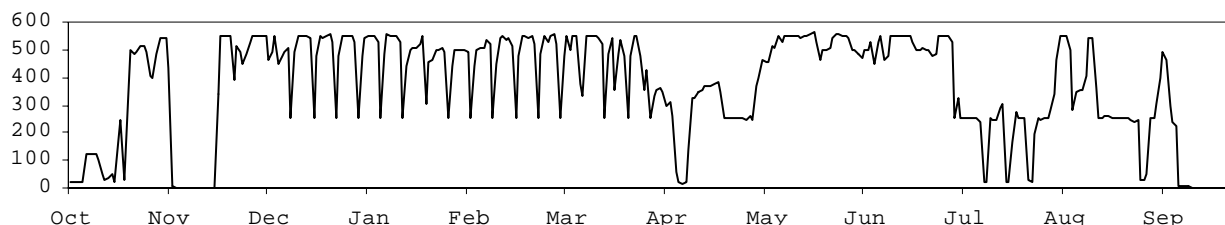
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	23	431	551	545	498	560	332	257	544	549	255	27
2	22	8.6	461	551	490	523	354	249	499	553	253	52
3	21	0	488	550	253	254	363	367	500	530	285	252
4	21	0	548	551	444	478	350	401	485	256	342	250
5	21	0	446	529	502	549	295	466	472	323	465	306
6	122	0	479	255	503	500	309	459	499	255	549	394
7	123	0	491	485	505	551	257	455	499	254	551	493
8	123	0	506	555	533	551	56	514	531	253	550	463
9	125	0	254	550	524	378	19	504	449	255	498	294
10	103	0	493	549	253	335	18	546	530	253	284	235
11	50	0	551	549	449	546	24	525	549	253	347	223
12	31	0	552	530	540	547	140	551	465	236	355	9.6
13	38	0	551	255	547	546	326	548	480	24	355	7.5
14	47	0	552	442	532	546	328	548	551	23	407	7
15	19	0	544	502	544	544	346	548	549	253	541	6.8
16	175	339	256	504	514	524	355	550	549	249	544	2.9
17	247	550	476	503	256	255	370	542	550	249	365	0
18	26	547	550	517	478	481	371	548	550	288	254	0
19	339	549	544	549	547	545	370	550	549	303	255	0
20	502	547	551	302	552	355	374	558	552	25	258	0
21	487	390	554	453	540	481	385	562	526	23	258	0
22	494	515	528	461	549	534	346	527	501	166	254	0
23	513	494	255	502	521	474	253	466	499	275	253	0
24	514	451	479	502	254	253	254	499	504	253	252	0
25	489	485	548	508	484	478	252	500	499	254	251	0
26	402	529	549	494	550	548	255	506	501	250	254	0
27	400	548	551	253	530	548	253	540	477	26	253	0
28	486	551	552	444	549	475	251	560	482	21	249	0
29	545	548	528	501	---	352	253	557	549	193	240	0
30	541	550	254	502	---	429	247	551	549	255	246	0
31	539	---	478	499	---	253	---	547	---	248	26	---
TOTAL	7588	8032.6	15120	14892	13441	14393	8106	15501	15439	7348	10249	3022.8
MEAN	245	268	488	480	480	464	270	500	515	237	331	101
AC-FT	15050	15930	29990	29540	26660	28550	16080	30750	30620	14570	20330	6000
MAX	545	551	554	555	552	560	385	562	552	553	551	493
MIN	19	0	254	253	253	253	18	249	449	21	26	0

WTR YR 2002 TOTAL 133132.4 MEAN 365 MAX 562 MIN 0 AC-FT 264100

MAX DISCH: 579 CFS AT 14:00 ON Mar. 1, 2002 GH 8.02 FT. SHIFT 0 FT.  
MAX GH: 8.02 FT. AT 14:00 ON Mar. 1, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06736000 NORTH FORK BIG THOMPSON RIVER AT DRAKE, CO

**LOCATION.**--Lat 40°20'45", long 105°26'30", NW¼ sec. 3, T.5 N., R.71 W., Larimer County, 400 ft upstream from mouth at Drake, Co. on U. S. Highway 34 to Estes Park, Co.

**DRAINAGE AREA AND PERIOD OF RECORD.**--85.1 mi<sup>2</sup>; 1947 to present.

**GAGE.**--Graphic water-stage recorder and DCP in a 42-inch well. The electric drop tape is the primary reference with a supplemental outside wire weight as backup. An outside wire weight staff was added on April 26, 2002.

**REMARKS.**--The primary record is hourly satellite data with chart backup. The record is complete and reliable except for the following periods: November 14, 2001 through April 10, 2002 when the station was closed for winter. September 18-19, 2002 when the inlets were left closed from a previous flush. Ponds in the channel upstream often ice up and break loose in the fall and cause bumps in the record when there is no ice at the control. The record is good, except for the following days which were estimated and considered poor: November 14, 2001 through April 10, 2002, and September 18-19, 2002. The peak flow is considered fair. Station maintained and record developed by Merlin Friedrichsen.

**RATING TABLE.**--BTNFDRCO10 USED FROM 01-OCT-2001 TO 05-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

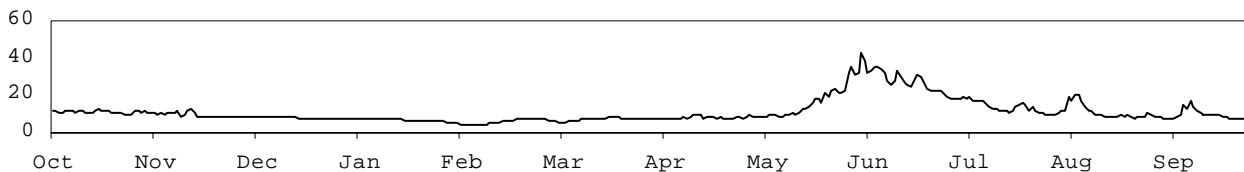
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	12	11	9	7	5	6	8	9.6	35	18	9.5	8.9
2	12	10	9	7	4	6	8	8.8	31	18	9.9	8.5
3	11	11	9	7	4	6	8	8.3	32	18	11	8.1
4	11	9.9	9	7	4	5	8	8.2	43	18	12	8
5	12	11	9	7	4	5	8	8.5	39	19	12	7.5
6	12	11	9	7	4	5	8	8.7	32	18	19	7.6
7	12	11	9	7	4	6	8	9.7	33	19	17	8
8	11	12	9	7	4	6	8	10	35	17	20	8.2
9	12	8.1	9	7	4	6	8	9.3	35	17	20	10
10	12	9.2	9	7	4	6	8	8.7	34	17	17	15
11	11	12	9	7	5	7	8.8	8.6	32	17	14	13
12	11	13	9	7	5	7	8	10	28	15	12	17
13	11	11	9	7	5	7	8.4	9.2	26	14	12	14
14	12	9	9	7	5	7	9.2	11	28	13	10	12
15	13	9	8	7	6	8	9.7	10	33	13	9.4	11
16	12	9	8	6	6	8	9.2	11	30	12	9.4	9.7
17	12	9	8	6	6	8	7.8	13	27	12	8.7	9.4
18	12	9	8	6	6	8	8.6	13	26	12	8.5	9.3
19	11	9	8	6	7	9	8.5	14	25	11	8.2	9.2
20	11	9	8	6	7	9	8.1	16	29	12	8.2	9.2
21	11	9	8	6	7	9	7.8	18	31	14	8.6	9.2
22	11	9	8	6	7	9	8.1	18	30	15	9.4	8.6
23	10	9	7	6	7	8	8	16	28	16	8.7	8.2
24	10	9	7	6	7	8	8	21	24	15	9.2	8
25	9.5	9	7	6	7	8	7.7	19	23	12	8.7	7.6
26	12	9	7	6	7	8	7.8	22	22	14	7.9	7.9
27	12	9	7	6	7	8	8.6	24	22	12	8.7	7.9
28	11	9	7	6	7	8	8.1	21	22	11	9	7.7
29	12	9	7	5	---	8	7.8	21	21	11	9.1	7.4
30	11	9	7	5	---	8	8.2	23	19	10	11	6.8
31	11	---	7	5	---	8	---	32	---	9.5	9.4	---
TOTAL	353.5	293.2	253	198	155	225	246.4	440.6	875	449.5	347.5	282.9
MEAN	11.4	9.8	8.2	6.4	5.5	7.3	8.2	14.2	29	14.5	11.2	9.4
AC-FT	701	582	502	393	307	446	489	874	1740	892	689	561
MAX	13	13	9	7	7	9	9.7	32	43	19	20	17
MIN	9.5	8.1	7	5	4	5	7.7	8.2	19	9.5	7.9	6.8

WTR YR 2002 TOTAL 4119.6 MEAN 11.3 MAX 43 MIN 4 AC-FT 8170

MAX DISCH: 49.2 CFS AT 22:15 ON Jun. 4, 2002 GH 4.13 FT. SHIFT 0.02 FT.

MAX GH: 4.13 FT. AT 22:15 ON Jun. 4, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





PLATTE RIVER BASIN

DILLE TUNNEL (EAST PORTAL) NEAR DRAKE, CO

**LOCATION.**--Lat 40°25'10", long 105°14'45", NW¼NW¼ sec. 9, T.5 N., R.70 W., Larimer County. Diverts water from Big Thompson River and Transmountain diversions from Colorado River basin to Hansen Feeder Canal.

**GAGE.**--Graphic water-stage recorder in concrete shelter at 8' Parshall flume.

**REMARKS.**--The primary record is hourly DCP data with chart back-up. Chart record is checked daily when tunnel is in operation by Northern Colorado Water Conservancy District personnel. The record is complete and reliable. Record is good. The tunnel is used to divert water for power generation at the canyon mouth. Flow at station is intermittent dependent on river flows, water orders, and other regulations. Station maintained and record developed by Merlin Friedrichsen.

**RATING TABLE.**--DILTUNCO03 USED FROM 01-OCT-2001 TO 30-SEP-2002

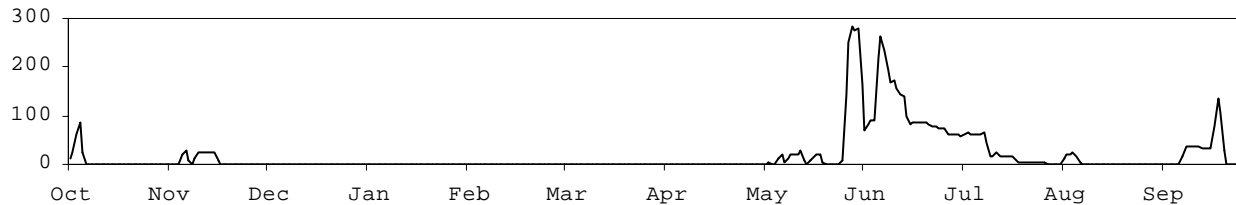
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	11	0	0	0	0	0	0	0	252	73	5.4	0
2	25	0	0	0	0	0	0	0	282	63	1.4	0
3	60	0	0	0	0	0	0	0	274	60	0	0
4	86	0	0	0	0	0	0	0	278	60	0	0
5	25	21	0	0	0	0	0	0	163	60	0	0
6	0	30	0	0	0	0	0	0	70	56	0	0
7	0	8.3	0	0	0	0	0	3.2	82	62	14	0
8	0	0	0	0	0	0	0	0	91	65	20	0
9	0	13	0	0	0	0	0	0	90	62	20	0
10	0	25	0	0	0	0	0	13	218	60	23	0
11	0	25	0	0	0	0	0	20	261	60	17	0
12	0	25	0	0	0	0	0	6	233	63	3.8	0
13	0	25	0	0	0	0	0	14	192	65	0	18
14	0	25	0	0	0	0	0	20	168	47	0	36
15	0	25	0	0	0	0	0	20	172	15	0	35
16	0	6.7	0	0	0	0	0	20	156	18	0	35
17	0	0	0	0	0	0	0	27	142	25	0	35
18	0	0	0	0	0	0	0	7.9	139	18	0	35
19	0	0	0	0	0	0	0	0	99	15	0	34
20	0	0	0	0	0	0	0	8.2	83	15	0	34
21	0	0	0	0	0	0	0	18	87	15	0	34
22	0	0	0	0	0	0	0	20	88	15	0	33
23	0	0	0	0	0	0	0	20	86	7.4	0	79
24	0	0	0	0	0	0	0	5.2	86	4.8	0	136
25	0	0	0	0	0	0	0	0	86	5.8	0	108
26	0	0	0	0	0	0	0	0	81	5	0	28
27	0	0	0	0	0	0	0	0	80	5.4	0	0
28	0	0	0	0	0	0	0	0	77	5.6	0	0
29	0	0	0	0	---	0	0	0	76	5.4	0	0
30	0	0	0	0	---	0	0	10	76	5.3	0	0
31	0	---	0	0	---	0	---	144	---	5.2	0	---
TOTAL	207	229	0	0	0	0	0	376.5	4268	1041.9	104.6	680
MEAN	6.68	7.63	0	0	0	0	0	12.1	142	33.6	3.37	22.7
AC-FT	411	454	0	0	0	0	0	747	8470	2070	207	1350
MAX	86	30	0	0	0	0	0	144	282	73	23	136
MIN	0	0	0	0	0	0	0	0	70	4.8	0	0

WTR YR 2002 TOTAL 6907 MEAN 18.9 MAX 282 MIN 0 AC-FT 13700

MAX DISCH: 287 CFS AT 23:45 ON Jun. 2, 2002 GH 3.92 FT. SHIFT 0 FT.  
MAX GH: 3.92 FT. AT 23:45 ON Jun. 2, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06738000 BIG THOMPSON RIVER AT MOUTH OF CANYON, NEAR DRAKE, CO

**LOCATION.**--Lat 40°25'18", long 105°13'34", in SW¼SW¼ sec. 3, T,5 N., R.70 W., Larimer County, Hydrologic Unit 10190006, on right bank at mouth of canyon, 400 ft upstream from Handy Ditch diversion dam, and 6.0 mi east of Drake.

**DRAINAGE AREA AND PERIOD OF RECORD.**--305 mi<sup>2</sup>; 1927-1933, 1938 to present.

**GAGE.**--Water-stage recorder with satellite telemetry and shaft encoder activated by manometer in a concrete shelter with outside wire weight for reference. A bank-operated cableway was added in 1997 for intermediate flow measurements.

**REMARKS.**--The primary record is hourly data, taken from satellite monitoring with chart back-up. Hourly GH values were taken from the chart on the following days when correct hourly values were not reported via satellite: November 19,25-28; December 4-5; May 5-18; August 1, 12, 17 ,22-24. The Record is complete except for the following periods: December 7, 2001 to March 14, 2002; when station was closed for winter; Sharp changes in the record occur due to diversions through Dille Tunnel (about 1 mile upstream), releases from Lake Estes, and draining/filling of the pond for the City of Loveland power plant. Except for the winter, the record is good due to frequency of measurements & visits and the presence of an artificial control. Record was estimated for December 7, 2001 to March 14, 2002. Record developed and station maintained by Merlin Friedrichsen.

**RATING TABLE.**--BTCANYCO16 USED FROM 01-OCT-2001 TO 11-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

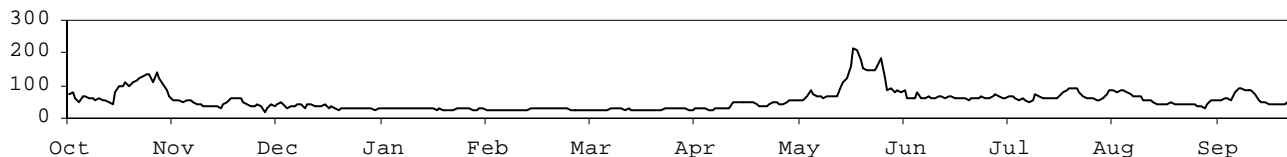
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	73	56	38	29	28	26	28	43	87	64	59	38
2	79	55	43	29	26	27	29	50	93	67	58	37
3	64	54	46	29	26	26	24	56	78	72	56	30
4	52	46	34	28	27	26	27	57	87	68	62	42
5	68	53	31	29	27	26	28	57	79	62	71	54
6	66	57	36	29	26	26	29	55	83	63	84	54
7	62	52	35	28	26	26	28	55	64	66	86	54
8	59	43	44	28	27	27	28	66	61	65	81	55
9	58	42	43	30	27	27	27	86	64	60	88	59
10	60	36	33	30	26	27	25	76	77	58	84	59
11	57	36	40	29	27	28	29	66	60	59	78	55
12	54	35	41	30	27	29	28	69	60	56	76	77
13	48	39	37	28	27	29	29	61	65	51	69	93
14	45	37	35	28	27	29	28	66	64	58	69	93
15	80	33	35	29	28	27	32	65	62	73	65	85
16	96	44	44	28	28	28	48	69	67	66	58	84
17	101	46	29	28	28	27	52	69	69	59	57	83
18	113	59	34	27	28	27	48	98	64	62	54	72
19	101	64	32	29	28	26	49	112	66	59	46	53
20	109	59	22	27	29	26	52	124	66	63	45	49
21	116	64	30	26	28	26	50	162	62	61	44	48
22	120	52	31	27	30	26	48	215	60	67	43	45
23	127	40	29	26	29	27	45	208	59	80	44	41
24	133	38	28	28	29	25	39	177	59	88	46	44
25	132	36	30	28	29	25	37	156	58	92	45	41
26	110	45	30	28	28	27	36	148	60	92	43	45
27	141	34	29	29	27	28	41	147	60	89	45	44
28	123	21	28	28	27	29	46	148	63	78	42	53
29	107	33	29	27	---	28	47	158	65	65	42	51
30	87	40	29	27	---	28	40	183	61	63	42	48
31	65	---	27	28	---	28	---	121	---	62	41	---
TOTAL	2706	1349	1052	874	770	837	1097	3223	2023	2088	1823	1686
MEAN	87	45	34	28	28	27	37	104	67	67	59	56
AC-FT	5370	2680	2090	1730	1530	1660	2180	6390	4010	4140	3620	3340
MAX	141	64	46	30	30	29	52	215	93	92	88	93
MIN	45	21	22	26	26	25	24	43	58	51	41	30

WTR YR 2002 TOTAL 19528 MEAN 53.5 MAX 215 MIN 21 AC-FT 38730

MAX DISCH: 266 CFS AT 06:30 ON May. 31, 2002 GH 3.08 FT. SHIFT -0.01 FT.

MAX GH: 3.08 FT. AT 06:30 ON May. 31, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN  
BUCKHORN CREEK NEAR MASONVILLE, CO

LOCATION.--Lat 40°26'04", long 105°10'47"

DRAINAGE AREA.--

GAGE.--A-35 Stevens recorder and 8004 Data Collection Platform(DCP) with shaft encoder in a wooden shelter with inside electric tape.

REMARKS.--The primary record is hourly data from satellite monitoring with chart back up. Daily maximum and minimum stages for the satellite record checked to within + 0.02 with the chart. Shaft encoder corrections were entered in Records program and prorated hourly by time for the following period: (See datum correction sheet) November 7, 2001: -0.01 encoder correction was made. (Previous visit 10/25/01). The record is good. Station maintained and record developed by Shera Sumerford.

RATING TABLE.--BUCRMVCO07 USED FROM 01-OCT-2001 TO 15-NOV-2002

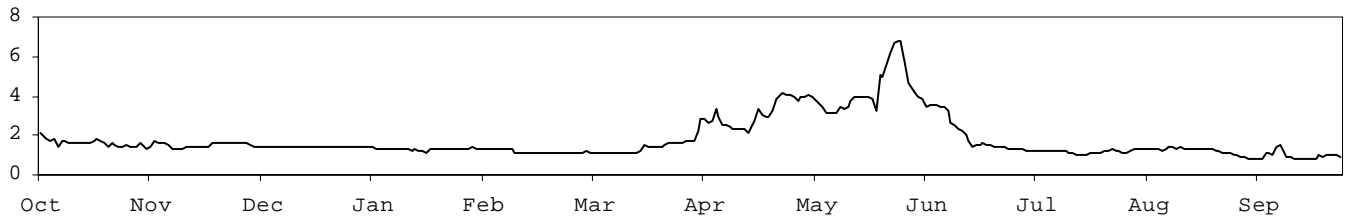
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	2.1	1.4	1.4	1.4	1.3	1.1	1.7	3.7	4.7	1.3	1.1	.98
2	1.9	1.7	1.4	1.4	1.3	1.1	1.7	4	4.4	1.3	1.2	.92
3	1.8	1.6	1.4	1.3	1.3	1.2	2.2	4	4.1	1.3	1.3	.87
4	1.7	1.6	1.4	1.3	1.3	1.1	2.8	4.1	4	1.2	1.3	.83
5	1.8	1.6	1.4	1.3	1.3	1.1	2.8	3.9	3.8	1.2	1.3	.83
6	1.4	1.5	1.4	1.3	1.3	1.1	2.6	3.7	3.4	1.2	1.3	.83
7	1.7	1.3	1.4	1.3	1.3	1.1	2.7	3.6	3.5	1.2	1.3	.83
8	1.7	1.3	1.4	1.3	1.3	1.1	3.3	3.4	3.5	1.2	1.3	.86
9	1.6	1.3	1.4	1.3	1.3	1.1	2.9	3.1	3.5	1.2	1.3	1.1
10	1.6	1.3	1.4	1.3	1.3	1.1	2.5	3.1	3.4	1.2	1.3	1.1
11	1.6	1.4	1.4	1.3	1.1	1.1	2.5	3.1	3.4	1.2	1.2	1
12	1.6	1.4	1.4	1.3	1.1	1.1	2.4	3.1	3.2	1.2	1.3	1.4
13	1.6	1.4	1.4	1.2	1.1	1.1	2.3	3.4	2.6	1.2	1.4	1.5
14	1.6	1.4	1.4	1.3	1.1	1.1	2.3	3.3	2.5	1.2	1.4	1.1
15	1.6	1.4	1.4	1.2	1.1	1.1	2.3	3.4	2.3	1.2	1.3	.94
16	1.7	1.4	1.4	1.2	1.1	1.1	2.3	3.7	2.2	1.1	1.4	.9
17	1.8	1.4	1.4	1.1	1.1	1.1	2.1	4	2	1.1	1.3	.83
18	1.7	1.6	1.4	1.3	1.1	1.2	2.3	4	1.7	1	1.3	.83
19	1.6	1.6	1.4	1.3	1.1	1.5	2.7	4	1.4	1	1.3	.83
20	1.4	1.6	1.4	1.3	1.1	1.4	3.3	4	1.5	.98	1.3	.83
21	1.6	1.6	1.4	1.3	1.1	1.4	3	4	1.5	1	1.3	.83
22	1.5	1.6	1.4	1.3	1.1	1.4	2.9	3.8	1.6	1.1	1.3	.83
23	1.4	1.6	1.4	1.3	1.1	1.4	2.9	3.2	1.5	1.1	1.3	.83
24	1.4	1.6	1.4	1.3	1.1	1.4	3.2	5.1	1.5	1.1	1.3	.97
25	1.5	1.6	1.4	1.3	1.1	1.5	3.8	5	1.4	1.1	1.3	.92
26	1.4	1.6	1.4	1.3	1.1	1.6	4.1	5.6	1.4	1.2	1.2	.98
27	1.4	1.6	1.4	1.3	1.1	1.6	4.2	6.2	1.4	1.2	1.2	.98
28	1.4	1.6	1.4	1.3	1.1	1.6	4.1	6.7	1.4	1.3	1.1	.98
29	1.6	1.5	1.4	1.3	---	1.6	4.1	6.8	1.3	1.2	1.1	.98
30	1.4	1.4	1.4	1.4	---	1.6	3.9	6.8	1.3	1.2	1.1	.94
31	1.3	---	1.4	1.3	---	1.7	---	5.8	---	1.1	.98	---
TOTAL	49.4	44.9	43.4	40.1	32.8	39.7	85.9	131.6	75.4	36.08	39.08	28.55
MEAN	1.6	1.5	1.4	1.3	1.2	1.3	2.9	4.3	2.5	1.16	1.26	.95
AC-FT	98	89	86	80	65	79	170	261	150	72	78	57
MAX	2.1	1.7	1.4	1.4	1.3	1.7	4.2	6.8	4.7	1.3	1.4	1.5
MIN	1.3	1.3	1.4	1.1	1.1	1.1	1.7	3.1	1.3	.98	.98	.83

WTR YR 2002 TOTAL 646.91 MEAN 1.77 MAX 6.8 MIN .83 AC-FT 1280

MAX DISCH: 6.98 CFS AT 15:00 ON May. 28, 2002 GH 4.94 FT. SHIFT 0.01 FT.  
MAX GH: 4.94 FT. AT 15:00 ON May. 28, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

CHARLES HANSEN FEEDER CANAL BELOW BIG THOMPSON SIPHON NEAR DRAKE, CO

LOCATION.--Lat 40°25'20", long 105°13'33", SW¼SW¼ sec. 3, T.5 N., T.70 W., Larimer County.

GAGE.--Graphic chart recorder and 8210 DCP with shaft encoder in a precast concrete shelter. The station is maintained by Northern Colorado Water Conservancy District personnel.

REMARKS.--The primary record is hourly DCP data with the chart record as back-up. The record is complete and reliable. During the zero flow periods--September 27-30, 2002--the chart/encoder go negative due to the draining of the canal for construction work. Record is good. Station maintained and record developed by Merlin Friedrichsen.

RATING TABLE.--HFCBBS016 USED FROM 01-OCT-2001 TO 30-SEP-2002

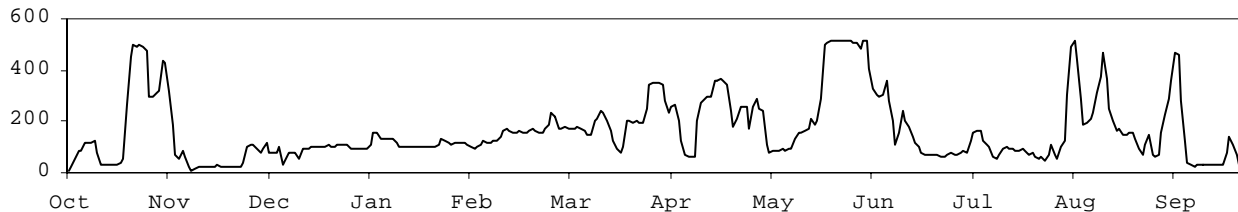
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	9.9	322	114	94	111	171	352	290	508	71	74	64
2	26	188	80	109	103	175	345	246	487	70	58	68
3	58	74	81	158	97	176	284	238	512	75	99	154
4	86	55	80	155	103	170	232	107	511	84	121	224
5	89	82	98	131	109	174	259	80	405	81	306	290
6	118	59	31	131	121	171	263	87	325	122	488	361
7	118	23	45	131	113	178	204	86	303	158	516	466
8	119	11	80	130	117	173	124	89	299	164	442	457
9	126	18	81	131	127	160	67	90	302	165	289	277
10	80	27	80	119	125	151	64	89	362	127	188	128
11	30	27	53	101	138	150	65	96	283	112	195	42
12	30	26	96	102	162	200	59	97	200	99	213	32
13	30	26	92	101	170	210	202	131	108	62	235	27
14	32	26	92	98	161	240	270	152	154	58	312	35
15	31	25	102	104	153	230	288	159	241	70	373	35
16	30	32	102	102	158	203	294	165	200	90	466	34
17	37	26	102	98	160	162	295	172	176	102	367	35
18	54	25	100	102	156	128	357	214	137	96	253	35
19	267	26	105	103	158	95	357	190	118	93	199	33
20	455	27	108	101	161	75	363	203	98	85	163	34
21	498	24	105	102	173	98	358	290	76	86	171	34
22	494	26	104	102	162	203	341	496	74	97	150	33
23	496	27	108	108	156	199	241	508	69	82	147	79
24	489	41	107	132	154	197	181	511	68	72	152	139
25	474	99	106	123	171	201	213	515	67	75	154	112
26	296	112	110	114	185	198	260	513	67	64	130	67
27	295	111	96	109	232	198	261	515	63	56	93	35
28	315	90	91	116	217	247	261	517	64	59	74	0
29	319	78	92	115	---	341	172	515	73	48	109	0
30	437	92	92	114	---	347	255	514	79	68	151	0
31	426	---	92	116	---	351	---	506	---	106	71	---
TOTAL	6364.9	1825	2825	3552	4153	5972	7287	8381	6429	2797	6759	3330
MEAN	205	61	91	115	148	193	243	270	214	90	218	111
AC-FT	12620	3620	5600	7050	8240	11850	14450	16620	12750	5550	13410	6610
MAX	498	322	114	158	232	351	363	517	512	165	516	466
MIN	9.9	11	31	94	97	75	59	80	63	48	58	0

WTR YR 2002 TOTAL 59674.9 MEAN 163 MAX 517 MIN 0 AC-FT 118400

MAX DISCH: 548 CFS AT 15:30 ON Jun. 2, 2002 GH 6.52 FT. SHIFT 0 FT.  
MAX GH: 6.52 FT. AT 15:30 ON Jun. 2, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06738100 CHARLES HANSEN FEEDER CANAL WASTEWAY TO BIG THOMPSON NEAR DRAKE, CO

LOCATION.--Lat 40°25'11", long 105°13'30", NE¼NW¼ sec. 10, T.5 N., R.70 W., Larimer County.

GAGE.--Graphic water-stage recorder with satellite telemetry in concrete shelter with supplemental outside staff gage at 15' Parshall flume. Station maintained by N.C.W.C.D.

REMARKS.--The primary record is hourly DCP data with the graphic chart as backup. There were periods when water was in the stilling well, causing a residual gage-height, which was entered as zero flow for those periods. During the peak period (October 26-30) the DCP data bounced between a value that agreed with the station visit & chart and a value that was 0.01 too low. A +0.01 correction was applied to the individual hours that were low compared to the chart. Record is good. Station maintained and record developed by Merlin Friedrichsen.

RATING TABLE.--HFCWASCO02 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

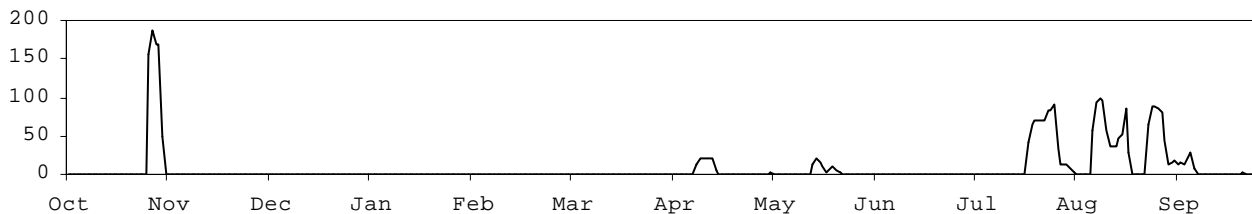
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	0	0	34	87
2	0	0	0	0	0	0	0	0	0	0	12	81
3	0	0	0	0	0	0	0	0	0	0	14	44
4	0	0	0	0	0	0	0	0	0	0	13	13
5	0	0	0	0	0	0	0	1.6	0	0	8.2	16
6	0	0	0	0	0	0	0	.65	0	0	1.8	19
7	0	0	0	0	0	0	0	0	0	0	0	12
8	0	0	0	0	0	0	0	0	0	0	0	15
9	0	0	0	0	0	0	0	0	0	0	0	13
10	0	0	0	0	0	0	0	0	0	0	0	24
11	0	0	0	0	0	0	0	0	0	0	0	29
12	0	0	0	0	0	0	14	0	0	0	57	8.4
13	0	0	0	0	0	0	20	0	0	0	94	0
14	0	0	0	0	0	0	20	0	0	0	98	0
15	0	.7	0	0	0	0	20	0	0	0	95	0
16	0	0	0	0	0	0	21	0	0	0	57	0
17	0	0	0	0	0	0	21	0	0	0	37	0
18	0	0	0	0	0	0	6.2	14	0	0	37	0
19	0	0	0	0	0	0	0	20	0	0	36	0
20	0	0	0	0	0	0	0	16	0	0	48	0
21	0	0	0	0	0	0	0	11	0	0	51	0
22	0	0	0	0	0	0	0	2.9	0	0	85	0
23	0	0	0	0	0	0	0	7.8	0	42	29	0
24	0	0	0	0	0	0	0	10	0	64	0	0
25	0	0	0	0	0	0	0	6.3	0	69	0	0
26	155	0	0	0	0	0	0	1.6	0	71	0	0
27	188	0	0	0	0	0	0	0	0	69	0	3.5
28	170	0	0	0	0	0	0	0	0	69	0	0
29	168	0	0	0	---	0	0	0	0	82	66	0
30	49	0	0	0	---	0	0	0	0	84	89	0
31	0	---	0	0	---	0	---	0	---	91	89	---
TOTAL	730	.7	0	0	0	0	122.2	91.85	0	641	1051	364.9
MEAN	23.5	.02	0	0	0	0	4.07	2.96	0	20.7	33.9	12.2
AC-FT	1450	1.4	0	0	0	0	242	182	0	1270	2080	724
MAX	188	.7	0	0	0	0	21	20	0	91	98	87
MIN	0	0	0	0	0	0	0	0	0	0	0	0

WTR YR 2002 TOTAL 3001.65 MEAN 8.22 MAX 188 MIN 0 AC-FT 5950

MAX DISCH: 220 CFS AT 08:00 ON Oct. 26, 2001 GH 2.29 FT. SHIFT 0 FT.

MAX GH: 2.29 FT. AT 08:00 ON Oct. 26, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06738100 CHARLES HANSEN FEEDER CANAL POWER PLANT TO BIG THOMPSON RIVER  
NEAR DRAKE, CO

LOCATION.--Lat 40°25'15", long 105°13'30", NE¼NW¼ sec. 10, T.5 N., R.70 W., Larimer County.

GAGE.--Graphic water-stage recorder and 8210 Data Collection Platform(DCP) connected to a flow meter directly connected to the power turbine. The station is maintained by the U.S.B.R. personnel.

REMARKS.--The primary record is hourly discharge data collected by the DCP with chart recorder as back-up. The record is complete and reliable. Record is good. Discharge was computed on a daily basis using real time Sat-Mon tool, and Data-wise values. These values were checked against the chart to develop the record. The flow at station is intermittent dependent on available river flows, water orders and other regulations. Record developed by Merlin Friedrichsen.

RATING TABLE.--STCONVERT USED FROM 01-OCT-2001 TO 30-SEP-2002

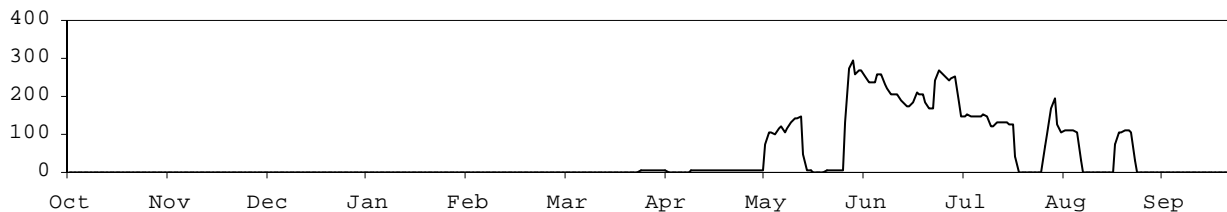
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	4	4	275	254	71	2.2
2	0	0	0	0	0	0	4	4	293	244	102	2.3
3	0	0	0	0	0	0	4	4	259	249	171	2.3
4	0	0	0	0	0	0	4	4	271	253	197	2.3
5	0	0	0	0	0	0	5.9	3.9	266	183	128	2.2
6	0	0	0	0	0	0	.33	73	255	147	103	2.5
7	0	0	0	0	0	0	.34	105	237	150	109	2.4
8	0	0	0	0	0	0	.33	104	235	151	110	2.5
9	0	0	0	0	0	0	.43	102	238	149	111	2.6
10	0	0	0	0	0	0	.5	117	258	148	113	2.4
11	0	0	0	0	0	0	.48	122	258	149	106	.6
12	0	0	0	0	0	0	2.5	107	232	150	32	.23
13	0	0	0	0	0	0	4	117	223	155	1.9	.17
14	0	0	0	0	0	0	4	133	207	148	1.9	.16
15	0	0	0	0	0	0	4	141	205	119	1.9	0
16	0	0	0	0	0	0	4	143	203	123	1.9	0
17	0	0	0	0	0	0	4	148	188	134	2	0
18	0	0	0	0	0	0	4	47	182	132	2	0
19	0	0	0	0	0	0	4	3	176	130	1.9	0
20	0	0	0	0	0	0	4	3	172	129	2	0
21	0	0	0	0	0	0	4	2	185	126	2	0
22	0	0	0	0	0	0	4	.04	210	127	2	0
23	0	0	0	0	0	0	4	0	207	40	74	0
24	0	0	0	0	0	0	4	1.6	203	2	104	0
25	0	0	0	0	0	.88	4	3	183	2	104	0
26	0	0	0	0	0	1.7	3.9	3	169	2	109	0
27	0	0	0	0	0	1.4	4	3	169	2	110	0
28	0	0	0	0	0	3.5	4	3	242	2.1	107	0
29	0	0	0	0	---	4	3.9	3	267	2.1	34	0
30	0	0	0	0	---	4	4	3	263	2	2.2	0
31	0	---	0	0	---	4	---	130	---	2	2.2	---
TOTAL	0	0	0	0	0	19.48	98.61	1636.54	6731	3606.2	2018.9	24.86
MEAN	0	0	0	0	0	.63	3.29	52.8	224	116	65.1	.83
AC-FT	0	0	0	0	0	39	196	3250	13350	7150	4000	49
MAX	0	0	0	0	0	4	5.9	148	293	254	197	2.6
MIN	0	0	0	0	0	0	.33	0	169	2	1.9	0

WTR YR 2002 TOTAL 14135.59 MEAN 38.7 MAX 293 MIN 0 AC-FT 28040

MAX DISCH: 321 CFS AT 08:45 ON Jun. 1, 2002 GH 321 FT. SHIFT 0 FT.  
MAX GH: 321 FT. AT 08:45 ON Jun. 1, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

## BOULDER CREEK FEEDER CANAL NEAR LYONS, CO

**LOCATION.**--Lat 40°12'58", long 105°15'28", NE¼NW¼ sec. 20, T.3 N., R.70 W., Boulder County.

**DRAINAGE AREA.**--N/A

**GAGE.**-- A-35 Stevens recorder in a 36-inch galvanized shelter with supplemental outside staff gage. A data collection platform (DCP) was installed in 1997 and is connected to the gage remotely approximately 100 yards west in a concrete 6 by 8-foot building. The station is maintained by NCWCD personnel.

**REMARKS.**--The primary record is hourly DCP data with chart back up. The record is complete and reliable. The record is good. Water was run October 1 thru November 6, 2001 and April 5 to September 30, 2002. This record will soon become part of Colorado Division of Water Rescues Water District 6 Diversion Data. At that time it will no longer be published as part of Colorado Streamflow Data. Record developed by Merlin Friedrichsen.

**RATING TABLE.**--BFCLYOCO02 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

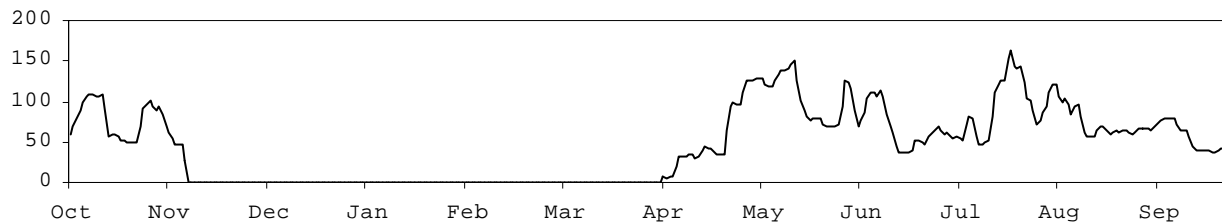
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	59	61	0	0	0	0	0	127	125	64	77	66
2	70	54	0	0	0	0	0	127	123	60	87	67
3	78	48	0	0	0	0	0	127	116	62	95	66
4	89	48	0	0	0	0	0	128	88	57	110	66
5	100	48	0	0	0	0	6.8	128	68	55	122	65
6	105	28	0	0	0	0	6	128	76	57	121	68
7	109	0	0	0	0	0	7.4	122	87	54	106	74
8	109	0	0	0	0	0	6.9	118	103	51	99	77
9	107	0	0	0	0	0	19	119	111	71	103	79
10	107	0	0	0	0	0	33	127	112	81	96	79
11	109	0	0	0	0	0	32	134	107	79	85	78
12	91	0	0	0	0	0	32	138	114	56	95	79
13	58	0	0	0	0	0	34	139	106	46	97	71
14	59	0	0	0	0	0	35	141	85	46	81	63
15	59	0	0	0	0	0	29	145	70	50	62	63
16	56	0	0	0	0	0	31	150	62	53	58	64
17	51	0	0	0	0	0	39	127	45	81	58	58
18	51	0	0	0	0	0	45	102	36	110	56	45
19	50	0	0	0	0	0	41	90	37	121	63	39
20	49	0	0	0	0	0	43	82	36	125	69	40
21	50	0	0	0	0	0	37	77	36	126	69	40
22	49	0	0	0	0	0	35	78	40	153	65	40
23	69	0	0	0	0	0	35	78	52	162	60	39
24	91	0	0	0	0	0	35	79	51	144	62	38
25	96	0	0	0	0	0	63	72	50	140	63	37
26	101	0	0	0	0	0	94	68	48	144	62	39
27	95	0	0	0	0	0	98	69	56	124	65	41
28	88	0	0	0	0	0	97	69	60	103	64	41
29	93	0	0	0	---	0	96	68	63	101	61	42
30	84	0	0	0	---	0	111	72	68	89	60	41
31	68	---	0	0	---	0	---	94	---	71	62	---
TOTAL	2450	287	0	0	0	0	1141.1	3323	2231	2736	2433	1705
MEAN	79	9.57	0	0	0	0	38	107	74	88	79	57
AC-FT	4860	569	0	0	0	0	2260	6590	4430	5430	4830	3380
MAX	109	61	0	0	0	0	111	150	125	162	122	79
MIN	49	0	0	0	0	0	0	68	36	46	56	37

WTR YR 2002 TOTAL 16306.1 MEAN 44.7 MAX 162 MIN 0 AC-FT 32340

MAX DISCH: 171 CFS AT 15:10 ON Jul. 22, 2002 GH 2.46 FT. SHIFT 0 FT.

MAX GH: 2.46 FT. AT 15:10 ON Jul. 22, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

ST. VRAIN SUPPLY CANAL NEAR LYONS, CO

LOCATION.--Lat 40°13'05", long 105°15'35", NE¼NW¼ sec. 20, T.3 N., R.70 W., Boulder County.

DRAINAGE AREA.--N/A

GAGE.--Graphic A-35 water-stage recorder in a 36-inch galvanized shelter at 15' Parshall Flume. Data Collection Platform and shaft encoder was installed in 1997.

REMARKS.--The primary record is hourly DCP data with chart backup. The record is complete and reliable. Mean daily values from the chart were used on the following days. April 4-9,2002--Shaft encoder was set wrong when station was opened. September 30, 2002--DCP was not working correctly. The canal was in use from October 1, 2001 to November 6, 2001 and April 4, 2002 to September 30 2002. The record is good. This record will soon be kept as part of Water District 5 Diversion Data. At that time it will no longer be published as part of Colorado Streamflow Data. Station maintained and record developed by Merlin Friedrichsen.

RATING TABLE.--SVSLYOCO05 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

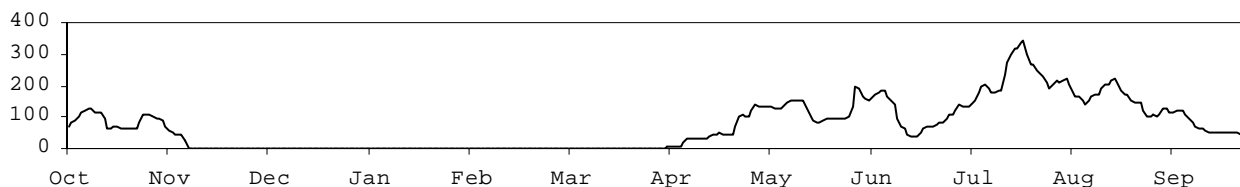
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	70	60	0	0	0	0	0	137	195	105	205	106
2	80	53	0	0	0	0	0	136	188	119	213	100
3	91	47	0	0	0	0	0	135	168	139	209	110
4	104	47	0	0	0	0	7	136	158	134	216	124
5	116	47	0	0	0	0	5.7	136	150	133	222	124
6	122	27	0	0	0	0	5.1	136	159	134	206	117
7	125	0	0	0	0	0	7.2	129	170	146	178	115
8	124	0	0	0	0	0	7.1	125	179	154	167	119
9	117	0	0	0	0	0	18	126	184	179	168	121
10	112	0	0	0	0	0	33	138	185	194	155	121
11	115	0	0	0	0	0	32	149	166	205	140	106
12	95	0	0	0	0	0	32	151	150	193	150	94
13	62	0	0	0	0	0	33	151	137	180	165	85
14	63	0	0	0	0	0	34	152	98	179	170	70
15	69	0	0	0	0	0	33	151	70	183	173	64
16	71	0	0	0	0	0	34	152	61	183	192	65
17	66	0	0	0	0	0	39	129	46	232	206	59
18	66	0	0	0	0	0	45	102	38	275	206	51
19	65	0	0	0	0	0	45	89	39	300	214	50
20	65	0	0	0	0	0	51	83	39	318	222	51
21	64	0	0	0	0	0	45	84	50	317	207	51
22	64	0	0	0	0	0	43	89	63	337	181	52
23	84	0	0	0	0	0	43	93	73	342	170	52
24	107	0	0	0	0	0	42	98	73	296	171	50
25	107	0	0	0	0	0	72	96	71	264	155	50
26	107	0	0	0	0	0	102	96	76	266	143	51
27	100	0	0	0	0	0	106	97	81	250	143	48
28	93	0	0	0	---	0	104	96	82	232	143	43
29	98	0	0	0	---	0	103	95	97	226	120	44
30	88	0	0	0	---	0	120	99	110	208	101	43
31	70	---	0	0	---	0	---	134	---	193	103	---
TOTAL	2780	281	0	0	0	0	1241.1	3720	3356	6616	5414	2336
MEAN	90	9.37	0	0	0	0	41.4	120	112	213	175	78
AC-FT	5510	557	0	0	0	0	2460	7380	6660	13120	10740	4630
MAX	125	60	0	0	0	0	120	152	195	342	222	124
MIN	62	0	0	0	0	0	0	83	38	105	101	43

WTR YR 2002 TOTAL 25744.1 MEAN 70.5 MAX 342 MIN 0 AC-FT 51060

MAX DISCH: 354 CFS AT 12:20 ON Jul. 22, 2002 GH 2.98 FT. SHIFT 0 FT.

MAX GH: 2.98 FT. AT 12:20 ON Jul. 22, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





PLATTE RIVER BASIN

LITTLE THOMPSON RIVER @ CANYON MOUTH NEAR BERTHOUD, CO

**LOCATION.**--Lat 40°15'29", long 105°12'21", SW¼NW¼ sec. 2, T. 3 N., 70 W., Boulder County, on the left bank, at the mouth of the Canyon, 1800 ft. upstream from the Culver Ditch Diversion and 8.5 mi. southwest of Berthoud, Co.

**DRAINAGE AREA.**--100 mi<sup>2</sup>.

**GAGE.**--Graphic water stage recorder with satellite monitoring in a 42" metal well. The drop tape is the primary reference. The DCP is the primary record.

**REMARKS.**--The hourly satellite record is the primary record with chart as back up. Daily maximum and minimum stages for the satellite record checked to within +0.02 with the chart. Record is complete and reliable except for the following periods: November 05-April04: Station was closed for the winter November 05-April 04: Partial record on closing and opening days. The record is fair, as there were many days with flows less than 0.55 cfs and meter measurements were not made. Zero flow occurred July 12, and September 2-8. Station maintained and record developed by Shera Sumerford.

**RATING TABLE.**--LTCANYCO12 USED FROM 01-OCT-2001 TO 30-SEP-2002

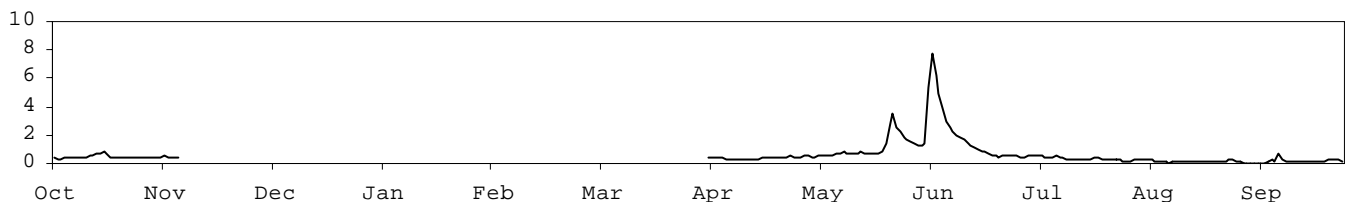
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.36	.51	-	-	-	-	.51	1.4	.46	.19	.08	
2	.32	.49	-	-	-	-	.53	1.3	.48	.24	0	
3	.34	.49	-	-	-	-	.49	1.2	.52	.29	0	
4	.4	.47	-	-	-	.36	.49	1.4	.54	.33	0	
5	.49	.49	-	-	-	.36	.51	5.3	.52	.29	0	
6	.46	-	-	-	-	.36	.5	7.8	.52	.29	0	
7	.4	-	-	-	-	.36	.56	6.2	.51	.26	0	
8	.41	-	-	-	-	.37	.63	5	.46	.2	0	
9	.46	-	-	-	-	.35	.63	3.9	.42	.17	.16	
10	.49	-	-	-	-	.33	.64	2.9	.47	.16	.28	
11	.52	-	-	-	-	.35	.72	2.5	.5	.09	.21	
12	.57	-	-	-	-	.33	.82	2.2	.43	0	.65	
13	.64	-	-	-	-	.31	.67	2	.37	.1	.32	
14	.7	-	-	-	-	.32	.71	1.9	.35	.11	.21	
15	.86	-	-	-	-	.31	.66	1.7	.33	.08	.17	
16	.77	-	-	-	-	.3	.77	1.4	.32	.16	.15	
17	.43	-	-	-	-	.3	.78	1.3	.32	.17	.15	
18	.4	-	-	-	-	.33	.71	1.1	.31	.17	.16	
19	.41	-	-	-	-	.36	.72	.92	.31	.18	.18	
20	.43	-	-	-	-	.41	.71	.9	.28	.18	.18	
21	.46	-	-	-	-	.42	.7	.79	.31	.19	.18	
22	.41	-	-	-	-	.43	.71	.69	.4	.2	.19	
23	.44	-	-	-	-	.43	.82	.58	.39	.2	.19	
24	.49	-	-	-	-	.44	1.4	.51	.31	.19	.19	
25	.47	-	-	-	-	.44	2.8	.49	.23	.19	.19	
26	.44	-	-	-	-	.49	3.5	.5	.26	.18	.22	
27	.49	-	-	-	-	.51	2.6	.53	.22	.19	.23	
28	.47	-	-	-	-	.48	2.2	.52	.23	.21	.23	
29	.44	-	-	-	---	.49	1.9	.52	.23	.24	.22	
30	.44	-	-	-	---	.48	1.7	.52	.19	.25	.2	
31	.44	---	-	-	---	---	1.5	---	.19	.19	---	
TOTAL	14.85	2.45	-	-	-	10.42	32.59	57.97	11.38	5.89	4.94	
MEAN	.48	.08	-	-	-	.35	1.05	1.93	.37	.19	.16	
AC-FT	29	4.9	-	-	-	21	65	115	23	12	9.8	
MAX	.86	.51	-	-	-	.51	3.5	7.8	.54	.33	.65	
MIN	.32	-	-	-	-	-	.49	.49	.19	0	0	

WTR YR 2002 TOTAL 140.49 MEAN .38 MAX 7.8 MIN 0 AC-FT 279

MAX DISCH: 27.3 CFS AT 17:30 ON Sep. 12, 2002 GH 3.04 FT. SHIFT 0.0 FT.  
MAX GH: 3.04 FT. AT 17:30 ON Sep. 12, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06744000 BIG THOMPSON RIVER AT MOUTH NEAR LA SALLE, CO

LOCATION.--Lat 40°21'00", long 104°47'04".

DRAINAGE AREA AND PERIOD OF RECORD.--828 mi<sup>2</sup>; 1951 to present.

GAGE.--8210 data collection platform and a graphic recorder in wooden shelter with galvanized well section. The drop tape is the primary reference with a supplemental outside chain gage.

REMARKS.--The primary record is hourly data taken from satellite monitoring with chart back up. The record is complete. The record is fair due to unexplained datum corrections, except for December 13,14,17,23-25, 2001; January 2,3,5,6,14-22, 24,25,30,31, 2002; February 1-6, 9-11,15,26-28, March 1,2, 2002, which were estimated due to ice. Station maintained and record developed by Shera Sumerford.

RATING TABLE.--BIGLASCO25 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

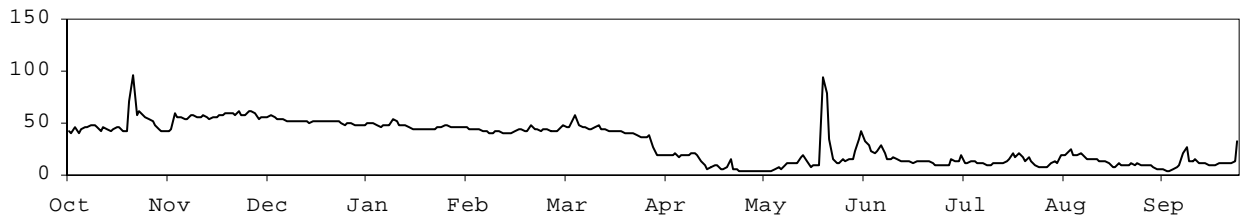
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	42	42	55	49	46	43	27	4.7	16	8.9	7	9.6
2	41	45	56	50	46	43	19	4.2	16	9.9	7.9	9.8
3	46	59	57	50	45	44	19	4.1	23	16	11	9.7
4	41	55	56	50	45	48	19	3.9	35	14	13	7.7
5	45	55	54	49	44	46	20	3.8	42	13	12	5.2
6	46	54	53	47	44	46	20	4.3	33	20	19	5.2
7	46	53	53	48	43	53	19	4.7	29	12	19	5
8	49	58	51	48	43	57	21	4.8	24	11	22	4.7
9	49	58	52	48	41	49	18	6.3	22	14	25	4.7
10	46	55	52	53	41	46	20	6.9	23	14	20	5.9
11	43	56	52	51	42	46	20	6.7	28	12	20	7
12	46	57	51	48	42	45	20	9.8	21	11	21	8.7
13	45	56	51	48	41	44	21	11	16	12	19	21
14	43	54	51	48	41	47	21	12	16	10	16	26
15	45	55	50	47	40	48	19	12	17	10	15	14
16	47	56	51	44	41	45	14	12	16	11	16	14
17	47	57	52	45	42	45	10	18	14	12	15	15
18	42	58	52	45	44	43	5.4	19	14	12	13	12
19	42	60	51	45	44	43	7.2	14	13	12	13	11
20	72	59	51	45	43	43	9.3	8.5	13	14	13	11
21	96	59	52	45	43	42	9.4	8.8	12	15	11	9.7
22	58	58	51	45	48	42	5.7	10	13	21	7.5	9.9
23	61	61	51	45	44	40	5	9.8	14	18	8.4	10
24	57	58	51	46	44	40	7.7	95	13	21	11	11
25	55	58	50	47	43	41	16	79	13	17	10	12
26	53	62	49	48	44	40	6.4	34	13	14	9	12
27	51	62	50	48	44	38	5.7	15	12	17	9.5	12
28	49	60	50	47	43	37	4.6	12	9.8	13	11	12
29	45	54	49	46	---	37	4.4	12	9.9	9.9	10	14
30	43	55	49	46	---	37	4.4	15	9.7	8.5	12	32
31	43	---	49	46	---	38	---	14	---	8	10	---
TOTAL	1534	1689	1602	1467	1211	1356	418.2	475.3	550.4	411.2	426.3	341.8
MEAN	50	56	52	47	43	44	13.9	15.3	18.3	13.3	13.8	11.4
AC-FT	3040	3350	3180	2910	2400	2690	829	943	1090	816	846	678
MAX	96	62	57	53	48	57	27	95	42	21	25	32
MIN	41	42	49	44	40	37	4.4	3.8	9.7	8	7	4.7

WTR YR 2002 TOTAL 11482.2 MEAN 31.5 MAX 96 MIN 3.8 AC-FT 22770

MAX DISCH: 181 CFS AT 14:45 ON May. 24, 2002 GH 2.13 FT. SHIFT -0.05 FT.

MAX GH: 2.13 FT. AT 14:45 ON May. 24, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06752000 CACHE LA POUFRE RIVER AT MOUTH OF CANYON, NEAR FORT COLLINS, CO

**LOCATION.**--Lat 40°39'52", long 105°13'26", in NW¼ sec. 15, T.8 N., R.70 W., Larimer County, Hydrologic Unit 10190007, on left bank at mouth of canyon, 0.5 mi downstream from headgate of Poudre Valley Canal, 1.2 mi upstream from Lewistone Creek, and 9.3 mi northwest of courthouse in Fort Collins.

**DRAINAGE AREA AND PERIOD OF RECORD.**--1,056 mi<sup>2</sup>. Sporadic and somewhat unreliable data from June 1881 to Aug. 1883. Reliable data from Oct. 1883 to current year. Periodic water-quality data from 1962 to 1995.

**GAGE.**--F-type water-stage recorder and satellite monitoring in concrete shelter and well with supplemental outside chain gage.

**REMARKS.**--The primary record is hourly data taken from satellite monitoring with chart as back up. The record is complete and reliable except for the following periods: November 8 was estimated because the station was disabled for construction; November 28, February 26 were ice affected; December 4-31, January 1-31, February 1-19, the station was closed. Flows were estimated. February 27-28, and March 1-5 were estimated. Mean daily chart values were used October 28, 2001 and April 7, 2002 to correct for Daylight Savings Time, as well as November 16-18, 29-30, December 1-3. Record is good, except for the period of November 8-16, when the flood hardening was being completed which is fair. Record was estimated for November 28, December 4 to February 19, February 26-28, and March 1-5 due to ice-affect and closing of the station for the winter. Station maintained and record developed by George Sievers.

**RATING TABLE.**--CLAFTCCO10 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

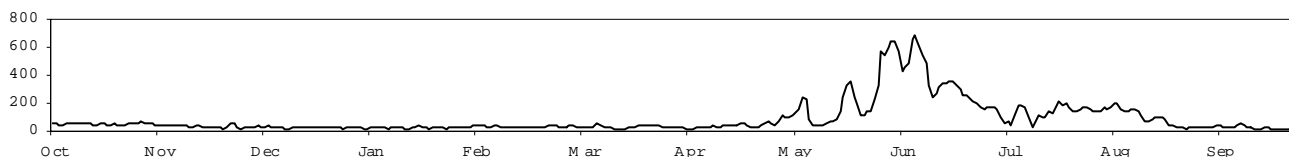
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	57	43	30	21	44	39	33	78	547	169	149	27
2	50	46	35	25	42	37	32	120	607	171	139	25
3	48	39	41	25	37	35	22	104	644	166	143	24
4	48	42	33	31	36	31	16	97	637	151	168	25
5	52	39	32	29	32	34	17	109	572	100	163	27
6	53	38	27	24	35	35	21	128	423	57	178	48
7	50	43	28	18	37	33	23	164	462	66	193	39
8	50	48	21	26	37	33	26	237	486	41	204	27
9	50	47	17	29	31	51	26	228	659	116	160	35
10	53	30	29	34	27	38	34	86	685	185	138	29
11	63	23	30	23	29	32	32	39	621	183	149	29
12	54	39	31	21	30	26	37	44	543	171	163	37
13	48	41	22	17	25	24	34	39	488	94	153	61
14	47	34	29	25	25	20	34	36	324	23	143	43
15	51	29	28	31	28	16	40	53	238	54	113	33
16	50	29	32	40	26	12	47	72	276	116	74	26
17	46	27	32	33	27	19	44	75	316	105	75	21
18	49	28	34	29	27	22	37	87	343	100	88	19
19	50	29	29	15	30	22	42	145	346	140	105	19
20	47	18	25	25	32	35	51	248	357	134	102	24
21	46	27	25	29	33	41	51	330	352	189	103	25
22	48	51	26	28	33	43	43	358	324	216	84	21
23	55	59	30	27	36	43	32	247	299	189	46	17
24	62	35	24	20	37	44	27	200	260	194	38	14
25	63	19	14	28	41	38	32	109	255	172	31	17
26	57	28	24	30	31	37	40	112	230	141	29	11
27	66	27	31	26	26	41	50	137	220	138	27	19
28	57	30	23	32	28	34	78	143	194	156	20	25
29	53	34	26	31	---	32	60	223	169	172	24	24
30	55	37	23	31	---	33	44	323	159	166	32	29
31	48	---	19	23	---	33	---	575	---	159	32	---
TOTAL	1626	1059	850	826	902	1013	1105	4946	12036	4234	3266	820
MEAN	53	35	27	27	32	33	37	160	401	137	105	27
AC-FT	3230	2100	1690	1640	1790	2010	2190	9810	23870	8400	6480	1630
MAX	66	59	41	40	44	51	78	575	685	216	204	61
MIN	46	18	14	15	25	12	16	36	159	23	20	11

WTR YR 2002 TOTAL 32683 MEAN 89.5 MAX 685 MIN 11 AC-FT 64830

MAX DISCH: 879 CFS AT 07:00 ON May. 31, 2002 GH 3.54 FT. SHIFT 0.44 FT.

MAX GH: 3.54 FT. AT 07:00 ON May. 31, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06752500 CACHE LA POUFRE RIVER NEAR GREELEY, CO

**LOCATION.**--Lat 40°25'04", long 104°39'22", in NW¼ sec. 11, T.5 N., R.65 W., Weld County, Hydrologic Unit 10190007, on right bank 15 ft. downstream from highway bridge, 2.9 mi east of courthouse in Greeley, and 3.0 mi upstream from mouth.

**DRAINAGE AREA.**--1,877 mi<sup>2</sup>.

**GAGE.**--Water-stage recorder with satellite telemetry in a 48" metal shelter and well with wire weight gage on bridge above the station. Elevation of gage is 4,610 ft above National Geodetic Vertical Datum of 1929, from topographic map.

**REMARKS.**--Primary record is taken from the hourly satellite gage readings and is mostly complete. The A-35 chart values were used October 28,2001 and April 7, 2002. There were several periods when the recorder clock stopped but there was complete satellite data for all of these days, except November 30 when the clock was stopped and transmissions were missed. The record is fair except for the following days which were estimated: November 15 & 30; February 12-14,25-28; March 2-4; April 12-24; May 4-9 & 11; July 2-3 & 9; August 2 & 5. Station maintained and records developed by George Sievers.

**RATING TABLE.**--CLAGRESH01 USED FROM 01-OCT-2001 TO 01-OCT-2001  
CLAGRECO26 USED FROM 29-OCT-2001 TO 09-APR-2002

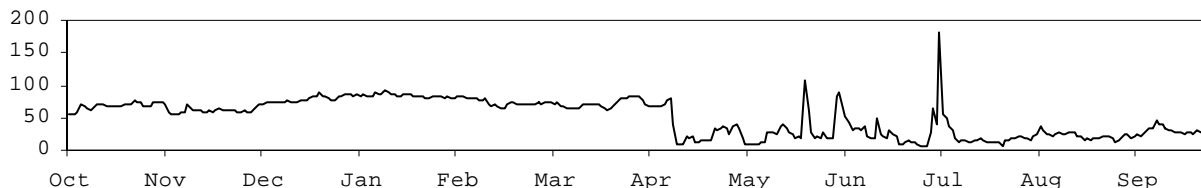
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	54	72	71	87	79	70	82	37	19	6.6	22	15
2	55	57	71	82	82	75	78	41	19	5.8	18	17
3	54	54	73	86	83	75	71	33	83	27	18	25
4	60	54	73	82	82	73	69	17	90	66	14	24
5	71	56	75	83	79	72	67	8	65	39	21	19
6	69	58	75	84	79	73	68	8	53	183	26	21
7	64	60	75	89	79	69	69	8	43	54	37	25
8	63	72	74	86	80	68	69	8	32	49	31	23
9	65	65	75	85	76	66	71	9	33	37	26	24
10	71	63	77	91	78	66	77	13	34	32	24	32
11	72	62	74	88	80	66	79	13	30	19	22	33
12	72	63	74	87	71	64	40	27	37	13	24	33
13	67	60	75	86	67	65	10	28	23	15	28	45
14	69	57	77	84	71	71	8	28	19	14	26	40
15	68	61	76	84	69	71	8	24	20	12	24	39
16	69	59	76	86	66	71	23	36	48	13	28	35
17	69	61	81	86	66	70	20	41	24	14	28	30
18	67	64	82	85	70	71	21	34	23	15	27	30
19	72	63	84	83	74	72	13	27	17	17	22	28
20	72	63	88	83	73	68	12	25	31	16	22	27
21	70	63	82	82	72	65	16	18	26	12	15	27
22	76	61	84	82	70	62	16	21	21	13	18	25
23	75	61	80	80	70	66	16	20	10	11	14	28
24	73	59	78	81	70	67	16	108	8.4	12	18	28
25	68	58	78	82	71	75	35	61	12	11	18	26
26	68	63	82	83	71	81	30	29	14	6.5	18	31
27	67	60	84	82	72	81	35	18	13	16	22	28
28	74	60	85	82	73	81	38	22	13	16	21	28
29	74	63	86	81	---	84	33	20	9.3	17	23	27
30	73	67	85	83	---	83	26	27	7	20	18	47
31	75	---	84	80	---	83	---	20	---	23	13	---
TOTAL	2116	1839	2434	2605	2073	2224	1216	829	876.7	804.9	686	860
MEAN	68	61	79	84	74	72	40.5	26.7	29.2	26	22	29
AC-FT	4200	3650	4830	5170	4110	4410	2410	1640	1740	1600	1360	1710
MAX	76	72	88	91	83	84	82	108	90	183	37	47
MIN	54	54	71	80	66	62	8	8	7	5.8	13	15

WTR YR 2002 TOTAL 18563.6 MEAN 50.9 MAX 183 MIN 5.8 AC-FT 36820

MAX DISCH: 629 CFS AT 04:45 ON Jul. 6, 2002 GH 3.99 FT. SHIFT -0.3 FT.  
MAX GH: 3.99 FT. AT 04:45 ON Jul. 6, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06754000 SOUTH PLATTE RIVER NEAR KERSEY, CO

**LOCATION.**--Lat 40°24'44", long 104°33'46", in NW¼SW¼ sec. 9, T.5 N., R.64 W., Weld County, Hydrologic Unit 10190003, on downstream side of bridge on State Highway 37, 1.9 mi north of railroad in Kersey, and 2.5 mi downstream from Cache la Poudre River.

**DRAINAGE AREA AND PERIOD OF RECORD.**--9,598 mi<sup>2</sup>. May 1901 to Dec. 1903, Mar. 1905 to current year. Monthly totals only for some periods. Periodic water-quality data available from 1950.

**GAGE.**--A graphic water-stage recorder and digital shaft encoder activated by a manometer in a concrete block shelter, also equipped with a satellite monitoring DCP. Both devices are hooked to the manometer. An outside wire weight is used for referencing the gage. A land-line phone is installed and the DCP is equipped with a voice modem card.

**REMARKS.**--The primary record is hourly data taken from the manometer. The manometer-encoder tracking was checked by comparison to chart mean gage heights. Satellite data checked against the chart to ±0.02 ft. Record is rated fair due to manometer operation and channel instability. The period from November 25, 2001 until January 29, 2002 as well as the estimated days of January 30-31, April 5, June 9-10, July 4-5 & 9, and September 12-13 should be considered poor. For complete station break down, see original record at Division Office. Station maintained and record developed by George Sievers.

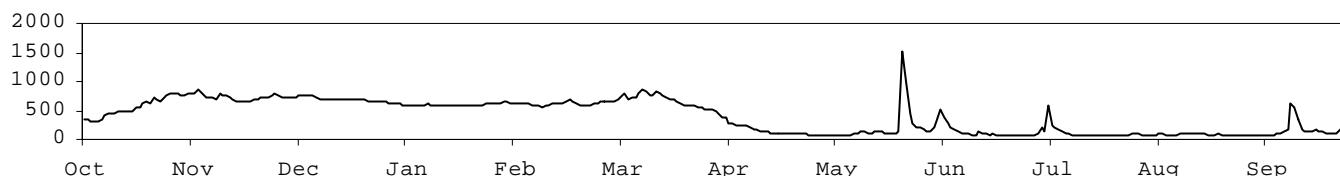
**RATING TABLE.**--PLAKERCO22 USED FROM 01-OCT-2001 TO 30-SEP-2002  
 PLAKERSH01,02,03,04 USED ALONG WITH PLAKERCO22 AT VARIOUS TIMES THROUGH OUT THE YEAR DUE TO SHIFTING SANDS. SEE DAILY RECORD FOR DETAILS.

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
 MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	350	787	726	597	633	663	484	72	154	73	89	70
2	331	807	750	590	622	663	435	80	148	72	84	68
3	300	846	759	597	625	644	391	74	191	108	79	78
4	295	778	759	590	629	690	367	66	304	210	70	78
5	319	732	742	590	623	759	290	57	527	150	75	70
6	359	732	742	598	607	798	272	62	366	599	82	63
7	411	718	734	597	584	697	249	66	262	236	95	75
8	433	700	701	605	593	739	247	70	200	201	116	73
9	448	780	701	597	574	738	247	68	170	160	83	76
10	450	755	692	583	538	792	237	83	130	136	80	97
11	466	742	684	583	579	851	223	88	109	89	79	111
12	484	708	684	590	578	815	183	111	115	88	83	130
13	481	689	684	590	616	756	157	126	95	82	92	160
14	485	670	684	597	619	765	140	122	83	81	91	621
15	486	663	676	590	620	816	130	111	80	77	88	554
16	545	659	684	582	634	809	121	118	128	74	91	334
17	563	666	692	582	669	755	112	150	87	74	89	183
18	604	671	701	590	698	717	109	152	87	77	93	137
19	648	675	701	583	642	706	104	139	75	75	90	133
20	628	700	684	583	619	695	102	119	120	74	90	146
21	709	738	684	583	599	651	107	108	86	66	86	167
22	684	708	668	597	594	611	101	103	79	66	86	125
23	668	711	660	590	587	580	98	94	76	66	85	121
24	725	760	645	590	590	579	88	137	79	64	96	114
25	750	776	645	605	606	590	100	1530	80	64	84	111
26	776	759	645	613	616	597	90	950	75	66	81	118
27	779	726	645	609	644	560	94	434	77	76	79	120
28	808	726	637	629	649	537	86	291	79	78	79	171
29	755	726	629	621	---	524	75	224	79	84	78	202
30	769	726	621	640	---	521	71	196	76	94	79	183
31	792	---	613	640	---	501	---	164	---	96	79	---
TOTAL	17301	21834	21272	18531	17187	21119	5510	6165	4217	3556	2651	4689
MEAN	558	728	686	598	614	681	184	199	141	115	86	156
AC-FT	34320	43310	42190	36760	34090	41890	10930	12230	8360	7050	5260	9300
MAX	808	846	759	640	698	851	484	1530	527	599	116	621
MIN	295	659	613	582	538	501	71	57	75	64	70	63

WTR YR 2002 TOTAL 144032 MEAN 395 MAX 1530 MIN 57 AC-FT 285700

MAX DISCH: 2060 CFS AT 12:00 ON May. 25, 2002 GH 5.47 FT. SHIFT -0.05 FT.  
 MAX GH: 5.47 FT. AT 12:00 ON May. 25, 2002



FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.

06758500 SOUTH PLATTE RIVER NEAR WELDONA, CO

**LOCATION.**--Lat 40°19'16", long 103°55'10", in SW¼SW¼ sec. 7, T.4 N., R.58 W., Morgan County, Hydrologic Unit 10190003, on left bank 875 ft downstream from bridge on State Highway 144, 2.8 mi southeast of Weldona, and 4.2 mi upstream from Bijou Creek.

**DRAINAGE AREA AND PERIOD OF RECORD.**--13,245 mi<sup>2</sup>. October 1952 to current year.

**GAGE.**--Graphic water-stage recorder and satellite monitoring equipment in a corrugated metal pipe and stilling well. The satellite equipment is a Sutron 8004 with digital shaft encoder. An electric tape inside the station references the gage. A new station was installed and operation began on May 2, 1991.

**REMARKS.**--The primary record is hourly data taken from satellite monitoring with chart back up. The record is complete and reliable. Mean gage heights from the chart were used October 28, 2001, and April 7, 2002 to compute discharge on daylight savings time days. Chart values were also used February 10-13. Record is considered fair because of all the shifting sand. Station maintained and record developed by George Sievers.

**RATING TABLE.**--PLAWELCO16 USED FROM 01-OCT-2001 TO 30-SEP-2002  
 PLAWELSH01,02,03,04,05,06,07,08,09 USED ALONG WITH PLAWELCO16 AT VARIOUS TIMES THROUGH THE YEAR  
 DUE TO SHIFTING SANDS. SEE DAILY RECORD FOR DETAILS.

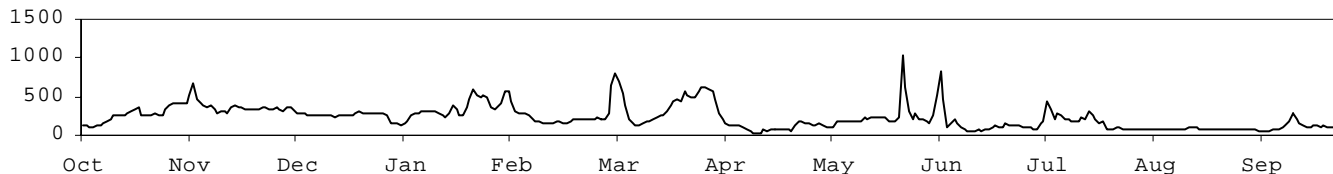
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
 MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	137	517	326	140	576	200	575	134	211	95	74	71
2	123	672	290	158	447	275	461	143	189	96	82	70
3	113	476	282	179	319	657	297	118	162	89	76	68
4	107	409	275	261	292	803	215	111	254	90	75	67
5	119	380	271	294	293	691	153	102	524	143	76	66
6	128	364	262	296	292	540	138	106	827	182	73	61
7	143	380	261	298	246	377	130	191	469	435	72	58
8	185	348	255	303	198	212	136	181	92	338	75	60
9	217	294	249	299	181	147	131	179	166	201	77	64
10	249	311	253	311	184	140	96	181	195	275	79	67
11	246	310	251	315	165	129	69	181	163	265	71	71
12	259	295	247	284	154	148	52	183	112	219	69	73
13	262	351	243	252	158	180	32	185	71	198	67	98
14	277	376	249	231	163	186	28	192	54	184	69	121
15	309	359	250	277	180	215	31	222	61	171	70	176
16	333	351	250	391	181	239	70	216	63	173	90	295
17	356	343	249	326	162	253	55	224	78	234	99	213
18	267	342	246	250	163	268	72	221	64	214	101	153
19	259	340	272	254	189	309	80	225	80	303	96	130
20	257	343	299	366	209	386	82	221	86	250	90	106
21	252	339	295	456	201	446	81	235	102	213	84	113
22	280	359	288	589	198	462	80	187	138	150	73	134
23	257	355	291	515	205	447	65	172	93	181	69	123
24	251	342	287	479	208	557	58	191	115	85	73	109
25	325	343	281	506	209	507	124	243	146	79	73	118
26	387	363	277	494	205	493	177	1040	140	84	74	98
27	410	329	286	370	228	494	175	625	125	91	80	95
28	408	323	253	347	211	562	145	311	136	92	72	95
29	404	355	155	350	---	625	143	196	120	87	71	104
30	410	370	143	415	---	611	140	272	100	80	77	124
31	419	---	151	580	---	606	---	205	---	76	75	---
TOTAL	8149	11039	7987	10586	6417	12165	4091	7193	5136	5373	2402	3201
MEAN	263	368	258	341	229	392	136	232	171	173	78	107
AC-FT	16160	21900	15840	21000	12730	24130	8110	14270	10190	10660	4760	6350
MAX	419	672	326	589	576	803	575	1040	827	435	101	295
MIN	107	294	143	140	154	129	28	102	54	76	67	58

WTR YR 2002 TOTAL 83739 MEAN 229 MAX 1040 MIN 28 AC-FT 166100

MAX DISCH: 1270 CFS AT 08:45 ON May. 26, 2002 GH 3.77 FT. SHIFT 0.68 FT.  
 MAX GH: 3.77 FT. AT 08:45 ON May. 26, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06759910 SOUTH PLATTE RIVER AT BALZAC, CO

**LOCATION.**--Lat 40°21'23", long 103°31'39", in SW¼NE¼ sec. 33, T.5 N., R.55 W., Morgan County, Hydrologic Unit 10190012, on bank 4.3 mi northeast of Snyder, and .7 mi downstream from North Sterling Canal.

**DRAINAGE AREA.**--16,852 mi<sup>2</sup>.

**GAGE.**--Stevens A-35 type graphic water stage recorder and satellite monitoring DCP and stilling well. Gage is referenced with an electric tape and there is a supplemental outside wire weight. The DCP is an 8210 with a speech modem

**REMARKS.**--The primary record is hourly data taken from satellite monitoring with chart back up. The record is complete and reliable except for the following days. May 19-20, 24-28, June 28, July 2, 5-6, 23, 29, August 27, September 11, 15-17, 20 ---Inlets plugged. Mean daily chart values were used October 28, and April 7 to correct for Daylight Savings Time. Record is good, except for the days with plugged inlets, which were fair. Station maintained and record developed by George Sievers.

**RATING TABLE.**--PLABALCO03 USED FROM 01-OCT-2001 TO 28-DEC-2001  
 PLABALSH03 USED FROM 08-MAR-2002 TO 08-MAR-2002  
 PLABALCO03 USED FROM 08-MAR-2002 TO 02-APR-2002  
 PLABALSH03 USED FROM 02-APR-2002 TO 29-APR-2002  
 PLABALCO03 USED FROM 29-APR-2002 TO 30-SEP-2002

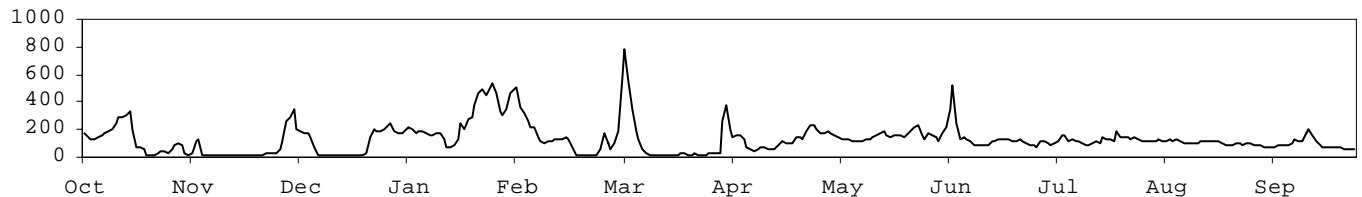
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
 MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	173	24	207	183	499	53	29	180	153	78	115	94
2	143	114	185	212	505	98	262	183	145	110	114	87
3	132	137	180	197	366	187	384	167	122	112	116	81
4	134	18	179	172	323	565	196	156	168	95	118	76
5	150	18	151	182	268	779	146	142	220	90	127	70
6	154	18	75	194	216	553	156	130	347	100	121	71
7	167	19	16	172	213	345	153	125	528	121	119	76
8	186	19	16	155	148	185	136	127	247	166	126	80
9	203	18	15	160	111	124	76	118	135	164	117	82
10	244	19	15	180	101	63	65	111	138	117	126	85
11	285	19	14	169	118	27	50	109	131	137	117	91
12	287	18	14	135	119	15	58	113	109	116	103	103
13	307	18	14	66	130	15	69	127	89	111	103	124
14	334	19	15	70	129	15	72	125	84	100	99	117
15	204	19	15	84	131	15	65	142	90	92	95	120
16	72	19	15	128	145	15	56	166	85	86	98	170
17	71	19	15	241	135	16	53	175	94	102	113	200
18	55	19	17	199	78	16	84	183	120	114	116	163
19	19	19	18	278	17	17	116	160	110	102	119	123
20	19	19	19	297	18	18	108	150	124	146	119	80
21	19	20	24	374	17	27	106	153	127	131	116	69
22	22	23	149	457	17	22	103	154	134	128	109	69
23	47	28	205	498	18	20	140	154	134	120	101	67
24	40	29	187	443	18	21	139	150	117	191	91	72
25	36	22	193	484	20	22	135	170	114	152	91	71
26	63	61	200	532	65	20	186	190	126	143	92	69
27	86	119	231	464	169	21	226	220	123	139	100	62
28	104	262	252	327	104	21	237	230	100	131	96	62
29	86	296	189	310	---	31	207	157	89	140	90	62
30	31	348	172	354	---	30	180	127	82	131	99	62
31	19	---	171	458	---	30	---	172	---	119	96	---
TOTAL	3892	1800	3168	8175	4198	3386	3993	4766	4385	3784	3362	2758
MEAN	126	60	102	264	150	109	133	154	146	122	108	92
AC-FT	7720	3570	6280	16220	8330	6720	7920	9450	8700	7510	6670	5470
MAX	334	348	252	532	505	779	384	230	528	191	127	200
MIN	19	18	14	66	17	15	29	109	82	78	90	62

WTR YR 2002 TOTAL 47667 MEAN 131 MAX 779 MIN 14 AC-FT 94550

MAX DISCH: 960 CFS AT 15:00 ON Mar. 5, 2002 GH 2.87 FT. SHIFT 0.36 FT.  
 MAX GH: 2.87 FT. AT 15:00 ON Mar. 5, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06763990 SOUTH PLATTE RIVER AT JULESBURG, CO. CHANNEL NO 2

**LOCATION.**--Lat 40°58'37", long 102°14'52", in NE¼SE¼ sec. 33, T.12 N., R.44 W., Sedgwick County, on right bank of channel No 2 (right channel) 5 ft downstream from bridge on U.S. Highway 385, 0.9 mi southeast of Julesburg, 3.0 mi upstream from Colorado-Nebraska State line, and 8 mi downstream from Lodgepole Creek.

**DRAINAGE AREA AND PERIOD OF RECORD.**--23,193 mi<sup>2</sup>. April 1902 to current year. Monthly data only for some periods. Published as near Julesburg and at Ovid in earlier years. Water quality data available from 1945 to 1995.

**GAGE.**--Satellite monitoring DCP and connected to a Sutron Accubbler. A wire weight gage on the bridge is used to reference the bubbler. The accubbler was moved this summer from the concrete shelter on the bridge abutment out onto the bridge next to the shaft encoder in the bridge well. Datum of gage is 3,448.51 ft. above National Geodetic Vertical Datum of 1929.

**REMARKS.**--The primary record was hourly data taken from the Acubbler. Very low flows, equipment problems, and sand channel variability all combined to give us marginal record most of the time. The channel was dry from June 19 to September 30. Record is fair, except for the periods listed which are estimated: October 1-4, 13-30; November 4-6; January 10-31, February 1-28; March 1-28; April 19-30, May 1-31, and June 1-7. This record is part of South Platte at Julesburg--combined flow, which includes records on channels 1, 2, and 4. Station maintained and record developed by Div. 1 Hydrographic Staff.

**RATING TABLE.**--PLAJURCO19 USED FROM 01-OCT-2001 TO 19-DEC-2010

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

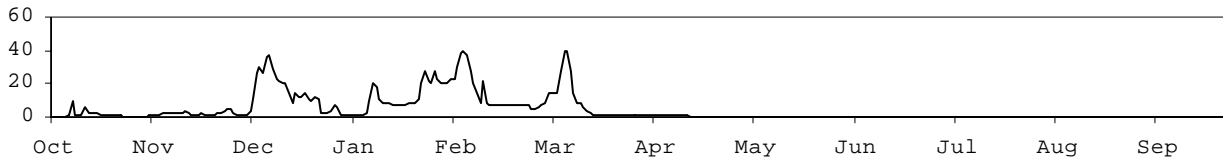
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.3	1.5	3.7	1.5	23	7	.93	.3	.2	0	0	0
2	.3	1.7	11	1.4	23	8	1	.3	.3	0	0	0
3	.3	1.5	27	1.3	30	14	1.1	.3	.3	0	0	0
4	.3	1.9	30	1.4	39	14	1.2	.3	.3	0	0	0
5	.51	2.3	26	1.5	40	14	1.3	.3	.4	0	0	0
6	1.6	2.6	36	3	37	14	1.4	.3	.4	0	0	0
7	9.3	2.9	37	9.4	28	28	1.2	.3	.49	0	0	0
8	.9	3	29	20	20	40	1.4	.3	.41	0	0	0
9	.66	3	23	18	14	40	1.5	.3	.4	0	0	0
10	1.6	2.9	22	11	8	28	1.5	.3	.38	0	0	0
11	5.9	3.1	20	8	22	14	.85	.3	.35	0	0	0
12	2.6	2.2	20	8	8	8	.7	.3	.34	0	0	0
13	2.5	1.5	15	8	7	8	1.1	.3	.31	0	0	0
14	2.5	1.5	8.9	7	7	6	1	.3	.27	0	0	0
15	2.5	1.7	14	7	7	4	.61	.3	.25	0	0	0
16	1.5	2.2	12	7	7	2	.57	.3	.18	0	0	0
17	1	1.2	12	7	7	1	.52	.3	.1	0	0	0
18	1	1.1	14	7	7	1	.5	.3	.01	0	0	0
19	1	1.2	11	8	7	1	.5	.3	0	0	0	0
20	.9	1.5	10	9	7	1	.5	.3	0	0	0	0
21	.8	1.9	12	9	7	1	.5	.3	0	0	0	0
22	.7	2	11	11	7	1	.5	.2	0	0	0	0
23	.6	3.4	2.2	21	7	1	.5	.2	0	0	0	0
24	.5	5	2	28	7	1	.4	.2	0	0	0	0
25	.4	5.3	2.4	22	7	1	.4	.2	0	0	0	0
26	.4	2.6	3.2	21	5	1	.4	.2	0	0	0	0
27	.4	1.2	7.7	28	5	1	.4	.2	0	0	0	0
28	.4	1.1	5.8	23	6	1	.4	.2	0	0	0	0
29	.5	1.2	1.6	21	---	.75	.4	.2	0	0	0	0
30	.6	1.5	1.5	20	---	.77	.4	.2	0	0	0	0
31	.75	---	1.5	20	---	.83	---	.2	---	0	0	---
TOTAL	43.22	65.7	432.5	368.5	399	263.35	23.68	8.3	5.39	0	0	0
MEAN	1.39	2.2	14	11.9	14.2	8.5	.79	.27	.18	0	0	0
AC-FT	86	130	858	731	791	522	47	16	11	0	0	0
MAX	9.3	5.3	37	28	40	40	1.5	.3	.49	0	0	0
MIN	.3	1.1	1.5	1.3	5	.75	.4	.2	0	0	0	0

WTR YR 2002 TOTAL 1609.64 MEAN 4.41 MAX 40 MIN 0 AC-FT 3190

MAX DISCH: 44.7 CFS AT 13:00 ON Dec. 5, 2001 GH 3.50 FT. SHIFT 0.25 FT.

MAX GH: 3.62 FT. AT 23:00 ON Dec. 4, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





PLATTE RIVER BASIN

06763990 SOUTH PLATTE RIVER AT JULESBURG, CO. CHANNEL NO 1

LOCATION.--Lat 40°58'37", long 102°14'52", in NE¼SE¼ sec. 33, T.12 N., R.44 W.

DRAINAGE AREA.--23,193 mi<sup>2</sup>.

GAGE.--Graphic water-stage recorder and satellite monitoring DCP (Sutron 8210) are connected to an AccuBubbler manometer. A wire weight gage on the bridge is used to reference the gage. DCP data is the primary record with chart as backup.

REMARKS.--The primary record is the hourly satellite data. The record is complete. The record is good from March 15 to September 30. It is fair for the rest of the year, except for these periods: December 19-22, 25-28; and January 6-9: the record is poor due to a large encoder corrections. November 14, 30; December 1-3, 7-18, 23, 24, 29-31; January 1-5, 15, 16, 29, 30; and March 1-13: the record was estimated. This record is added to the daily flows of channels 2,3, and 4 to form the record for the South Platte River at Julesburg, Combined flow. Station maintained and record developed by Div. 1 Hydrographic Staff.

RATING TABLE.--ONEJURCO05 USED FROM 01-OCT-2001 TO 30-SEP-2002

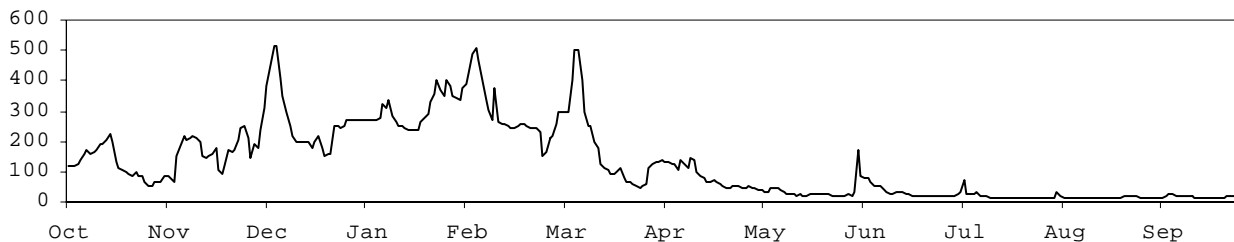
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	119	85	310	270	377	220	125	51	29	20	12	15
2	120	77	380	270	386	260	132	49	23	17	10	14
3	121	65	450	270	424	300	135	47	36	18	10	14
4	122	151	515	270	489	300	140	42	169	19	10	14
5	141	182	516	270	509	300	135	40	88	24	30	15
6	155	215	406	277	467	300	129	35	79	31	18	15
7	172	206	350	321	401	400	128	34	80	75	16	15
8	157	213	300	312	336	500	123	47	67	29	14	17
9	162	220	250	338	304	500	106	43	56	29	15	28
10	173	210	220	286	268	400	139	43	52	24	15	26
11	189	197	200	261	374	300	124	42	51	31	13	21
12	191	153	200	252	264	250	115	30	42	21	12	19
13	202	142	200	251	258	250	146	29	30	19	13	17
14	227	150	200	241	255	200	137	27	25	17	11	18
15	200	155	200	240	249	175	102	24	28	16	11	18
16	134	176	180	240	246	128	85	23	32	15	11	17
17	115	105	200	236	247	114	77	24	30	13	11	14
18	106	92	220	239	250	103	68	23	30	13	11	14
19	102	121	175	266	255	95	66	22	27	13	11	14
20	95	170	154	276	254	91	70	25	25	15	12	13
21	88	164	157	291	248	99	66	24	21	16	12	14
22	96	171	157	332	243	113	58	25	18	14	11	15
23	85	205	250	358	242	78	51	24	20	12	12	15
24	85	241	250	400	243	65	49	25	19	12	15	16
25	65	251	246	366	230	64	49	25	18	12	13	16
26	56	210	249	349	149	57	52	26	21	12	20	16
27	52	147	270	405	163	50	53	22	21	11	19	18
28	69	194	271	380	209	47	53	21	22	11	17	19
29	69	178	270	350	---	50	49	21	20	13	18	20
30	69	240	270	340	---	62	48	21	20	10	19	19
31	88	---	270	339	---	109	---	21	---	10	16	---
TOTAL	3825	5086	8286	9296	8340	5980	2810	955	1199	592	438	506
MEAN	123	170	267	300	298	193	94	31	40	19	14	17
AC-FT	7590	10090	16440	18440	16540	11860	5570	1890	2380	1170	869	1000
MAX	227	251	516	405	509	500	146	51	169	75	30	28
MIN	52	65	154	236	149	47	48	21	18	10	10	13

WTR YR 2002 TOTAL 47313 MEAN 130 MAX 516 MIN 10 AC-FT 93850

MAX DISCH: 540 CFS AT 10:00 ON Dec. 5, 2001 GH 4.52 FT. SHIFT 0.17 FT.  
MAX GH: 4.52 FT. AT 10:00 ON Dec. 5, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

06763980 SOUTH PLATTE RIVER AT JULESBURG, CO. CHANNEL NO 4 (INCLUDES FLOW FROM CHANNEL NO 3)

**LOCATION.**--Lat 40°58'46", long 102°15'15", in NW¼NE¼ sec. 33, T.12 N., R.44 W., Sedgwick County, Hydrologic Unit 10190018, on left bank of channel No 4 (left channel) 215 ft downstream from bridge on U.S. Highway 385, 0.9 mi southeast of Julesburg, 3.0 mi upstream from Colorado-Nebraska State line, and 8 mi downstream from Lodgepole Creek.

**DRAINAGE AREA.**--23,193 mi<sup>2</sup>.

**GAGE.**--Water-stage graphic recorder with satellite telemetry. Supplemental outside chain gage. DCP is primary record with chart as backup.

**REMARKS.**--The primary record is hourly data taken from satellite monitoring with chart backup. The record is complete. The record is Fair due to sand movement through the channel and possible ice effects, except for the following days which were estimated: November 26; January 22-26; February 18-21; March 1, 9, 10; June 19, 20; July 30, 31; August 6, 7, 21-28; September 6-11, 14-17, 26, 27. This record is added to the daily flows of channels 1 and 2 to form the record for the South Platte River at Julesburg, Combined flow. Station maintained and record developed by Div. 1 Hydrographic Staff.

**RATING TABLE.**--PLAJULCO22 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

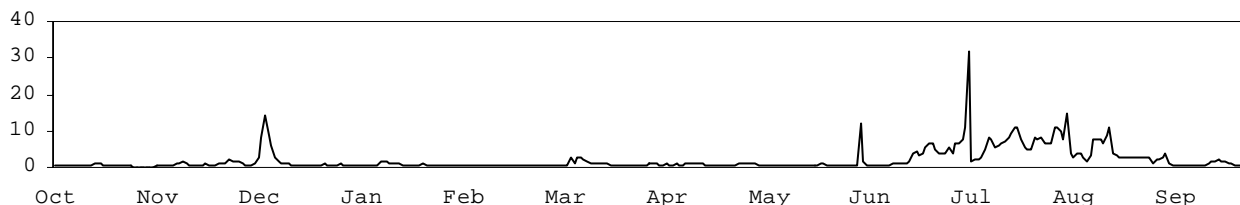
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.28	.29	1.1	.55	.4	.5	.85	.84	.47	3.6	11	2.3
2	.28	.28	2.8	.54	.47	.4	.84	.83	.49	6.5	11	2.3
3	.28	.28	8.3	.54	.52	.39	.8	.77	.12	6.6	10	2.9
4	.35	.3	14	.58	.59	.42	.81	.75	1.5	7.6	7.5	3.9
5	.49	.51	9	.54	.59	.44	.84	.69	.73	11	15	.83
6	.39	.73	6.1	.56	.57	.48	.82	.62	.65	32	4	.5
7	.39	1.2	2.9	.79	.55	2.7	.78	.61	.62	1.4	2.5	.5
8	.43	1.3	1.7	1.5	.54	1.1	1.1	.61	.61	2.3	3.9	.5
9	.51	1.4	1.1	1.9	.55	3	.69	.61	.63	2.4	3.7	.5
10	.59	1.3	1	1.5	.51	3	.71	.62	.69	2.6	2.5	.5
11	.68	.81	.88	1.1	.49	2.3	.93	.7	.75	5.1	1.5	.5
12	.75	.58	.75	.96	.5	1.4	.87	.69	.8	8.1	3.5	.54
13	.83	.6	.69	1.1	.49	1.1	.87	.63	.86	7.4	7.7	.51
14	1	.61	.69	.97	.48	1	1	.61	.91	5.6	7.5	.3
15	1.2	.68	.66	.71	.44	.93	1	.66	.96	5.8	7.6	.5
16	.76	.89	.66	.6	.35	.92	.92	.66	.98	6.8	6.7	.8
17	.61	.78	.69	.62	.34	.84	.79	.59	1.1	7.2	8.9	1.2
18	.46	.65	.72	.65	.4	.83	.66	.51	1.6	8.3	11	1.8
19	.39	.72	.69	.66	.4	.77	.68	.47	3.6	9.4	4.1	1.9
20	.36	.95	.69	.71	.4	.74	.64	.46	4.5	11	3.2	2
21	.31	1.1	.77	.87	.5	.69	.63	.52	3.5	11	2.5	1.6
22	.3	1.1	.84	.75	.53	.71	.69	.92	4.1	7.7	2.5	1.6
23	.3	2.3	.68	.75	.5	.75	.65	.88	5.6	5.4	2.5	1.3
24	.29	1.6	.61	.75	.54	.69	.69	.54	6.5	5	2.5	.96
25	.26	1.7	.63	.75	.56	.73	.69	.49	6.7	4.9	2.5	.36
26	.25	1.5	.66	.75	.68	.75	.7	.46	5	8.1	2.5	.3
27	.25	.98	.85	.47	.53	.77	.83	.45	3.7	7.6	2.5	.3
28	.26	.77	.82	.46	.54	.78	.83	.44	3.7	8.4	2.5	.37
29	.25	.77	.62	.46	---	.8	.83	.45	3.9	6.8	2.6	.35
30	.25	.79	.59	.43	---	.82	.84	.42	5.3	6.4	2.5	.34
31	.27	---	.6	.37	---	.84	---	.43	---	6.8	.88	---
TOTAL	14.02	27.47	62.79	23.89	13.96	31.59	23.98	18.93	82.45	228.8	158.78	32.26
MEAN	.45	.92	2.03	.77	.5	1.02	.8	.61	2.75	7.4	5.12	1.08
AC-FT	28	54	125	47	28	63	48	38	164	454	315	64
MAX	1.2	2.3	14	1.9	.68	3	1.1	.92	12	32	15	3.9
MIN	.25	.28	.59	.37	.34	.39	.63	.42	.47	1.4	.88	.3

WTR YR 2002 TOTAL 718.92 MEAN 1.97 MAX 32 MIN .25 AC-FT 1430

MAX DISCH: 167 CFS AT 21:30 ON Jun. 3, 2002 GH 2.95 FT. SHIFT -0.16 FT.

MAX GH: 3.32 FT. AT 09:30 ON Jul. 6, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



PLATTE RIVER BASIN

06764000 SOUTH PLATTE RIVER AT JULESBURG, CO (COMBINED)

LOCATION.--See Channel No.2 and Channel No.4.

DRAINAGE AREA.--23,193 mi<sup>2</sup>.

GAGE.--See Channel No.2 and Channel No. 4.

REMARKS.--Combined flow daily flows were computed by inserting the mean daily flows for all three gages into a spreadsheet and adding the totals day-by-day. The daily totals were then manually entered into a blank record spreadsheet, which was renamed PLAJUCCO-South Platte at Julesburg, combined flow. At low flows, channel 2 dries up. Channel 4 has in the past contained only local runoff and irrigation returns. However, this year channel 4 had water pumped into it from construction and well augmentation sources and at times was a significant portion of the summer total. The drought continued this year, with about 95% of the total flow happening in channel 1. Non-estimated Combined flow record is rated as fair due to channel instability and the use of manometers to collect data, except for the periods December 19-22, 25-28, and January 6-9 which should be considered poor due to a large instrument correction on channel one.

JULESBURG COMBINED

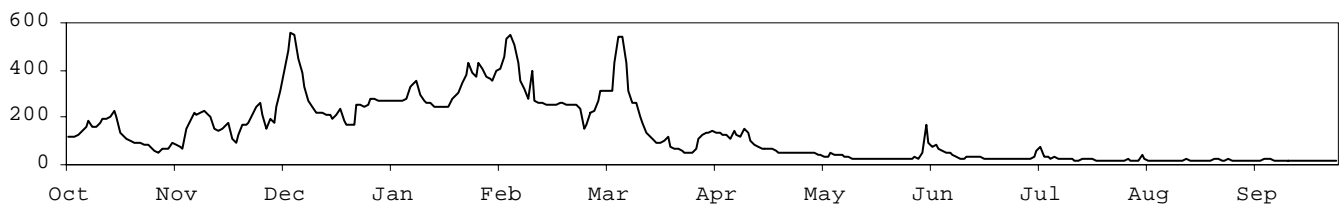
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	120	87	315	272	400	228	127	52	30	24	23	17
2	121	79	394	272	409	268	134	50	24	24	21	16
3	122	67	485	272	455	314	137	48	48	25	20	17
4	123	153	559	272	529	314	142	43	171	27	18	18
5	142	185	551	272	550	314	137	41	89	35	45	16
6	157	218	448	281	505	314	131	36	80	63	22	16
7	182	210	390	331	430	431	130	35	81	76	19	16
8	158	217	331	334	357	541	126	48	68	31	18	18
9	163	224	274	358	319	543	108	44	57	31	19	29
10	175	214	243	299	277	431	141	44	53	27	18	27
11	196	201	221	270	396	316	126	43	52	36	15	22
12	194	156	221	261	273	259	117	31	43	29	16	20
13	205	144	216	260	265	259	148	30	31	26	21	18
14	231	152	210	249	262	207	139	28	26	23	19	18
15	204	157	215	248	256	180	104	25	29	22	19	19
16	136	179	193	248	253	131	86	24	33	22	18	18
17	117	107	213	244	254	116	78	25	31	20	20	15
18	107	94	235	247	257	105	69	24	32	21	22	16
19	103	123	187	275	262	97	67	23	31	22	15	16
20	96	172	165	286	261	93	71	26	30	26	15	15
21	89	167	170	301	256	101	67	25	25	27	15	16
22	97	174	169	344	251	115	59	26	22	22	14	17
23	86	211	253	380	250	80	52	25	26	17	15	16
24	86	248	253	429	251	67	50	26	26	17	18	17
25	66	258	249	389	238	66	50	26	25	17	16	16
26	57	214	253	371	155	59	53	27	26	20	23	16
27	53	149	279	433	169	52	54	23	25	19	22	18
28	70	196	278	403	216	49	54	22	26	19	20	19
29	70	180	272	371	---	52	50	22	24	20	21	20
30	70	242	272	360	---	64	49	22	25	16	22	19
31	89	---	272	359	---	111	---	22	---	17	17	---
TOTAL	3885	5178	8786	9691	8756	6277	2856	986	1289	821	606	541
MEAN	125	173	283	313	313	202	95	32	43	27	20	18
AC-FT	7710	10270	17430	19220	17370	12450	5660	1960	2560	1630	1200	1070
MAX	231	258	559	433	550	543	148	52	171	76	45	29
MIN	53	67	165	244	155	49	49	22	22	16	14	15

WTR YR 2002 TOTAL 49672 MEAN 136 MAX 559 MIN 14 AC-FT 98520

MAX DISCH: 572 CFS AT 11:00 ON Dec. 04, 2001 GH 4.50 FT. SHIFT 0.17 FT.  
MAX GH: 4.52 FT. AT 10:00 ON Dec. 04, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## PLATTE RIVER BASIN

## TRANSMOUNTAIN DIVERSIONS INTO THE SOUTH PLATTE BASIN IN COLORADO

## TRANSMOUNTAIN DIVERSIONS INTO THE SOUTH PLATTE BASIN IN COLORADO

WATER YEAR 2002 (October 2001 - September 2002)

## FROM THE COLORADO RIVER BASIN

NAME	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	TOTAL
Adams Tunnel*	9084.2	8502.5	15085	15085	13546	14443	7971	15101	14492	7278	10277	4273	135,138
Aurora Homestake	2142	2015	2698	1773	1837	2098	2013	2607	0	1907	1901	1579.6	22,571
Berthoud Pass Ditch	0	0	0	0	0	0	0	24	100.5	0	0	0	125
Boreas Pass Ditch	0	0	0	0	0	0	0.37	3.5	10.87	0	0	0	15
Grand River Ditch	9.62	0	0	0	0	0	25	1014	2854	532.7	181.5	116.78	4,734
Hoosier Pass Ditch	522.7	0	0	0	0	0	24.29	381.3	785	0	0	0	1,713
Moffat Tunnel**	1447	646	445	306.5	204.7	186.9	833.3	3775	5306	1285	1065	1547	17,047
Roberts Tunnel	5813	2728	3757	3699	3345	3747	6947	8590	8990	10406	5876	1901	65,799
Straight Creek Tunnel	8.99	8.7	8.99	8.99	8.12	8.99	8.7	11.75	17.23	10.94	7.57	4.6	114
Vidler Tunnel	0	0	0	0	0	0	0	33.44	82.4	18.79	14.07	12.57	161
TOTALS FROM THE COLORADO RIVER BASIN (DAY-CFS)													247,416
TOTALS FROM THE COLORADO RIVER BASIN (ACRE-FT)													490,749

\*West slope water only

\*\*Includes all flow in August P. Gumlick Tunnel

## FROM THE LARAMIE RIVER BASIN

NAME	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	TOTAL
Bob Creek Ditch	0	0	0	0	0	0	0	1.52	0	0	0	0	2
Deadman Ditch	0	0	0	0	0	0	0	49.13	20.63	0	0	0	70
Laramie-Poudre Tunnel	0	0	0	0	0	0	0	1111.6	3121	681.4	334.4	224.5	5,473
Skyline Ditch	0	0	0	0	0	0	0	0	0	0	0	0	0
TOTALS FOR THE LARAMIE RIVER AGREEMENT (DAY-CFS)													5,544
TOTALS FOR THE LARAMIE RIVER AGREEMENT (ACRE-FT)													10,997
Wilson Supply Ditch (Gage)	0	0	0	0	0	0	0.91	109.73	18.54	0	0	0	129
minus Deadman Ditch	0	0	0	0	0	0	0	49.13	20.53	0	0	0	70
= Net Sand Cr. Diversion	0	0	0	0	0	0	0.91	60.6	-1.99	0	0	0	60
TOTALS FROM THE LARAMIE RIVER BASIN (DAY-CFS)													5,604
TOTALS FROM THE LARAMIE RIVER BASIN (ACRE-FT)													11,115

## FROM THE NORTH PLATTE RIVER BASIN

NAME	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	TOTAL
Cameron Pass Ditch	0	0	0	0	0	0	0	0.77	42.14	0	0	0	43
Michigan Ditch	61.01	35.98	26.46	21.9	14.89	14.11	15.06	162.1	398.9	0	0	0	750
TOTALS FROM THE NORTH PLATTE RIVER BASIN (DAY-CFS)													793
TOTALS FROM THE NORTH PLATTE RIVER BASIN (ACRE-FT)													1,574

TRANSMOUNTAIN DIVERSION TO

PLATTE RIVER BASIN

AURORA HOMESTAKE PIPELINE ABOVE ELEVENMILE RESERVOIR

LOCATION.--

**GAGE.--**A venturi meter in the pipeline. A Parshall flume installed in the outfall channel was washed around and isolated in localized flooding on July 30, 1998. This water originates in the Eagle River drainage of the Colorado River basin. It is diverted through the Homestake Tunnel and is stored in Twin Lakes in the Arkansas basin. A pipeline from Twin Lakes goes to the Otero Pump station, where water is pumped into the Aurora-Homestake pipeline for use by Aurora and Colorado Springs.

**REMARKS.--**The primary record is hourly discharges taken from satellite monitoring. The record must be regarded as poor until the meter is calibrated with discharge measurements. The total Colorado River water imported for Homestake pipeline use this year via Homestake (5%), Busk-Ivanhoe (50%), and Twin-Lakes Tunnel (50%) was 15,624 AF. Since 44,770 AF was imported through the pipeline, the remainder of the water imported is assumed to be Colorado River water stored in previous years and Arkansas transfer water. The record was developed by Robert E. Cooper.

**RATING TABLE.--**STCONVERT USED FROM 01-OCT-2001 TO 30-SEP-2002

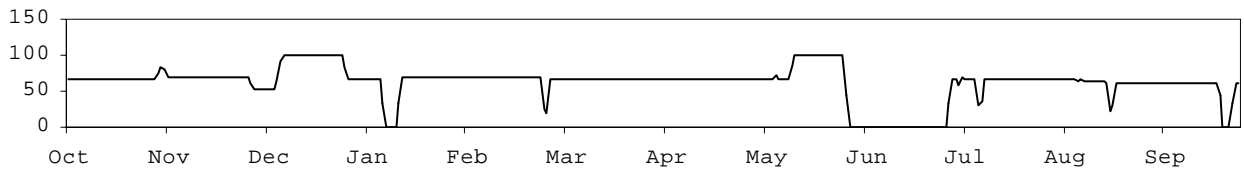
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	68	69	53	66	69	68	67	67	0	0	66	60
2	68	69	53	66	69	68	67	67	0	33	66	61
3	68	69	53	66	69	68	68	67	0	68	66	61
4	68	69	53	66	69	68	67	67	0	68	66	60
5	68	69	64	66	69	67	67	67	0	57	66	60
6	68	69	91	66	69	67	67	66	0	69	66	60
7	68	69	101	32	69	67	68	67	0	68	66	60
8	68	69	101	0	69	67	68	67	0	68	66	60
9	68	69	101	0	69	67	67	73	0	68	66	60
10	68	69	101	0	69	67	67	67	0	68	66	60
11	68	69	101	0	69	67	67	67	0	31	65	60
12	68	69	101	34	69	67	67	67	0	36	66	60
13	68	69	101	69	69	68	67	67	0	67	64	60
14	68	69	101	69	69	68	67	86	0	67	64	60
15	68	69	101	69	69	68	67	100	0	67	64	60
16	68	69	101	69	69	68	67	100	0	67	64	60
17	68	69	101	69	69	68	67	100	0	67	64	60
18	68	69	101	69	69	68	67	100	0	67	64	60
19	68	69	101	69	69	68	67	100	0	67	63	60
20	68	69	101	69	69	68	67	100	0	67	62	60
21	68	69	101	69	69	68	67	100	0	67	22	60
22	68	69	101	69	69	68	67	100	0	67	30	60
23	68	69	101	69	69	68	67	100	0	67	61	60
24	68	69	101	69	69	68	67	100	0	67	61	44
25	68	69	101	69	69	68	67	100	0	67	61	.21
26	68	69	82	69	24	68	67	100	0	67	61	.39
27	68	62	66	69	20	67	67	100	0	67	61	0
28	68	53	66	69	68	68	67	100	0	67	61	33
29	76	53	66	69	---	68	67	100	0	67	61	60
30	82	53	66	69	---	68	67	100	0	67	61	60
31	80	---	66	69	---	67	---	45	---	67	61	---
TOTAL	2142	2015	2698	1773	1837	2098	2013	2607	0	1907	1901	1579.6
MEAN	69	67	87	57.2	66	68	67	84	0	61.5	61	52.7
AC-FT	4250	4000	5350	3520	3640	4160	3990	5170	0	3780	3770	3130
MAX	82	69	101	69	69	68	68	100	0	69	66	61
MIN	68	53	53	0	20	67	67	45	0	0	22	0

WTR YR 2002 TOTAL 22570.6 MEAN 61.8 MAX 101 MIN 0 AC-FT 44770

MAX DISCH: 101 CFS AT 15:00 ON Dec. 6, 2001 GH N/A. SHIFT N/A.  
MAX GH: N/A

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## PLATTE RIVER BASIN

09042000 EAST PORTAL HOOSIER PASS TUNNEL NEAR ALMA, CO

**LOCATION.**--Lat 39°21'33", long 106°04'37"; Park County, tunnel diverts water from tributaries of Blue River in Colorado River basin to Montgomery Res. (Middle Fork South Platte River) in sec. 14, T. 8 S., R. 78 W., in Platte River basin.

**GAGE.**--Water-stage recorder with satellite telemetry at an 8-ft Parshall flume with a metal stilling well housed inside tunnel entrance. Staff gage installed 1991. Elevation of gage is 10,945 ft by topographic map. Station is owned and maintained by the City of Colorado Springs. Satellite equipment owned by State of Co.

**REMARKS.**--The record is developed from hourly gage heights from the satellite record, with chart back up. Daily mean gage heights were checked against the charts. Mean daily GH's from the chart were used April 4-9, 2002. The record is complete and reliable. The record is fair due to lack of definition by measurements. The flow is controlled by numerous diversions into the tunnel inlet from the Blue River drainage. Record developed by Rodger Burcher.

**RATING TABLE.**--STD08FTPF USED FROM 01-OCT-2001 TO 27-JUN-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

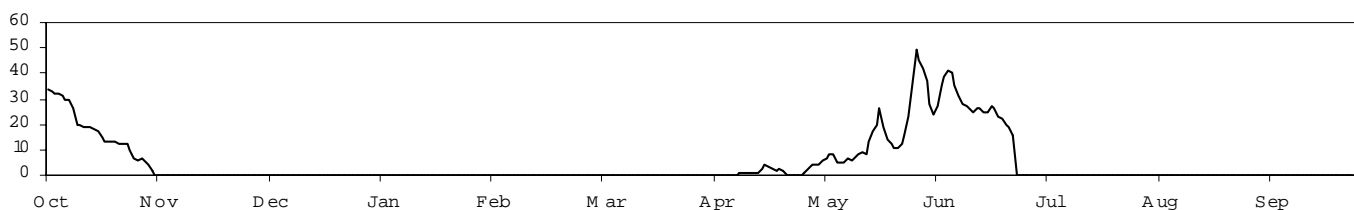
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	34	0	0	0	0	0	0	2.1	45	0	0	0
2	33	0	0	0	0	0	0	4.3	42	0	0	0
3	32	0	0	0	0	0	0	3.8	37	0	0	0
4	32	0	0	0	0	0	0	4.1	28	0	0	0
5	31	0	0	0	0	0	0	5.4	24	0	0	0
6	30	0	0	0	0	0	0	6.7	27	0	0	0
7	30	0	0	0	0	0	0	8.6	35	0	0	0
8	26	0	0	0	0	0	0	8.4	39	0	0	0
9	20	0	0	0	0	0	0	5.1	41	0	0	0
10	20	0	0	0	0	0	.28	4.6	40	0	0	0
11	19	0	0	0	0	0	.38	4.8	35	0	0	0
12	19	0	0	0	0	0	.48	6.6	31	0	0	0
13	19	0	0	0	0	0	.71	5.4	28	0	0	0
14	18	0	0	0	0	0	.88	6.5	27	0	0	0
15	17	0	0	0	0	0	.88	8.1	26	0	0	0
16	15	0	0	0	0	0	.76	9.3	25	0	0	0
17	13	0	0	0	0	0	.81	8.5	26	0	0	0
18	13	0	0	0	0	0	2.1	13	26	0	0	0
19	13	0	0	0	0	0	3.8	17	25	0	0	0
20	13	0	0	0	0	0	3.2	20	25	0	0	0
21	12	0	0	0	0	0	2.3	26	27	0	0	0
22	12	0	0	0	0	0	2	19	26	0	0	0
23	12	0	0	0	0	0	2.4	14	23	0	0	0
24	9.6	0	0	0	0	0	1.7	12	22	0	0	0
25	6.2	0	0	0	0	0	.21	11	20	0	0	0
26	5.9	0	0	0	0	0	.18	11	19	0	0	0
27	6.5	0	0	0	0	0	.18	12	16	0	0	0
28	5.8	0	0	0	0	0	.18	16	0	0	0	0
29	4.4	0	0	0	---	0	.18	23	0	0	0	0
30	1.3	0	0	0	---	0	.68	36	0	0	0	0
31	0	---	0	0	---	0	---	49	---	0	0	---
TOTAL	522.7	0	0	0	0	0	24.29	381.3	785	0	0	0
MEAN	16.9	0	0	0	0	0	.81	12.3	26.2	0	0	0
AC-FT	1040	0	0	0	0	0	48	756	1560	0	0	0
MAX	34	0	0	0	0	0	3.8	49	45	0	0	0
MIN	0	0	0	0	0	0	0	2.1	0	0	0	0

WTR YR 2002 TOTAL 1713.29 MEAN 4.69 MAX 49 MIN 0 AC-FT 3400

MAX DISCH: 60.1 CFS AT 23:00 ON May. 30, 2002 GH 1.48 FT. SHIFT 0 FT.

MAX GH: 1.48 FT. AT 23:00 ON May. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



TRANSMOUNTAIN DIVERSION TO

PLATTE RIVER BASIN

09046000 BOREAS PASS DITCH AT BOREAS PASS, CO

**LOCATION.**--Diverts water from tributaries of Blue River in Colorado River basin to Tarryall Creek in sec. 26, T.7 S., R.77 W., in Platte River basin.

**GAGE.**--Graphic water-stage recorder with satellite monitoring at a standard 18-inch Parshall Flume with a metal stilling well. Station is owned and maintained by City Of Englewood.

**REMARKS.**--The primary record is hourly satellite data with no chart as back up. From April 18 until June 27, 2002 (shut-off), satellite data was collected. The gage was visited 4 times with no corrections necessary to the satellite record. The record is complete and reliable, except for the initial period April 18-May 20, which is considered estimated because the exact GH of zero flow was not recorded. The gage is seasonal and runs typically from June to August. The permanent nature of the flume installation suggests that some permanent level of shift is built into the flume. Record developed by Rodger Burcher.

**RATING TABLE.**-- STD01HFTPF USED FROM 18-APR-2002 TO 27-JUN-2002

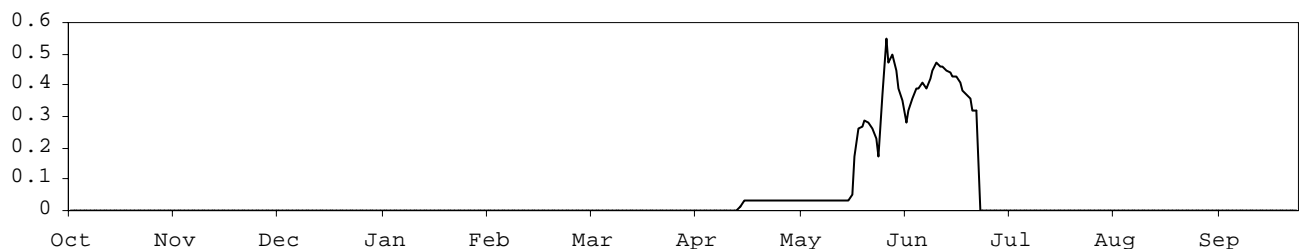
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	.03	.47	0	0	0
2	0	0	0	0	0	0	0	.03	.5	0	0	0
3	0	0	0	0	0	0	0	.03	.45	0	0	0
4	0	0	0	0	0	0	0	.03	.39	0	0	0
5	0	0	0	0	0	0	0	.03	.35	0	0	0
6	0	0	0	0	0	0	0	.03	.28	0	0	0
7	0	0	0	0	0	0	0	.03	.32	0	0	0
8	0	0	0	0	0	0	0	.03	.36	0	0	0
9	0	0	0	0	0	0	0	.03	.39	0	0	0
10	0	0	0	0	0	0	0	.03	.39	0	0	0
11	0	0	0	0	0	0	0	.03	.41	0	0	0
12	0	0	0	0	0	0	0	.03	.39	0	0	0
13	0	0	0	0	0	0	0	.03	.42	0	0	0
14	0	0	0	0	0	0	0	.03	.45	0	0	0
15	0	0	0	0	0	0	0	.03	.47	0	0	0
16	0	0	0	0	0	0	0	.03	.46	0	0	0
17	0	0	0	0	0	0	0	.03	.46	0	0	0
18	0	0	0	0	0	0	.01	.03	.45	0	0	0
19	0	0	0	0	0	0	.03	.03	.44	0	0	0
20	0	0	0	0	0	0	.03	.03	.43	0	0	0
21	0	0	0	0	0	0	.03	.05	.43	0	0	0
22	0	0	0	0	0	0	.03	.17	.41	0	0	0
23	0	0	0	0	0	0	.03	.26	.38	0	0	0
24	0	0	0	0	0	0	.03	.27	.37	0	0	0
25	0	0	0	0	0	0	.03	.29	.36	0	0	0
26	0	0	0	0	0	0	.03	.28	.32	0	0	0
27	0	0	0	0	0	0	.03	.26	.32	0	0	0
28	0	0	0	0	0	0	.03	.23	0	0	0	0
29	0	0	0	0	---	0	.03	.17	0	0	0	0
30	0	0	0	0	---	0	.03	.37	0	0	0	0
31	0	---	0	0	---	0	---	.55	---	0	0	---
TOTAL	0	0	0	0	0	0	.37	3.5	10.87	0	0	0
MEAN	0	0	0	0	0	0	.01	.11	.36	0	0	0
AC-FT	0	0	0	0	0	0	.7	6.9	22	0	0	0
MAX	0	0	0	0	0	0	.03	.55	.5	0	0	0
MIN	0	0	0	0	0	0	0	.03	0	0	0	0

WTR YR 2002 TOTAL 14.74 MEAN .04 MAX .55 MIN 0 AC-FT 29

MAX DISCH: 0.99 CFS AT 23:00 ON May. 30, 2002 GH 0.32 FT. SHIFT -0.01 FT.  
MAX GH: 0.32 FT. AT 23:00 ON May. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## PLATTE RIVER BASIN

09050590 HAROLD D. ROBERTS TUNNEL NEAR GRANT, CO

**LOCATION.**--Lat 39°27'50", long 105°41'01"; Harold D. Roberts tunnel diverts water from Dillon Reservoir in Blue River basin, to North Fork South Platte River (tributary to South Platte River) in SW¼SW¼ sec. 4, T. 7 S., R. 74 W., in Platte River basin.

**GAGE.**--A Stevens A-35 graphic stage recorder and Sutron 8210 DCP with digital shaft encoder in a concrete shelter and well at a 20' Parshall Flume. Primary reference is a drop tape with the R.M. on the front edge of the equipment shelf. The Sutron 8210 DCP was converted to High Data Rate on 17 April 2002. Station is owned and maintained by the Denver Water Dept., who also generate power from the tunnel flow.

**REMARKS.**--The record is taken from hourly satellite data with chart back-up. It is complete and reliable. The recording equipment functions well, even during cold weather, due to a heat lamp installed within the shelter and well. The record is rated as good, except for the period of September 21-30, 2002, which was estimated. Record is developed by Rodger Burcher.

**RATING TABLE.**--STD20FTPF USED FROM 01-OCT-2001 TO 30-SEP-2002

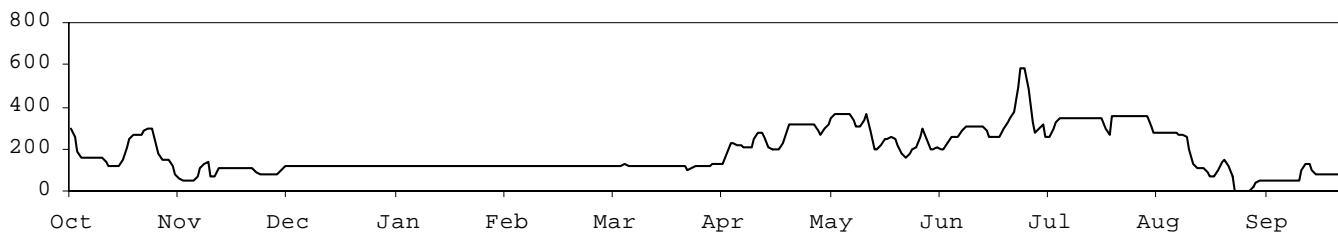
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	299	63	122	119	119	122	121	317	301	485	354	0
2	252	53	122	119	119	122	124	290	249	329	352	0
3	186	54	122	119	119	122	131	269	202	278	352	15
4	156	54	121	119	119	122	129	295	202	301	352	39
5	156	53	121	119	119	122	126	319	203	315	306	50
6	156	72	121	118	119	122	181	346	201	256	276	50
7	156	105	121	116	119	122	229	363	199	261	277	50
8	156	129	121	117	119	124	230	363	232	299	275	50
9	156	135	121	117	119	123	220	363	254	329	275	50
10	157	72	121	118	119	122	214	362	255	350	274	50
11	134	74	121	118	119	122	209	362	253	350	273	50
12	120	108	121	117	119	122	207	334	283	350	272	50
13	121	108	121	117	119	123	208	307	305	350	271	50
14	121	108	122	118	118	123	250	307	305	350	270	50
15	121	108	122	117	119	123	280	340	305	348	259	51
16	148	108	122	120	119	123	281	361	307	345	201	51
17	205	108	122	121	119	122	252	285	307	345	125	94
18	249	108	123	121	119	121	210	199	307	345	105	125
19	265	108	123	121	119	121	199	200	288	345	105	128
20	265	108	122	121	119	121	199	218	257	343	107	103
21	265	108	121	121	119	120	199	250	258	343	86	80
22	285	108	121	121	119	121	230	251	258	343	71	80
23	299	89	122	121	120	122	291	252	258	298	72	80
24	298	80	122	121	122	122	319	245	299	264	100	80
25	259	80	121	120	122	122	319	221	328	355	135	80
26	181	81	121	121	122	102	319	173	341	355	146	80
27	151	81	121	121	121	110	318	154	375	355	120	80
28	151	81	119	121	121	121	318	182	490	355	65	80
29	151	81	119	121	---	121	317	202	584	355	0	80
30	115	103	119	120	---	121	317	203	584	355	0	75
31	79	---	119	119	---	121	---	257	119	354	0	---
TOTAL	5813	2728	3757	3699	3345	3747	6947	8590	8990	10406	5876	1901
MEAN	188	91	121	119	119	121	232	277	300	336	190	63.4
AC-FT	11530	5410	7450	7340	6630	7430	13780	17040	17830	20640	11660	3770
MAX	299	135	123	121	122	124	319	363	584	485	354	128
MIN	79	53	119	116	118	102	121	154	199	256	0	0

WTR YR 2002 TOTAL 65799 MEAN 180 MAX 584 MIN 0 AC-FT 130500

MAX DISCH: 587 CFS AT 21:15 ON Jun. 28, 2002 GH 3.53 FT. SHIFT 0.06 FT. DATUM CORR. -0.01 FT.  
MAX GH: 3.53 FT. AT 21:15 ON Jun. 28, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





TRANSMOUNTAIN DIVERSION TO

PLATTE RIVER BASIN

09047300 VIDLER TUNNEL NEAR ARGENTINE PASS, CO

LOCATION.--Lat 39°37'28", long 105°47'28", sec.6, T.5 S., R.75 W., Summit County.

DRAINAGE AREA.--N/A

GAGE.--Stevens F-type recorder and digital shaft encoder mounted on a prefabricated steel three-foot Parshall flume. The flume is inside the tunnel, approximately 320 feet from the DCP. The primary reference is the flume staff. An 8004 Sutron data collection platform was installed in 2000.

REMARKS.--The primary record is hourly GH's taken from satellite telemetry with chart backup. No corrections were required to the encoder all season. The record is complete and reliable. The record is considered good. Record developed by Lee Cunning.

RATING TABLE.--VIDTUNCO02 USED FROM 01-OCT-2001 TO 30-SEP-2002

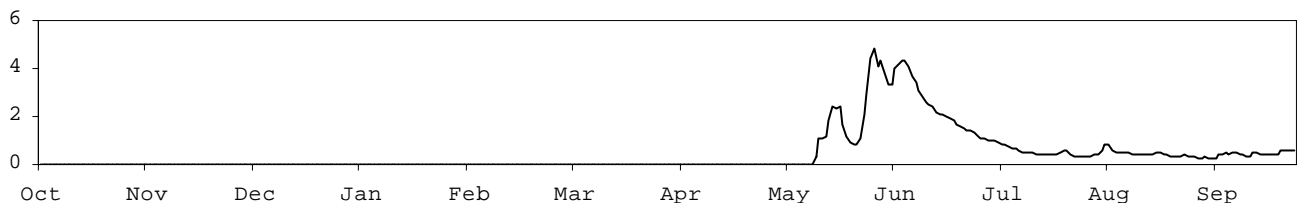
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	4.1	1.1	.34	.31
2	0	0	0	0	0	0	0	0	4.3	1.1	.36	.29
3	0	0	0	0	0	0	0	0	3.8	1	.39	.29
4	0	0	0	0	0	0	0	0	3.3	1	.45	.3
5	0	0	0	0	0	0	0	0	3.3	.99	.61	.28
6	0	0	0	0	0	0	0	0	4	.93	.82	.28
7	0	0	0	0	0	0	0	0	4.2	.84	.81	.28
8	0	0	0	0	0	0	0	0	4.3	.81	.61	.39
9	0	0	0	0	0	0	0	0	4.3	.76	.52	.43
10	0	0	0	0	0	0	0	0	4.1	.68	.49	.51
11	0	0	0	0	0	0	0	0	3.7	.63	.47	.45
12	0	0	0	0	0	0	0	0	3.4	.58	.46	.52
13	0	0	0	0	0	0	0	0	3.1	.53	.47	.5
14	0	0	0	0	0	0	0	.36	2.8	.53	.45	.41
15	0	0	0	0	0	0	0	1.1	2.6	.52	.42	.38
16	0	0	0	0	0	0	0	1.1	2.5	.47	.42	.37
17	0	0	0	0	0	0	0	1.2	2.4	.45	.4	.34
18	0	0	0	0	0	0	0	1.8	2.2	.41	.39	.49
19	0	0	0	0	0	0	0	2.4	2.1	.39	.42	.5
20	0	0	0	0	0	0	0	2.3	2.1	.41	.45	.43
21	0	0	0	0	0	0	0	2.4	2	.41	.49	.42
22	0	0	0	0	0	0	0	1.7	1.9	.4	.5	.41
23	0	0	0	0	0	0	0	1.2	1.8	.42	.42	.38
24	0	0	0	0	0	0	0	.94	1.7	.52	.4	.38
25	0	0	0	0	0	0	0	.83	1.6	.55	.37	.39
26	0	0	0	0	0	0	0	.81	1.5	.56	.36	.57
27	0	0	0	0	0	0	0	1.1	1.4	.41	.35	.55
28	0	0	0	0	0	0	0	2.1	1.4	.37	.36	.58
29	0	0	0	0	---	0	0	2.9	1.3	.34	.38	.57
30	0	0	0	0	---	0	0	4.4	1.2	.34	.36	.57
31	0	---	0	0	---	0	---	4.8	---	.34	.33	---
TOTAL	0	0	0	0	0	0	0	33.44	82.4	18.79	14.07	12.57
MEAN	0	0	0	0	0	0	0	1.08	2.8	.61	.45	.42
AC-FT	0	0	0	0	0	0	0	66	163	37	28	25
MAX	0	0	0	0	0	0	0	4.8	4.3	1.1	.82	.58
MIN	0	0	0	0	0	0	0	0	1.2	.34	.33	.28

WTR YR 2002 TOTAL 161.27 MEAN .44 MAX 4.8 MIN 0 AC-FT 320

MAX DISCH: 7.49 CFS AT 18:00 ON May. 30, 2002 GH 0.79 FT. SHIFT -0.05 FT.  
MAX GH: 0.79 FT. AT 18:00 ON May. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## PLATTE RIVER BASIN

09021500 BERTHOUD PASS DITCH AT BERTHOUD PASS, CO

**LOCATION.**--Lat 39°47'55", long 105°46'35"; Berthoud Pass Ditch diverts water from tributaries of Fraser River between headgate in sec. 33, T. 2 S., R. 75 W., Grand County, and Berthoud Pass, in Colorado River basin, to Hoop Creek, tributary to west fork Clear Creek in sec. 10, T. 3 S., R. 75 W., in Platte River Basin.

**GAGE.**--A-35 graphic water-stage recorder mounted on 30" cutthroat flume in a 42-inch metal shelter. The stilling well has been divided to accommodate two recorders, one for Ha and one for Hb.

**REMARKS.**--The primary record is mean daily gage heights taken from the chart. The record is complete and reliable. The record is good except for May 24, and the peak GH and discharge, which should be considered fair to poor. Station maintained and record developed by Lee Cunning.

**RATING TABLE.**--BERDITCO02 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

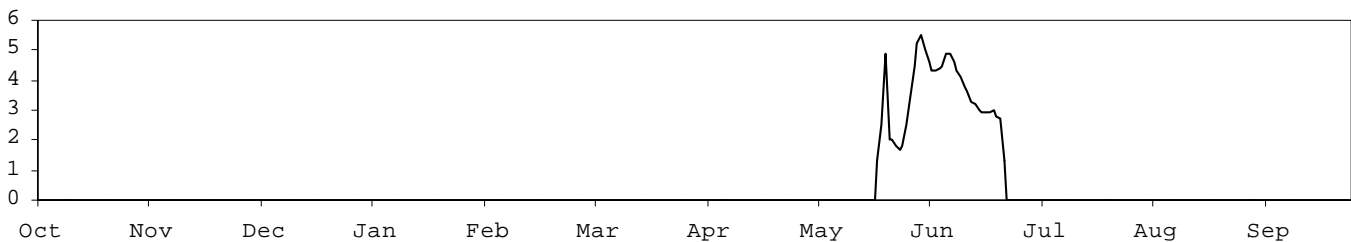
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	4.5	0	0	0
2	0	0	0	0	0	0	0	0	5.2	0	0	0
3	0	0	0	0	0	0	0	0	5.5	0	0	0
4	0	0	0	0	0	0	0	0	5	0	0	0
5	0	0	0	0	0	0	0	0	4.6	0	0	0
6	0	0	0	0	0	0	0	0	4.3	0	0	0
7	0	0	0	0	0	0	0	0	4.3	0	0	0
8	0	0	0	0	0	0	0	0	4.4	0	0	0
9	0	0	0	0	0	0	0	0	4.5	0	0	0
10	0	0	0	0	0	0	0	0	4.9	0	0	0
11	0	0	0	0	0	0	0	0	4.9	0	0	0
12	0	0	0	0	0	0	0	0	4.6	0	0	0
13	0	0	0	0	0	0	0	0	4.3	0	0	0
14	0	0	0	0	0	0	0	0	4.1	0	0	0
15	0	0	0	0	0	0	0	0	3.8	0	0	0
16	0	0	0	0	0	0	0	0	3.6	0	0	0
17	0	0	0	0	0	0	0	0	3.3	0	0	0
18	0	0	0	0	0	0	0	0	3.2	0	0	0
19	0	0	0	0	0	0	0	0	3	0	0	0
20	0	0	0	0	0	0	0	0	2.9	0	0	0
21	0	0	0	0	0	0	0	0	2.9	0	0	0
22	0	0	0	0	0	0	0	1.3	2.9	0	0	0
23	0	0	0	0	0	0	0	2.5	3	0	0	0
24	0	0	0	0	0	0	0	4.9	2.8	0	0	0
25	0	0	0	0	0	0	0	2	2.7	0	0	0
26	0	0	0	0	0	0	0	2	1.3	0	0	0
27	0	0	0	0	0	0	0	1.8	0	0	0	0
28	0	0	0	0	0	0	0	1.7	0	0	0	0
29	0	0	0	0	---	0	0	1.8	0	0	0	0
30	0	0	0	0	---	0	0	2.5	0	0	0	0
31	0	---	0	0	---	0	---	3.5	---	0	0	---
TOTAL	0	0	0	0	0	0	0	24	100.5	0	0	0
MEAN	0	0	0	0	0	0	0	.77	3.35	0	0	0
AC-FT	0	0	0	0	0	0	0	48	199	0	0	0
MAX	0	0	0	0	0	0	0	4.9	5.5	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0

WTR YR 2002 TOTAL 124.5 MEAN .34 MAX 5.5 MIN 0 AC-FT 247

MAX DISCH: 11.4 CFS AT 00:45 ON May. 24, 2002 GH 1.17 FT. SHIFT 0 FT.

MAX GH: 1.17 FT. AT 00:45 ON May. 24, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## PLATTE RIVER BASIN

09022500 EAST PORTAL MOFFAT TUNNEL NEAR ROLLINSVILLE, CO

**LOCATION.**--Lat 39°54'16", long 105°38'45"; diverts water from tributaries of William's Fork River and main stem and tributaries of Fraser River in Colorado River basin, to South Boulder Creek, in sec. 2, T.2 S., R.74 W., in Platte River basin, Gilpin County.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder and satellite telemetry in a timber shelter at a concrete stilling well and 15-foot Parshall Flume. The old Sutron 8004 was replaced with a High Data Rate Sutron 8210 having logging capability as well as telephone line access at the beginning of WY2002. Electric tape was installed April 18, 2001.

**REMARKS.**--Primary record is hourly satellite data with chart backup and is complete and reliable. The flume is not subject to ice as the water is still warm from the tunnel. The graphic chart is changed weekly by Denver Water Department, who have been asked to report on encoder error. Record is good. Station maintained by Denver Water Board and record developed by Lee Cunning.

**RATING TABLE.**--STD15FTPF USED FROM 01-OCT-2001 TO 01-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

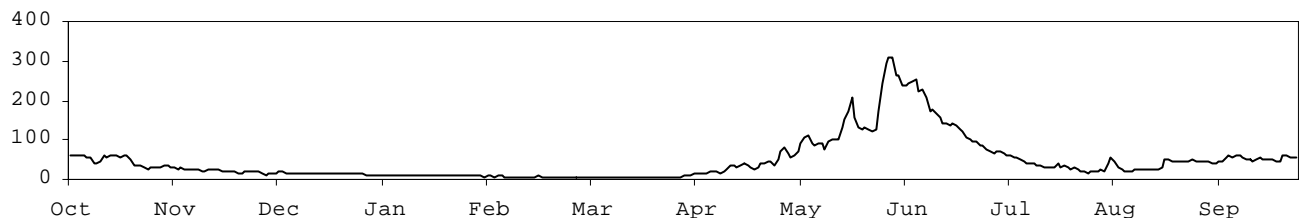
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	63	30	16	12	7.3	6.8	8.1	79	307	72	20	46
2	62	25	18	11	7.9	6.8	9.2	65	310	67	21	44
3	61	28	18	11	7.7	6.4	11	56	265	69	23	44
4	60	27	17	12	7.5	6.4	13	61	264	70	22	44
5	59	26	15	11	7.8	4.9	14	71	240	67	38	43
6	58	27	15	11	7.7	5.1	14	93	239	63	57	43
7	57	27	16	11	7.2	5.1	14	108	243	60	47	44
8	40	27	14	11	7.2	5.9	14	113	249	57	32	45
9	41	18	16	11	7.5	6.3	18	92	251	55	25	56
10	44	21	16	11	7.3	6	21	86	225	49	22	61
11	59	23	15	9.9	7.2	6	19	91	227	46	20	54
12	58	25	14	10	7.2	4.6	17	90	209	43	20	62
13	60	24	14	11	7.1	4.9	20	76	173	41	26	59
14	62	23	14	10	7.1	5.8	27	98	179	39	27	56
15	59	22	14	10	7.1	6.2	33	101	167	36	27	50
16	57	21	14	10	7.2	6.1	36	100	158	34	26	49
17	63	21	14	10	7.6	6.1	30	102	143	32	25	48
18	60	22	14	10	7.5	6.2	36	130	144	31	24	53
19	49	22	14	8.3	7.4	6.2	38	150	138	29	24	56
20	34	17	14	9.8	7.5	6.2	36	174	142	31	25	53
21	33	15	14	9.8	7.3	6.2	28	206	135	43	32	51
22	33	21	14	9.2	6.9	6.3	24	157	128	32	51	49
23	32	21	14	9	7.2	6.5	28	131	119	33	51	49
24	27	18	13	8.3	7.5	6.3	39	125	105	32	48	48
25	29	20	14	8.8	7.1	6.1	41	130	103	25	48	48
26	28	18	13	8.6	6.7	6	44	128	98	31	47	62
27	30	17	13	8.6	7.2	6.3	44	124	94	23	46	61
28	32	12	12	8.6	6.8	6.1	36	129	88	21	46	57
29	33	14	12	8.4	---	5.4	50	171	85	18	48	56
30	33	14	12	8.4	---	6.5	71	242	78	17	50	56
31	31	---	12	7.8	---	7.2	---	296	---	19	47	---
TOTAL	1447	646	445	306.5	204.7	186.9	833.3	3775	5306	1285	1065	1547
MEAN	47	22	14	9.9	7.3	6	27.8	122	177	42	34	52
AC-FT	2870	1280	883	608	406	371	1650	7490	10520	2550	2110	3070
MAX	63	30	18	12	7.9	7.2	71	296	310	72	57	62
MIN	27	12	12	7.8	6.7	4.6	8.1	56	78	17	20	43

WTR YR 2002 TOTAL 17047.4 MEAN 46.7 MAX 310 MIN 4.6 AC-FT 33810

MAX DISCH: 399 CFS AT 20:45 ON May. 30, 2002 GH 3.39 FT. SHIFT -0.05 FT.

MAX GH: 3.39 FT. AT 20:45 ON May. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## PLATTE RIVER BASIN

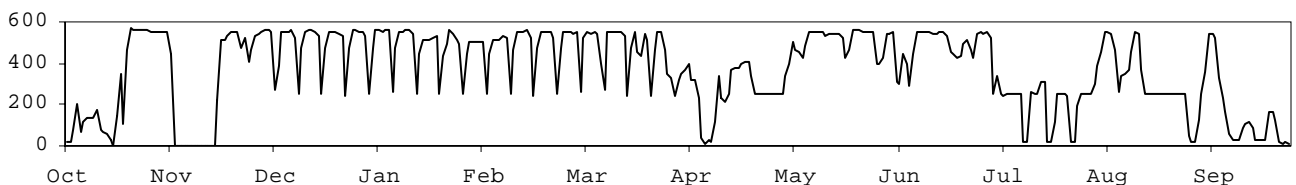
09013000 ALVA B. ADAMS TUNNEL AT EAST PORTAL  
NEAR ESTES PARK, COLORADO**LOCATION.**--Lat 40°19'40", long 105°34'39", in NW¼ sec. 9, T.3 N., R.75 W.**GAGE.**--Water-stage recorder with satellite telemetry in a concrete shelter and well at a 15-foot Parshall flume. DCP is primary record with chart as backup.**REMARKS.**--Primary record is hourly data, taken from satellite monitoring with chart back up. The record is complete and reliable. In the winter months a bubble device is used to keep the well open. Record is good. In the past, ADATUNCO (Adams Tunnel plus Wind River diversion) has been published with a remark as to the total amount of Wind River water included. Beginning in the 2000 water year, ADANETCO (West slope delivery only) will be published to provide the west slope delivery on a daily basis, along with the records for WINDESCO and WINBYCO. Small differences will exist (due to rounding) between ADANETCO and the sum of ADATUNCO minus (WINDESCO - WINBYCO). This year there were no wind river diversions due to low flows, so ADATUNCO equals ADANETCO. Station maintained and record developed by Merlin Friedrichsen.**RATING TABLE.**--ADATUNCO06 USED FROM 01-OCT-2001 TO 02-OCT-2002DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	22	441	551	558	508	546	322	248	426	545	250	24
2	21	45	271	557	499	549	347	248	546	549	247	23
3	81	0	386	556	247	260	364	343	546	527	296	128
4	201	0	550	558	446	525	397	396	549	248	390	247
5	65	0	552	559	510	555	322	501	314	336	451	358
6	119	0	553	259	511	539	324	464	296	247	549	543
7	131	0	557	478	510	547	237	454	446	246	548	538
8	131	0	526	556	534	543	43	422	398	248	544	519
9	135	0	251	554	521	398	14	488	293	250	467	328
10	175	0	477	557	250	267	32	548	447	252	259	236
11	74	0	556	560	468	548	24	551	549	252	341	167
12	66	0	557	546	553	555	115	547	550	249	348	58
13	56	0	557	252	554	551	340	548	548	24	365	27
14	32	0	556	444	547	551	229	547	551	21	459	27
15	.2	221	533	511	563	552	211	537	549	265	552	27
16	149	511	249	512	525	532	252	542	546	251	543	84
17	349	511	474	512	241	245	368	543	546	253	363	105
18	111	533	549	519	470	471	377	546	551	314	249	117
19	466	555	554	534	550	552	376	538	549	313	247	86
20	569	556	549	251	549	456	397	521	531	17	247	30
21	559	556	546	440	548	439	406	429	453	17	248	29
22	561	471	531	489	551	545	402	462	450	117	252	29
23	563	526	246	558	518	517	339	558	425	252	253	29
24	564	410	476	545	250	243	248	558	436	253	249	166
25	560	466	557	512	470	467	247	560	497	249	251	162
26	552	531	558	493	551	549	247	555	514	245	251	122
27	555	546	554	254	552	548	248	554	466	24	252	21
28	555	553	551	447	550	468	248	556	425	21	253	12
29	554	558	532	504	---	346	248	547	544	190	253	17
30	555	557	253	503	---	333	247	393	551	250	254	14
31	553	---	473	507	---	246	---	397	---	253	46	---
TOTAL	9084.2	8502.45	15085	15085	13546	14443	7971	15101	14492	7278	10277	4273
MEAN	293	283	487	487	484	466	266	487	483	235	332	142
AC-FT	18020	16860	29920	29920	26870	28650	15810	29950	28740	14440	20380	8480
MAX	569	558	558	560	563	555	406	560	551	549	552	543
MIN	.2	0	246	251	241	243	14	248	293	17	46	12

WTR YR 2002 TOTAL 135137.65 MEAN 370 MAX 569 MIN 0 AC-FT 268000

MAX DISCH: 585 CFS AT 10:15 ON Oct. 20, 2001 GH 4.25 FT. SHIFT 0 FT.  
MAX GH: 4.25 FT. AT 10:15 ON Oct. 20, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



TRANSMOUNTAIN DIVERSION TO

PLATTE RIVER BASIN

09010000 GRAND RIVER DITCH AT LA POUVRE PASS, CO

**LOCATION.**--Lat 40°28'22", long 105°49'17", in NW¼ sec. 21, T.6 N., R.75 W., in Platte River Basin, to La Poudre Pass Creek, tributary to Cache La Poudre River.

**GAGE.**--F-type water-stage recorder with satellite telemetry. Station located at 10' Parshall flume near La Poudre Pass, Colorado.

**REMARKS.**--The primary record is hourly data, taken from satellite monitoring with chart backup. Water was run in October of 2001 because of the dry conditions, and the station was closed for the winter on October 8. April 23 - May 11, 2002 was estimated. May 29-30, 2002 the shaft encoder drive tape slipped and chart values were inserted for the bogus hourly values. The record is good except for the estimated days of April 23 - May 11. The record was prepared by George Sievers, with help from the district 3 Water Commissioners.

**RATING TABLE.**--STD10FTPF USED FROM 01-OCT-2001 TO 30-SEP-2002

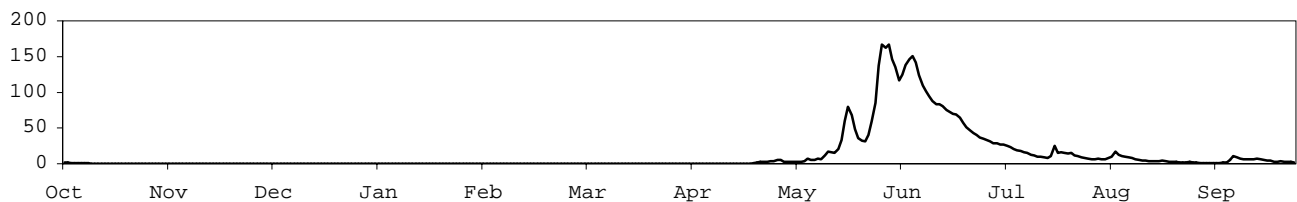
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1.7	0	0	0	0	0	0	5	162	33	6.6	1.4
2	1.4	0	0	0	0	0	0	3	167	31	6.4	1.2
3	1.3	0	0	0	0	0	0	2.5	146	29	7.6	1.1
4	1.3	0	0	0	0	0	0	3	135	29	6.5	1
5	1.2	0	0	0	0	0	0	3	117	27	6.6	.92
6	1	0	0	0	0	0	0	3	125	27	8.3	.85
7	1.2	0	0	0	0	0	0	3	138	25	10	.78
8	.52	0	0	0	0	0	0	4	146	23	17	.93
9	0	0	0	0	0	0	0	7	151	21	13	2.1
10	0	0	0	0	0	0	0	5	142	19	11	1.8
11	0	0	0	0	0	0	0	5	124	18	9.6	5.4
12	0	0	0	0	0	0	0	6.9	109	16	8.6	11
13	0	0	0	0	0	0	0	6.6	101	15	7.7	8.9
14	0	0	0	0	0	0	0	12	94	13	6.6	7.5
15	0	0	0	0	0	0	0	17	88	12	5.7	6.6
16	0	0	0	0	0	0	0	16	83	10	4.9	6.2
17	0	0	0	0	0	0	0	15	83	9.5	4.3	6.1
18	0	0	0	0	0	0	0	21	81	8.8	4	6.7
19	0	0	0	0	0	0	0	33	75	8	3.7	6.8
20	0	0	0	0	0	0	0	60	73	11	3.5	5.9
21	0	0	0	0	0	0	0	80	70	25	4	5.6
22	0	0	0	0	0	0	0	68	69	15	4.4	4.9
23	0	0	0	0	0	0	1	48	65	16	3.6	4.4
24	0	0	0	0	0	0	2	36	57	15	3	3
25	0	0	0	0	0	0	3	32	51	14	2.7	2.5
26	0	0	0	0	0	0	3	31	47	15	2.3	3.5
27	0	0	0	0	0	0	3	40	43	12	2	2.8
28	0	0	0	0	0	0	4	59	40	11	1.8	2.4
29	0	0	0	0	---	0	4	85	37	9.2	2.1	2.3
30	0	0	0	0	---	0	5	137	35	8	2.3	2.2
31	0	---	0	0	---	0	---	167	---	7.2	1.7	---
TOTAL	9.62	0	0	0	0	0	25	1014	2854	532.7	181.5	116.78
MEAN	.31	0	0	0	0	0	.83	32.7	95	17.2	5.9	3.89
AC-FT	.19	0	0	0	0	0	50	2010	5660	1060	360	232
MAX	1.7	0	0	0	0	0	5	167	167	33	17	11
MIN	0	0	0	0	0	0	0	2.5	35	7.2	1.7	.78

WTR YR 2002 TOTAL 4733.6 MEAN 13 MAX 167 MIN 0 AC-FT 9390

MAX DISCH: 207 CFS AT 20:30 ON Jun. 2, 2002 GH 2.82 FT. SHIFT 0 FT.  
MAX GH: 2.82 FT. AT 20:30 ON Jun. 2, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



TRANSMOUNTAIN DIVERSION TO

PLATTE RIVER BASIN

06745500 CAMERON PASS DITCH AT CAMERON PASS, CO

LOCATION.--Lat 40°31'14", long 105°53'32"; Diverts water from Michigan River and tributaries, to Joe Wright Creek (tributary to Cache La Poudre River) in sec. 2, T.6 N., R.76 W.

GAGE.--F-type graphic water-stage recorder at 2' Parshall flume.

REMARKS.--Primary record is mean daily chart values. Record is good. Water was run from May 31 until June 24, 2002. Station maintained and record developed by George Sievers and George Varra.

RATING TABLE.--CAPDCPC001 USED FROM 31-MAY-2002 TO 24-JUN-2002

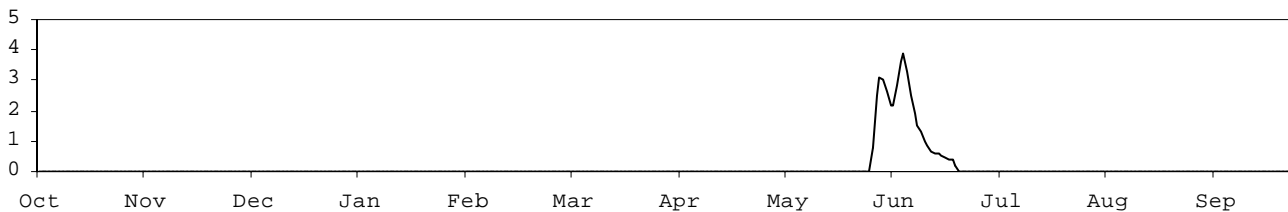
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	2.5	0	0	0
2	0	0	0	0	0	0	0	0	3.1	0	0	0
3	0	0	0	0	0	0	0	0	3	0	0	0
4	0	0	0	0	0	0	0	0	2.6	0	0	0
5	0	0	0	0	0	0	0	0	2.2	0	0	0
6	0	0	0	0	0	0	0	0	2.2	0	0	0
7	0	0	0	0	0	0	0	0	2.8	0	0	0
8	0	0	0	0	0	0	0	0	3.6	0	0	0
9	0	0	0	0	0	0	0	0	3.9	0	0	0
10	0	0	0	0	0	0	0	0	3.3	0	0	0
11	0	0	0	0	0	0	0	0	2.5	0	0	0
12	0	0	0	0	0	0	0	0	1.9	0	0	0
13	0	0	0	0	0	0	0	0	1.5	0	0	0
14	0	0	0	0	0	0	0	0	1.3	0	0	0
15	0	0	0	0	0	0	0	0	1	0	0	0
16	0	0	0	0	0	0	0	0	.88	0	0	0
17	0	0	0	0	0	0	0	0	.66	0	0	0
18	0	0	0	0	0	0	0	0	.61	0	0	0
19	0	0	0	0	0	0	0	0	.61	0	0	0
20	0	0	0	0	0	0	0	0	.51	0	0	0
21	0	0	0	0	0	0	0	0	.47	0	0	0
22	0	0	0	0	0	0	0	0	.42	0	0	0
23	0	0	0	0	0	0	0	0	.38	0	0	0
24	0	0	0	0	0	0	0	0	.2	0	0	0
25	0	0	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0	0	0
27	0	0	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0	0	0
29	0	0	0	0	---	0	0	0	0	0	0	0
30	0	0	0	0	---	0	0	0	0	0	0	0
31	0	---	0	0	---	0	---	.77	---	0	0	---
TOTAL	0	0	0	0	0	0	0	.77	42.14	0	0	0
MEAN	0	0	0	0	0	0	0	.03	1.4	0	0	0
AC-FT	0	0	0	0	0	0	0	1.5	84	0	0	0
MAX	0	0	0	0	0	0	0	.77	3.9	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0

WTR YR 2002 TOTAL 42.91 MEAN .12 MAX 3.9 MIN 0 AC-FT 85

MAX DISCH: 4.6 CFS AT 14:00 ON JUNE 8, 2002 GH 0.73 FT. SHIFT -.03 FT.  
MAX GH: 0.73 FT. AT 14:00 ON JUNE 8, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## PLATTE RIVER BASIN

06746000 MICHIGAN DITCH AT CAMERON PASS, CO

**LOCATION.**--Lat 40°31'14", long 105°53'30"; Diverts water from Michigan River and tributaries, to Joe Wright Creek (tributary to Cache la Poudre River) in sec. 2, T.6 N., R. 76 W.

**GAGE.**--Graphic water-stage recorder in a fiberglass shelter with a concrete well at 8 foot Parshall flume. The staff in the stilling well is the only reference point. Winter record is based on data from the Floware unit that the City of Fort Collins installs. This unit is in a heated shelter that is constructed over the flume. A wooden form that greatly reduces the cross section is installed in the flume. This allows all the water to pass through a very small known area.

**REMARKS.**--The record is mean daily gage heights taken from the chart, and the daily averages taken from the Floware unit: Oct. 1 to Oct. 11, 2001 is chart values. October 18, 2001 to April 25 2002, is Floware data; May 21 to June 29, 2002 is chart values. All other days are zero flow: October 12-17, 2001, Apr. 26 to May 20, 2002, and June 30 to Sept. 30, 2002. The float bottoms out on the well floor at a gage height of about 0.04 ft. The record is considered good, except for the winter period taken from the Floware unit--October 18, 2001 to Apr. 25, 2002--which is poor due to lack of calibration information. Station maintained and record developed by George Sievers and George Varra.

**RATING TABLE.**--MICDCPC002 USED FROM 01-OCT-2001 TO 29-JUN-2002

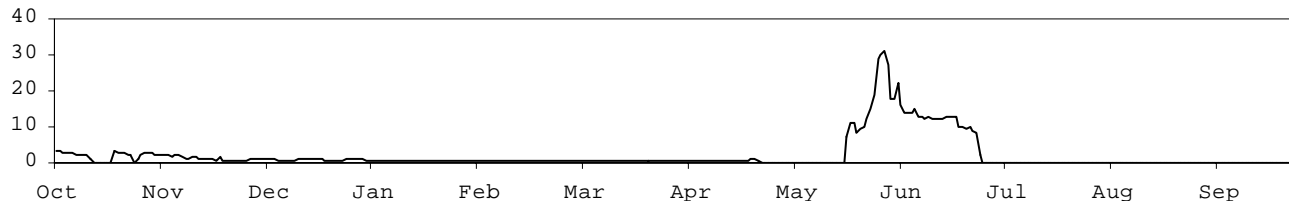
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	3.5	2.3	1	.76	.63	.49	.56	0	31	0	0	0
2	3.2	2.1	1	.77	.62	.48	.58	0	27	0	0	0
3	3	2	1	.78	.61	.47	.55	0	18	0	0	0
4	2.8	1.9	.96	.81	.61	.48	.56	0	18	0	0	0
5	2.8	2.1	.81	.83	.58	.48	.6	0	22	0	0	0
6	2.6	2.3	.83	.82	.57	.49	.64	0	16	0	0	0
7	2.4	1.8	.83	.82	.55	.48	.58	0	14	0	0	0
8	2.4	1.1	.81	.8	.54	.45	.57	0	14	0	0	0
9	2.4	1.2	.81	.76	.5	.49	.56	0	14	0	0	0
10	2	1.5	.83	.71	.5	.49	.5	0	15	0	0	0
11	1.2	1.5	.85	.68	.52	.46	.44	0	13	0	0	0
12	0	1.3	.84	.68	.54	.46	.47	0	13	0	0	0
13	0	1.2	.85	.71	.53	.44	.55	0	12	0	0	0
14	0	1	.88	.72	.52	.44	.57	0	13	0	0	0
15	0	1	.84	.7	.49	.44	.52	0	12	0	0	0
16	0	.96	.85	.71	.51	.44	.5	0	12	0	0	0
17	0	.74	.85	.7	.52	.44	.56	0	12	0	0	0
18	3.3	1.6	.84	.69	.52	.45	.57	0	12	0	0	0
19	2.8	.82	.83	.67	.5	.44	.61	0	13	0	0	0
20	2.8	.45	.81	.68	.5	.44	.56	0	13	0	0	0
21	2.8	.5	.82	.67	.51	.45	.57	7.2	13	0	0	0
22	2.5	.49	.78	.67	.51	.49	.6	11	13	0	0	0
23	2	.45	.8	.67	.53	.44	.87	11	10	0	0	0
24	.04	.49	.81	.67	.51	.4	1.3	8.6	9.8	0	0	0
25	.87	.34	.85	.65	.45	.4	.67	9.5	9.5	0	0	0
26	2.5	.54	.86	.64	.5	.4	0	9.8	9.8	0	0	0
27	2.8	1.1	.85	.63	.51	.39	0	12	8.9	0	0	0
28	2.8	1.1	.85	.61	.51	.41	0	15	8.6	0	0	0
29	2.7	1.1	.85	.62	---	.48	0	19	2.3	0	0	0
30	2.5	1	.84	.64	---	.47	0	29	0	0	0	0
31	2.3	---	.83	.63	---	.53	---	30	---	0	0	---
TOTAL	61.01	35.98	26.46	21.9	14.89	14.11	15.06	162.1	398.9	0	0	0
MEAN	1.97	1.2	.85	.71	.53	.46	.5	5.23	13.3	0	0	0
AC-FT	121	71	52	43	30	28	30	322	791	0	0	0
MAX	3.5	2.3	1	.83	.63	.53	1.3	30	31	0	0	0
MIN	0	.34	.78	.61	.45	.39	0	0	0	0	0	0

WTR YR 2002 TOTAL 750.41 MEAN 2.06 MAX 31 MIN 0 AC-FT 1490

MAX DISCH: 47 CFS AT 19:15 ON May 30, 2002 GH 1.27 FT. SHIFT 0 FT.  
MAX GH: 1.27 FT. AT 19:15 ON MAY 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## PLATTE RIVER BASIN

06746500 SKYLINE DITCH NEAR CHAMBERS LAKE, CO

LOCATION.--Lat 40°39'50", long 105°53'10"; Diverts water from West Branch Laramie River, to Chambers Lake (tributary to Cache la Poudre River) in sec. 31, T.8 N., R.75 W.

GAGE.--F-type graphic water-stage recorder at 10' Parshall flume.

REMARKS.--The primary record is mean daily gage heights taken from the chart recorder. This is the only source. The charts are worked by the District 3 water commissioner and checked by George Sievers. Record is good. Station maintained and record developed by George Sievers.

## RATING TABLE.--

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	0	0	0	0
2	0	0	0	0	0	0	0	0	0	0	0	0
3	0	0	0	0	0	0	0	0	0	0	0	0
4	0	0	0	0	0	0	0	0	0	0	0	0
5	0	0	0	0	0	0	0	0	0	0	0	0
6	0	0	0	0	0	0	0	0	0	0	0	0
7	0	0	0	0	0	0	0	0	0	0	0	0
8	0	0	0	0	0	0	0	0	0	0	0	0
9	0	0	0	0	0	0	0	0	0	0	0	0
10	0	0	0	0	0	0	0	0	0	0	0	0
11	0	0	0	0	0	0	0	0	0	0	0	0
12	0	0	0	0	0	0	0	0	0	0	0	0
13	0	0	0	0	0	0	0	0	0	0	0	0
14	0	0	0	0	0	0	0	0	0	0	0	0
15	0	0	0	0	0	0	0	0	0	0	0	0
16	0	0	0	0	0	0	0	0	0	0	0	0
17	0	0	0	0	0	0	0	0	0	0	0	0
18	0	0	0	0	0	0	0	0	0	0	0	0
19	0	0	0	0	0	0	0	0	0	0	0	0
20	0	0	0	0	0	0	0	0	0	0	0	0
21	0	0	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0	0	0
23	0	0	0	0	0	0	0	0	0	0	0	0
24	0	0	0	0	0	0	0	0	0	0	0	0
25	0	0	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0	0	0
27	0	0	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0	0	0
29	0	0	0	0	---	0	0	0	0	0	0	0
30	0	0	0	0	---	0	0	0	0	0	0	0
31	0	---	0	0	---	0	---	0	---	0	0	---
TOTAL	0	0	0	0	0	0	0	0	0	0	0	0
MEAN	0	0	0	0	0	0	0	0	0	0	0	0
AC-FT	0	0	0	0	0	0	0	0	0	0	0	0
MAX	0	0	0	0	0	0	0	0	0	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0

WTR YR 2002      TOTAL            0 MEAN            0 MAX            0 MIN            0 AC-FT            0

MAX DISCH: 0 CFS

MAX GH: 0 FT.

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



TRANSMOUNTAIN DIVERSION TO

PLATTE RIVER BASIN

06747000 LARAMIE-POUDRE TUNNEL NEAR CHAMBERS LAKE, CO

LOCATION.--Lat 40°40'34", long 105°50'49"; Laramie-Poudre tunnel diverts water from Laramie River and tributaries to Cache la Poudre River in sec 9, T.8 N., R.75 W.

GAGE.--F-type, graphic water-stage recorder with satellite telemetry at 10' Parshall flume.

REMARKS.--Primary record is hourly GH's, taken from satellite monitoring with chart back-up. The record is complete and reliable. The DCP was installed on April 22nd because we anticipated the tunnel turning on early. Record is good. Station maintained and record developed by George Sievers and George Varra.

RATING TABLE.--STD10FTPF USED FROM 01-OCT-2001 TO 30-SEP-2002

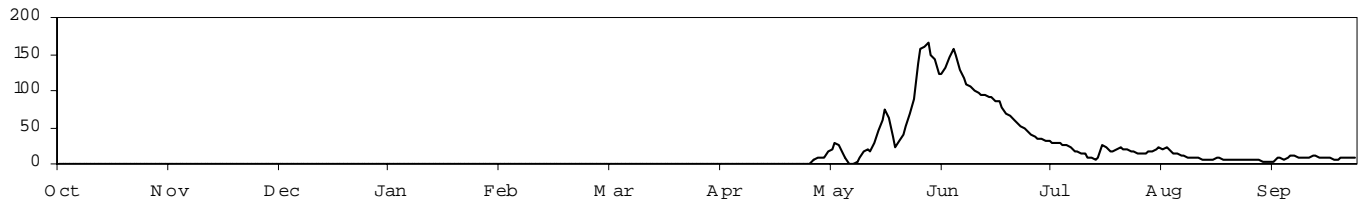
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	5.3	159	41	14	5.2
2	0	0	0	0	0	0	0	7.8	165	36	13	4.7
3	0	0	0	0	0	0	0	7.9	149	35	17	4.5
4	0	0	0	0	0	0	0	9.3	143	35	18	4.1
5	0	0	0	0	0	0	0	17	123	32	19	4
6	0	0	0	0	0	0	0	20	124	32	22	4.1
7	0	0	0	0	0	0	0	28	132	30	21	4.2
8	0	0	0	0	0	0	0	27	146	30	22	7.2
9	0	0	0	0	0	0	0	13	156	28	17	8.3
10	0	0	0	0	0	0	0	8.6	148	26	14	6.5
11	0	0	0	0	0	0	0	.54	128	25	13	7.7
12	0	0	0	0	0	0	0	0	116	22	12	12
13	0	0	0	0	0	0	0	2.2	110	17	11	11
14	0	0	0	0	0	0	0	10	107	16	9.8	9
15	0	0	0	0	0	0	0	17	101	15	8.5	8
16	0	0	0	0	0	0	0	19	96	13	7.7	7.6
17	0	0	0	0	0	0	0	16	95	10	7.3	7.4
18	0	0	0	0	0	0	0	28	94	7.6	6.8	11
19	0	0	0	0	0	0	0	46	92	5.8	6.6	12
20	0	0	0	0	0	0	0	59	91	9	6.7	10
21	0	0	0	0	0	0	0	74	87	27	7.1	8.5
22	0	0	0	0	0	0	0	62	85	22	7.6	7.7
23	0	0	0	0	0	0	0	37	77	17	7.3	7.2
24	0	0	0	0	0	0	0	22	68	17	6.4	4.8
25	0	0	0	0	0	0	0	31	66	21	5.8	6.6
26	0	0	0	0	0	0	0	40	60	24	5.3	8.7
27	0	0	0	0	0	0	0	51	56	21	5.3	7.8
28	0	0	0	0	0	0	0	69	52	19	5.2	7.4
29	0	0	0	0	---	0	0	89	49	17	6	7.9
30	0	0	0	0	---	0	0	138	46	16	6.4	9.4
31	0	---	0	0	---	0	---	157	---	15	5.6	---
TOTAL	0	0	0	0	0	0	0	1111.64	3121	681.4	334.4	224.5
MEAN	0	0	0	0	0	0	0	35.9	104	22	10.8	7.5
AC-FT	0	0	0	0	0	0	0	2200	6190	1350	663	445
MAX	0	0	0	0	0	0	0	157	165	41	22	12
MIN	0	0	0	0	0	0	0	0	46	5.8	5.2	4

WTR YR 2002 TOTAL 5472.94 MEAN 15 MAX 165 MIN 0 AC-FT 10860

MAX DISCH: 222 CFS AT 20:00 ON May. 30, 2002 GH 2.95 FT. SHIFT 0 FT.  
MAX GH: 2.95 FT. AT 20:00 ON May. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## PLATTE RIVER BASIN

## BOB CREEK DITCH NEAR GLENDEVEY, CO

LOCATION.--Lat 40°31'50", long 105°45'40" NESWNW, sec. 11, 9 N., 75 W.

GAGE.--Weekly chart recorder at 3' Parshall flume with metal shelter, staff gage, and well.

REMARKS.--Primary record was taken from mean daily chart gage heights. Water was diverted from May 2 until May 30, 2002. This record should be considered poor since a compressed chart was used, and the chart calibration was not consistent. Water commissioner George Varra and the City of Greeley employees who set the chart worked the record. Hydrographic staff checked only the peak flow because the chart resolution and rounding factors in extremely low flows limited the accuracy possible. Record developed by George Sievers.

RATING TABLE.--BOBGLNCO01 USED FROM 01-MAY-2002 TO 30-MAY-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

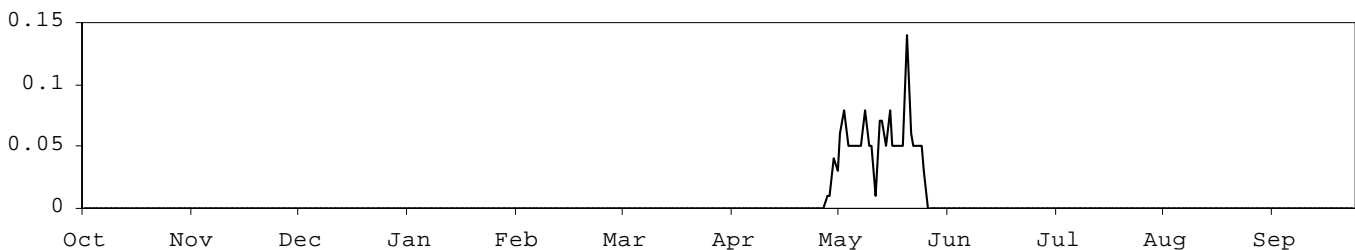
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	0	0	0	0
2	0	0	0	0	0	0	0	.01	0	0	0	0
3	0	0	0	0	0	0	0	.01	0	0	0	0
4	0	0	0	0	0	0	0	.04	0	0	0	0
5	0	0	0	0	0	0	0	.03	0	0	0	0
6	0	0	0	0	0	0	0	.06	0	0	0	0
7	0	0	0	0	0	0	0	.08	0	0	0	0
8	0	0	0	0	0	0	0	.05	0	0	0	0
9	0	0	0	0	0	0	0	.05	0	0	0	0
10	0	0	0	0	0	0	0	.05	0	0	0	0
11	0	0	0	0	0	0	0	.05	0	0	0	0
12	0	0	0	0	0	0	0	.05	0	0	0	0
13	0	0	0	0	0	0	0	.08	0	0	0	0
14	0	0	0	0	0	0	0	.05	0	0	0	0
15	0	0	0	0	0	0	0	.05	0	0	0	0
16	0	0	0	0	0	0	0	.01	0	0	0	0
17	0	0	0	0	0	0	0	.07	0	0	0	0
18	0	0	0	0	0	0	0	.07	0	0	0	0
19	0	0	0	0	0	0	0	.05	0	0	0	0
20	0	0	0	0	0	0	0	.08	0	0	0	0
21	0	0	0	0	0	0	0	.05	0	0	0	0
22	0	0	0	0	0	0	0	.05	0	0	0	0
23	0	0	0	0	0	0	0	.05	0	0	0	0
24	0	0	0	0	0	0	0	.05	0	0	0	0
25	0	0	0	0	0	0	0	.14	0	0	0	0
26	0	0	0	0	0	0	0	.06	0	0	0	0
27	0	0	0	0	0	0	0	.05	0	0	0	0
28	0	0	0	0	0	0	0	.05	0	0	0	0
29	0	0	0	0	---	0	0	.05	0	0	0	0
30	0	0	0	0	---	0	0	.03	0	0	0	0
31	0	---	0	0	---	0	---	0	---	0	0	---
TOTAL	0	0	0	0	0	0	0	1.52	0	0	0	0
MEAN	0	0	0	0	0	0	0	.05	0	0	0	0
AC-FT	0	0	0	0	0	0	0	3	0	0	0	0
MAX	0	0	0	0	0	0	0	.14	0	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0

WTR YR 2002 TOTAL 1.52 MEAN .004 MAX .14 MIN 0 AC-FT 3

MAX DISCH: 0.68 CFS AT 14:30 ON May 25, 2002 GH 0.16 FT., SHIFT 0 FT.

MAX GH: 0.16 FT. AT 14:30 ON May 25, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## PLATTE RIVER BASIN

## DEADMAN DITCH NEAR DEADMAN PARK, CO

**LOCATION.**--Lat 40°50'04", long 105°48'05", sec. 9, T. 10 N., R. 75 W., Diverts water from Laramie River and tributaries, to Sheep Creek (tributary to Cache La Poudre River) via Sand Creek.

**GAGE.**--F-type, graphic water-stage recorder at 6' Parshall flume. Staff is used to reference gage.

**REMARKS.**--The primary record is mean daily gage heights from the chart. The record is complete. The record is reliable with the possible exception of May 9-12, 2002, which is flatter than the other record. This period was accepted as OK since the ditch is a controlled diversion, and constant flow is possible. Record is good. Water was run from May 6 until June 12, 2002. Station maintained and record developed by George Sievers.

**RATING TABLE.**--DEADDP001 USED FROM 06-MAY-2002 TO 12-JUN-2002

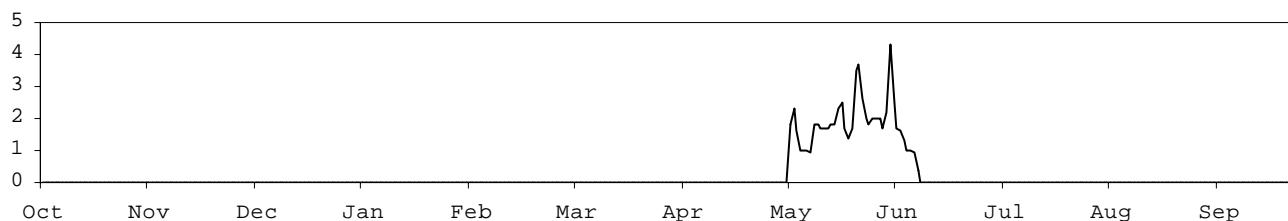
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	2	0	0	0
2	0	0	0	0	0	0	0	0	1.7	0	0	0
3	0	0	0	0	0	0	0	0	2.2	0	0	0
4	0	0	0	0	0	0	0	0	4.3	0	0	0
5	0	0	0	0	0	0	0	0	2.5	0	0	0
6	0	0	0	0	0	0	0	1.8	1.7	0	0	0
7	0	0	0	0	0	0	0	2.3	1.6	0	0	0
8	0	0	0	0	0	0	0	1.6	1.3	0	0	0
9	0	0	0	0	0	0	0	1	1	0	0	0
10	0	0	0	0	0	0	0	1	1	0	0	0
11	0	0	0	0	0	0	0	1	.93	0	0	0
12	0	0	0	0	0	0	0	.93	.4	0	0	0
13	0	0	0	0	0	0	0	1.8	0	0	0	0
14	0	0	0	0	0	0	0	1.8	0	0	0	0
15	0	0	0	0	0	0	0	1.7	0	0	0	0
16	0	0	0	0	0	0	0	1.7	0	0	0	0
17	0	0	0	0	0	0	0	1.7	0	0	0	0
18	0	0	0	0	0	0	0	1.8	0	0	0	0
19	0	0	0	0	0	0	0	1.8	0	0	0	0
20	0	0	0	0	0	0	0	2.3	0	0	0	0
21	0	0	0	0	0	0	0	2.5	0	0	0	0
22	0	0	0	0	0	0	0	1.7	0	0	0	0
23	0	0	0	0	0	0	0	1.4	0	0	0	0
24	0	0	0	0	0	0	0	1.7	0	0	0	0
25	0	0	0	0	0	0	0	3.5	0	0	0	0
26	0	0	0	0	0	0	0	3.7	0	0	0	0
27	0	0	0	0	0	0	0	2.6	0	0	0	0
28	0	0	0	0	0	0	0	2	0	0	0	0
29	0	0	0	0	---	0	0	1.8	0	0	0	0
30	0	0	0	0	---	0	0	2	0	0	0	0
31	0	---	0	0	---	0	---	2	---	0	0	---
TOTAL	0	0	0	0	0	0	0	49.13	20.63	0	0	0
MEAN	0	0	0	0	0	0	0	1.58	.69	0	0	0
AC-FT	0	0	0	0	0	0	0	97	41	0	0	0
MAX	0	0	0	0	0	0	0	3.7	4.3	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0

WTR YR 2002 TOTAL 69.76 MEAN .19 MAX 4.3 MIN 0 AC-FT 138

MAX DISCH: 8.98 CFS AT 20:30 ON May. 18, 2002 GH 0.54 FT. SHIFT 0 FT.  
MAX GH: 0.54 FT. AT 20:30 ON May. 18, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## PLATTE RIVER BASIN

06750500 WILSON SUPPLY DITCH NEAR EATON RESERVOIR, CO

**LOCATION.**--Lat 40°54'31", long 105°46'43"; Diverts water from Sand Creek and Deadman Creek in Laramie River basin to Sheep Creek (tributary to North Fork Cache la Poudre River) in sec. 23, T.11 N., R.75 W., in the Cache la Poudre River basin.

**GAGE.**--F-type, graphic water-stage recorder at 10' Parshall flume. Satellite telemetry was added in the spring of 1994. Gage is referenced with an IG drop tape.

**REMARKS.**--Primary record is hourly data taken from satellite monitoring, with the chart as a back up. Record is good except for April 25, 27, 29, 30; May 1, 2, 3, 13; and June 8 which are poor due to leakage in the stilling well at flows below about 0.2 cfs. Water was run from April 25 until June 8 when the ditch was shut off. Water Commissioner George Varra works the chart record, and his figures are used as a check for the published figures developed from the DCP data. Station maintained and record developed by George Sievers.

**RATING TABLE.**--WSDEARCO02 USED FROM 22-APR-2002 TO 08-JUN-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

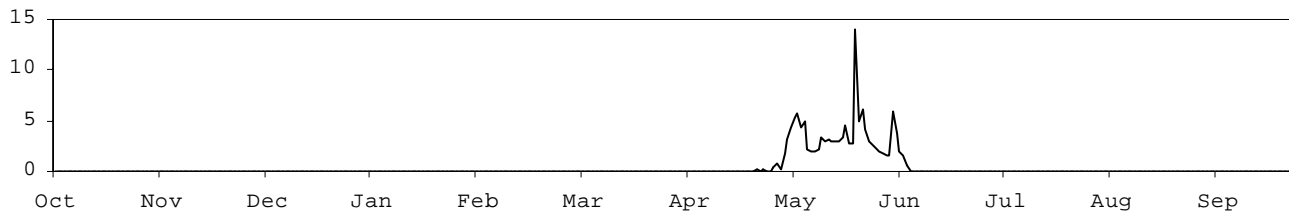
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	.72	1.7	0	0	0
2	0	0	0	0	0	0	0	.21	1.6	0	0	0
3	0	0	0	0	0	0	0	1.7	1.5	0	0	0
4	0	0	0	0	0	0	0	3.2	5.9	0	0	0
5	0	0	0	0	0	0	0	4.4	3.7	0	0	0
6	0	0	0	0	0	0	0	5.3	2	0	0	0
7	0	0	0	0	0	0	0	5.7	1.5	0	0	0
8	0	0	0	0	0	0	0	4.3	.64	0	0	0
9	0	0	0	0	0	0	0	5	0	0	0	0
10	0	0	0	0	0	0	0	2.2	0	0	0	0
11	0	0	0	0	0	0	0	1.9	0	0	0	0
12	0	0	0	0	0	0	0	2	0	0	0	0
13	0	0	0	0	0	0	0	2.2	0	0	0	0
14	0	0	0	0	0	0	0	3.4	0	0	0	0
15	0	0	0	0	0	0	0	3	0	0	0	0
16	0	0	0	0	0	0	0	3.2	0	0	0	0
17	0	0	0	0	0	0	0	3	0	0	0	0
18	0	0	0	0	0	0	0	3	0	0	0	0
19	0	0	0	0	0	0	0	2.9	0	0	0	0
20	0	0	0	0	0	0	0	3.4	0	0	0	0
21	0	0	0	0	0	0	0	4.6	0	0	0	0
22	0	0	0	0	0	0	0	2.8	0	0	0	0
23	0	0	0	0	0	0	0	2.7	0	0	0	0
24	0	0	0	0	0	0	0	14	0	0	0	0
25	0	0	0	0	0	0	.22	5	0	0	0	0
26	0	0	0	0	0	0	0	6.1	0	0	0	0
27	0	0	0	0	0	0	.24	4.2	0	0	0	0
28	0	0	0	0	0	0	0	2.9	0	0	0	0
29	0	0	0	0	---	0	.03	2.5	0	0	0	0
30	0	0	0	0	---	0	.42	2.2	0	0	0	0
31	0	---	0	0	---	0	---	2	---	0	0	---
TOTAL	0	0	0	0	0	0	.91	109.73	18.54	0	0	0
MEAN	0	0	0	0	0	0	.03	3.54	.62	0	0	0
AC-FT	0	0	0	0	0	0	1.8	218	37	0	0	0
MAX	0	0	0	0	0	0	.42	14	5.9	0	0	0
MIN	0	0	0	0	0	0	0	.21	0	0	0	0

WTR YR 2002 TOTAL 129.18 MEAN .35 MAX 14 MIN 0 AC-FT 256

MAX DISCH: 36.3 CFS AT 05:15 ON May. 24, 2002 GH 0.95 FT. SHIFT 0 FT.

MAX GH: 0.95 FT. AT 05:15 ON May. 24, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## REPUBLICAN RIVER BASIN

## PIONEER DITCH AT HEADGATE NEAR LAIRD, CO

**LOCATION.**--Lat 40°05'05", long 102°08'30", SW¼NE¼ sec. 2, T.1 N., R.43 W., Yuma County, 4 mi east of Wray, Co., 1000 ft south of U.S. Highway 34.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder in metal box enclosure and well section with outside staff at 5' Parshall flume.

**REMARKS.**--The record is taken from hourly satellite readings, with chart back up. Mean daily GH's from the chart were used for June 3-8. The record is complete and reliable, except for the chart period, which used some graphic estimation to compensate for a plugged inlet that was cleared on June 9. The canal was off October 12, 2001 to April 10, 2002. Chart records were occasionally mislabeled--Pioneer Ditch at the Stateline charts and the headgate charts were switched. The record is good, except for June 3-9, which is estimated. The record is good. Record developed by Robert Cooper.

**RATING TABLE.**--STD05FTPF USED FROM 01-OCT-2001 TO 04-OCT-2002

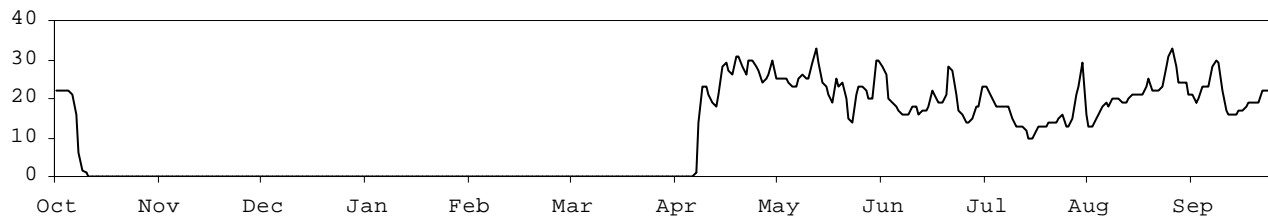
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	22	0	0	0	0	0	0	24	22	14	13	33
2	22	0	0	0	0	0	0	25	20	14	15	28
3	22	0	0	0	0	0	0	26	20	15	21	24
4	22	0	0	0	0	0	0	30	30	18	23	24
5	22	0	0	0	0	0	0	25	30	18	29	24
6	21	0	0	0	0	0	0	25	28	23	16	21
7	16	0	0	0	0	0	0	25	26	23	13	21
8	6.4	0	0	0	0	0	0	25	20	22	13	19
9	1.7	0	0	0	0	0	0	24	19	20	15	20
10	1.2	0	0	0	0	0	0	23	18	18	16	23
11	.04	0	0	0	0	0	.99	23	17	18	18	23
12	0	0	0	0	0	0	14	25	16	18	19	23
13	0	0	0	0	0	0	23	26	16	18	18	28
14	0	0	0	0	0	0	23	25	16	18	20	30
15	0	0	0	0	0	0	21	25	18	15	20	29
16	0	0	0	0	0	0	19	29	18	13	20	22
17	0	0	0	0	0	0	18	33	16	13	19	17
18	0	0	0	0	0	0	21	29	17	13	19	16
19	0	0	0	0	0	0	28	24	17	12	20	16
20	0	0	0	0	0	0	29	23	18	10	21	16
21	0	0	0	0	0	0	27	21	22	9.9	21	17
22	0	0	0	0	0	0	26	19	20	12	21	17
23	0	0	0	0	0	0	31	25	19	13	21	18
24	0	0	0	0	0	0	31	23	19	13	23	19
25	0	0	0	0	0	0	28	24	21	13	25	19
26	0	0	0	0	0	0	26	20	28	14	22	19
27	0	0	0	0	0	0	30	15	27	14	22	19
28	0	0	0	0	0	0	30	14	21	14	22	22
29	0	0	0	0	---	0	28	21	17	15	23	22
30	0	0	0	0	---	0	27	23	16	16	28	22
31	0	---	0	0	---	0	---	23	---	13	31	---
TOTAL	156.34	0	0	0	0	0	480.99	742	612	479.9	627	651
MEAN	5.04	0	0	0	0	0	16	24	20	15.5	20	22
AC-FT	310	0	0	0	0	0	954	1470	1210	952	1240	1290
MAX	22	0	0	0	0	0	31	33	30	23	31	33
MIN	0	0	0	0	0	0	0	14	16	9.9	13	16

WTR YR 2002 TOTAL 3749.23 MEAN 10.3 MAX 33 MIN 0 AC-FT 7440

MAX DISCH: 37.3 CFS AT 07:45 ON Aug. 5, 2002 GH 1.55 FT. SHIFT -0.07 FT.  
MAX GH: 1.55 FT. AT 07:45 ON Aug. 5, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## REPUBLICAN RIVER BASIN

## PIONEER DITCH AT COLORADO-NEBRASKA STATE LINE

**LOCATION.**--Lat 40°03'25", long 102°03'10", SW¼SW¼ sec. 10, T.1 N., R.42 W., Yuma County; 1200 ft south of U.S. Highway 34 at Colorado/Nebraska State line.

**DRAINAGE AREA.**--N/A

**GAGE.**--Type-F graphic water-stage recorder and a Sutron DCP in metal box and well with two outside vertical steel staffs at 4' Parshall flume. Station maintained by Pioneer Ditch Company.

**REMARKS.**--The record is hourly data taken from satellite monitoring, with the chart as back-up. The record is complete and reliable except for the following periods: April 12-30, When no chart was installed, and satellite monitoring data was intermittent. Mean daily values were taken from the chart for May 1-21 when the DCP was transmitting an extra zero value parameter, causing all the DCP values to be about half the actual reading. Several corrections of +-0.02 were applied manually for some hours, if a consistent variance could be seen between the chart and DCP data. The record is Good except for April 12-30 which was estimated; and August 13-September 3 which is poor due to submergence of the flume. Record developed by Robert Cooper.

**RATING TABLE.**--STD04FTPF USED FROM 01-OCT-2001 TO 04-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

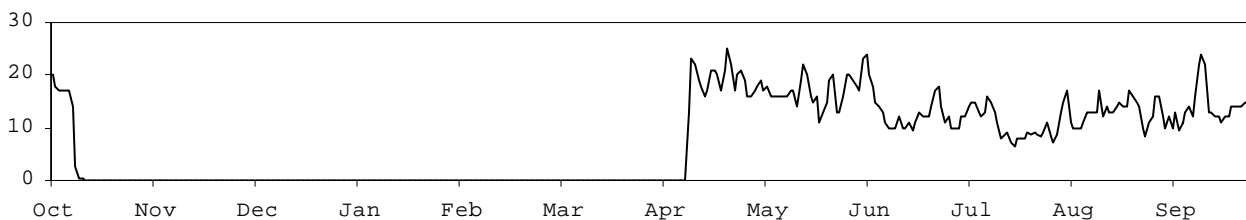
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	20	0	0	0	0	0	0	16	19	10	7.4	16
2	18	0	0	0	0	0	0	17	18	10	8.9	16
3	17	0	0	0	0	0	0	18	17	10	13	12
4	17	0	0	0	0	0	0	19	23	12	15	10
5	17	0	0	0	0	0	0	17	24	12	17	12
6	17	0	0	0	0	0	0	18	20	14	11	10
7	14	0	0	0	0	0	0	16	18	15	10	13
8	2.8	0	0	0	0	0	0	16	15	15	9.7	9.5
9	.56	0	0	0	0	0	0	16	14	13	10	11
10	.36	0	0	0	0	0	0	16	13	12	11	13
11	0	0	0	0	0	0	0	16	11	13	13	14
12	0	0	0	0	0	0	13	16	9.7	16	13	12
13	0	0	0	0	0	0	23	17	10	15	13	16
14	0	0	0	0	0	0	22	17	10	13	13	22
15	0	0	0	0	0	0	19	14	12	11	17	24
16	0	0	0	0	0	0	18	19	10	8	12	22
17	0	0	0	0	0	0	16	22	10	8.8	14	13
18	0	0	0	0	0	0	17	20	11	9	13	13
19	0	0	0	0	0	0	21	16	9.6	7.3	13	12
20	0	0	0	0	0	0	21	15	11	6.5	14	12
21	0	0	0	0	0	0	20	16	13	7.9	15	11
22	0	0	0	0	0	0	17	11	12	7.8	14	12
23	0	0	0	0	0	0	21	13	12	7.9	14	12
24	0	0	0	0	0	0	25	15	12	9.1	17	14
25	0	0	0	0	0	0	22	19	14	8.7	16	14
26	0	0	0	0	0	0	17	20	17	9.1	15	14
27	0	0	0	0	0	0	20	13	18	8.7	14	14
28	0	0	0	0	0	0	21	13	14	8.2	10	15
29	0	0	0	0	---	0	19	16	11	9.1	8.3	15
30	0	0	0	0	---	0	16	20	12	11	11	14
31	0	---	0	0	---	0	---	20	---	8.4	12	---
TOTAL	123.72	0	0	0	0	0	368	517	420.3	326.5	394.3	417.5
MEAN	3.99	0	0	0	0	0	12.3	17	14	10.5	12.7	13.9
AC-FT	245	0	0	0	0	0	730	1030	834	648	782	828
MAX	20	0	0	0	0	0	25	22	24	16	17	24
MIN	0	0	0	0	0	0	0	11	9.6	6.5	7.4	9.5

WTR YR 2002 TOTAL 2567.32 MEAN 7.03 MAX 25 MIN 0 AC-FT 5090

MAX DISCH: 32.6 CFS AT 22:30 ON Aug. 4, 2002 GH 1.48 FT. SHIFT 0.09 FT.

MAX GH: 1.55 FT. (Submerged) AT 20:15 ON Sep. 15, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

07082500 LAKE FORK CREEK BELOW SUGAR LOAF DAM NEAR LEADVILLE, CO

**LOCATION.**--Lat 39°15'05" long 106°22'28", Lake County, SE¼NW¼NW¼ sec. 19, T.9 S., R.80 W., on right bank 4.2 miles upstream from junction of Lake Fork Creek and Arkansas River.

**GAGE.**--Graphic water-stage recorder, satellite-monitored data collection platform (Sutron 8004) and shaft encoder in 42-inch diameter corrugated metal pipe (CMP) shelter and concrete well. Shaft encoder and chart set to inside electric tape gage mounted on instrument shelf. Satellite data are primary record (graphic chart record is used for back-up purposes). Outside staff gage also used for reference purpose. Shelter is equipped with AC power for well heater. Control is a concrete weir with ogee lip, tapered lower from the left to right bank, located at the gage. Elevation of gage datum 9,720 ft. from topographic map.

**REMARKS.**--Record is complete and reliable for the entire year. Record good. Station maintained and record developed by L.R. Schultz.

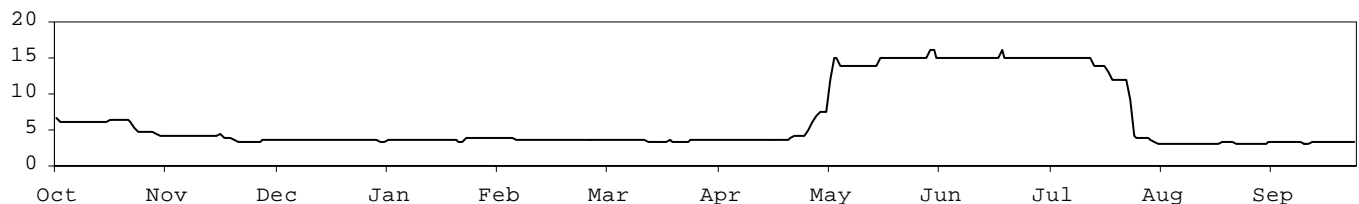
**RATING TABLE.**--LFCBSLCO04 USED FROM 01-OCT-2001 TO 07-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	6.8	4.3	3.7	3.4	4	3.7	3.7	6	15	15	4	3.1
2	6.1	4.3	3.7	3.6	4	3.7	3.7	6.9	15	15	4	3.1
3	6.2	4.3	3.7	3.7	4	3.7	3.7	7.5	16	15	4	3.1
4	6.1	4.3	3.7	3.7	4	3.7	3.7	7.5	16	15	3.7	3.1
5	6.1	4.3	3.7	3.7	4	3.7	3.7	7.5	15	15	3.4	3.1
6	6.1	4.3	3.7	3.7	3.8	3.7	3.7	12	15	15	3.1	3.4
7	6.1	4.3	3.7	3.7	3.7	3.7	3.7	15	15	15	3.1	3.4
8	6.1	4.3	3.7	3.7	3.7	3.7	3.7	15	15	15	3.1	3.4
9	6.1	4.3	3.7	3.7	3.7	3.7	3.7	14	15	15	3.1	3.4
10	6.1	4.3	3.7	3.7	3.7	3.7	3.7	14	15	15	3.1	3.4
11	6.1	4.3	3.7	3.7	3.7	3.7	3.7	14	15	15	3.1	3.4
12	6.1	4.3	3.7	3.7	3.7	3.7	3.7	14	15	15	3.1	3.4
13	6.1	4.3	3.7	3.7	3.7	3.7	3.7	14	15	15	3.1	3.4
14	6.1	4.3	3.7	3.7	3.7	3.7	3.7	14	15	15	3.1	3.4
15	6.1	4.3	3.7	3.7	3.7	3.6	3.7	14	15	15	3.1	3.4
16	6.5	4.4	3.7	3.7	3.7	3.4	3.7	14	15	15	3.1	3.1
17	6.5	4	3.7	3.7	3.7	3.4	3.7	14	15	15	3.1	3.1
18	6.5	4	3.7	3.7	3.7	3.4	3.7	14	15	15	3.1	3.4
19	6.5	3.9	3.7	3.7	3.7	3.4	3.7	14	15	14	3.1	3.4
20	6.5	3.6	3.7	3.7	3.7	3.4	3.7	15	15	14	3.1	3.4
21	6.5	3.4	3.7	3.6	3.7	3.4	3.7	15	15	14	3.1	3.4
22	6	3.4	3.7	3.4	3.7	3.5	3.7	15	15	14	3.1	3.4
23	5.4	3.4	3.7	3.4	3.7	3.4	3.7	15	16	13	3.1	3.4
24	4.6	3.4	3.7	3.8	3.7	3.4	3.7	15	15	12	3.4	3.4
25	4.6	3.4	3.7	4	3.7	3.4	3.9	15	15	12	3.4	3.4
26	4.6	3.4	3.7	4	3.7	3.4	4.3	15	15	12	3.4	3.4
27	4.6	3.4	3.7	4	3.7	3.4	4.3	15	15	12	3.4	3.4
28	4.6	3.5	3.7	4	3.7	3.5	4.3	15	15	12	3.1	3.4
29	4.5	3.7	3.7	4	---	3.5	4.3	15	15	9.3	3.1	3.4
30	4.3	3.7	3.6	4	---	3.6	4.9	15	15	4.3	3.1	3.4
31	4.3	---	3.4	4	---	3.6	---	15	---	4	3.1	---
TOTAL	178.8	119.1	114.3	115.8	105.2	110.5	114.8	411.4	453	416.6	100.9	99.9
MEAN	5.8	4	3.7	3.7	3.8	3.6	3.8	13.3	15	13.4	3.3	3.3
AC-FT	355	236	227	230	209	219	228	816	899	826	200	198
MAX	6.8	4.4	3.7	4	4	3.7	4.9	15	16	15	4	3.4
MIN	4.3	3.4	3.4	3.4	3.7	3.4	3.7	6	15	4	3.1	3.1
CAL YR 2001	TOTAL	2768.9	MEAN	7.59	MAX	15	MIN	3	AC-FT	5490		
WTR YR 2002	TOTAL	2340.3	MEAN	6.41	MAX	16	MIN	3.1	AC-FT	4640		

MAX DISCH: 15.8 CFS AT 15:15 ON June 2, 2002 GH 0.51 FT. SHIFT 0.02 FT.  
MAX GH: 0.51 FT. AT 15:15 ON June 2, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

07084500 LAKE CREEK ABOVE TWIN LAKES RESERVOIR, CO

**LOCATION.**--Lat 39°03'47", long 106°24'26", Lake County, Hydrologic Unit 11020001, on left bank 1.2 mi upstream from water line of Twin Lakes Reservoir at elevation 9,200 ft and 1.9 mi southwest of village of Twin Lakes.

**DRAINAGE AREA AND PERIOD OF RECORD.**--75 mi<sup>2</sup>. April 1946 to Sept. 1962, Oct. 1963 to current year. Monthly data only for some periods.

**GAGE.**--Graphic water-stage recorder, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in 36-inch diameter corrugated metal pipe (CMP) shelter and well. Shaft encoder and chart set to inside drop tape gage with adjustable RP on instrument shelf. Satellite-monitored data are primary record (graphic chart record is used for back-up purposes). Cableway approximately 15 feet downstream from gage. Elevation of gage is 9,310 ft. Prior to May 20, 1950, at site 190 ft downstream, at different datum. May 20, 1950, to Apr. 7, 1953, at site 10 ft upstream, at present datum.

**REMARKS.**--Record is complete and reliable except for the following periods: Oct. 24-26; Nov. 9, 2001, when ice affected the stage discharge relationship; Nov. 10, 2001 to April 10, 2002, when the station was closed for the winter. Record good, except during periods of no gage height record and ice effect, which is poor. Record developed and station maintained by L.R. Schultz.

**RATING TABLE.**--LAKATLCO20 USED FROM 01-OCT-2001 TO 30-SEP-2002

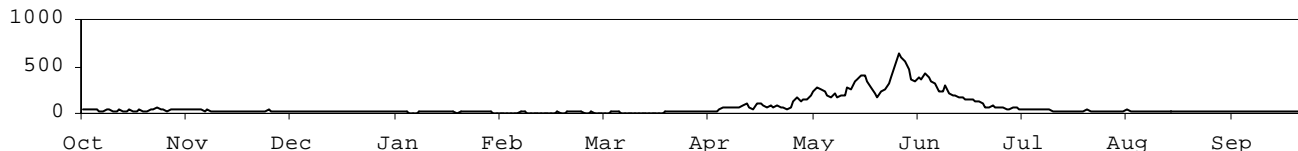
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	36	35	19	14	9	11	17	172	606	55	23	17
2	34	34	20	13	8	10	18	131	556	52	23	17
3	34	38	20	13	9	9	18	139	462	51	24	16
4	33	44	19	13	9	8	19	148	371	58	24	16
5	32	35	19	11	9	9	19	185	338	57	22	16
6	31	31	18	10	10	10	21	239	381	51	23	16
7	31	33	20	10	10	11	31	284	353	51	32	16
8	32	26	22	10	11	12	38	245	417	49	30	19
9	33	19	18	12	11	11	70	238	388	50	27	19
10	31	29	16	13	10	10	61	187	341	44	24	24
11	31	30	15	12	9	9	66	176	322	41	23	24
12	32	31	14	11	10	9	64	210	227	38	22	28
13	31	23	13	11	10	9	56	172	237	35	21	30
14	31	18	13	11	10	9.3	60	198	305	33	21	28
15	32	19	12	11	10	9.5	92	184	208	33	20	26
16	29	19	13	12	9	9	117	274	190	31	19	24
17	30	19	14	13	9	9	74	247	187	29	18	24
18	37	18	15	12	10	8	47	333	176	29	18	27
19	30	16	15	12	11	8	96	368	166	28	17	28
20	26	17	15	10	10	8	96	396	157	27	19	26
21	33	18	15	11	10	9	82	407	148	27	24	25
22	44	19	14	12	11	10	62	335	145	27	23	23
23	71	23	14	12	11	11	76	275	137	29	20	23
24	35	28	13	11	12	12	73	206	126	29	19	22
25	38	34	13	11	12	13	86	179	102	26	18	21
26	30	31	14	12	11	13	66	226	74	34	18	26
27	38	30	14	12	9	12	59	252	70	29	17	28
28	39	24	14	11	10	12	53	315	90	27	17	27
29	36	16	15	11	---	13	73	389	65	25	17	28
30	33	17	15	11	---	15	129	514	59	24	18	28
31	32	---	16	10	---	17	---	637	---	23	17	---
TOTAL	1065	774	487	358	280	325.8	1839	8261	7404	1142	658	692
MEAN	34	26	16	12	10	10.5	61	266	247	37	21	23
AC-FT	2110	1540	966	710	555	646	3650	16390	14690	2270	1310	1370
MAX	71	44	22	14	12	17	129	637	606	58	32	30
MIN	26	16	12	10	8	8	17	131	59	23	17	16
CAL YR 2001	TOTAL	52821.6	MEAN	145	MAX	1150	MIN	7.2	AC-FT	104800		
WTR YR 2002	TOTAL	23285.8	MEAN	63.8	MAX	637	MIN	8	AC-FT	46190		

MAX DISCH: 830 CFS AT 22:30 ON May 30, 2002 GH 2.96 FT. SHIFT -0.38 FT.

MAX GH: 2.96 FT. AT 22:30 ON May 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





ARKANSAS RIVER BASIN

LAKE CREEK BELOW TWIN LAKES RESERVOIR, CO

**LOCATION.**--Lat 39°04'34", long 106°18'35", in NE¼SE¼, sec. 22, T.11 S., R. 80 W., Lake County, on right bank 1.2 miles upstream from confluence of Lake Creek and Arkansas River and 1500 ft downstream of Twin Lakes Dam.

**GAGE.**--Graphic water-stage recorder, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in a concrete shelter and well. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. Shaft encoder and chart are set to an inside electric tape-down mounted on instrument shelf. Outside staff gage installed in flume but generally used as backup to primary reference tape-down gage. Control is a 30-foot concrete Parshall flume. Datum of gage is 9,200 ft. above mean sea level.

**REMARKS.**--Record is complete and reliable the entire year. Record good. Station maintained and record developed by L.R. Schultz.

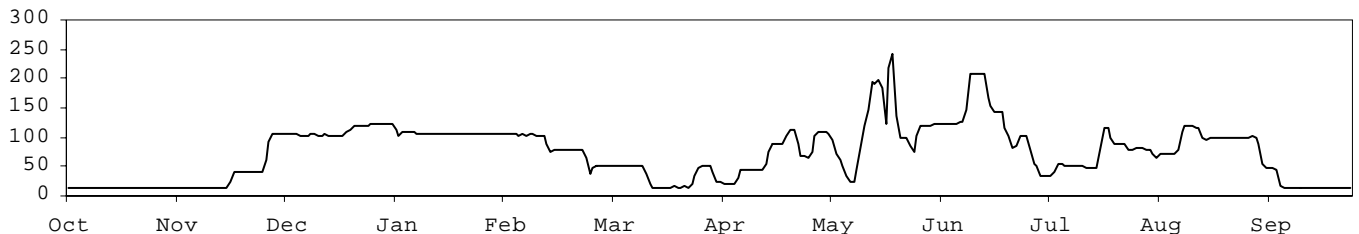
**RATING TABLE.**--STD30FTPF USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	13	13	106	123	106	50	50	101	121	80	82	100
2	13	14	105	112	105	51	42	110	118	56	81	101
3	13	14	104	102	105	50	24	110	121	51	80	100
4	13	14	104	109	105	50	23	109	122	35	80	87
5	13	14	104	109	104	50	22	107	123	35	70	56
6	13	14	103	109	103	50	22	96	123	35	64	49
7	13	14	103	108	104	50	22	72	123	35	72	48
8	13	14	103	105	103	50	22	61	123	40	72	49
9	13	14	104	104	104	50	31	51	124	53	72	46
10	13	13	104	105	104	50	46	34	124	53	72	17
11	13	13	103	106	103	50	46	24	125	52	71	14
12	13	14	103	106	103	50	46	24	125	51	79	12
13	13	14	104	106	103	50	46	44	147	51	108	12
14	13	13	103	106	90	39	45	83	207	51	118	13
15	13	14	103	106	76	20	46	118	207	51	118	13
16	13	24	103	106	78	15	46	145	207	51	118	13
17	13	40	103	106	78	15	53	195	208	49	116	12
18	13	40	102	106	78	15	74	190	208	48	117	12
19	13	40	108	106	78	15	90	199	168	48	98	13
20	13	40	112	106	78	15	90	185	155	48	95	13
21	13	40	119	106	77	15	89	124	144	82	100	13
22	13	41	120	105	78	16	89	218	144	117	100	13
23	13	41	120	105	78	15	102	241	144	116	100	13
24	13	41	119	105	78	15	113	138	116	100	100	13
25	13	41	119	106	66	16	113	99	101	88	100	13
26	13	62	122	105	36	15	90	98	83	88	100	13
27	13	93	123	105	49	20	67	98	86	87	100	13
28	13	107	123	104	50	34	67	84	101	87	100	13
29	13	107	123	105	---	48	65	76	101	80	100	13
30	13	106	123	105	---	51	75	102	101	79	100	13
31	13	---	123	106	---	51	---	121	---	82	100	---
TOTAL	403	1069	3418	3303	2420	1081	1756	3457	4100	1979	2883	910
MEAN	13	36	110	107	86	35	59	112	137	64	93	30
AC-FT	799	2120	6780	6550	4800	2140	3480	6860	8130	3930	5720	1800
MAX	13	107	123	123	106	51	113	241	208	117	118	101
MIN	13	13	102	102	36	15	22	24	83	35	64	12
CAL YR 2001	TOTAL	57426	MEAN	157	MAX	997	MIN	13	AC-FT	113900		
WTR YR 2002	TOTAL	26779	MEAN	73.4	MAX	241	MIN	12	AC-FT	53120		

MAX DISCH: 280 CFS AT 22:45 ON May 22, 2002 GH 1.73 FT. SHIFT 0.03 FT.  
MAX GH: 1.73 FT. AT 22:45 ON May 22, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

07086000 ARKANSAS RIVER AT GRANITE, CO

**LOCATION.**--Lat 39°02'34", long 106°15'55", in SE¼SW¼ sec. 31, T.11 S., R.79 W., Chaffee County, Hydrologic Unit 11020001, on right bank at Granite, 100 ft east of U.S. Highway 24, 100 ft downstream from county bridge, and 200 ft upstream from Cache Creek.

**DRAINAGE AREA AND PERIOD OF RECORD.**--427 mi<sup>2</sup>. Sporadic data from April 1895 to May 1901. Complete data from April 1910 to current year. Monthly data for some periods only.

**GAGE.**--Water-stage recorder with satellite telemetry. Datum of gage is 8,914.86 ft above National Geodetic Vertical Datum of 1929, supplementary adjustment of 1960. Prior to Apr. 6, 1910, non-recording gages near present site at different datum's. Apr. 6, 1910, to Oct. 25, 1917, water-stage recorder or non-recording gage at site 832 ft upstream, at different datum. Oct. 26, 1917, to Oct. 26, 1960, water-stage recorder at site 168 ft downstream, at present datum.

**REMARKS.**--Record is complete and reliable except for the following periods: Nov. 27, 28; Dec. 6, 9, 10, 13, 16, 25, 28, 30, 31, 2001; Jan. 1, 15, 16, 18, 22, 23, 25, 26, 30; Feb. 14, 25, 28; Mar. 12, 15-17, 2002, when stage-discharge relationship was affected by ice. Nov. 29, 30; Dec. 1, 7, 8, 11, 12, 14, 15, 17-24, 26, 27, 29, 2001; Jan. 2, 3, 5, 11, 12, 14, 17, 19-21, 24, 31; Feb. 1-13, 15-17, 21, 22, 26, 27; Mar. 1-6, 9, 10, 18, 19, 2002, when intakes may have been frozen and/or clock stopped. The shelter and well are situated on the right bank in calm water subject to significant shore ice during periods of freezing weather. Record good, except during periods of no gage height record and ice effect, which is poor. Station maintained and record developed by L.R. Schultz.

**RATING TABLE.**--ARKGRNCO11 USED FROM 01-OCT-2001 TO 08-OCT-2002

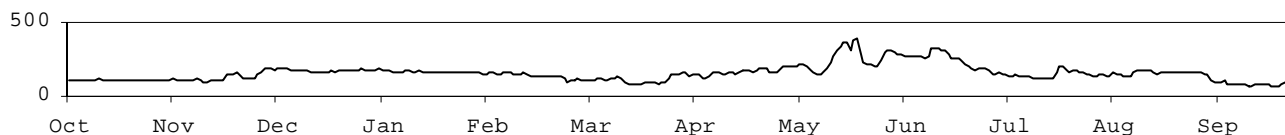
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	105	115	181	183	155	116	159	200	314	175	139	156
2	105	111	183	175	155	110	158	205	305	151	140	156
3	105	108	186	169	159	107	140	200	296	149	145	155
4	104	104	186	170	157	108	150	200	286	167	145	146
5	105	104	187	162	155	111	155	209	287	154	136	114
6	104	108	179	167	154	114	148	212	272	145	130	101
7	106	107	176	167	160	118	127	211	271	140	159	100
8	108	119	175	167	168	120	119	197	272	141	155	101
9	111	108	173	171	165	110	140	176	269	152	147	104
10	115	98	171	176	151	111	156	158	268	138	134	87
11	112	97	170	167	154	116	157	143	265	134	129	81
12	113	104	168	166	155	118	159	153	257	132	132	83
13	111	107	166	170	159	132	154	163	270	129	163	85
14	113	111	168	160	145	124	153	193	326	126	175	79
15	109	105	165	159	130	94	156	226	324	125	172	75
16	105	114	162	167	131	87	158	272	319	122	171	72
17	108	147	165	165	132	78	154	313	316	117	170	71
18	108	149	170	164	133	80	164	334	314	121	170	81
19	105	152	168	157	134	83	181	360	278	124	156	86
20	104	159	170	159	139	87	182	363	255	126	151	80
21	104	138	182	158	134	91	172	310	252	159	163	78
22	108	127	180	159	135	95	167	377	252	203	167	77
23	113	128	174	164	141	101	178	393	248	202	165	74
24	109	126	174	160	137	89	189	287	217	181	162	73
25	103	125	177	161	116	83	190	230	197	164	159	72
26	105	142	178	162	98	89	185	219	183	182	157	82
27	103	167	184	164	111	97	168	213	178	175	156	88
28	105	190	180	162	114	123	163	204	191	168	156	88
29	105	185	179	161	---	142	159	207	192	156	156	85
30	110	187	182	160	---	149	171	246	188	142	159	84
31	113	---	179	157	---	153	---	298	---	142	158	---
TOTAL	3334	3842	5438	5109	3977	3336	4812	7472	7862	4652	4777	2814
MEAN	108	128	175	165	142	108	160	241	262	150	154	94
AC-FT	6610	7620	10790	10130	7890	6620	9540	14820	15590	9210	9480	5580
MAX	115	190	187	183	168	153	190	393	326	203	175	156
MIN	103	97	162	157	98	78	119	143	178	117	129	71

CAL YR 2001 TOTAL 117332 MEAN 321 MAX 1610 MIN 95 AC-FT 232700  
WTR YR 2002 TOTAL 57415 MEAN 157 MAX 393 MIN 71 AC-FT 113900

MAX DISCH: 450 CFS AT 11:30 ON May. 22, 2002 GH 3.3 FT. SHIFT 0.01 FT.  
MAX GH: 3.3 FT. AT 11:30 ON May. 22, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

07086500 CLEAR CREEK ABOVE CLEAR CREEK RESERVOIR, CO

**LOCATION.**--Lat 39°01'05", long 106°16'38", in SE¼ sec. 12, T,12 S., R.80 W., Chaffee County, Hydrologic Unit 11020001, on right bank 0.5 mi upstream from water line of Clear Creek Reservoir at elevation 8,875 ft, 1.5 mi downstream from unnamed tributary, and 1.9 mi southwest of Granite.

**DRAINAGE AREA.**--67.1 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in a 42-inch diameter corrugated metal pipe (CMP) shelter and well. Shaft encoder and chart set to inside drop tape gage with adjustable RP on instrument shelf. DCP data are primary record (graphic chart record is used for back-up purposes). Control is a concrete dam tapered lower towards the center located approximately 15 feet downstream. An outside staff gage was installed on April 19, 2000 as a supplemental reference gage. However, since its installation, it does not agree with the inside tape, most likely due to draw down.

**REMARKS.**--Record is complete and reliable except for the following periods: Nov. 10,11,16,17,19-22,24-26, 2001, when the stage-discharge relationship was affected by ice. Nov. 27, 2001 to April 4, 2002, when the station was closed for the winter. Record good, except during periods of no gage height record and ice effect, which is poor. Station maintained and record developed by L.R. Schultz.

**RATING TABLE.**--CCACCRC014 USED FROM 01-OCT-2001 TO 30-SEP-2002

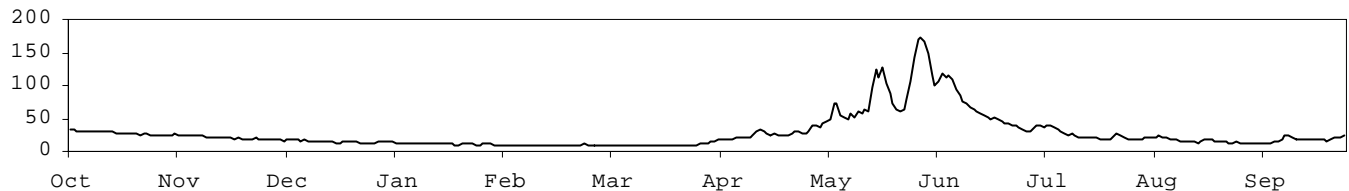
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	32	25	16	14	8	10	13	40	172	31	17	13
2	32	24	17	13	8	9	15	40	168	31	17	12
3	31	24	18	13	8.5	8	15	37	147	32	18	12
4	31	23	17	12	9	8.5	17	41	115	39	20	12
5	30	23	17	12	9	8.9	18	45	100	40	21	11
6	30	23	16	12	8.8	9	19	50	107	36	20	11
7	30	23	17	12	9.3	9.3	19	74	117	38	22	11
8	29	23	15	12	9.8	9.4	18	72	113	40	24	12
9	30	22	14	13	9.8	9	20	54	114	36	21	13
10	30	21	14	13	9	9	22	52	110	32	20	16
11	29	20	15	13	9	9.5	22	47	95	30	18	16
12	30	21	15	13	9.5	9.5	22	58	85	28	17	19
13	29	21	14	13	9	10	22	51	77	25	17	25
14	28	21	15	13	9	9	23	61	74	26	16	23
15	28	20	14	12	9.5	9	29	57	67	25	16	20
16	27	20	13	12	9	8.5	32	65	63	21	15	19
17	27	19	13	12	9	8.5	29	62	61	21	14	18
18	27	20	14	11	9.5	8	26	98	58	22	14	19
19	26	19	14	10	10	8	25	125	55	21	13	19
20	26	18	14	10	10	8	26	113	51	21	14	19
21	25	17	14	11	9.5	8.1	24	127	50	21	17	18
22	27	19	14	12	9	8.4	23	104	51	19	18	18
23	27	20	13	12	9.5	8.4	23	87	48	19	17	17
24	25	19	13	11	10	8.5	25	74	45	19	16	17
25	23	18	13	10	11	8	28	63	43	18	15	16
26	24	18	13	10	9	8	29	62	42	24	15	18
27	24	18	13	11	9.5	8.6	29	64	40	27	14	20
28	24	18	14	11	9.8	8.8	27	80	39	23	13	21
29	24	17	14	11	---	9.5	27	105	36	21	13	21
30	24	17	14	10	---	11	31	142	33	19	14	24
31	26	---	14	9	---	12	---	169	---	17	13	---
TOTAL	855	611	451	363	260	277.4	698	2319	2376	822	519	510
MEAN	28	20	15	11.7	9.3	9	23	75	79	27	17	17
AC-FT	1700	1210	895	720	516	550	1380	4600	4710	1630	1030	1010
MAX	32	25	18	14	11	12	32	169	172	40	24	25
MIN	23	17	13	9	8	8	13	37	33	17	13	11

CAL YR 2001 TOTAL 20346.8 MEAN 55.7 MAX 329 MIN 8 AC-FT 40360  
WTR YR 2002 TOTAL 10061.4 MEAN 27.6 MAX 172 MIN 8 AC-FT 19960

MAX DISCH: 218 CFS AT 23:45 ON May 31, 2002 GH 3.97 FT. SHIFT 0.06 FT.  
MAX GH: 3.97 FT. AT 23:45 ON May 31, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

## CLEAR CREEK BELOW CLEAR CREEK RESERVOIR, NEAR GRANITE, CO

**LOCATION.**--Lat 39°01'20", long 106°14'07", Lake County, on left bank 200 ft. upstream from junction Clear Creek and Arkansas River.

**DRAINAGE AREA.**--N/A

**GAGE.**--Float activated graphic water-stage recorder and shaft encoder in a metal-sided wood frame shelter and concrete well. Shaft encoder connected by data cable to satellite-monitored data collection platform (Sutron 8200) on Clear Creek Dam. Shaft encoder and chart set to inside drop tape gage with adjustable RP on instrument shelf. Outside gage used as supplemental reference. Control is a 20-ft. wide, compound, broad-crested weir located at the gage.

**REMARKS.**--Record is complete and reliable. Although there were gaps in the shaft-encoder data for over half the month of October 2001, the gaps were filled using chart data. Record good. Station maintained and record developed by L. R. Schultz.

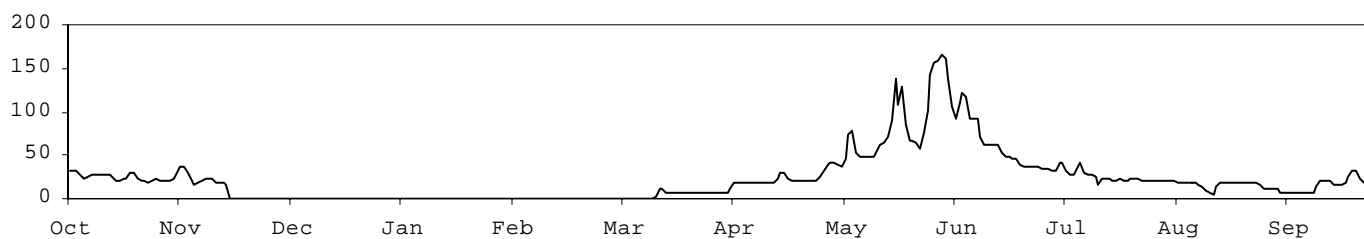
**RATING TABLE.**--CCBCCRC004 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	32	36	.84	.92	.99	.66	6.1	38	159	35	21	12
2	32	36	.85	.92	.99	.66	6.1	41	166	35	20	12
3	32	30	.85	.92	.99	.66	6.1	41	160	33	20	12
4	27	20	.85	.92	.99	.66	12	39	138	33	20	11
5	24	17	.85	.92	.99	.66	18	36	105	42	20	7.7
6	25	18	.85	.92	.99	.66	18	47	92	42	20	7.6
7	28	21	.85	.92	.99	.66	18	74	111	32	19	7.4
8	28	22	.85	.92	.99	.66	18	78	122	28	19	7.1
9	27	22	.85	.92	1	.66	18	52	117	28	19	7.1
10	27	22	.85	.93	1	.67	18	49	92	37	19	7.3
11	28	19	.85	.92	1	.68	18	49	92	42	19	7.1
12	27	19	.85	.94	1.1	.72	18	49	91	31	18	7.1
13	25	19	.85	.93	1.1	.72	18	49	72	27	17	7.1
14	20	17	.85	.94	1	1.4	18	49	63	27	14	7.1
15	20	1.1	.85	.92	.99	12	18	57	63	25	10	13
16	22	1.1	.85	.92	.99	11	18	62	63	17	6.4	20
17	23	.93	.85	.92	.99	7.1	23	65	63	24	5	20
18	30	.92	.85	.93	.99	7.1	30	71	63	24	13	20
19	29	.86	.91	.97	1	6.9	31	89	52	22	18	20
20	24	.85	.92	.98	1	6.9	22	137	48	21	18	17
21	21	.85	.92	1	1	6.9	21	109	48	21	18	15
22	20	.85	.92	.99	1	7	21	128	47	22	19	16
23	19	.85	.92	.99	1.1	7	21	84	47	21	19	19
24	21	.85	.92	.99	1.1	7.1	21	66	40	21	18	26
25	23	.85	.92	.99	1	6.5	21	66	36	22	18	32
26	21	.85	.92	.99	.93	6.2	21	65	36	22	18	32
27	20	.85	.92	.99	.68	6.2	21	58	36	22	18	23
28	20	.85	.92	.99	.66	6.2	21	76	36	21	18	18
29	20	.85	.92	.99	---	5.9	26	101	36	21	18	18
30	22	.85	.92	.99	---	6	32	142	35	21	15	30
31	28	---	.92	.99	---	6.1	---	157	---	21	12	---
TOTAL	765	332.26	27.24	29.48	27.55	132.23	578.3	2224	2329	840	526.4	458.6
MEAN	25	11.1	.88	.95	.98	4.27	19.3	72	78	27	17	15.3
AC-FT	1520	659	54	58	55	262	1150	4410	4620	1670	1040	910
MAX	32	36	.92	1	1.1	12	32	157	166	42	21	32
MIN	19	.85	.84	.92	.66	.66	6.1	36	35	17	5	7.1
CAL YR 2001	TOTAL	18918.3	MEAN	51.8	MAX	341	MIN	.84	AC-FT	37520		
WTR YR 2002	TOTAL	8270.06	MEAN	22.7	MAX	166	MIN	.66	AC-FT	16400		

MAX DISCH: 169 CFS AT 09:00 ON June 1, 2002 GH 2.15 FT. SHIFT 0.04 FT.  
MAX GH: 2.15 FT. AT 09:00 ON June 1, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07089520 COTTONWOOD CREEK AT BUENA VISTA, CO

**LOCATION.**--Lat 38°50'04", long 106°07'20", in NW¼NW¼, sec. 16, T.14 S., R. 78 W., in Chaffee County, on left bank, about 1500 ft. upstream from Arkansas River, and 1200 ft. upstream from bridge at Buena Vista High School.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in a 42-inch corrugated metal pipe shelter and well. Shaft encoder and chart set to inside drop tape gage with adjustable RP on instrument shelf. Outside staff gage used for supplemental reference. Satellite-monitored data are the primary record (graphic chart record is used for back-up purposes). Datum of gage 7930 ft. from topographic map.

**REMARKS.**--Record is complete and reliable except for the following periods: Nov. 20, 21, 25-30; Dec. 1, 6, 8-10, 12-20, 22-31, 2001; Jan. 1-6, 11-15, 17-27, 30, 31; Feb. 1-17, 21, 22, 25-28; Mar. 1-10, 15-20, 2002, when ice affected the stage-discharge relationship. Record good, except that for periods of ice effect, which is poor. Station maintained and record developed by L.R.Schultz.

**RATING TABLE.**--COCRBVCO04 USED FROM 01-OCT-2001 TO 15-OCT-2002

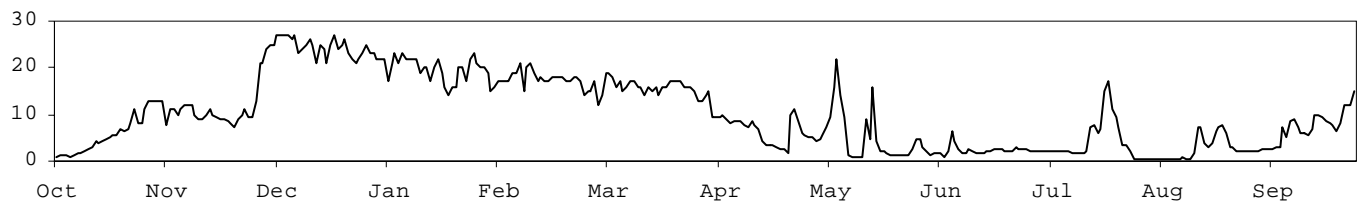
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.99	7.6	25	22	16	17	14	5	3.1	2.3	.6	2.3
2	1.1	11	27	17	17	12	15	4.4	2.1	2.1	.6	2.2
3	1.3	11	27	21	17	14	9.6	4.6	1.5	2	.6	2.3
4	1.3	10	27	23	17	19	9.4	5.4	1.7	2.1	.64	2.4
5	1	11	27	21	17	19	9.6	7.4	1.9	2.1	.63	2.6
6	1.2	12	26	23	19	18	9.9	9.5	1.6	2	.63	2.5
7	1.7	12	27	22	19	16	9.2	16	1	2	.64	2.5
8	1.7	12	23	22	21	17	8.2	22	2.3	2	.59	2.8
9	2.1	10	24	22	15	15	8.4	14	6.6	2	.6	3.2
10	2.6	8.8	25	22	20	16	8.4	9.3	4.5	2.1	.55	7.2
11	3.1	8.8	26	19	21	17	8.5	1.2	2.5	2	.55	5.3
12	4.1	10	25	20	19	17	7.8	.66	1.7	2	.57	8.4
13	3.9	11	21	20	17	16	7.4	.7	1.8	1.9	.71	9
14	4.3	10	25	17	18	16	8.4	.7	2.7	1.8	.6	7.3
15	4.6	9.3	24	20	17	14	7.8	.82	2.2	1.8	.62	5.8
16	5	9.2	21	22	17	16	6.7	8.8	1.9	1.8	1.6	6.1
17	5.4	8.8	25	19	18	15	4.4	4.6	1.8	2.1	7.1	5.4
18	5.5	8.6	27	16	18	16	3.5	16	1.9	7.5	7.3	6.7
19	6.9	8	24	14	18	14	3.4	4.1	2.1	7.8	3.8	10
20	6.3	7.5	25	16	18	16	3.6	2.2	2.2	5.9	2.8	10
21	6.8	9	26	16	17	16	3.2	2.2	2.5	6.9	3.9	9.3
22	8	9.8	23	20	17	17	2.6	1.6	2.6	15	6.6	8.6
23	11	11	22	20	18	17	2.4	1.1	2.5	17	7.5	8.2
24	8.3	9.6	21	17	18	17	1.6	1.1	2.3	11	7.8	7.9
25	8.2	9.4	22	22	17	17	9.7	1.1	2.3	9.4	6.2	6.6
26	11	13	23	23	14	16	11	1.2	2.2	7.4	2.9	8.3
27	13	21	25	21	15	16	8.6	1.3	3.2	3.6	2.8	12
28	13	21	23	20	15	16	6	1.3	2.4	3.3	2.2	12
29	13	24	23	20	---	15	5.7	2.7	2.4	2.2	2.2	12
30	13	25	22	19	---	13	5.1	4.8	2.4	.58	2.2	15
31	13	---	22	15	---	13	---	4.6	---	.54	2.2	---
TOTAL	182.39	349.4	753	611	490	493	219.1	160.38	71.9	132.22	78.23	203.9
MEAN	5.88	11.6	24	20	18	16	7.3	5.17	2.4	4.27	2.52	6.8
AC-FT	362	693	1490	1210	972	978	435	318	143	262	155	404
MAX	13	25	27	23	21	19	15	22	6.6	17	7.8	15
MIN	.99	7.5	21	14	14	12	1.6	.66	1	.54	.55	2.2

CAL YR 2001 TOTAL 6315.56 MEAN 17.3 MAX 111 MIN .4 AC-FT 12530  
WTR YR 2002 TOTAL 3744.52 MEAN 10.3 MAX 27 MIN .54 AC-FT 7430

MAX DISCH: 115 CFS AT 21:00 ON Jul. 22, 2002 GH 3.05 FT. SHIFT -0.05 FT.  
MAX GH: 3.05 FT. AT 21:00 ON Jul. 22, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

07091000 CHALK CREEK AT NATHROP, CO

**LOCATION.**--Lat 38°44'30", long 106°04'57", in SW¼SE¼NE¼SW¼ sec. 14, T.15 S., R.78 W., Chaffee County, on left bank, 640' north of the Junction of Co. Hwy. 162 and U.S. 285 on the frontage rd. parallel to U.S. 285, ¼ mi. south of Nathrop, Co., and 1 mi. west of the confluence of Chalk Creek and the Arkansas River.

**DRAINAGE AREA.**--N\A

**GAGE.**--Graphic water-stage recorder, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in 32-inch diameter corrugated metal pipe (CMP) shelter and well. Shaft encoder and chart set to inside drop tape gage with adjustable RP on instrument shelf. DCP data are primary record (graphic chart record is used for back-up purposes). Outside staff gage also used for reference purpose. Control is a concrete dam, tapered lower towards the center, located approximately 5 feet downstream. Elevation of gage 7660' from topographic map.

**REMARKS.**--Record is complete and reliable except for the following periods: Jan. 19, 24; Feb. 1, 10, 26; Mar. 2-4, 2002, when ice affected the stage-discharge relationship. Record good, except that for periods of ice effect, which should be considered poor. Station maintained and record developed by L. R. Schultz.

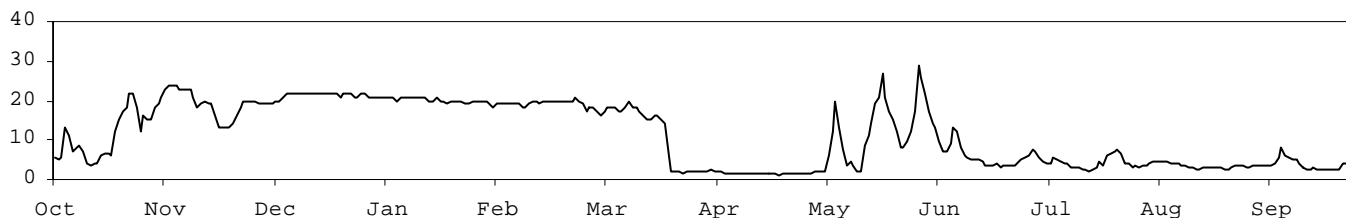
**RATING TABLE.**--CHCRNACO6 USED FROM 01-OCT-2001 TO 11-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	5.7	23	19	21	18	18	1.9	1.7	26	6	3.2	3.2
2	5.2	24	20	21	19	17	2.1	1.9	22	7.4	3.4	3.4
3	5.7	24	20	21	19	16	2.7	1.9	17	7.3	3.5	3.5
4	13	24	21	21	19	17	1.9	1.8	14	5.6	3.9	3.5
5	11	23	22	20	19	18	1.9	1.9	13	4.4	4.4	3.5
6	7.1	23	22	21	19	18	1.8	6.1	9.8	4.1	4.4	3.5
7	8.2	23	22	21	19	18	1.6	12	7.1	4.3	4.6	3.6
8	8.7	23	22	21	19	17	1.6	20	7	5.5	4.6	3.8
9	6.9	21	22	21	18	17	1.6	13	9.2	5.3	4.4	5.4
10	3.9	18	22	21	18	18	1.6	7.7	13	4.8	4.1	8.1
11	3.5	19	22	21	19	20	1.6	3.6	12	3.8	4	5.9
12	3.8	20	22	21	20	18	1.6	4.7	8.1	3.8	3.9	5.8
13	4.3	19	22	21	20	18	1.5	3.6	6.2	3.1	3.3	5.3
14	6.1	19	22	20	19	17	1.7	2.2	5.5	3	3.3	4.9
15	6.5	16	22	20	20	16	1.6	2.1	5.3	2.8	3.1	4.2
16	6.4	13	22	21	20	15	1.6	8.4	5	2.4	2.9	3
17	6.3	13	22	20	20	15	1.5	11	4.9	2.4	2.7	2.7
18	12	13	22	20	20	16	1.4	14	4.6	2.2	2.7	2.7
19	15	13	22	19	20	16	1.4	19	3.6	2.5	2.8	3
20	17	14	21	20	20	15	1.4	21	3.6	2.8	2.8	2.7
21	18	16	22	20	20	14	1.3	27	3.7	4.6	3	2.5
22	22	18	22	20	20	6.2	1.2	21	4.2	3.6	2.9	2.4
23	22	20	22	20	20	2.2	1.5	17	3.2	6.2	2.9	2.4
24	18	20	21	19	21	1.9	1.6	15	3.3	6.8	2.8	2.4
25	12	20	21	19	20	2.2	1.6	12	3.4	7.3	2.7	2.5
26	16	20	22	20	19	1.7	1.6	8.2	3.4	7.4	2.6	2.4
27	15	19	22	20	17	1.8	1.7	8.3	3.4	6.7	2.8	4
28	15	19	21	20	18	1.8	1.6	9.8	3.8	4.1	3.4	4.2
29	18	19	21	20	---	1.9	1.7	12	5.2	4.3	3.4	3.8
30	19	19	21	20	---	1.9	1.7	17	5.6	3.2	3.3	3.9
31	21	---	21	19	---	1.9	---	29	---	3.4	3.2	---
TOTAL	352.3	575	667	629	540	377.5	49.5	333.9	236.1	141.1	105	112.2
MEAN	11.4	19	22	20	19	12.2	1.7	10.8	7.9	4.6	3.4	3.7
AC-FT	699	1140	1320	1250	1070	749	98	662	468	280	208	223
MAX	22	24	22	21	21	20	2.7	29	26	7.4	4.6	8.1
MIN	3.5	13	19	19	17	1.7	1.2	1.7	3.2	2.2	2.6	2.4
CAL YR 2001	TOTAL	12525.3	MEAN	34.3	MAX	190	MIN	1.8	AC-FT	24840		
WTR YR 2002	TOTAL	4118.6	MEAN	11.3	MAX	29	MIN	1.2	AC-FT	8170		

MAX DISCH: 39.8 CFS AT 10:00 ON May 31, 2002 GH 3.48 FT. SHIFT 0.05 FT.  
MAX GH: 3.48 FT. AT 10:00 ON May 31, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

07091500 ARKANSAS RIVER AT SALIDA, CO

**LOCATION.**--Lat 38°32'45", long 106°00'36", in NE¼ sec. 31, T.50 N., R.9 E., Chaffee County on right bank at Salida, 450 ft. upstream from bridge on State Highway 291, and 2.7 mi. upstream from South Arkansas River.

**DRAINAGE AREA.**--1,218 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder, satellite-monitored data collection platform and shaft encoder in 36-inch diameter corrugated metal pipe (CMP) shelter and well. Shaft encoder and chart set to inside drop tape gage with adjustable RP on instrument shelf (augmented by an outside staff gage). Outside gage set 0.01 ft low. Satellite data are primary record (DCP log and A-35 chart used for back-up purposes). Cableway approximately 35 feet downstream from gage. High data rate Sutron 8210 DCP installed June 18, 2002. Datum of gage is 7,050.45 ft.

**REMARKS.**--Record is complete and reliable except for the following periods: Nov. 21, 22, 26-30; Dec. 1, 2, 5-20, 22-29, 31, 2001; Jan. 1-7, 11, 12, 14, 15, 17-27, 30, 31; Feb. 1-17, 26-28; March 1, 3-7, 9, 10, 2002, when gage height was affected by ice on the control. Record good. A comparison was made with the downstream station ARKANSAS RIVER nr. WELLSVILLE to insure the integrity of the low-flow extension. A new rating reflecting the results of many lower flow measurements made during WY2002 will be developed and implemented during WY2003. Station maintained and record developed by L.R. Schultz.

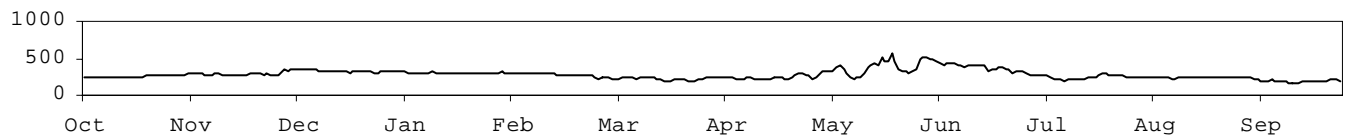
**RATING TABLE.**--ARKSALCO28 USED FROM 01-OCT-2001 TO 01-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	244	294	338	328	285	249	246	238	516	309	238	231
2	241	299	339	326	290	240	252	306	523	283	237	231
3	242	296	349	285	298	227	242	320	500	270	235	232
4	245	284	340	306	292	220	233	317	497	271	243	233
5	239	276	345	302	285	225	245	322	455	280	242	223
6	237	276	339	304	285	232	245	336	423	268	236	204
7	237	277	345	308	292	244	233	365	409	257	238	199
8	242	287	332	304	298	243	218	398	430	239	246	200
9	244	291	331	305	289	233	216	360	431	207	240	202
10	246	278	332	314	292	228	228	292	421	206	236	207
11	249	270	329	305	284	235	239	236	405	203	231	182
12	251	273	333	310	295	236	236	225	392	200	227	181
13	249	278	325	307	285	236	224	236	380	214	229	187
14	245	277	317	306	293	245	220	242	393	219	248	183
15	244	273	318	302	275	230	219	284	418	218	252	174
16	245	257	313	309	268	217	216	387	418	220	254	161
17	247	271	304	308	267	206	211	413	409	222	247	160
18	247	286	318	307	270	202	215	429	406	226	246	170
19	266	286	315	296	270	200	240	412	403	231	252	187
20	268	287	314	295	272	202	249	526	335	232	241	186
21	269	295	324	301	275	207	241	464	339	242	246	183
22	269	275	325	302	271	206	220	467	355	274	247	182
23	274	285	321	309	272	206	217	558	376	308	250	182
24	271	274	309	299	278	206	230	448	365	292	249	181
25	271	280	300	300	276	198	274	354	338	270	246	185
26	277	270	315	306	249	195	293	325	340	269	243	191
27	277	295	335	301	228	199	285	314	308	274	243	204
28	278	338	334	302	240	207	270	308	318	270	243	206
29	281	334	329	298	---	227	258	322	321	265	243	203
30	283	347	321	315	---	238	226	363	312	251	241	200
31	288	---	327	306	---	241	---	491	---	239	234	---
TOTAL	7966	8609	10116	9466	7774	6880	7141	11058	11936	7729	7503	5850
MEAN	257	287	326	305	278	222	238	357	398	249	242	195
AC-FT	15800	17080	20070	18780	15420	13650	14160	21930	23680	15330	14880	11600
MAX	288	347	349	328	298	249	293	558	523	309	254	233
MIN	237	257	300	285	228	195	211	225	308	200	227	160
CAL YR 2001	TOTAL	184665	MEAN	506	MAX	2200	MIN	219	AC-FT	366300		
WTR YR 2002	TOTAL	102028	MEAN	280	MAX	558	MIN	160	AC-FT	202400		

MAX DISCH: 588 CFS AT 23:45 ON May 22, 2002 GH 1.38 FT. SHIFT -0.03 FT.  
MAX GH: 1.38 FT. AT 23:45 ON May 22, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07093700 ARKANSAS RIVER NEAR WELLSVILLE, CO

**LOCATION.**--Lat 38°30'10", long 105°56'21", in SW¼NE¼ sec. 14, T.49 N., R.9 E., Chaffee County, Hydrologic Unit 11020001, on right bank 50 ft upstream from Chaffee-Fremont County line, 2.0 mi northwest of Wellsville, 2.8 mi downstream from South Arkansas River, and 3.5 mi southeast of Salida.

**DRAINAGE AREA AND PERIOD OF RECORD.**--1,485 mi<sup>2</sup>. April 1961 to current year.

**GAGE.**--Accububble with satellite telemetry referenced to outside chain gage. DCP data is the primary source of record. Datum of gage is 6,883.4 ft above National Geodetic Vertical Datum of 1929 (river-profile survey).

**REMARKS.**--Record is complete and reliable except for the following periods: Nov. 28, 29; Dec. 10-14, 16, 17, 19, 20, 22-31, 2001; Jan. 1-7, 19, 20, 22, 24-26, 30,31; Feb. 1, 2, 5-7, 12-16, 26; Mar. 1-3, 9, 2002, when the orifice line was temporarily frozen. Jan. 8-12, 14-17, 2002 when two different accubars (installed temporarily in the gage in an attempt to alleviate the orifice freezing) malfunctioned. Record good, except during periods of orifice freezing, which is poor. Station maintained and record developed by L.R. Schultz.

**RATING TABLE.**--ARKWELCO06 USED FROM 01-OCT-2001 TO 01-OCT-2002

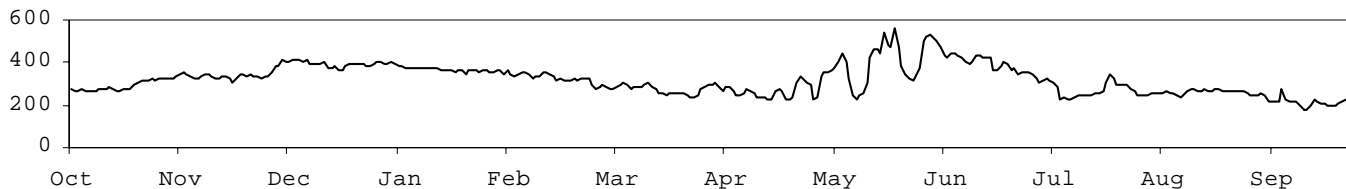
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	273	346	406	396	340	295	295	239	524	348	247	248
2	269	352	408	385	360	290	304	336	532	324	246	248
3	269	348	417	382	346	275	288	358	508	306	246	247
4	272	336	409	374	337	271	267	354	505	312	258	254
5	266	326	412	376	340	281	282	361	470	327	256	243
6	263	327	404	375	350	294	284	376	437	316	251	218
7	263	330	412	376	355	302	268	404	422	303	252	212
8	270	342	392	375	346	297	247	442	445	282	268	213
9	272	342	390	373	328	278	241	408	446	231	259	217
10	276	331	396	370	334	289	257	329	435	233	253	275
11	279	322	392	370	338	290	279	246	420	229	244	229
12	281	327	399	375	355	287	270	228	406	225	239	220
13	278	334	377	369	355	295	251	244	393	238	244	220
14	270	332	378	365	345	309	238	251	405	245	268	214
15	270	325	379	364	330	286	238	305	434	244	274	200
16	271	305	366	360	315	272	234	423	436	244	272	179
17	273	320	367	360	320	253	223	460	421	245	268	181
18	276	343	384	356	318	252	225	458	424	246	268	197
19	299	341	391	364	317	247	261	440	425	254	276	229
20	307	337	398	363	318	252	275	539	361	254	261	219
21	310	344	394	344	323	259	261	483	363	267	267	210
22	312	333	394	365	318	257	227	471	382	301	271	204
23	315	338	392	367	321	259	223	564	405	342	273	201
24	320	323	387	360	328	258	239	475	394	326	270	196
25	318	338	387	358	324	243	307	381	367	298	266	198
26	325	332	392	366	294	235	335	342	370	293	263	206
27	321	356	400	363	271	235	329	329	343	300	264	220
28	320	384	400	358	290	248	305	316	350	291	265	222
29	328	388	392	350	---	273	291	338	350	280	263	215
30	329	411	398	361	---	289	226	378	351	267	262	212
31	335	---	401	362	---	292	---	500	---	248	253	---
TOTAL	9030	10213	12214	11382	9216	8463	7970	11778	12524	8619	8067	6547
MEAN	291	340	394	367	329	273	266	380	417	278	260	218
AC-FT	17910	20260	24230	22580	18280	16790	15810	23360	24840	17100	16000	12990
MAX	335	411	417	396	360	309	335	564	532	348	276	275
MIN	263	305	366	344	271	235	223	228	343	225	239	179

CAL YR 2001 TOTAL 208344 MEAN 571 MAX 2390 MIN 250 AC-FT 413200  
WTR YR 2002 TOTAL 116023 MEAN 318 MAX 564 MIN 179 AC-FT 230100

MAX DISCH: 593 CFS AT 01:00 ON May 23, 2002 GH 3.89 FT. SHIFT 0 FT.  
MAX GH: 3.89 FT. AT 01:00 ON May 23, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





## ARKANSAS RIVER BASIN

07095000 GRAPE CREEK NEAR WESTCLIFFE, CO

**LOCATION.**--Lat 38°11'10", long 105°28'59", in NW¼NW¼ sec. 31, T.21 S., R.72 W., Custer County, Hydrologic Unit 110200001, on left bank 0.5 mi upstream from water line of De Weese Reservoir at elevation 7,665 ft, 0.5 mi downstream from Swift Creek, and 3.6 mi northwest of Westcliffe.

**DRAINAGE AREA.**--320 mi<sup>2</sup>.

**GAGE.**--Graphic water stage recorder, satellite monitored data collection platform (Sutron Model 8210 DCP) and shaft encoder in a 48-inch diameter metal pipe (CMP) shelter and well. Primary record is DCP log data with the graphic chart recorder and satellite data used for backup purposes. Primary reference gage is electric drop tape inside well. No outside staff gage. The control is a compound, broad-crested weir located 17 ft. downstream from the gage. High data rate Sutron 8210 DCP installed August 1, 2002. Elevation of gage is 7,690 ft, from topographic map. Prior to Mar, 17, 1939, at site 30 ft upstream at present datum.

**REMARKS.**--Record is complete and reliable except for the following periods: November 21, 24-30, December 1-14, 2001; and March 13, 2002 when the stage-discharge relationship was affected by shore ice and ice on the control. December 15-31, 2001; January 1-31, February 1-28, and March 1-12, 2002 when chart and shaft encoder floats were frozen in ice in the well. Record good, except for periods of ice effect and no gage height record, which are poor. Station maintained and record developed by Thomas W. Ley.

**RATING TABLE.**--GRAWESCO08 USED FROM 01-OCT-2001 TO 30-SEP-2002

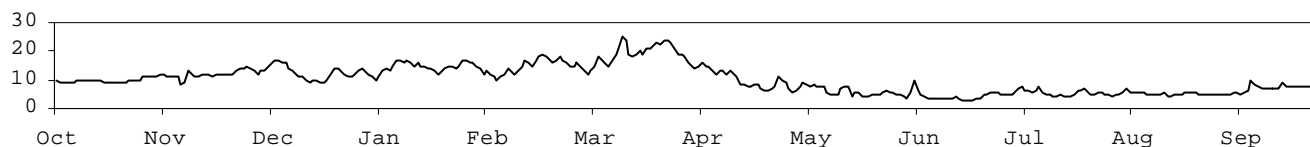
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	10	12	15	10	12	15	16	5.4	5	4.8	4	4.9
2	9	11	16	11	13	13	15	6.1	4.2	4.8	4.9	4.9
3	9	11	17	13	12	12	14	7.5	3.3	5	5.2	4.8
4	9	11	17	14	11	13	15	9	5.3	5.7	5.9	5.1
5	9	11	16	13	10	15	16	8.4	9.5	6.9	6.8	5.6
6	9.4	8.7	16	15	11	18	15	7.6	6.1	7.5	5.8	5.3
7	9.6	9.4	14	17	12	17	15	8.2	5.1	6.6	5.8	5.2
8	9.8	13	13	17	14	16	13	7.6	4.5	6.1	5.7	5.4
9	9.7	12	12	16	13	15	12	7.8	3.6	5.4	5.5	6.1
10	9.5	11	11	17	12	17	13	7.4	3.2	6.3	5.3	10
11	9.6	11	11	16	13	19	13	5.4	3.3	7.4	5	8.5
12	9.9	12	10	15	15	21	12	4.6	3.5	5.8	4.7	7.5
13	10	12	9	16	17	25	13	5.1	3.5	4.9	4.8	7.2
14	10	12	10	15	16	24	12	5.2	3.6	4.6	4.6	7.1
15	9.1	11	10	15	15	19	11	7	3.7	4.5	4.9	7
16	9	12	9	14	17	18	8.7	7.8	3.7	4.5	5.7	6.9
17	9.1	12	9	14	18	19	8.6	7.5	4	4.6	4.5	6.9
18	9	12	10	13	19	20	7.4	4.2	3.6	4.4	4.5	7.2
19	9.1	12	12	12	18	19	7.9	5.3	3	4.1	4.8	9.1
20	9.1	12	14	13	17	21	8.6	5.4	2.9	4.2	4.8	7.9
21	9.2	12	14	14	16	21	8.7	4.3	3.1	4.6	5.2	7.5
22	9.7	13	13	15	17	22	7.1	4.1	3.1	6	5.5	7.4
23	9.5	14	12	15	18	23	6.3	3.9	3.3	6.5	5.6	7.4
24	9.9	14	11	14	17	22	6	4.8	3.5	6.9	5.5	7.4
25	10	15	11	15	16	24	6.7	5.1	5	5.3	5.3	7.4
26	11	14	12	17	15	24	7.8	4.9	5.2	5.1	5.1	7.6
27	11	13	13	17	15	23	11	5.6	5.3	5.1	4.8	8
28	11	12	14	16	16	21	10	6.6	5.4	5.4	5	8.3
29	11	13	13	16	---	19	9.3	5.9	5.7	5.3	4.9	7.6
30	11	13	12	15	---	19	7.3	5.8	5.1	5.2	5	7.9
31	12	---	11	14	---	18	---	5	---	5	5	---
TOTAL	303.2	361.1	387	454	415	592	326.4	188.5	129.3	168.5	160.1	209.1
MEAN	9.8	12	12.5	15	15	19	10.9	6.1	4.3	5.4	5.2	7
AC-FT	601	716	768	901	823	1170	647	374	256	334	318	415
MAX	12	15	17	17	19	25	16	9	9.5	7.5	6.8	10
MIN	9	8.7	9	10	10	12	6	3.9	2.9	4.1	4	4.8

CAL YR 2001 TOTAL 8959.2 MEAN 25 MAX 403 MIN 7.9 AC-FT 17770  
WTR YR 2002 TOTAL 3694.2 MEAN 10.1 MAX 25 MIN 2.9 AC-FT 7330

MAX DISCH: 35.3 CFS AT 11:00 ON Mar. 17, 2002 GH 0.93 FT. SHIFT 0.00 FT.  
MAX GH: 0.93 FT. AT 11:00 ON Mar. 17, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07096000 ARKANSAS RIVER AT CANON CITY, CO

**LOCATION.**--Lat 38°26'02", long 105°15'24", in SE¼SE¼ sec. 31, T.18 S., R.70 W., Fremont County, Hydrologic Unit 11020002, on right bank 800 ft upstream from Sand Creek, 0.7 mi downstream from Grape Creek, and 0.7 mi upstream from First Street Bridge in Canon City.

**DRAINAGE AREA AND PERIOD OF RECORD.**--3,117 mi<sup>2</sup>. January 1888 to current year. Monthly data only for some periods. Published as near Canyon 1900-1906.

**GAGE.**--Graphic water-stage recorder, satellite monitored data collection platform (Sutron 8200A DCP) and shaft encoder in 42-inch diameter CMP shelter and well. Primary reference gage is electric drop tape inside well. Control is man-made concrete diversion dam located approximately 200 feet downstream. Cableway 15-20 feet downstream from gage. USGS Hydrolab is co-located at gage. High data rate DCP (Sutron 8210) and SDI shaft encoder installed July 25, 2002. Datum of gage is 5,342.13 ft above National Geodetic Vertical Datum of 1929.

**REMARKS.**--Record is complete and reliable except for the following days when ice on the control affected the gage height: Nov. 28-30, Dec. 1, 11, 18-19, 21-28, 30-31, 2001; January 1-7, 15-19, 23-25, 31, Feb 1, 26-28, and March 1-3, 2002. Record good, except for days on which ice affected the stage-discharge relationship, which should be considered poor. Several measurements were made this water year at stages lower than previously experienced since Rating No. 22 was started in use. A trend for larger positive shifts to Rating No. 22 as gage height decreases was found. Due to this, a new rating will be developed in WY2003. Station maintained and record developed by Thomas W. Ley.

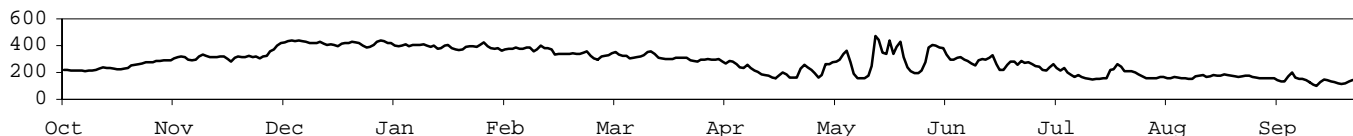
**RATING TABLE.**--ARKCANCO22 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	219	307	420	420	360	320	295	160	385	250	156	160
2	217	313	424	400	373	325	297	181	407	245	156	156
3	214	318	435	395	374	330	302	261	401	219	157	156
4	213	315	438	400	375	342	279	264	386	214	157	157
5	213	297	435	410	385	354	268	275	380	238	167	159
6	212	292	436	395	375	333	284	281	333	261	169	158
7	211	294	432	405	377	326	280	297	294	235	159	144
8	215	321	428	407	384	326	260	339	296	213	159	135
9	214	331	417	405	386	307	239	362	310	231	167	135
10	217	326	420	411	357	309	232	277	312	200	162	170
11	227	315	420	398	373	316	255	190	296	183	159	198
12	236	312	427	389	399	318	235	158	284	168	155	161
13	235	315	416	398	380	329	216	155	265	181	152	151
14	235	319	404	375	380	354	205	155	254	167	152	152
15	228	317	410	380	373	356	188	177	289	156	173	144
16	225	298	406	400	335	337	182	247	298	151	177	130
17	226	283	396	405	339	311	176	472	296	148	179	110
18	229	308	415	380	337	304	160	442	311	151	167	100
19	231	318	420	370	340	301	157	347	328	154	171	129
20	254	316	420	365	336	298	182	339	264	156	182	147
21	256	313	430	373	343	301	200	440	220	156	174	142
22	261	325	425	390	338	310	187	340	220	221	175	135
23	266	315	420	395	338	309	163	392	256	222	184	128
24	274	319	400	395	349	308	163	429	279	261	180	120
25	274	303	385	390	356	308	162	316	279	242	178	114
26	276	320	390	406	325	290	230	236	258	208	172	121
27	286	325	405	422	305	284	256	211	288	211	166	131
28	286	355	430	393	295	283	240	196	273	211	172	142
29	292	370	437	381	---	295	219	194	277	199	178	147
30	291	400	435	375	---	295	195	213	260	185	175	143
31	292	---	420	380	---	298	---	274	---	172	169	---
TOTAL	7525	9560	12996	12208	9987	9777	6707	8620	8999	6209	5199	4275
MEAN	243	319	419	394	357	315	224	278	300	200	168	143
AC-FT	14930	18960	25780	24210	19810	19390	13300	17100	17850	12320	10310	8480
MAX	292	400	438	422	399	356	302	472	407	261	184	198
MIN	211	283	385	365	295	283	157	155	220	148	152	100
CAL YR 2001	TOTAL	210316	MEAN	576	MAX	0	MIN	0	AC-FT	417200		
WTR YR 2002	TOTAL	102062	MEAN	280	MAX	472	MIN	100	AC-FT	202400		

MAX DISCH: 496 CFS AT 21:00 ON May. 17, 2002 GH 5.79 FT. SHIFT 0.1 FT.  
MAX GH: 5.88 FT. AT 19:30 ON Mar. 2, 2002 (ice affected)

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07097000 ARKANSAS RIVER AT PORTLAND, CO

**LOCATION.**--Lat 38°23'18", long 105°00'56", in NE¼NE¼ sec. 20, T.19 S., R.68 W., Fremont County, Hydrologic Unit 11020002, on right bank at bridge on State Highway 120 at Portland and 1 mi downstream from Hardscrabble Creek.

**DRAINAGE AREA.**--4,024 mi<sup>2</sup>.

**GAGE.**--Sutron 8210 satellite-monitored data collection platform (DCP) and high data rate transmitter (HDR) with shaft encoder and a graphic water-stage recorder in 36-inch diameter CMP shelter and well. Primary record is 8210 data logger with the graphic chart recorder used for backup purposes. Primary reference gage is a drop tape referenced to an adjustable RP mounted on the instrument shelf inside the shelter. A cablecar is suspended from a monorail attached to upstream side of Highway 120 bridge 10-15 feet downstream from gage. USGS Hydrolab monitored by DCP for water temperature and specific conductance. The 8210 HDR DCP and SDI shaft encoder were installed July 25, 2002.

**REMARKS.**--Record is complete and reliable except for: December 25-31; January 1-3, 17-19, 24, 25, 31; February 1; March 2, 3, ice affected stage-discharge relationship. August 28 and 29 when the shaft encoder tape came off and the recorder pen was not tracing on the chart during a rain event. Discharge was estimated from the content change and release of Pueblo Reservoir during the period. Record good, except during periods of estimated flows, which is poor. Station maintained and record developed by Anthony D. Gutierrez.

**RATING TABLE.**--ARKPORCO06 USED FROM 01-OCT-2001 TO 01-OCT-2002

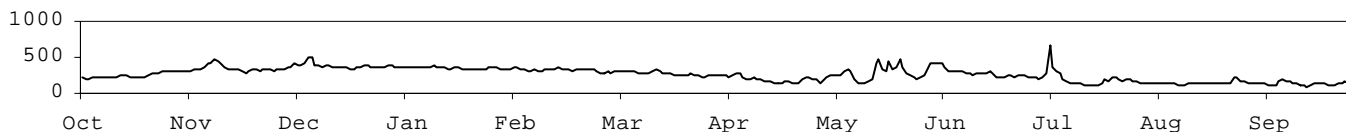
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	211	300	403	372b	335b	307	255	148	370	225	130	147
2	201	320	396	365b	354	290b	250	156	408	221	130	140
3	202	335	402	370b	352	300b	262	227	405	208	139	132
4	209	329	404	356	340	304	242	244	416	211	143	139
5	211	362	513	372	332	315	227	251	420	265	144	140
6	212	417	507	350	301	315	246	260	354	673	144	135
7	215	418	396	373	313	315	270	262	316	355	134	121
8	216	459	398	375	321	315	271	297	301	309	131	107
9	222	440	372	371	312	301	219	341	307	279	142	105
10	232	404	378	378	304	283	202	293	297	184	137	166
11	234	352	383	366	326	289	200	193	303	163	134	199
12	239	324	370	360	343	285	209	147	280	139	125	162
13	244	331	368	362	328	286	206	143	267	137	113	154
14	243	325	353	342	339	312	186	139	256	131	114	143
15	233	324	363	329	348	320	169	165	269	127	132	137
16	224	310	369	357	322	302	157	208	288	117	135	120
17	233	284	334	350b	321	276	158	427	284	119	138	102
18	228	303	346	335b	323	266	137	461	270	122	134	91
19	229	321	356	325b	316	266	127	338	301	125	145	109
20	247	322	354	328	326	256	146	311	262	122	151	139
21	271	313	378	336	331	244	173	452	217	132	147	140
22	269	323	378	324	327	254	169	337	215	194	144	134
23	277	323	360	337	324	260	141	367	231	179	144	128
24	293	321	352	320b	332	263	133	483	250	222	144	125
25	295	307	350b	345b	341	276	136	351	249	217	147	116
26	296	331	360b	364	318	259	185	267	236	189	141	125
27	310	337	372b	368	286	237	233	239	243	179	140	132
28	312	329	381b	360	278	231	219	219	249	191	220a	144
29	296	363	377b	343	---	236	199	202	259	185	219a	158
30	293	373	371b	330	---	241	187	212	236	165	162	142
31	303	---	360b	335b	---	253	---	247	---	158	154	---
TOTAL	7700	10300	11804	10898	9093	8657	5914	8387	8759	6243	4457	4032
MEAN	248	343	381	352	325	279	197	271	292	201	144	134
AC-FT	15270	20430	23410	21620	18040	17170	11730	16640	17370	12380	8840	8000
MAX	312	459	513	378	354	320	271	483	420	673	220	199
MIN	201	284	334	320	278	231	127	139	215	117	113	91

CAL YR 2001 TOTAL 221555 MEAN 607 MAX 2900 MIN 200 AC-FT 439400  
WTR YR 2002 TOTAL 96244 MEAN 264 MAX 673 MIN 91 AC-FT 190900

MAX DISCH: 4110 CFS AT 00:00 ON Jul. 6, 2002 GH 6.16 FT. SHIFT 0.01 FT.  
MAX GH: 6.16 FT. AT 00:00 ON Jul. 6, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07099400 ARKANSAS RIVER ABOVE PUEBLO, CO

**LOCATION.**--Lat 38°16'18", long 104°43'03", in SE¼NE¼ sec. 36, T.20 S., R.66 W., Pueblo County, Hydrologic Unit 11020002, on left bank of Arkansas River, 200' downstream from NE corner of Arkansas River bridge, approx. 0.4 mi. downstream from Pueblo Dam, and 7 mi. West of Pueblo.

**DRAINAGE AREA AND PERIOD OF RECORD.**--4,670 mi<sup>2</sup>. October 1965 to current year. Periodic water quality and sediment data available Oct. 1965 to current year.

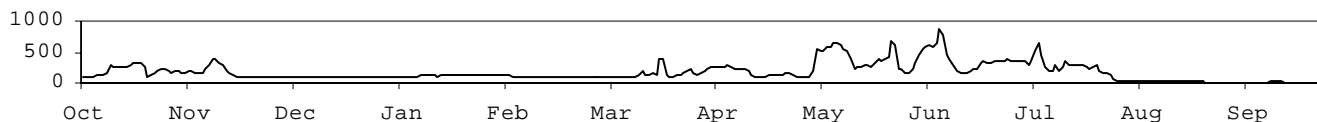
**GAGE.**--Satellite-monitored data collection platform (Sutron 8210 DCP) with Sutron Accububble, shaft encoder and graphic water-stage recorder in a 4' x 4' block shelter over a CMP well. The well isolates at a gage height of 1.80 ft. Primary record is the DCP log of the Accububble data with the shaft encoder and graphic chart recorder data used for backup purposes when the well is not isolated. A new electric tape and fixed index were installed in the new shelter and put into use on April 9, 2002. An outside staff gage and RP was installed on August 26, 2002 for use as the primary reference gage under the low flow conditions (gage heights up to 2.67 ft) experienced this water year. High data rate Sutron 8210 DCP installed May 20, 2002. Cableway approximately 20 feet upstream from gage. USGS Hydrolab co-located at gage. Elevation of gage is 4740 ft above NGV Datum of 1929 (from topographic map). Prior to March 23, 1967 at site 730 ft upstream at datum 2.23 ft higher. May 24 1974 to Feb 24 1975 at site 2000 ft downstream, at different datum. February 25, 1975 to September 30, 2001 at or within 50 ft of present location, at datum 1 ft. higher.

**REMARKS.**--Record is complete and reliable, except for the period August 28-September 30, 2002 when the Accububble experienced leak problems and the well was isolated. Record good, except for the period of no gage height record, which should be considered poor. Station maintained and record developed by Anthony D. Gutierrez.

**RATING TABLE.**--ARKPUECO17 USED FROM 01-OCT-2001 TO 01-OCT-2002

DAY	DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002											
	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	100	186	103	106	116	109	195	102	228	348	34	.58
2	89	178	103	106	115	109	241	102	316	347	28	.58
3	91	164	103	107	116	108	265	208	463	348	19	.58
4	105	164	103	107	112	107	265	543	543	348	19	.58
5	122	172	103	107	107	107	265	513	580	303	19	.58
6	122	229	103	107	107	108	264	531	600	342	19	.58
7	127	299	103	107	107	108	264	567	580	531	19	.58
8	175	392	103	113	106	101	284	586	649	651	18	.58
9	306	389	103	118	106	96	259	646	870	459	18	.58
10	269	334	101	118	106	96	234	650	769	248	18	.58
11	255	278	101	116	107	96	234	601	448	196	18	.58
12	265	206	102	114	107	96	234	546	375	196	18	.58
13	271	152	102	112	107	145	234	502	303	286	18	.58
14	272	124	101	114	108	198	205	395	194	182	18	.28
15	297	99	102	114	107	123	144	226	175	268	18	.28
16	324	100	102	114	107	141	109	242	175	368	18	.28
17	318	100	102	114	107	156	109	247	173	303	19	.24
18	308	100	102	114	107	144	109	277	188	303	18	.58
19	254	100	103	113	107	390	109	301	219	302	18	.58
20	110	100	104	113	107	402	132	270	240	305	18	.58
21	119	100	104	113	108	117	140	322	325	287	18	.58
22	151	100	105	113	108	112	140	399	347	263	18	.58
23	192	100	105	114	107	111	140	361	326	230	18	.58
24	211	100	105	114	108	115	141	384	335	262	18	.58
25	221	100	105	114	109	121	163	418	352	288	18	.57
26	202	100	105	114	110	150	159	691	352	186	16	.57
27	166	103	105	114	108	191	113	599	351	157	12	.57
28	182	102	105	114	108	210	102	227	366	157	.58	.56
29	180	102	106	115	---	161	102	214	384	128	.58	.56
30	162	102	106	115	---	120	101	169	362	70	.58	.56
31	173	---	106	115	---	152	---	165	---	47	.58	---
TOTAL	6139	4875	3206	3489	3035	4500	5456	12004	11588	8709	512.32	122.99
MEAN	198	163	103	113	108	145	182	387	386	281	16.5	4.1
AC-FT	12180	9670	6360	6920	6020	8930	10820	23810	22980	17270	1020	244
MAX	324	392	106	118	116	402	284	691	870	651	34	.28
MIN	89	99	101	106	106	96	101	102	173	47	.58	.56
CAL YR 2001	TOTAL	206086	MEAN	565	MAX	2820	MIN	85	AC-FT	408760		
WTR YR 2002	TOTAL	63636.31	MEAN	174	MAX	870	MIN	.56	AC-FT	126200		

MAX DISCH: 886 CFS AT 03:30 ON Jun. 9, 2002 GH 2.76 FT. SHIFT 0.01 FT. DATUM CORR. 1.00 FT.  
 MAX GH: 2.76 FT. (+1.00 FT. DATUM CORR.) AT 03:30 ON Jun. 9, 2002



## ARKANSAS RIVER BASIN

07111000 HUERFANO RIVER AT MANZANARES CROSSING NEAR REDWING, CO

**LOCATION.**--Lat 37°43'40", long 105°21'03", in sec 5, T.27 S., R.71 W., Huerfano County, on left bank at Manzanares crossing, 500 ft downstream from private bridge, .2 mi downstream from Manzanares Creek, and 3.5 mi southwest of Redwing.

**DRAINAGE AREA.**--73 mi<sup>2</sup>.

**GAGE.**--Sutron model 8210 satellite-monitored data collection platform (DCP) with shaft encoder and graphic water-stage recorder, inside a 48-inch diameter corrugated metal pipe (CMP) shelter and well. Shaft encoder and chart set to inside electric tape gage. DCP logger is primary record with DCP data and A-35 chart record used for back-up purposes. A Sutron High-Data Rate radio transmitter (HDR) DCP was installed August 1 2002.

**REMARKS.**--Record complete and reliable except for the following periods: November 20, 21, 24, 26-29; December 6, 8-12, 15-17 and 23-28, 2001 and January 11,12, 14, 18-20, 24-26, 30, 31; February 1, 3, 14-16, 20-22, 25-28; March 1, 9, 10, and 17, 2002, when the stage-discharge relationship was affected by ice. December 13, 14, 2001 and February 4-13; March 2-5, 2002, when ice affected float movement in the well or the well was frozen. Record fair except for periods of ice effect, which should be considered poor. Station maintained and record developed by Anthony D. Gutierrez.

**RATING TABLE.**--HURREDCO23 USED FROM 01-OCT-2001 TO 30-SEP-2002

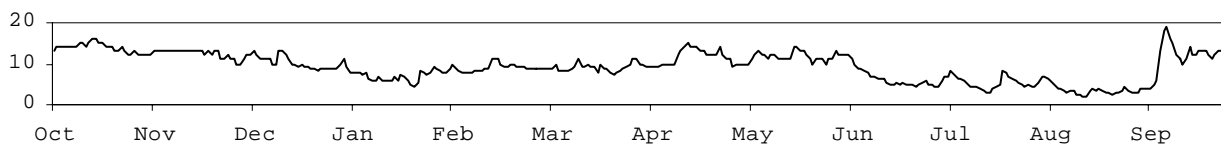
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	13	13	12	7.7	9	8.7	10	9.6	13	4.7	4.3	3
2	14	13	13	7.7	9.9	9	10	10	12	4.6	4.6	2.7
3	14	13	12	7.7	9	9	9.5	10	12	4.6	5.3	3
4	14	13	11	7.7	8.5	9	9.4	10	12	5.7	6.9	4.1
5	14	13	11	7.5	8	9	9.2	10	12	7	6.8	3.9
6	14	13	11	7.7	8	9.6	9.1	11	11	6.6	6.3	3.9
7	14	13	11	6.3	8	8.4	9.4	12	9.6	8.3	5.9	3.9
8	14	13	10	5.7	8	8.4	9.7	13	8.9	7.4	4.7	4.7
9	15	13	10	5.7	8.5	8.5	10	12	8.7	6.3	4.1	5.8
10	15	13	13	6.6	8.5	8.5	10	12	8.2	6.2	3.7	13
11	14	13	13	6	8.5	8.9	10	11	7.9	5.7	3.3	18
12	15	13	12	6	8.7	9.5	10	12	6.9	5	2.9	19
13	16	13	11	5.9	9	11	12	12	6.6	4.3	3.3	16
14	16	13	10	6	11	9.5	13	11	6.4	4.2	3.2	15
15	15	13	10	6.6	11	9.1	14	11	6.1	4.6	2.5	12
16	15	13	9.5	6	11	9.8	15	11	6.1	3.8	2.3	11
17	14	12	10	7.2	10	9.5	14	11	5.2	3.5	2.1	9.8
18	14	13	9.4	6.8	9.5	9.2	14	11	4.7	3	2.1	11
19	14	12	9.4	6	9.4	8	14	14	4.7	2.8	3.2	14
20	13	13	9	5	10	9.9	13	14	5.2	3.7	3.9	12
21	13	13	8.8	4.5	10	8.7	13	13	4.7	4.3	3.6	12
22	14	11	8.3	5.3	9.5	9	12	13	5.2	4.8	3.7	13
23	13	11	9	8.3	9.1	7.6	12	12	5.1	8.4	3.6	13
24	12	12	9	8	9.2	7.2	12	11	4.7	7.7	3.1	13
25	12	11	9	7.5	9	7.8	12	10	4.7	7	2.9	12
26	13	11	9	8	9	8.5	14	11	4.6	6.4	2.2	11
27	12	10	9	9.3	8.6	8.9	12	11	5.1	6	2.7	12
28	12	10	9	8.8	8.6	9.5	11	11	5.6	5.5	3	13
29	12	11	10	8.3	---	10	11	10	5.8	5	3.3	13
30	12	12	11	8	---	11	9.4	11	5	4.6	4.2	12
31	12	---	9.3	8	---	11	---	11	---	4.7	3.4	---
TOTAL	424	370	318.7	215.8	256.5	281.7	343.7	351.6	217.7	166.4	117.1	309.8
MEAN	14	12	10.3	7	9.2	9.1	11.5	11.3	7.3	5.4	3.8	10.3
AC-FT	841	734	632	428	509	559	682	697	432	330	232	614
MAX	16	13	13	9.3	11	11	15	14	13	8.4	6.9	19
MIN	12	10	8.3	4.5	8	7.2	9.1	9.6	4.6	2.8	2.1	2.7

CAL YR 2001 TOTAL 9834.4 MEAN 26.9 MAX 136 MIN 7.3 AC-FT 19510  
WTR YR 2002 TOTAL 3373 MEAN 9.24 MAX 19 MIN 2.1 AC-FT 6690

MAX DISCH: 22.7 CFS AT 20:15 ON Sep. 11, 2002 GH 2.44 FT. SHIFT -0.04 FT.  
MAX GH: 2.44 FT. AT 20:15 ON Sep. 11, 2002  
MAX GH: 3.3 FT. AT 08:45 ON Jan. 20, 2002 (ice affected)

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

07114000 CUCHARAS RIVER AT BOYD RANCH NEAR LA VETA, CO

**LOCATION.**--Lat 37°25'12", long 105°03'08", in SE¼NE¼SE¼ sec. 24, T.30 S., R.69 W., Huerfano County, on left bank at Boyd Ranch, 29 ft. downstream from private bridge, 1.4 mi downstream from Chaparral Creek, and 6.5 mi southwest of La Veta.

**DRAINAGE AREA.**--56 mi<sup>2</sup>.

**GAGE.**--Sutron model 8210 satellite-monitored data collection platform (DCP) with a High Data Rate (HDR) radio transmitter, with shaft encoder and graphic water-stage recorder in a 42-inch diameter corrugated metal pipe (CMP) shelter over 48-inch corrugated pipe well. Shaft encoder and chart are set to the reference mark on the front of the equipment shelf using a drop-tape that was installed June 30, 2000. DCP log is primary record with graphic chart record and DCP data used for back-up purposes. The new Sutron DCP was installed July 29, 2002. The outside staff is at this time not being used.

**REMARKS.**--Record is complete and reliable except for the following periods: November 20, 21, 23 - 30; December 1-3, 6-20, 22-31, 2001; January 1-3, 18, 19; February 14-17; March 5-13, 16-21; and April 3, 2002, when the stage-discharge relationship was affected by ice. January 4-14, 20-31; February 1-13, 18-28; March 1-4 when the well was frozen. Record considered good, except during periods of ice effect, which is poor. Station maintained and record developed by Anthony Gutierrez.

**RATING TABLE.**--CRBRLVCO14 USED FROM 01-OCT-2001 TO 08-OCT-2002

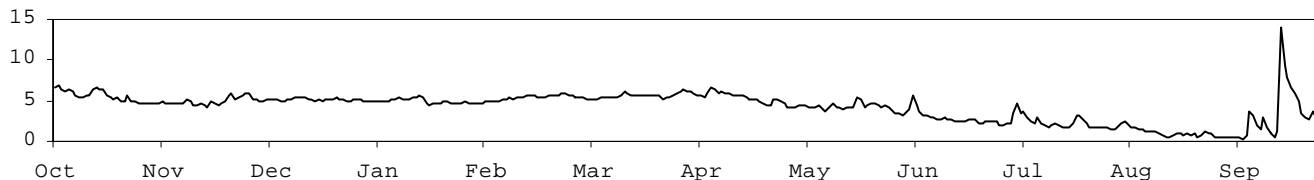
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	6.7	5	5.2	4.8	4.7	5.4	6.2	4.2	3.4	1.9	1.4	.45
2	7	4.6	5.2	4.8	4.8	5.3	6.1	4.3	3.2	2.1	1.5	.44
3	6.5	4.7	5.1	4.8	4.8	5.2	5.9	4.4	3.4	2.1	1.7	.49
4	6.2	4.7	5.1	4.9	4.9	5.1	5.7	4.4	4	3.5	2.1	.46
5	6.3	4.7	4.9	5	4.9	5.1	5.7	4.5	5.7	4.7	2.5	.4
6	6.2	4.6	5	5.1	5	5.2	5.5	4.2	4.5	3.5	1.9	.37
7	5.6	4.7	5.1	5.2	5.1	5.3	5.9	4.1	3.7	3.7	1.8	.38
8	5.4	5.2	5.2	5.3	5.2	5.4	6.7	4.2	3.3	3	1.7	.36
9	5.3	4.8	5.3	5.2	5.3	5.3	6.5	4.4	3.1	2.4	1.5	.81
10	5.6	4.4	5.4	5.1	5.2	5.3	6	4	2.9	2.1	1.4	3.7
11	5.6	4.5	5.5	5.2	5.3	5.4	6.1	3.8	2.9	2.9	1.3	3.1
12	6.5	4.6	5.4	5.3	5.4	5.5	6	4.3	2.8	2.2	1.3	1.9
13	6.6	4.4	5.2	5.4	5.5	5.7	5.8	4.6	2.8	1.9	1.3	1.4
14	6.4	4.3	5.1	5.6	5.6	6.2	5.7	4.3	2.9	1.8	1.3	2.9
15	6.3	4.9	5	5.4	5.7	5.8	5.6	4.2	2.8	1.9	1.1	1.8
16	5.6	4.7	5.1	4.7	5.6	5.7	5.6	3.9	2.7	2.2	.68	.94
17	5.5	4.5	5	4.4	5.3	5.6	5.6	4.2	2.5	1.9	.51	.55
18	5.2	4.6	5.1	4.7	5.4	5.6	5.3	4.2	2.4	1.7	.56	1.2
19	5.3	5	5.2	4.7	5.5	5.6	5.2	4.2	2.4	1.7	.75	14
20	4.8	5.7	5.2	4.7	5.6	5.7	5.2	5.5	2.5	1.8	1.1	9.4
21	4.9	5.9	5.3	4.8	5.6	5.6	5.2	5.1	2.7	2.1	.87	7.8
22	5.6	5.2	5.2	4.8	5.7	5.6	5	4.3	2.8	3.1	.86	6.6
23	5	5.5	5.1	4.7	5.7	5.7	4.7	4.4	2.6	3.1	1.1	5.8
24	4.8	5.6	5	4.6	5.8	5.7	4.4	4.6	2.3	2.8	.82	4.8
25	4.7	5.8	5	4.6	5.8	5.2	4.4	4.7	2.3	2.1	.87	3.4
26	4.7	5.8	5.1	4.7	5.7	5.4	5.1	4.5	2.4	1.8	.57	2.9
27	4.7	5.2	5.1	4.8	5.6	5.4	5.2	4.3	2.4	1.7	.77	2.7
28	4.7	5.1	5.1	4.7	5.5	5.7	5	4.5	2.5	1.7	1.2	3.6
29	4.7	5	4.9	4.7	---	5.9	4.7	4.2	2.5	1.6	.93	3.1
30	4.6	5	4.9	4.6	---	6.2	4.3	3.9	2	1.6	.94	2.4
31	4.6	---	4.9	4.6	---	6.4	---	3.5	---	1.6	.5	---
TOTAL	171.6	148.7	158.9	151.9	150.2	172.2	164.3	133.9	88.4	72.2	36.83	88.15
MEAN	5.5	5	5.1	4.9	5.4	5.6	5.5	4.3	3	2.3	1.19	2.94
AC-FT	340	295	315	301	298	342	326	266	175	143	73	175
MAX	7	5.9	5.5	5.6	5.8	6.4	6.7	5.5	5.7	4.7	2.5	14
MIN	4.6	4.3	4.9	4.4	4.7	5.1	4.3	3.5	2	1.6	.5	.36

CAL YR 2001 TOTAL 3587 MEAN 9.83 MAX 37 MIN 2.3 AC-FT 7117  
WTR YR 2002 TOTAL 1537.28 MEAN 4.21 MAX 14 MIN .36 AC-FT 3050

MAX DISCH: 22.3 CFS AT 01:00 ON Sep. 19, 2002 GH 0.87 FT. SHIFT 0.03 FT.  
MAX GH: 0.87 FT. AT 01:00 ON Sep. 19, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

OXFORD FARMERS DITCH NEAR NEPESTA, CO

**LOCATION.**--Lat 38° 10' 34", Long 104° 8' 42", in the NE¼ NW¼ SW¼ Sec.32, T21S, R60W Pueblo County, Hydrologic Unit 11020005, approximately 0.33 mi upstream from Arkansas River at Nepesta Rd. Bridge river gage.

**DRAINAGE AREA.**-- N/A.

**GAGE.**--Float-activated graphic water-stage recorder and shaft encoder in wood frame shelter with well. Shaft encoder is connected to a SDI Radio Bridge (slave), which is monitored by Sutron 8210 DCP and SDI Radio Bridge (master) installed at Arkansas River at Nepesta Road Bridge near Nepesta CO gaging station. Primary record is the DCP log data with satellite-monitored data and chart recorder data used for backup purposes. Twelve-foot standard concrete Parshall flume is the control. Primary reference gage is outside staff gage installed in flume.

**REMARKS.**--Record is complete and reliable. Record fair. The Arkansas River near Nepesta CO gaging station was moved from above the Oxford Farmers Ditch diversion to the Nepesta Road Bridge below the Oxford diversion beginning October 1, 2000. For consistency and comparison with previously published historical record in this reach of the Arkansas River, the Oxford Ditch mean daily discharge is combined with the mean daily discharge measured at Arkansas River at Nepesta Road Bridge near Nepesta CO gaging station. Record developed by Div. II personnel.

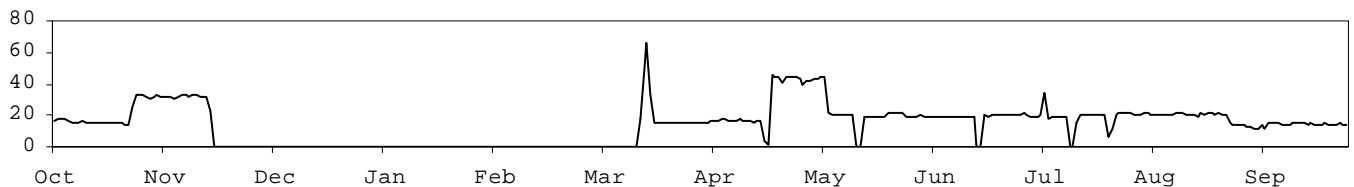
**RATING TABLE.**--OXFDFITCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	17	32	0	0	0	0	15	42	19	21	20	14
2	18	32	0	0	0	0	15	42	20	20	20	13
3	18	32	0	0	0	0	15	43	19	19	20	13
4	18	31	0	0	0	0	16	43	19	19	21	12
5	16	32	0	0	0	0	17	44	19	19	21	11
6	15	33	0	0	0	0	17	44	19	20	20	14
7	15	33	0	0	0	0	18	21	19	34	20	11
8	15	32	0	0	0	0	18	20	19	18	20	15
9	16	33	0	0	0	0	17	20	19	19	20	15
10	15	33	0	0	0	0	17	20	19	19	20	15
11	15	32	0	0	0	0	17	20	19	19	20	15
12	15	32	0	0	0	0	18	20	19	19	20	14
13	15	32	0	0	0	0	17	20	19	19	21	14
14	15	23	0	0	0	0	17	20	19	.08	21	14
15	15	0	0	0	0	18	17	.09	19	0	21	15
16	15	0	0	0	0	49	15	0	19	15	20	15
17	15	0	0	0	0	66	17	19	19	20	20	15
18	15	0	0	0	0	33	17	19	0	20	20	15
19	15	0	0	0	0	15	3.7	19	0	20	19	14
20	15	0	0	0	0	15	1.8	19	20	20	21	15
21	14	0	0	0	0	15	46	19	19	20	20	14
22	14	0	0	0	0	15	45	19	20	20	22	14
23	26	0	0	0	0	15	44	19	20	20	22	14
24	33	0	0	0	0	15	41	21	20	20	20	15
25	33	0	0	0	0	15	45	22	20	6.2	21	14
26	33	0	0	0	0	15	45	22	20	12	20	14
27	32	0	0	0	0	15	44	22	20	20	20	14
28	31	0	0	0	0	15	44	22	20	21	15	15
29	32	0	0	0	---	15	43	19	20	21	14	14
30	33	0	0	0	---	15	40	19	20	21	14	14
31	32	---	0	0	---	15	---	19	---	21	14	---
TOTAL	626	442	0	0	0	361	742.5	718.09	543	562.28	607	421
MEAN	20	14.7	0	0	0	11.6	24.7	23.2	18.1	18.1	20	14
AC-FT	1240	877	0	0	0	716	1470	1420	1080	1120	1200	835
MAX	33	33	0	0	0	66	46	44	20	34	22	15
MIN	14	0	0	0	0	0	1.8	0	0	0	14	11
CAL YR 2001	TOTAL	12062.46	MEAN	33	MAX	124	MIN	0	AC-FT	23930		
WTR YR 2002	TOTAL	5022.87	MEAN	13.8	MAX	66	MIN	0	AC-FT	9960		

MAX DISCH: 66 CFS AT 08:30 ON Mar. 16, 2002 GH 1.18 FT. SHIFT 0 FT. DATUM 0.06 FT.  
MAX GH: 1.24 FT. AT 08:30 ON Mar. 16, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

07117000 ARKANSAS RIVER AT NEPESTA ROAD BRIDGE NEAR NEPESTA, CO (RIVER ONLY)

**LOCATION.**--Lat 38° 10' 44", Long 104° 8' 20", in the NE¼ SE¼ NW¼ Sec.32, T21S, R60W Pueblo County, Hydrologic Unit 11020005, on the left bank downstream side of the Nepesta Road Bridge crossing the Arkansas River, 0.8 mi downstream of Kramer Creek, 9 mi downstream from Huerfano River, 1 mile NNW of the Nepesta Cemetery.

**DRAINAGE AREA.**--9,345 mi<sup>2</sup>.

**GAGE.**--Sutron 8210 satellite-monitored data collection platform (DCP) with data logger attached to a Sutron Accububbler in a 4" x 4" steel shelter. The primary record is the DCP log data with satellite data used for backup. The primary gage is a wire weight gage attached to the bridge approximately 120 ft south of the shelter. A Water Log SDI radio bridge is controlled by the DCP for data collection and transmission of the Oxford Farmers Ditch gage height. A High Data Rate 8210 DCP was installed this water year. Elevation of gage is 4,355 ft above National Geodetic Vertical Datum of 1929.

**REMARKS.**--Record is complete and reliable, except for the periods: December 30, 31, 2001; January 1, 2, 31; February 1 - 4, 26, 27; March 1 -3, 2002, when ice affected the stage-discharge relationship; November 16 - 19, 2001, when the SDI radio bridge wasn't working properly and the battery was failing; March 28 - 31; April 1, 2002, when an accubar pressure sensor was installed and failed. Record is considered fair. Station maintained and record developed by Anthony D. Gutierrez.

**RATING TABLE.**--ARKNEPC015 USED FROM 01-OCT-2001 TO 02-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

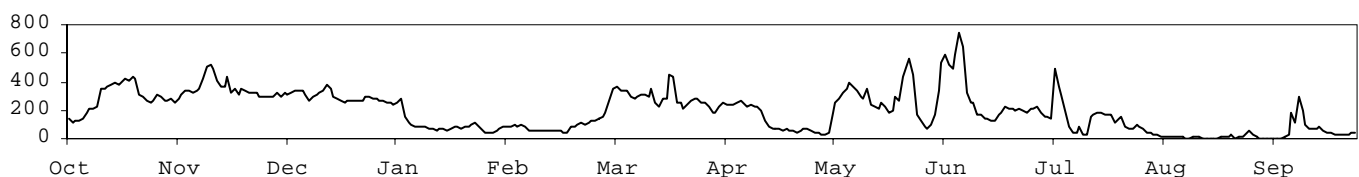
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	137	281	318	245	85	158	187	38	73	205	64	32
2	115	304	308	250	80	185	180	31	97	226	49	16
3	121	339	324	285	90	270	229	33	170	183	39	5.4
4	129	341	343	157	95	355	255	40	339	156	28	4.8
5	143	323	335	107	91	363	241	186	539	156	23	5.9
6	189	341	331	97	92	332	236	254	587	137	15	5.9
7	210	346	307	80	82	336	242	283	521	490	13	2.3
8	208	425	260	81	61	332	256	316	494	371	11	6.6
9	224	510	293	86	52	299	268	350	583	304	12	5.2
10	351	525	310	81	56	275	256	389	748	191	9	8.6
11	355	487	329	69	54	294	229	365	643	82	12	26
12	370	404	335	72	51	304	234	341	327	44	8	189
13	378	362	379	62	51	309	229	301	253	38	2.6	110
14	398	370	345	66	52	300	229	287	251	87	5.2	291
15	382	433	296	68	52	351	191	348	175	33	15	202
16	399	327	278	60	53	257	129	239	167	32	11	103
17	419	353	261	70	50	229	84	220	137	159	11	75
18	413	305	254	78	44	285	70	206	135	174	7	75
19	436	357	272	86	46	285	69	247	132	180	.82	67
20	426	341	267	68	83	455	68	229	128	183	4.2	81
21	308	316	266	89	89	439	62	182	167	170	1.6	63
22	296	322	267	89	105	259	66	197	185	164	4.9	40
23	268	321	264	99	109	250	56	297	219	174	12	38
24	250	301	299	115	94	209	51	260	204	119	19	33
25	269	293	289	87	107	234	47	432	208	138	14	34
26	306	289	282	55	130	273	56	513	201	156	23	30
27	296	291	283	47	133	278	70	561	205	88	5.9	32
28	261	294	268	48	135	283	70	455	194	67	8.5	34
29	271	321	270	48	---	258	59	168	187	72	8.7	40
30	284	299	250	50	---	250	44	126	210	97	26	37
31	247	---	248	70	---	224	---	84	---	78	63	---
TOTAL	8859	10521	9131	2965	2222	8931	4463	7978	8479	4754	526.42	1692.7
MEAN	286	351	295	96	79	288	149	257	283	153	17	56.4
AC-FT	17570	20870	18110	5880	4410	17710	8850	15820	16820	9430	1040	3360
MAX	436	525	379	285	135	455	268	561	748	490	64	291
MIN	115	281	248	47	44	158	44	31	73	32	.82	2.3

CAL YR 2001 TOTAL 186683 MEAN 511 MAX 3150 MIN 99 AC-FT 370280  
WTR YR 2002 TOTAL 70522.12 MEAN 193 MAX 748 MIN .82 AC-FT 139900

MAX DISCH: 801 CFS AT 07:30 ON Jun. 10, 2002 GH 12.18 FT. SHIFT -0.08 FT. DATUM +0.03 FT.

MAX GH: 12.21 FT. AT 23:45 ON Mar. 20, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





## ARKANSAS RIVER BASIN

07117000 ARKANSAS RIVER AT NEPESTA ROAD BRIDGE NEAR NEPESTA, CO (COMBINED)

**LOCATION.**-- Lat 38° 10' 44", Long 104° 8' 20", in the NE¼ SE¼ NW¼ Sec.32, T21S, R60W Pueblo County, Hydrologic Unit 11020005, on the left bank downstream side of the Nepesta Road Bridge crossing the Arkansas River, 0.8 mi downstream of Kramer Creek, 9 mi downstream from Huerfano River, 1 mile NNW of the Nepesta Cemetery.

**DRAINAGE AREA.**--9,345 mi<sup>2</sup>.

**REMARKS.**--Combined record is fair, except during periods of estimated flow, which should be considered poor. The Arkansas River near Nepesta CO gaging station was moved from above the Oxford Farmers Ditch diversion to the Nepesta Road bridge below the diversion beginning October 1, 2000. For consistency and comparison with previously published historical record in this reach of the Arkansas River, the total Arkansas River flow is computed by combining the Oxford Ditch mean daily discharge with the mean daily discharge measured at Arkansas River at Nepesta Road Bridge near Nepesta CO gaging station. The peak discharge for the year was 820 cfs at 07:30 June 10, 2002.

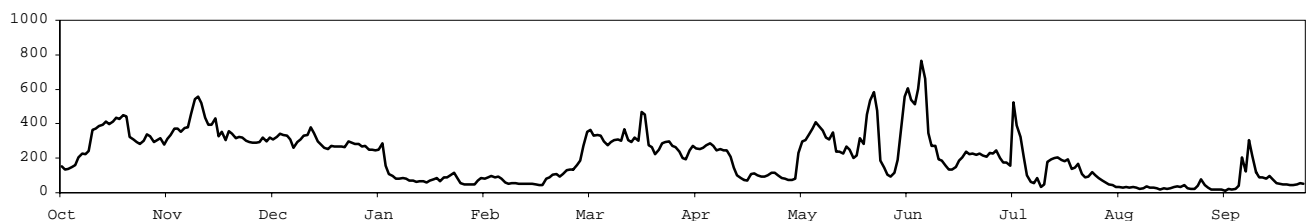
ARKANSAS RIVER AT NEPESTA BRIDGE AND OXFORD FARMERS DITCH (COMBINED)  
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	154	313	318	245	85	158	202	80	92	226	84	46
2	133	336	308	250	80	185	195	73	117	246	69	29
3	139	371	324	285	90	270	244	76	189	202	59	18
4	147	372	343	157	95	355	271	83	358	175	49	17
5	159	355	335	107	91	363	258	230	558	175	44	17
6	204	374	331	97	92	332	253	298	606	157	35	20
7	225	379	307	80	82	336	260	304	540	524	33	13
8	223	457	260	81	61	332	274	336	513	389	31	22
9	240	543	293	86	52	299	285	370	602	323	32	20
10	366	558	310	81	56	275	273	409	767	210	29	24
11	370	519	329	69	54	294	246	385	662	101	32	41
12	385	436	335	72	51	304	252	361	346	63	28	203
13	393	394	379	62	51	309	246	321	272	57	24	124
14	413	393	345	66	52	300	246	307	270	87	26	305
15	397	433	296	68	52	369	208	348	194	33	36	217
16	414	327	278	60	53	306	144	239	186	47	31	118
17	434	353	261	70	50	295	101	239	156	179	31	90
18	428	305	254	78	44	318	87	225	135	194	27	90
19	451	357	272	86	46	300	73	266	132	200	20	81
20	441	341	267	68	83	470	70	248	148	203	25	96
21	322	316	266	89	89	454	108	201	186	190	22	77
22	310	322	267	89	105	274	111	216	205	184	27	54
23	294	321	264	99	109	265	100	316	239	194	34	52
24	283	301	299	115	94	224	92	281	224	139	39	48
25	302	293	289	87	107	249	92	454	228	144	35	48
26	339	289	282	55	130	288	101	535	221	168	43	44
27	328	291	283	47	133	293	114	583	225	108	26	46
28	292	294	268	48	135	298	114	477	214	88	24	49
29	303	321	270	48	---	273	102	187	207	93	23	54
30	317	299	250	50	---	265	84	145	230	118	40	51
31	279	---	248	70	---	239	---	103	---	99	77	---
TOTAL	9485	10963	9131	2965	2222	9292	5206	8696	9022	5316	1135	2114
MEAN	306	365	295	96	79	300	174	281	301	171	37	71
AC-FT	18810	21750	18110	5880	4410	18430	10330	17250	17900	10540	2250	4190
MAX	451	558	379	285	135	470	285	583	767	524	84	305
MIN	133	289	248	47	44	158	70	73	92	33	20	13

CAL YR 2001 TOTAL 198910 MEAN 545 MAX 3260 MIN 99 AC-FT 394500  
WTR YR 2002 TOTAL 75547 MEAN 207 MAX 767 MIN 13 AC-FT 149800

MAX DISCH.: 820 CFS AT 7:30 ON Jun. 10, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

07119700 ARKANSAS RIVER BELOW CATLIN DAM, NEAR FOWLER, CO

**LOCATION.**--Lat 38°07'33", long 103°54'41", in NW¼NW¼ sec. 21, T.22 S., R.58 W., Otero County, Hydrologic Unit 11020005, at Catlin Canal gage, on right bank 2.2 mi downstream from diversion dam for Catlin Canal, 2.3 mi downstream from Apishapa River, and 6.0 mi east of Fowler.

**DRAINAGE AREA AND PERIOD OF RECORD.**--10,901 mi<sup>2</sup>. October 1964 to current year.

**GAGE.**--Satellite-monitored data collection platform (Sutron Model 8210 DCP), and accubar in 8' by 8' shelter. Primary record is DCP data log. Satellite-monitored data used for backup purposes. Outside staff gage is primary reference gage. Cableway approximately 1 mile upstream. Catlin Canal flume gage height and USGS water quality monitor also monitored by this DCP. High data rate Sutron 8210 DCP installed May 21, 2002. Concrete flood block and new orifice lines installed April-May 2002. New orifice lines started in use on May 9, 2002.

**REMARKS.**--Record is complete and reliable except for the following periods: Jan. 8, 9; Jul. 21, 22; and Aug. 21, 22, 2002 due to DCP malfunction and missing satellite data. Nov 28, 29; Dec 13-14, 31, 2001; Jan 1-4, 30-31; Feb 1-5, 26-27; and Mar 1-3, 2002 due to ice affecting the stage-discharge relationship. Record fair, except for periods of estimated gage heights, which should be considered poor. Record developed and station maintained by Adam Adame.

**RATING TABLE.**--ARKCATCO09 USED FROM 01-OCT-2001 TO 30-SEP-2002

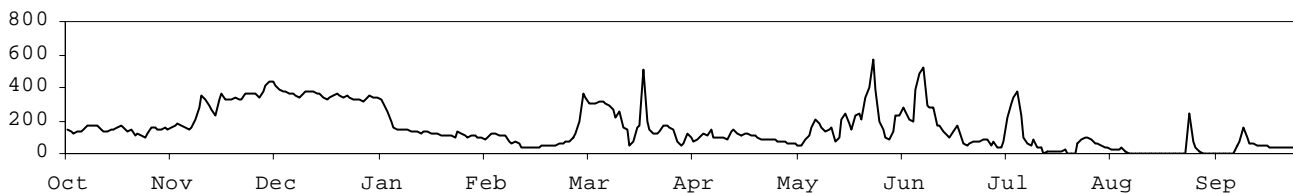
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	144	154	436	344	95	125	53	70	102	85	80	35
2	131	172	417	330	85	190	63	69	85	53	64	12
3	126	182	385	300	100	360	117	66	130	68	55	4.5
4	128	174	381	260	120	345	100	64	234	32	49	1.3
5	132	155	377	193	120	301	70	55	233	34	41	2.2
6	145	142	358	155	113	297	82	52	280	68	34	2.7
7	166	155	359	146	109	302	104	54	259	218	25	.7
8	167	204	346	145	106	320	119	81	204	299	21	.53
9	174	279	336	150	76	312	113	107	193	342	20	.88
10	172	352	364	151	66	303	143	162	384	378	31	1.3
11	150	323	374	137	77	290	101	201	484	229	15	0
12	137	290	379	132	60	272	102	177	521	102	5.6	4
13	130	264	370	129	39	219	101	158	291	62	.96	50
14	148	226	360	124	38	253	98	139	276	49	.79	75
15	148	329	363	132	38	157	80	149	275	81	1.8	162
16	153	367	340	129	39	143	128	156	174	31	1.4	96
17	172	333	332	126	40	52	140	78	166	31	2.5	63
18	162	333	338	126	39	68	121	94	132	.53	1.9	56
19	134	331	353	119	44	153	110	212	106	6.4	2.1	53
20	143	336	367	112	49	165	118	245	95	15	2.5	50
21	106	333	350	109	50	510	118	179	135	15	2.1	52
22	120	333	344	104	46	192	115	150	167	15	2	44
23	108	368	349	105	53	146	115	228	132	17	1.8	36
24	92	368	337	98	63	121	99	246	59	19	1.5	34
25	126	368	323	128	66	116	88	209	54	0	1.2	33
26	152	367	328	116	73	136	88	344	64	0	1.6	34
27	163	339	333	104	75	168	87	395	77	0	.88	35
28	145	380	321	102	94	164	88	575	72	58	3.1	35
29	142	410	339	108	---	158	83	393	68	87	1.7	35
30	152	437	349	105	---	141	74	198	79	94	242	34
31	145	---	340	100	---	75	---	145	---	96	70	---
TOTAL	4413	8804	11048	4619	1973	6554	3018	5451	5531	2584.93	782.43	1042.11
MEAN	142	293	356	149	71	211	101	176	184	83.4	25.2	34.7
AC-FT	8750	17460	21910	9160	3910	13000	5990	10810	10970	5130	1550	2070
MAX	174	437	436	344	120	510	143	575	521	378	242	162
MIN	92	142	321	98	38	52	53	52	54	0	.79	0

CAL YR 2001 TOTAL 144374 MEAN 396 MAX 2260 MIN 39 AC-FT 286400  
WTR YR 2002 TOTAL 55820.47 MEAN 153 MAX 575 MIN 0 AC-FT 110700

MAX DISCH: 790 CFS AT 17:00 ON Aug. 30, 2002 GH 3.14 FT. SHIFT -0.39 FT.  
MAX GH: 3.14 FT. AT 17:00 ON Aug. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07119705 CATLIN CANAL, NEAR FOWLER, CO

LOCATION.--Lat 38°07'33", long 103°54'41", in NW¼NW¼ sec. 21, T.22 S., R.58 W., Otero County, Hydrologic Unit 11020005, at river gage.

DRAINAGE AREA.--N/A

GAGE.--Float-activated graphic water-stage recorder and shaft encoder in 8' x 8' shelter with well (with equipment for Arkansas River below Catlin Dam near Fowler CO river gage). Shaft encoder is connected to satellite-monitored data collection platform (DCP) used for river gage. Primary record is DCP log file with the graphic chart recorder used for backup purposes. Fifteen-foot standard concrete Parshall flume is the control. Primary reference gage is outside staff gage installed in flume. Elevation of canal gage is 4,257.87 ft. above National Geodetic Vertical Datum of 1929.

REMARKS.--Record is complete and reliable. Record good. Records developed by Adam Adame.

RATING TABLE.--STD15FTPF USED FROM 01-OCT-2001 TO 15-NOV-2002

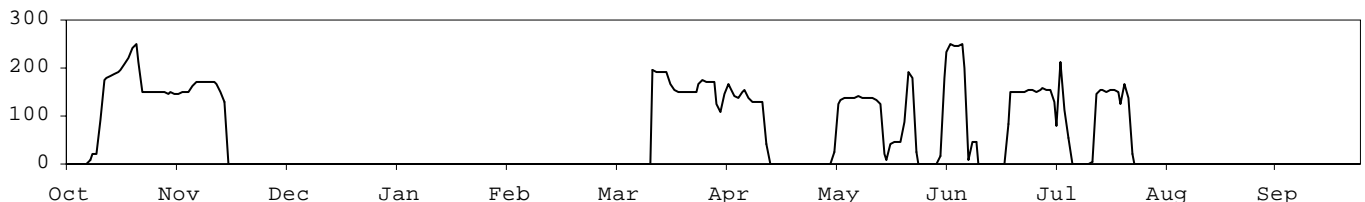
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	147	0	0	0	0	169	0	0	152	0	0
2	0	148	0	0	0	0	124	0	0	154	0	0
3	0	149	0	0	0	0	107	0	0	157	0	0
4	0	148	0	0	0	0	146	0	18	153	0	0
5	0	162	0	0	0	0	165	24	181	155	0	0
6	0	172	0	0	0	0	160	124	232	129	0	0
7	8.8	172	0	0	0	0	143	134	248	78	0	0
8	19	172	0	0	0	0	137	137	245	214	0	0
9	20	172	0	0	0	0	148	139	244	114	0	0
10	90	170	0	0	0	0	155	138	252	55	0	0
11	173	170	0	0	0	0	138	139	202	.82	0	0
12	180	168	0	0	0	0	131	140	7.6	0	0	0
13	184	152	0	0	0	0	131	139	44	0	0	0
14	186	131	0	0	0	0	130	138	47	0	0	0
15	193	0	0	0	0	195	129	138	0	0	0	0
16	197	0	0	0	0	192	40	138	0	0	0	0
17	209	0	0	0	0	190	0	135	0	4.9	0	0
18	222	0	0	0	0	192	0	127	0	144	0	0
19	242	0	0	0	0	190	0	20	0	153	0	0
20	252	0	0	0	0	168	0	9.6	0	153	0	0
21	211	0	0	0	0	153	0	43	0	149	0	0
22	152	0	0	0	0	152	0	44	0	155	0	0
23	151	0	0	0	0	152	0	46	82	153	0	0
24	148	0	0	0	0	152	0	46	151	148	0	0
25	148	0	0	0	0	152	0	89	148	126	0	0
26	149	0	0	0	0	150	0	193	152	168	0	0
27	149	0	0	0	0	152	0	179	151	136	0	0
28	148	0	0	0	0	165	0	26	148	19	0	0
29	147	0	0	0	---	173	0	0	153	.03	0	0
30	148	0	0	0	---	172	0	0	154	0	0	0
31	147	---	0	0	---	171	---	0	---	0	0	---
TOTAL	3873.8	2233	0	0	0	2871	2153	2485.6	2859.6	2870.75	0	0
MEAN	125	74.4	0	0	0	92.6	71.8	80.2	95.3	92.6	0	0
AC-FT	7680	4430	0	0	0	5690	4270	4930	5670	5690	0	0
MAX	252	172	0	0	0	195	169	193	252	214	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0

CAL YR 2001 TOTAL 53026.8 MEAN 145 MAX 347 MIN 0 AC-FT 105200  
WTR YR 2002 TOTAL 19346.75 MEAN 53 MAX 252 MIN 0 AC-FT 38370

MAX DISCH: 257 CFS AT 19:30 ON Jul. 7, 2002 GH 2.54 FT. SHIFT 0 FT.  
MAX GH: 2.54 FT. AT 19:30 ON Jul. 7, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07119700 ARKANSAS RIVER BELOW CATLIN DAM, NEAR FOWLER, CO (COMBINED)

LOCATION.--Lat 38°07'33", long 103°54'41", in NW¼NW¼ sec. 21, T.22 S., R.58 W., Otero County.

DRAINAGE AREA.--10,901 mi<sup>2</sup>.

REMARKS.--The combined record of discharges was obtained by the addition of Catlin Canal daily flows to the corresponding daily flows in the Arkansas River below Catlin Dam. The peak discharge for the year was 790 cfs on August 30, 2002. Combined record is fair, except during periods of estimated flow, which should be considered poor. Record is a compilation of Catlin Dam and Catlin Canal records developed by Div. II Personnel.

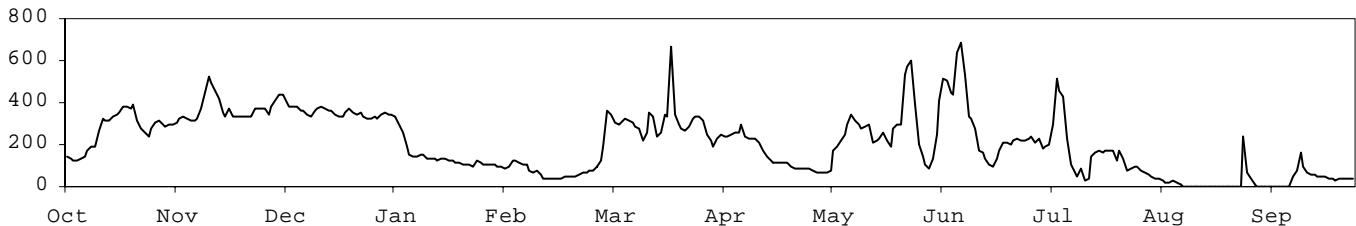
ARKANSAS RIVER BELOW CATLIN DAM NEAR FOWLER, CO AND CATLIN CANAL (COMBINED)  
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	144	301	436	344	95	125	222	70	102	237	80	35
2	131	320	417	330	85	190	187	69	85	207	64	12
3	126	331	385	300	100	360	224	66	130	225	55	4.5
4	128	322	381	260	120	345	246	64	252	185	49	1.3
5	132	317	377	193	120	301	235	79	414	189	41	2.2
6	145	314	358	155	113	297	242	176	512	197	34	2.7
7	175	327	359	146	109	302	247	188	507	296	25	.7
8	186	376	346	145	106	320	256	218	449	513	21	.53
9	194	451	336	150	76	312	261	246	437	456	20	.88
10	262	522	364	151	66	303	298	300	636	433	31	1.3
11	323	493	374	137	77	290	239	340	686	230	15	0
12	317	458	379	132	60	272	233	317	529	102	5.6	4
13	314	416	370	129	39	219	232	297	335	62	.96	50
14	334	357	360	124	38	253	228	277	323	49	.79	75
15	341	329	363	132	38	352	209	287	275	81	1.8	162
16	350	367	340	129	39	335	168	294	174	31	1.4	96
17	381	333	332	126	40	242	140	213	166	36	2.5	63
18	384	333	338	126	39	260	121	221	132	145	1.9	56
19	376	331	353	119	44	343	110	232	106	159	2.1	53
20	395	336	367	112	49	333	118	255	95	168	2.5	50
21	317	333	350	109	50	663	118	222	135	164	2.1	52
22	272	333	344	104	46	344	115	194	167	170	2	44
23	259	368	349	105	53	298	115	274	214	170	1.8	36
24	240	368	337	98	63	273	99	292	210	167	1.5	34
25	274	368	323	128	66	268	88	298	202	126	1.2	33
26	301	367	328	116	73	286	88	537	216	168	1.6	34
27	312	339	333	104	75	320	87	574	228	136	.88	35
28	293	380	321	102	94	329	88	601	220	77	3.1	35
29	289	410	339	108	---	331	83	393	221	87	1.7	35
30	300	437	349	105	---	313	74	198	233	94	242	34
31	292	---	340	100	---	246	---	145	---	96	70	---
TOTAL	8287	11037	11048	4619	1973	9425	5171	7937	8391	5456	782.43	1042.11
MEAN	267	368	356	149	71	304	172	256	280	176	25.2	34.7
AC-FT	16440	21890	21910	9160	3910	18690	10260	15740	16640	10820	1550	2070
MAX	395	522	436	344	120	663	298	601	686	513	242	162
MIN	126	301	321	98	38	125	74	64	85	31	.79	0

CAL YR	2001	TOTAL	197424	MEAN	541	MAX	2510	MIN	123	AC-FT	391600
WTR YR	2002	TOTAL	75168.54	MEAN	206	MAX	686	MIN	0	AC-FT	149100

MAX DISCH.: 790 CFS AT 17:00 ON Aug. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07120500 ARKANSAS RIVER near ROCKY FORD, CO

**LOCATION.**--Lat 38°03'52", Long 103°41'24" in SE ¼, NW ¼, Sec. 9, T23S, R56W, Hydrologic Unit 11020005, Otero County, on right bank of Arkansas River, approximately 250 feet upstream from State Highway 266, and approximately 1.6 miles NE of Rocky Ford, Colorado.

**DRAINAGE AREA AND PERIOD OF RECORD.**-- Undetermined. Gage established October 8, 1992.

**GAGE.**--Graphic water stage recorder. On Oct 18, 2001 new satellite monitoring equipment (Sutron 8210 DCP and Accububble) in a new 4' x 4' gage shelter were started in use. Same outside staff gage and control are used. Primary record is DCP log data with satellite-monitored data used for backup purposes. High data rate GOES radio DCP installed on July 24, 2002. Primary reference gage is outside staff gage on right side of channel. Elevation of gage datum is 4130.46 ft MSL.

**REMARKS.**--Record is complete and reliable for the entire water year, except for the following period(s): Oct 12 - 18, 2001 due to manometer malfunction; June 29-July 1 and Sept 26-30, 2002 due to DCP malfunction; Nov 28-29, Dec 13-16, 30-31, 2001; Jan 1-6, 17-19, 24, 30-31, Feb 1-4, 26-28, March 1-5, 2002, due to ice affecting the stage-discharge relationship. Record fair. Record developed and station maintained by Adam Adame.

**RATING TABLE.**--ARKROCCO01 USED FROM 01-OCT-2001 TO 04-OCT-2002

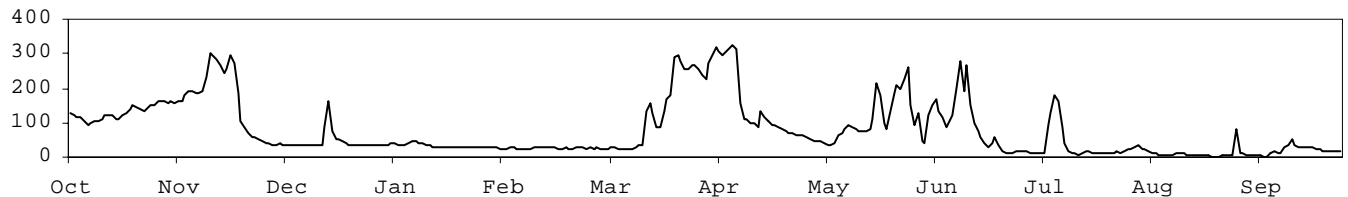
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	126	165	35	40	25	27	224	54	129	18	26	14
2	124	165	35	38	26	25	273	46	49	18	31	9.2
3	117	179	34	35	26	24	298	44	38	12	32	7.7
4	114	190	33	33	27	26	318	47	121	11	23	6.1
5	105	192	33	35	27	30	305	42	152	9	22	4.7
6	95	187	34	40	26	30	293	35	166	9.1	18	4.1
7	99	183	34	47	26	26	305	33	131	13	13	3.2
8	104	193	36	44	26	26	321	39	114	91	9.5	2
9	104	234	37	39	26	26	324	61	89	125	7.2	2.3
10	108	300	35	39	24	26	314	70	111	177	6.1	11
11	123	297	33	35	27	26	155	82	121	165	6.7	15
12	120	284	36	33	27	27	110	90	200	89	5.6	12
13	120	266	85	30	27	36	109	88	278	38	7.2	12
14	110	243	160	30	27	35	100	81	191	16	12	28
15	110	257	75	30	27	136	100	75	266	8.7	9.7	35
16	120	296	55	29	27	155	88	76	153	13	9.3	50
17	130	273	50	29	27	126	134	75	101	6	7.8	37
18	140	185	45	30	26	86	118	79	75	13	8.2	30
19	150	107	40	29	26	88	104	111	58	17	6.8	30
20	143	85	37	29	27	131	95	213	38	15	8.6	30
21	140	70	37	28	26	169	94	179	29	12	5.9	29
22	133	59	35	27	26	177	86	97	43	12	4.7	30
23	142	59	34	27	27	292	80	79	58	14	3.2	24
24	148	53	34	27	27	297	77	135	37	14	.41	21
25	152	47	33	30	27	276	67	186	18	14	1.6	17
26	165	43	33	28	25	253	67	206	14	14	2	16
27	162	38	33	28	27	256	65	200	13	14	3.9	15
28	161	35	32	27	26	264	66	227	14	15	4.3	15
29	159	33	33	30	---	265	66	258	17	13	5.1	16
30	160	39	32	28	---	256	60	152	18	17	4.9	15
31	159	---	34	27	---	240	---	93	---	21	83	---
TOTAL	4043	4757	1332	1001	738	3857	4816	3253	2842	1023.8	388.71	541.3
MEAN	130	159	43	33	26	124	161	105	95	33	12.5	18
AC-FT	8020	9440	2640	1990	1460	7650	9550	6450	5640	2030	771	1070
MAX	165	300	160	47	27	297	324	258	278	177	83	50
MIN	95	33	32	27	24	24	60	33	13	6	.41	2

CAL YR 2001 TOTAL 109348 MEAN 300 MAX 2330 MIN 28 AC-FT 216900  
WTR YR 2002 TOTAL 28592.81 MEAN 78.4 MAX 324 MIN .41 AC-FT 56710

MAX DISCH: 326 CFS AT 23:30 ON Nov. 16, 2001 GH 2.37 FT. SHIFT 0.04 FT.  
MAX GH: 2.37 FT. AT 23:30 ON Nov. 16, 2001  
MAX GH (ICE-AFFECTED): 3.35 FT. AT 12:00 ON Dec. 14, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

07122400 CROOKED ARROYO NEAR SWINK, CO

**LOCATION.**--Lat 37°58'56", long 103°35'52", in SW¼SW¼ sec. 5, T.24 S., R.55 W., Otero County, on right bank 54 ft. downstream from bridge on State Highway 10, 2.0 mi. upstream from mouth, and 2.8 mi. southeast of Swink.

**DRAINAGE AREA.**--108 mi<sup>2</sup>.

**GAGE.**--Water-stage recorder with satellite telemetry. On July 24, 2002, new satellite monitoring equipment (High data rate Sutron 8210 DCP and Accububble) installed in a new 4' x 4' steel shelter were put into use. Primary record is DCP log file with satellite-monitored data used for backup. Same primary reference gage and control are used. Elevation of gage is 4,100 ft. above sea level.

**REMARKS.**--Record is complete and reliable, except for the period Sep 28-30, 2002, when the DCP malfunctioned and no data was transmitted or logged. Record fair. Station maintained and record developed by Adam Adame.

**RATING TABLE.**--CANSWKCO06 USED FROM 01-OCT-2001 TO 07-OCT-2002

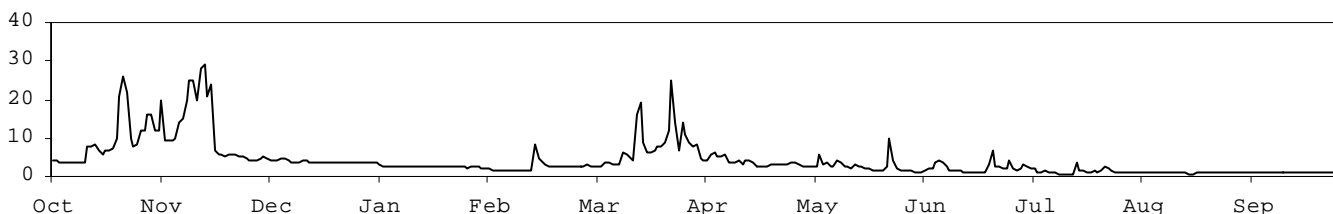
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	4	20	4.5	3.4	2.2	2.8	7.7	3.3	1.3	2.1	1.1	.89
2	3.9	9.4	4.3	3	1.9	2.9	8.1	2.8	1.3	1.3	1.1	.88
3	3.8	9.5	4.1	2.7	1.7	2.8	4.7	2.8	1.2	1.9	1.1	.97
4	3.8	9.5	4.1	2.6	1.8	2.7	3.9	2.7	1.2	3.3	1.1	.94
5	3.8	9.9	4.7	2.6	1.8	2.5	4	2.7	1.2	2.5	1.1	.96
6	3.8	14	4.8	2.6	1.8	2.6	5.6	2.6	1.3	2.3	1.1	.92
7	3.7	15	4	2.6	1.8	3.5	6.4	5.9	2	2.1	1.1	.89
8	3.7	20	3.7	2.6	1.8	3.8	5.4	3	2.2	1.2	1.1	.91
9	3.7	25	3.6	2.6	1.8	3	5	3.5	3.6	1.2	.94	1.2
10	3.7	25	3.6	2.6	1.6	3	5.7	2.5	4.2	1.5	.9	1.2
11	7.6	20	3.9	2.7	1.6	3.3	3.7	2.8	3.6	1.2	.92	1.1
12	7.6	28	4.2	2.8	1.6	6.1	3.5	4.4	2.8	1	.9	1.1
13	8.3	29	3.6	2.8	1.6	5.6	3.6	3.7	1.6	.85	.91	1.1
14	6.6	21	3.8	2.8	1.6	5.3	3.9	2.4	1.5	.71	.87	1
15	5.6	24	3.8	2.8	8.4	4.2	3.2	2.5	1.5	.58	.79	1.1
16	6.5	6.8	3.7	2.8	4.6	16	4.1	2.3	1.3	.49	.83	1.1
17	6.8	5.7	3.8	2.8	3.9	19	3.9	2.9	1.2	.43	.87	1.1
18	7.2	5.6	3.8	2.8	2.9	9	3.4	2.7	1.2	.41	.86	1.1
19	10	5.4	3.7	2.8	2.5	6.4	2.7	2.6	1.1	3.4	.8	1
20	21	5.5	3.7	2.8	2.4	6.4	2.6	2.1	1	1.5	.75	1
21	26	5.7	3.7	2.8	2.4	6.6	2.4	1.9	1	1.6	.77	.97
22	22	5.9	3.7	2.8	2.5	7.6	2.6	1.8	1	.96	.79	.99
23	9.7	5.4	3.7	2.8	2.8	7.9	2.9	1.8	.92	1.2	.79	1
24	7.8	5	3.7	2.5	2.8	9	3.2	1.8	3.2	1.4	.8	.92
25	8.4	4.9	3.7	2.4	2.7	12	3.2	1.8	6.5	1	.79	.91
26	12	4.4	3.7	2.4	2.7	25	3.2	2.4	2.4	1.4	.82	.96
27	12	4.1	3.7	2.3	2.8	14	3.2	9.9	2.5	2.7	.9	.93
28	16	4.1	3.7	2.5	2.8	6.5	3.3	3.9	2.2	1.9	.94	.93
29	16	4.8	3.7	2.5	---	14	3.5	1.9	2	1.3	.95	.93
30	12	5.1	3.7	2.4	---	11	3.4	1.8	4.2	1.1	.93	.93
31	12	---	3.8	2.3	---	8.9	---	1.5	---	1.1	1	---
TOTAL	279	357.7	120.2	82.9	70.8	233.4	122	90.7	62.22	45.63	28.62	29.93
MEAN	9	11.9	3.9	2.7	2.5	7.5	4.1	2.9	2.07	1.47	.92	1
AC-FT	553	709	238	164	140	463	242	180	123	91	57	59
MAX	26	29	4.8	3.4	8.4	25	8.1	9.9	6.5	3.4	1.1	1.2
MIN	3.7	4.1	3.6	2.3	1.6	2.5	2.4	1.5	.92	.41	.75	.88

CAL YR 2001 TOTAL 4731.8 MEAN 13.0 MAX 66 MIN 2 AC-FT 9390  
WTR YR 2002 TOTAL 1523.1 MEAN 4.17 MAX 29 MIN .41 AC-FT 3020

MAX DISCH: 38.4 CFS AT 17:30 ON Mar. 16, 2002 GH 2.12 FT. SHIFT 0.15 FT.  
MAX GH: 2.12 FT. AT 17:30 ON Mar. 16, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07123000 ARKANSAS RIVER AT LA JUNTA, CO

**LOCATION.**--Lat 37°59'26", long 103°31'55", in SE¼NE¼ sec. 2, T.24 S., R.55 W., Otero County, Hydrologic Unit 11020005, on right bank at upstream side of bridge on State Highway 109 in La Junta, 450 ft upstream from King Arroyo.

**DRAINAGE AREA AND PERIOD OF RECORD.**--12,210 mi<sup>2</sup>. Staff gage originally established by USGS in 1889, with sporadic data and various locations. Water stage recorder in use since Oct. 1933 at several locations also. Gage site in continuous use since then.

**GAGE.**--Satellite-monitored data collection platform (Sutron 8210 DCP), and Accububble in 4' x 4' steel shelter. DCP log file is primary record with satellite data use for backup. Wire-weight gage on bridge serves as primary reference gage. High data rate Sutron 8210 DCP installed May 20, 2002. Datum of gage is 4,039.60 ft above National Geodetic Vertical Datum of 1929. See WSP 1711 or 1731 for history of changes prior to June 13, 1940. June 13, 1940, to June 6, 1967, water-stage recorder at site 300 ft upstream at present datum.

**REMARKS.**--Record is complete and reliable except for: December 13-15, 30-31, 2001; January 1-5, 24-25, 30-31; February 1, 2, 26-27; and March 2-5, 2002, when ice affected the stage-discharge relationship; and, May 20, 2002, when the high data rate DCP was installed and September 26-30, 2002, when the DCP malfunctioned. Record fair, except for periods of missing or estimated gage height, which should be considered poor. Station maintained and record developed by Adam Adame.

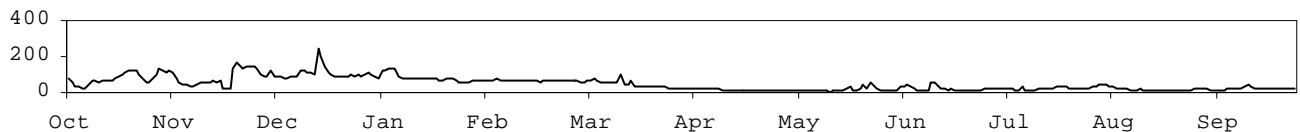
**RATING TABLE.**--ARKLAJCO41 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	79	107	93	83	70	65	22	9.6	9.7	21	34	18
2	58	74	86	120	70	60	21	9.5	8.9	19	36	24
3	30	51	88	123	69	60	21	9.9	8.9	21	44	21
4	29	49	83	135	67	65	20	9.4	12	19	43	20
5	25	39	83	135	74	70	19	9.4	37	18	45	16
6	23	34	87	129	67	81	21	9.4	31	18	35	12
7	47	35	92	91	69	63	22	15	41	19	29	10
8	70	48	94	82	65	55	23	9	33	19	22	8.9
9	64	54	117	78	65	51	21	9.6	17	14	21	13
10	59	56	126	78	64	53	21	8.5	9.7	15	21	21
11	67	54	115	76	67	60	20	6.6	14	36	18	20
12	71	61	111	75	67	57	18	7	11	14	16	20
13	72	65	100	74	67	57	15	7.9	13	14	11	20
14	67	59	250	73	65	95	12	6.5	52	10	15	25
15	74	62	200	77	66	47	11	5.5	58	12	20	29
16	87	27	140	78	65	47	10	5.9	35	18	13	39
17	95	23	116	79	62	63	12	10	26	21	11	34
18	113	23	95	74	59	36	15	6.9	18	21	9.9	21
19	120	131	87	72	63	32	12	6.8	16	24	12	22
20	120	171	84	72	65	32	12	20	18	27	10	20
21	117	145	84	74	63	30	9.8	33	14	29	10	20
22	104	136	87	78	63	31	9.4	16	11	29	9.8	21
23	75	149	89	73	65	31	8.8	11	12	30	9.3	21
24	54	144	101	65	63	33	7.3	23	12	29	9.4	20
25	56	143	94	60	67	35	8.1	46	16	23	9.4	21
26	83	130	97	59	66	36	10	27	11	21	9.4	21
27	103	95	92	60	65	30	10	56	9.7	21	9.4	21
28	129	85	102	54	65	22	12	32	9.9	24	9.7	21
29	125	89	111	65	---	25	10	19	11	20	12	21
30	116	125	100	65	---	27	9.8	14	25	21	16	21
31	120	---	85	65	---	23	---	10	---	25	21	---
TOTAL	2452	2464	3289	2522	1843	1472	443.2	469.4	600.8	652	591.3	621.9
MEAN	79	82	106	81	66	48	14.8	15.1	20	21	19.1	20.7
AC-FT	4860	4890	6520	5000	3660	2920	879	931	1190	1290	1170	1230
MAX	129	171	250	135	74	95	23	56	58	36	45	39
MIN	23	23	83	54	59	22	7.3	5.5	8.9	10	9.3	8.9

CAL YR 2001 TOTAL 55393 MEAN 152 MAX 1250 MIN 23 AC-FT 109900  
WTR YR 2002 TOTAL 17420.6 MEAN 47.7 MAX 250 MIN 5.5 AC-FT 34550

MAX DISCH: 390 CFS (estimated) AT 20:00 ON Dec. 14, 2001 GH 7.07 FT. (ice affected)  
MAX GH: 7.07 FT. (ice affected) AT 20:00 ON Dec. 14, 2001  
MAX DISCH: 216 CFS AT 14:30 ON Nov. 19, 2001 GH 6.49 FT. SHIFT -0.06 FT.  
MAX GH: 6.49 FT. AT 14:30 ON Nov. 19, 2001  
FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07123675 HORSE CREEK at HIGHWAY 194 nr LAS ANIMAS, CO (WY2001)

**LOCATION.**--Lat 38°05'06", long 103°21'12", in SE1/4,SW1/4, sec. 33, T.22S., R.53 W., Bent County, Hydrological Unit 11020008, on right bank 15 ft upstream from right end of box culverts on State Highway 194, 3.2 mi upstream from mouth, 3.4 mi downstream from Ft. Lyon Canal Aqueduct, and 7.5 mi west of Las Animas, Co.

**DRAINAGE AREA AND PERIOD OF RECORD.**--Drainage undetermined. Established and operated Oct. 19, 1979 to Sep. 30, 1993 by USGS. Operated and maintained by State of Colorado, Oct. 01, 1993 to present.

**GAGE.**--Graphic water stage recorder, gas purge manometer, satellite monitored data collection platform and shaft encoder in a 4'x4' steel shelter. Primary record is satellite monitored data with chart backup. Primary reference gage is outside staff gage on left side of channel 150 ft upstream from gage shelter. New outside staff gage installed October 30, 2000 approximately 30 ft upstream of gage shelter. Gas-purge manometer and chart recorder replaced with Sutron Accububble May 2, 2001.

**REMARKS.**--Record is complete and reliable for the entire water year, except for the following period(s): January 9, 15, 17-20, 22; Feb 1-2, 9-10, 2001, when ice affected the stage-discharge relationship. Dec 13-14, 2000, when the manometer malfunctioned. May 30-31, Jun 1, 23-24, 2001, when the DCP malfunctioned and there were no satellite data or DCP log data. Record fair, except during periods of ice effect and equipment malfunction which are poor. Station maintained and record developed by Adam Adame.

**RATING TABLE.**--HRC194CO04 USED FROM 01-OCT-2000 TO 10-OCT-2001

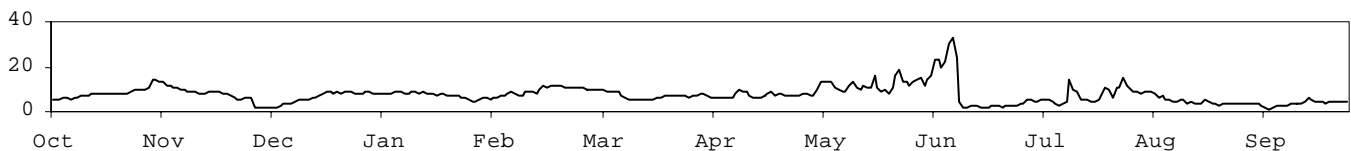
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2000 TO SEPTEMBER 2001  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	5.4	13	2	8	5.6	9.8	7.8	8.2	14	4	9.2	3.5
2	5.4	12	2.1	8.3	6	9.8	7.9	7.1	15	5	9	3.3
3	5.4	12	2.2	8	6.6	9.9	6.8	7.2	12	5.3	7.9	3.3
4	5.8	11	2.5	8.3	7	9.6	6.2	10	14	4.3	9.1	3.4
5	6	11	3.2	8.6	7.4	9.4	6.2	13	16	4.8	8.7	3.3
6	5.5	10	3.6	8.7	7.6	9.3	6.2	13	23	5.3	9	3.1
7	5.9	9.8	4	8.9	8.5	9.1	6.3	13	23	5.1	7.7	2.2
8	6.5	9.3	4.8	8.3	8	9	6.5	13	20	5.6	6.6	.81
9	6.9	8.8	5.2	8.3	7.1	8.8	6.2	11	22	4.6	7.1	2.1
10	7.3	8.6	5.4	8.6	7.2	7.4	5.9	9.4	30	3.3	5.1	2.6
11	7.5	7.7	5.3	8.6	8.7	6.1	8.2	9.1	33	3	5.1	2.4
12	7.7	7.7	5.7	8.4	9.1	5.6	9.5	9.1	24	3.9	4.7	2.5
13	7.7	8.1	6	8.9	9.3	5.5	8.6	12	4.6	4.7	4.2	2.6
14	7.7	8.5	6.4	8.1	8.4	5.4	8.5	13	1.9	14	5.5	3.2
15	7.7	8.5	6.8	8.3	10	5.1	6.7	11	2.1	10	5.2	3.3
16	7.7	9.2	8.3	8	12	5.2	6.4	10	2.5	9	4	3.6
17	7.9	9.3	9.1	7.2	11	5.4	6.3	12	2.6	4.9	4.5	3.3
18	8	8.2	8.9	7.7	12	5.3	6.6	11	2.8	5.3	4	4.2
19	8.1	7.6	8.4	7.7	12	5.5	7	11	1.7	4.9	4	5.8
20	8.2	7	9.1	7.5	12	5.8	8.1	16	2	4.4	3.9	5.1
21	8	6.3	8.2	7	12	5.8	8.6	11	2.1	4.5	5	4.5
22	8	5.4	8.6	6.8	11	6.8	7.1	8.7	2.8	5	4.6	4.6
23	8.9	5.6	9.1	6.7	11	7	7.6	9.6	2.5	6.9	3.8	4.1
24	9.9	5.9	8.7	6.3	11	6.9	8.1	8.1	2.5	11	3.5	4
25	10	6.5	8.2	6.2	11	7.4	7.3	11	2.1	9.8	2.9	4.3
26	9.6	6.2	8.2	5.7	11	7.5	7.2	16	2.6	6.5	3.8	4.7
27	9.6	1.9	8.3	4.3	11	6.9	7.5	19	3	11	3.8	4.7
28	11	1.6	8.5	4.3	10	6.9	7.2	13	3	11	3.7	4.7
29	14	1.6	8.6	5.4	---	6.6	6.8	13	3	15	3.6	4.5
30	14	1.8	8.1	5.9	---	7.3	8.2	12	3.4	12	3.3	4.7
31	13	---	8.4	5.9	---	7.2	---	13	---	9.8	3.6	---
TOTAL	254.3	230.1	201.9	228.9	263.5	223.3	217.5	353.5	293.2	213.9	166.1	108.41
MEAN	8.2	7.7	6.5	7.4	9.4	7.2	7.3	11.4	9.8	6.9	5.4	3.61
AC-FT	504	456	400	454	523	443	431	701	582	424	329	215
MAX	14	13	9.1	8.9	12	9.9	9.5	19	33	15	9.2	5.8
MIN	5.4	1.6	2	4.3	5.6	5.1	5.9	7.1	1.7	3	2.9	.81

CAL YR 2000 TOTAL 6400.2 MEAN 17.5 MAX 197 MIN 1.6 AC-FT 12690  
WTR YR 2001 TOTAL 2754.61 MEAN 7.55 MAX 33 MIN .81 AC-FT 5460

MAX DISCH: 58 CFS AT 10:00 ON Jun. 11, 2001 GH 2.38 FT. SHIFT 0.46 FT.  
MAX GH: 2.38 FT. AT 10:00 ON Jun. 11, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





ARKANSAS RIVER BASIN

07123675 HORSE CREEK at HIGHWAY 194 nr LAS ANIMAS, CO (WY2002)

**LOCATION.**--Lat 38°05'06", long 103°21'12", in SE1/4,SW1/4, sec. 33, T.22S., R.53 W., Bent County, Hydrological Unit 11020008, on right bank 15 ft upstream from right end of box culverts on State Highway 194, 3.2 mi upstream from mouth, 3.4 mi downstream from Ft. Lyon Canal Aqueduct, and 7.5 mi west of Las Animas, Co.

**DRAINAGE AREA AND PERIOD OF RECORD.**--Drainage undetermined. Established and operated Oct. 19, 1979 to Sep. 30, 1993 by USGS. Operated and maintained by State of Colorado, Oct. 01, 1993 to present.

**GAGE.**--Accububble and satellite-monitored data collection platform (Sutron 8210 DCP) in a 4' x 4' steel shelter. Primary record is DCP data log with satellite-monitored data used for backup purposes. For the period October 1, 2001 to 1655 Nov. 19, 2001, the accububble was referenced to an outside staff gage on right side of channel 150 ft upstream from gage shelter near the accububble orifice. Beginning 1700 Nov. 19, 2001, the accububble orifice was moved to a new location approximately 30 ft upstream of gage shelter. An outside staff gage installed on the right side of the channel and installed on Oct. 30, 2000 is now the primary reference gage. Sutron high data rate 8210 DCP installed Sept. 13, 2002.

**REMARKS.**--Record is complete and reliable, except for the following period(s): December 14, 2001 and Jan. 3, 2002, when ice affected the stage-discharge relationship. Oct. 8-10, 26 and Dec 2, 2001; Jan. 2, 15-17; Feb. 13-14; May 2-3; Jul 25-31; Aug 1-5, 21-27; and Sep. 17-18, 2002, when the DCP malfunctioned and there were no satellite data or DCP log data. Jan. 16-May 3, 2002, when the accububble may not have been working properly. Record fair to poor, except during periods of ice effect and equipment malfunction which are poor. Station maintained and record developed by Adam Adame.

**RATING TABLE.**--HRC194CO04 USED FROM 01-OCT-2001 TO 19-NOV-2001  
 HRC194CO05 USED FROM 19-NOV-2001 TO 03-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
 MEAN VALUES

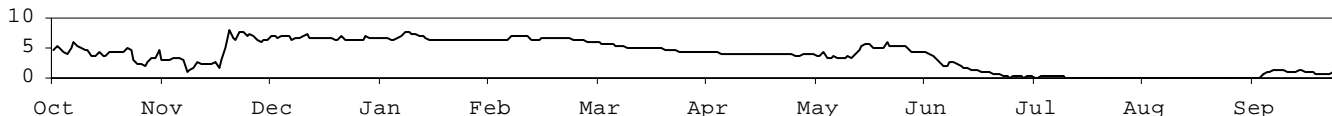
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	4.8	2.9	6.5	6.7	6.3	6.3	4.3	3.8	5	.38	0	0
2	5.3	2.9	6.9	6.7	6.3	6.1	4.3	3.9	4.5	.26	0	0
3	4.9	3	7.1	6.6	6.3	6.1	4.3	3.9	4.3	.22	0	0
4	4.2	3.4	6.8	6.6	6.3	6	4.3	4	4.5	.11	0	0
5	3.9	3.4	7.1	6.4	6.3	5.9	4.2	4	4.4	.21	0	0
6	4.9	3.5	7	6.2	6.3	5.8	4.2	3.7	4.4	.17	.02	0
7	6.1	2.9	7.1	6.7	6.4	5.7	4.2	3.7	3.9	.14	.02	0
8	5.5	1.1	6.5	7.1	6.9	5.7	4.2	4.3	3.6	.16	.02	0
9	5	1.4	6.6	7.6	6.9	5.6	4.1	3.4	3.2	.21	.03	0
10	4.7	1.8	6.6	7.7	6.9	5.5	4.1	3.4	2.8	.21	.05	.54
11	4.7	2.8	7	7.5	6.9	5.4	4.1	3.6	2.1	.25	.04	.96
12	3.8	2.4	7.3	7.4	6.9	5.3	4.1	3.5	2.1	.3	.03	1.1
13	3.7	2.2	6.8	7.1	6.9	5.1	4.1	3.4	2.6	.27	.04	1.2
14	4.5	2.3	6.6	7	6.5	5	4	3.5	2.6	.26	.05	1.2
15	3.7	2.3	6.7	6.8	6.4	5	4	3.6	2.2	.19	.05	1.2
16	3.7	2.7	6.7	6.4	6.4	5	4	3.5	2	.11	.06	1.2
17	4.4	1.8	6.6	6.2	6.6	5	4	4.1	1.8	0	.03	1
18	4.3	2.9	6.7	6.2	6.6	5	4	4.7	1.7	.04	.04	1
19	4.3	4.9	6.6	6.2	6.6	4.9	4	5.4	1.3	.02	.06	1
20	4.5	7.9	6.5	6.2	6.6	4.9	4	5.7	1.3	0	.07	1.3
21	4.2	6.6	6.5	6.2	6.6	4.9	4	5.7	1.3	.04	0	1.3
22	5.1	6.4	6.9	6.2	6.6	4.9	3.9	5.1	.95	0	0	1.1
23	4.7	7.7	6.5	6.2	6.6	4.9	3.9	5	.96	0	0	.97
24	3.1	7.6	6.2	6.2	6.6	4.8	3.9	4.9	.9	0	0	.96
25	2.3	7	6.5	6.3	6.6	4.8	3.9	4.9	.55	0	0	.81
26	2.3	7.3	6.5	6.4	6.4	4.8	3.9	6.1	.54	0	0	.74
27	2.1	7.1	6.4	6.4	6.4	4.8	3.9	5.5	.55	0	0	.69
28	2.8	6.3	6.4	6.4	6.4	4.5	3.9	5.3	.42	0	.06	.76
29	3.2	5.9	7	6.4	---	4.4	3.9	5.4	.18	0	.01	.82
30	3.4	6.5	6.8	6.4	---	4.4	3.8	5.4	.12	0	.02	.89
31	4.7	---	6.8	6.4	---	4.4	---	5.4	---	0	0	---
TOTAL	128.8	126.9	208.2	204.8	183.5	160.9	121.5	137.8	66.77	3.55	.7	20.74
MEAN	4.2	4.2	6.7	6.6	6.6	5.2	4.1	4.5	2.23	.11	.02	.69
AC-FT	255	252	413	406	364	319	241	273	132	7	1.4	41
MAX	6.1	7.9	7.3	7.7	6.9	6.3	4.3	6.1	5	.38	.07	1.3
MIN	2.1	1.1	6.2	6.2	6.3	4.4	3.8	3.4	.12	0	0	0

CAL YR 2001 TOTAL 2503.11 MEAN 6.86 MAX 33 MIN 0.81 AC-FT 4965  
 WTR YR 2002 TOTAL 1364.16 MEAN 3.74 MAX 7.9 MIN 0 AC-FT 2710

MAX DISCH: 11.1 CFS AT 14:15 ON Nov. 20, 2001 GH 1.59 FT. SHIFT -0.02 FT.

MAX GH: 1.59 FT. AT 14:15 ON Nov. 20, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07124500 PURGATOIRE RIVER AT TRINIDAD, CO

LOCATION.--Lat 37°10'15", long 104°30'31", in NW¼SE¼ sec. 13, T.33 S., R.64 W., Las Animas County, in city of Trinidad, on left bank.

DRAINAGE AREA.--795 mi².

GAGE.--From October 1, 2001 thru July 31, 2002 the gaging station was located 90 feet downstream of the Cedar Street Bridge. Station was moved downstream to a new location 20 ft above the Commercial Street Bridge on August 1, 2002. Current equipment is a Sutron 8210 High Data Rate DCP (satellite monitored data collection platform) controlling a Sutron Accububble system inside a 4' x 4' steel shelter on the left bank above the channel. Orifice line in conduit extends down the bank to the channel. Primary record is the DCP log data with satellite-monitored data used for backup purposes. The primary reference is a staff gage set in the streambed near the orifice.

REMARKS.--Record is complete and reliable except for the following periods: September 23 - 30, 2002, when the DCP failsafed and stopped logging data. Record considered good, except for days of missing gage height record, which are poor. Station maintained and record developed Anthony Gutierrez.

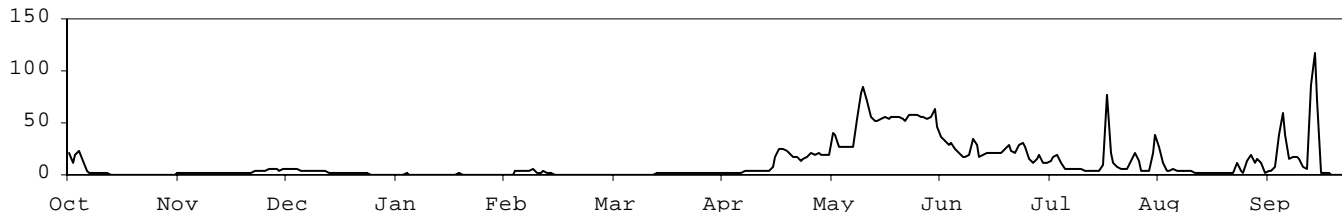
RATING TABLE.--PURTRICO24 USED FROM 01-OCT-2001 TO 31-JUL-2002  
PURTRICO25 USED FROM 01-AUG-2002 TO 01-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	22	1.2	5	.92	.79	.68	1.2	19	55	15	13	13
2	11	1.5	4.9	.92	.68	.75	1.2	22	54	12	4.3	20
3	19	1.5	5.2	.82	.68	.76	1.2	19	55	15	3.2	12
4	24	1.5	5.1	.89	.94	.85	1.4	19	64	19	2.9	16
5	14	1.5	4.9	1	3.2	.75	1.4	20	46	11	22	11
6	3.1	1.5	4.8	.84	4.1	.7	1.5	40	37	12	38	2.5
7	2.8	1.8	4.4	.84	3.9	.67	1.6	39	33	13	27	3.7
8	2.7	2	4.4	.84	3.1	.67	2.2	27	29	17	11	4
9	2.4	2.1	4.1	.8	3.9	.7	2.4	27	30	20	4.5	6.9
10	1.7	2.4	3.9	.9	5	.67	2.7	27	25	11	4.4	38
11	1.3	2	3.9	.73	2.3	.68	3.2	27	21	5.2	6.3	60
12	1.1	2.3	3.9	.6	2.7	.75	3.4	27	17	5.4	4	39
13	.93	2.4	3.4	.6	3.2	.75	3.8	53	18	5.3	4	16
14	.81	2.4	2.2	.56	2.4	.8	4.5	79	20	5.6	4.5	17
15	.7	2.7	1.8	.59	.99	.89	4	85	34	5.6	4.2	18
16	.63	2.4	1.8	.57	.79	.9	4.8	72	29	5.1	3	16
17	.58	2.5	1.8	.58	.72	1.1	4.5	56	18	4.7	1.3	8.1
18	.57	2.6	1.6	.57	.68	1.1	4.4	52	20	4.2	.99	5.1
19	.54	2.6	1.6	.57	.77	1	6.9	52	21	3.8	1.3	86
20	.58	2.7	1.5	1	.7	1.1	18	54	22	3.8	1.6	118
21	.54	2.6	1.3	.67	.83	1.5	25	56	22	4.1	2.4	72
22	.61	2.8	1.3	.58	.68	2	25	54	22	9.7	2.2	1.8
23	.56	3.7	1.3	.58	.68	2	24	55	22	76	1.7	1.3
24	.61	3.2	1.1	.64	.71	2	21	55	25	21	2.1	1
25	.56	2.9	1.1	.66	.68	1.8	18	56	29	11	1.9	.9
26	.63	4.1	.92	.68	.68	1.3	17	53	24	6.8	1.6	.8
27	.75	5.9	.92	.59	.68	1.2	14	52	22	6	1.3	.7
28	.83	5.9	.92	.59	.71	1.2	15	57	28	6	1.5	.6
29	.83	5.3	.92	.6	---	1.2	18	57	30	6.6	11	.6
30	.91	4.8	.92	.61	---	1.2	21	58	26	13	3.8	.54
31	.94	---	.92	.69	---	1.2	---	55	---	21	2.7	---
TOTAL	118.21	82.8	81.82	22.03	47.19	32.87	272.3	1424	898	374.9	193.69	590.54
MEAN	3.81	2.8	2.64	.71	1.69	1.06	9.1	46	30	12.1	6.25	19.7
AC-FT	234	164	162	44	94	65	540	2820	1780	744	384	1170
MAX	24	5.9	5.2	1	5	2	25	85	64	76	38	118
MIN	.54	1.2	.92	.56	.68	.67	1.2	19	17	3.8	.99	.54
CAL YR 2001	TOTAL	21135.83	MEAN	57.9	MAX	222	MIN	.54	AC-FT	41920		
WTR YR 2002	TOTAL	4138.35	MEAN	11.3	MAX	118	MIN	.54	AC-FT	8210		

MAX DISCH: 558 CFS AT 16:00 ON Jul. 23, 2002 GH 3.47 FT. SHIFT 0.15 FT.  
MAX GH: 3.47 FT. AT 16:00 ON Jul. 23, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07126500 PURGATOIRE RIVER AT NINEMILE DAM, NEAR HIGBEE, CO (RIVER ONLY)

**LOCATION.**--Lat 37°42'53", long 103°30'38", in NW¼ sec. 7, T.27 S., R.54 W., Otero County, Hydrologic Unit 11020010, on left bank at Ninemile Dam, 4 mi southwest of Higbee, and 5.5 mi upstream from Smith Canyon. Prior to Apr. 21, 1978 gage located 850 ft, upstream.

**DRAINAGE AREA.**--2,752 mi<sup>2</sup>.

**GAGE.**--Accubar water level sensor and satellite-monitored data collection platform (Sutron 8210 DCP) in a 4 ft by 4 ft steel shelter. The primary gage is an outside drop tape from a reference point on a steel "I" beam on the wall face between Ninemile Dam and the Ninemile Canal headgate. Control is the Ninemile Dam. DCP data log file is the primary record with Satellite-monitored gage height data providing backup. Installed SDI Radio Bridge on May 21, 2002 to monitor Ninemile Canal gage data. Installed high data rate 8210 DCP on Sep 13, 2002.

**REMARKS.**--Record complete and reliable except for the following periods: Jan 31, Feb 1-3, 26-27, Mar 2-3, 2002, when the stage-discharge relationship was affected by ice. Jun 13, 2002, when the orifice was temporarily plugged. Record fair, except during periods of estimated flow, flows over 500 cfs, and flows less than 5 cfs, all of which should be considered poor. Station maintained and record developed by Adam Adame.

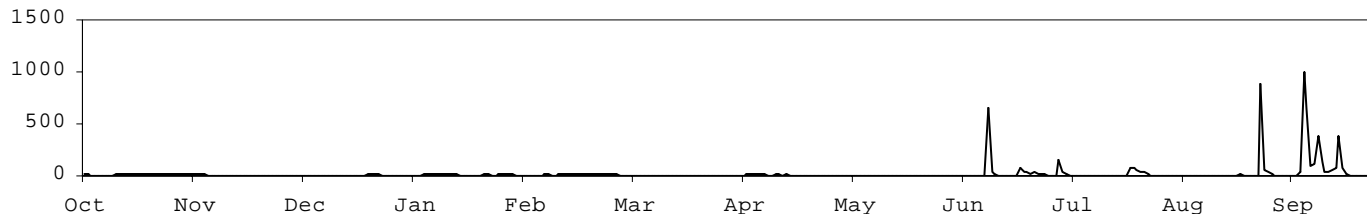
**RATING TABLE.**--PURNINCO17 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	12	13	1.4	2.2	4	8.8	0	0	0	0	0	18
2	11	14	3.6	3.8	6	3.5	0	0	0	0	0	.12
3	4.1	14	3.7	.55	6.5	4.5	0	0	0	149	0	0
4	0	15	3.9	9.6	6.6	4.7	0	0	0	29	0	0
5	0	6.1	4.7	15	6.9	8.4	3.1	0	0	18	0	0
6	0	0	4.1	12	6	2.5	14	0	0	0	0	0
7	0	0	4	16	8.5	4.1	13	0	0	0	0	0
8	0	0	3.9	17	12	5.2	13	0	0	0	0	0
9	4.9	0	3.3	17	14	3.1	13	0	0	0	0	46
10	16	0	3.7	17	9.4	2.8	14	0	0	0	0	992
11	16	0	3.1	13	8.6	2.3	12	0	0	0	0	645
12	15	0	2.1	12	10	1.9	6.8	0	0	0	0	92
13	15	0	1.8	15	13	.95	4.3	0	650	0	0	107
14	15	0	3.4	13	11	.28	10	0	33	0	0	392
15	15	0	4.2	8.2	12	0	9.8	0	20	0	0	128
16	17	0	5.4	6.1	12	0	9.6	0	5.9	0	0	47
17	17	0	6.3	7.7	12	0	9.8	0	0	0	0	46
18	16	0	6.4	7.7	12	0	5.4	0	0	3.2	0	58
19	16	0	4	8.3	13	0	0	0	0	.02	0	80
20	16	0	13	8.3	12	0	0	0	0	0	0	381
21	16	0	20	8.2	12	0	0	0	0	0	0	81
22	16	0	15	11	12	0	0	0	77	0	0	13
23	16	0	9.8	12	13	0	0	0	40	71	16	4.7
24	14	1.4	4	6.4	12	0	0	0	29	80	0	.79
25	13	2.8	2.2	5.9	12	0	0	0	20	53	0	.34
26	14	2	3.5	12	10	0	0	0	33	33	0	1.7
27	14	3.1	4.5	11	10	0	0	0	26	32	0	8.4
28	14	2.9	4.8	11	11	0	0	0	23	23	0	4.3
29	13	2.4	5.3	11	---	0	0	0	13	.04	886	0
30	14	3.5	4.1	11	---	0	0	0	0	0	49	0
31	14	---	6.6	5	---	0	---	0	---	0	33	---
TOTAL	364	80.2	165.8	313.95	287.5	53.03	137.8	0	969.9	491.26	984	3146.35
MEAN	11.7	2.67	5.4	10.1	10.3	1.71	4.59	0	32.3	15.8	31.7	105
AC-FT	722	159	329	623	570	105	273	0	1920	974	1950	6240
MAX	17	15	20	17	14	8.8	14	0	650	149	886	992
MIN	0	0	1.4	.55	4	0	0	0	0	0	0	0
CAL YR 2001	TOTAL	6573.79	MEAN	18	MAX	850	MIN	0	AC-FT	13040		
WTR YR 2002	TOTAL	6993.79	MEAN	19.2	MAX	992	MIN	0	AC-FT	13870		

MAX DISCH: 3220 CFS AT 08:00 ON Aug. 29, 2002 GH 5.56 FT. SHIFT 0 FT. DATUM -0.12 FT.  
MAX GH: 5.56 FT. (DATUM -0.12 FT.) AT 08:00 ON Aug. 29, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07126500 NINEMILE CANAL BELOW NINEMILE DAM NEAR HIGBEE, CO.

LOCATION.--Lat 37°42'53", long 103°30'38", in NW¼ sec. 7, T.27 S., R.54 W., Otero County.

DRAINAGE AREA.--N/A

GAGE.--Float-activated graphic water-stage recorder, satellite-monitored data collection platform (DCP, Sutron 8004) and shaft encoder in CMP shelter with well. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. Six-foot standard concrete Parshall flume is the control. Primary reference gage is outside staff gage installed in flume. On April 2, 2002 the old CMP shelter was replaced with a 3 ft by 3 ft steel shelter. On May 21, 2002 the 8004 DCP was removed and the gage was connected to the Purgatoire River at Ninemile Dam DCP (Sutron 8210) using an SDI Radio Bridge. An SDI shaft encoder was also installed in the canal gage on that date. After that installation, the canal gage height data are logged with the river gage data on the river gage DCP and transmitted with the river gage data as well.

REMARKS.--Record is complete and reliable, except for Feb 1 and 3, 2002, when the stage-discharge relationship was affected by ice. Record good. Station maintained and record developed by Adam Adame.

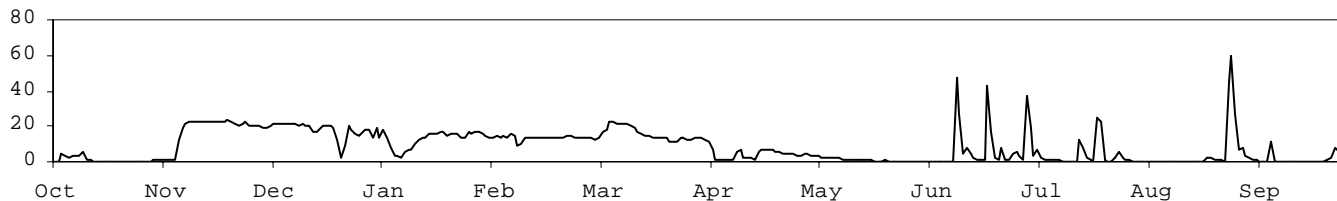
RATING TABLE.--NMCHIGCO01 USED FROM 01-OCT-2001 TO 01-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.5	1	20	14	14	14	14	4.2	.27	2.9	.69	6.8
2	.43	.89	21	18	14	13	13	4.1	.25	1.5	.53	7.9
3	4.2	.73	21	14	15	12	12	3.8	.19	.37	.45	3.6
4	3.9	.71	21	8.4	13	14	11	3.5	.14	.19	.35	2.1
5	2.8	12	21	3.9	15	17	7.3	3.2	.13	3.3	.33	1.1
6	2.9	19	21	3.7	14	18	1.2	2.8	.08	6.4	.35	.58
7	3.3	21	21	2.4	16	22	1.3	2.6	.07	2.2	.31	.46
8	3.9	22	21	5.4	15	23	1.3	2.3	0	1.1	.37	.52
9	5.4	22	20	7.2	9.1	21	1.3	2.3	0	.72	.31	.43
10	.77	22	21	7.2	9.9	21	1.4	2.1	0	.69	.3	11
11	.58	22	20	10	13	21	1.4	2	0	.62	.38	.35
12	.52	22	20	12	14	21	6.1	1.6	0	.59	.34	.31
13	.42	23	17	13	14	20	6.7	1.5	47	.52	.33	.23
14	.35	23	17	14	14	19	1.7	1.3	27	.48	.3	.26
15	.35	23	18	16	14	17	1.7	1.2	4.7	.43	.37	.22
16	.35	23	20	16	14	16	1.7	1.1	7.8	.39	.29	.18
17	.33	23	20	16	14	15	1.2	1	4.2	.35	.45	.14
18	.28	23	20	17	14	15	5.2	.93	2.2	.12	.12	.13
19	.27	24	19	17	14	14	7.3	.75	1.2	8.2	.1	.1
20	.27	23	12	15	14	13	7.1	.57	.91	2.8	.04	.08
21	.27	21	2.1	16	14	13	7.2	.45	.71	.95	.04	.02
22	.27	20	9.3	16	14	13	6.6	.18	43	.56	.04	0
23	.27	21	20	16	15	13	6	.35	17	25	2.2	0
24	.27	22	18	14	15	11	5.2	.59	2.3	22	1.9	0
25	.23	20	16	14	14	11	4.6	.49	1.2	.65	.72	0
26	.2	20	15	17	14	11	4.2	.39	8	.56	.67	.62
27	.2	20	17	16	14	13	4.4	.35	1.3	.51	.61	2.2
28	.39	20	18	17	14	13	4.1	.37	1.3	1.7	.56	8.2
29	.81	19	18	17	---	12	3.6	.38	4.9	5.9	45	6.5
30	.88	19	13	16	---	12	3.4	.35	5.5	2.1	60	4.9
31	1.1	---	19	15	---	13	---	.31	---	.89	27	---
TOTAL	36.71	552.33	556.4	404.2	388	481	153.2	47.06	181.35	162.01	145.45	58.93
MEAN	1.18	18.4	17.9	13	13.9	16	5.1	1.52	6.05	5.23	4.69	1.96
AC-FT	73	1100	1100	802	770	954	304	93	360	321	289	117
MAX	5.4	24	21	18	16	23	14	4.2	47	37	60	11
MIN	.2	.71	2.1	2.4	9.1	11	1.2	.18	0	.35	.04	0
CAL YR 2001	TOTAL	4305.82	MEAN	11.8	MAX	50	MIN	0.20	AC-FT	8540		
WTR YR 2002	TOTAL	3166.64	MEAN	8.68	MAX	60	MIN	0	AC-FT	6280		

MAX DISCH: 125 CFS AT 10:30 ON Aug. 29, 2002 GH 2.81 FT. SHIFT 0 FT.  
MAX GH: 2.81 FT. AT 10:30 ON Aug. 29, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

07126500 PURGATOIRE RIVER AT NINEMILE DAM, NEAR HIGBEE, CO (COMBINED)

**LOCATION.**--Lat 37°42'53", long 103°30'38", in NW¼ sec. 7, T.27 S., R.54 W., Otero County, Hydrologic Unit 11020010, on left bank at Ninemile Dam, 4 mi southwest of Higbee, and 5.5 mi upstream from Smith Canyon. Prior to Apr. 21, 1978 gage located 850 ft, upstream.

**DRAINAGE AREA.**--2,752 mi<sup>2</sup>.

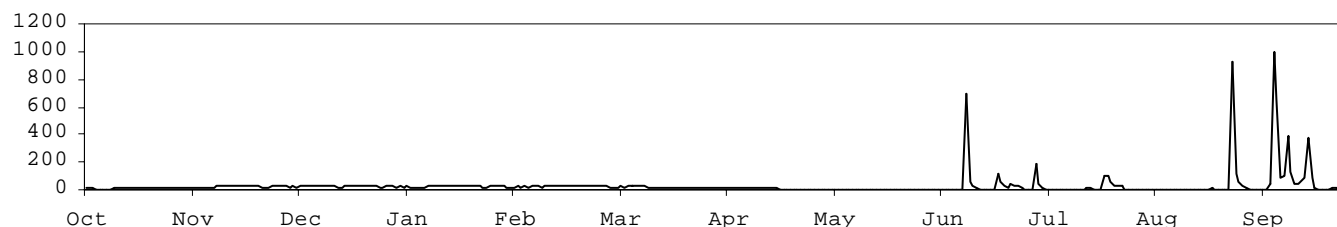
**REMARKS.**--The combined record of discharges was obtained by the addition of daily flows from the Ninemile Canal to the corresponding daily flows in the Purgatoire River at Ninemile Dam. The peak discharge for the water year was 3220 cfs at 0800 on August 29, 2002. Combined record is fair, except for during the following periods of estimated flows and during periods of flow less than 5 cfs and over 500 cfs, all of which should be considered poor. Station maintained and record developed by Div. II personnel.

## PURGATOIRE RIVER AT NINEMILE DAM AND NINEMILE CANAL (COMBINED)

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	13	14	21	16	18	23	14	4.2	.27	2.9	.69	25
2	11	15	25	22	20	17	13	4.1	.25	1.5	.53	8
3	8.3	15	25	15	22	17	12	3.8	.19	186	.45	3.6
4	3.9	16	25	18	20	19	11	3.5	.14	48	.35	2.1
5	2.8	18	26	19	22	25	10	3.2	.13	21	.33	1.1
6	2.9	19	25	16	20	21	15	2.8	.08	6.4	.35	.58
7	3.3	21	25	18	25	26	14	2.6	.07	2.2	.31	.46
8	3.9	22	25	22	27	28	14	2.3	0	1.1	.37	.52
9	10	22	23	24	23	24	14	2.3	0	.72	.31	.46
10	17	22	25	24	19	24	15	2.1	0	.69	.3	1000
11	17	22	23	23	22	23	13	2	0	.62	.38	645
12	16	22	22	24	24	23	13	1.6	0	.59	.34	92
13	15	23	19	28	27	21	11	1.5	697	.52	.33	107
14	15	23	20	27	25	19	12	1.3	60	.48	.3	392
15	15	23	22	24	26	17	12	1.2	25	.43	.37	128
16	17	23	25	22	26	16	11	1.1	14	.39	.29	47
17	17	23	26	24	26	15	11	1	4.2	.35	.45	46
18	16	23	26	25	26	15	11	.93	2.2	15	.12	58
19	16	24	23	25	27	14	7.3	.75	1.2	8.2	.1	80
20	16	23	25	23	26	13	7.1	.57	.91	2.8	.04	381
21	16	21	22	24	26	13	7.2	.45	.71	.95	.04	81
22	16	20	24	27	26	13	6.6	.18	120	.56	.04	13
23	16	21	30	28	28	13	6	.35	57	96	18	4.7
24	14	23	22	20	27	11	5.2	.59	31	102	1.9	.79
25	13	23	18	20	26	11	4.6	.49	21	54	.72	.34
26	14	22	19	29	24	11	4.2	.39	41	34	.67	2.3
27	14	23	22	27	24	13	4.4	.35	27	33	.61	11
28	14	23	23	28	25	13	4.1	.37	24	25	.56	13
29	14	21	23	28	---	12	3.6	.38	18	5.9	931	6.5
30	15	23	17	27	---	12	3.4	.35	5.5	2.1	109	4.9
31	15	---	26	20	---	13	---	.31	---	.89	60	---
TOTAL	397.1	633	722	717	677	535	289.7	47.06	1150.85	654.29	1129.25	3200.89
MEAN	12.8	21	23	23	24	17	9.7	1.52	38.4	21.1	36.4	107
AC-FT	788	1260	1430	1420	1340	1060	575	93	2280	1300	2240	6350
MAX	17	24	30	29	28	28	15	4.2	697	186	931	1000
MIN	2.8	14	17	15	18	11	3.4	.18	0	.35	.04	.34
CAL YR 2001	TOTAL	10877.94	MEAN	29.8	MAX	885	MIN	0.27	AC-FT	21580		
WTR YR 2002	TOTAL	10153.14	MEAN	27.8	MAX	1000	MIN	0	AC-FT	20140		
MAX DISCH.:	3220	CFS AT	8:00 ON	Aug. 29, 2002								

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

PURGATOIRE RIVER below HIGHLAND DAM near LAS ANIMAS, CO (WY2001)

**LOCATION.**--Lat 37°54'03", Long 103°17'56" (Hackamore Ranch, CO Quadrangle, Scale 1:24,000), NE1/4, SW1/4, Section 1, T25S, R53W. On the left bank approximately ¼ mile downstream of the Highland Canal Diversion Dam, Bent County, 11 mi southwest of Las Animas, Colorado.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water stage recorder, gas-purge manometer, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in a 4 ft x 4 ft steel shelter. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. Primary reference gage is outside staff gage on left side of channel approximately 150 ft east of shelter. Outside gage established October 25, 2000. Satellite-monitored gage established May 22, 2001 with first full day of operation on May 23, 2001.

**REMARKS.**--Record is complete and reliable during the period May 23 to September 30, 2001. Satellite data were missing for several periods during the water year due to DCP and shaft encoder malfunction. Chart data was complete and reliable and used during these periods to fill in missing satellite data. Record fair, except during periods when flows were greater than 500 cfs, which are poor. Partial year record only. Gage operated and maintained by Adam Adame.

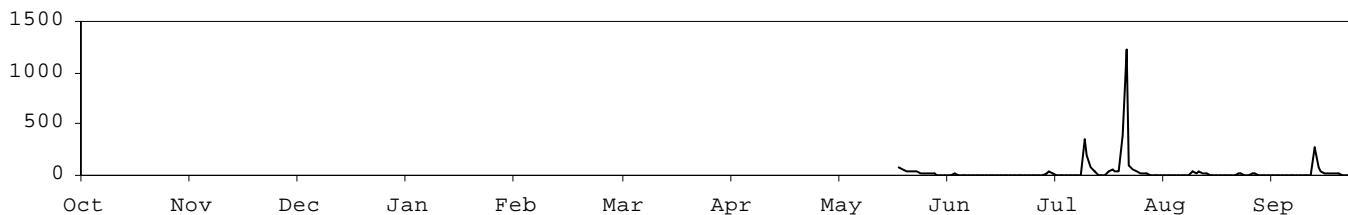
**RATING TABLE.**--PURHILCO01 USED FROM 23-MAY-2001 TO 15-JUL-2001  
 PURHILCO02 USED FROM 15-JUL-2001 TO 30-SEP-2001

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2000 TO SEPTEMBER 2001  
 MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1									15	0	15	26
2									11	0	10	15
3									7.2	4.2	6.5	9
4									7	22	3.5	4.9
5									5	36	2.3	3.2
6									3	18	1.9	2.2
7									9.1	2.3	1.6	1.4
8									14	.89	.87	1.2
9									6.4	.38	.63	1.2
10									3.5	0	.27	1.1
11									1.2	0	.21	.49
12									.55	0	.26	.28
13									.13	.23	.18	.2
14									.13	.45	.1	.17
15									.23	350	32	.22
16									.23	192	19	3.4
17									0	81	39	2.2
18									0	31	22	1.4
19									0	9.7	11	277
20									0	5.4	5.3	83
21									0	3.4	8.4	43
22									0	47	7.9	28
23								70	0	51	5.3	26
24								56	0	32	3.1	21
25								45	0	35	1.5	15
26								45	0	384	.87	10
27								38	0	1220	.57	6.7
28								33	0	105	23	4.5
29								28	0	52	11	4.1
30								24	0	31	6.8	3.2
31								18	---	20	6.3	---
TOTAL								357	83.67	2733.95	246.36	595.06
MEAN								39.7	2.79	88.2	7.95	19.8
AC-FT								708	166	5420	489	1180
MAX								70	15	1220	39	277
MIN								0	0	0	0.1	.17

GAGE STARTED ON 5-23-2001. PARTIAL YEAR RECORD ONLY.

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

HIGHLAND CANAL below HIGHLAND DAM near LAS ANIMAS, CO (WY2001)

**LOCATION.**--Lat 37°54'03", Long 103°17'56" (Hackamore Ranch, CO Quadrangle, Scale 1:24,000), NE1/4, SW1/4, Section 1, T25S, R53W. On the left bank approximately ¼ mile downstream of the Highland Canal Diversion Dam, Bent County, 11 mi southwest of Las Animas, Colorado.

**DRAINAGE AREA.**--N/A

**GAGE.**--Float-activated graphic water-stage recorder and shaft encoder in small shelter over CMP stilling well. Shaft encoder wired to satellite-monitored data collection platform (Sutron 8004 DCP) in Purgatoire River below Highland Dam gage shelter. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. Standard 5-ft steel Parshall flume is the control. Primary reference gage is outside staff gage installed in flume. Gage and flume installed this water year and began full daily operation on May 23, 2001.

**REMARKS.**--Record is complete and reliable for the period May 23 through September 30, 2001. Record good. Gage is operated and maintained by Adam Adame.

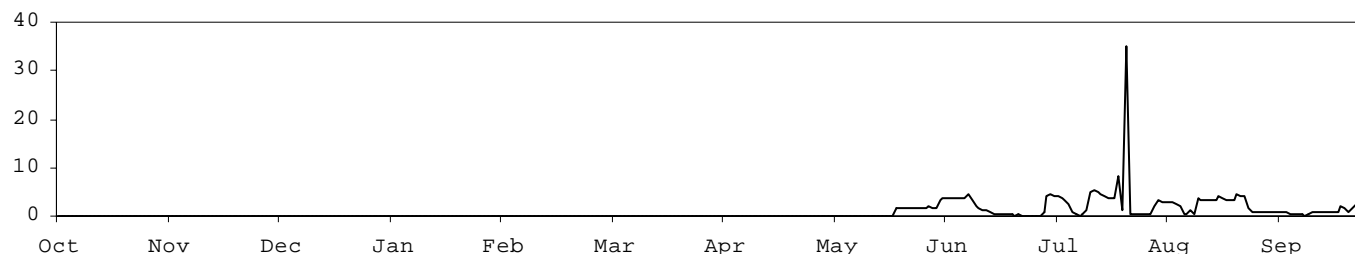
**RATING TABLE.**--STD05FTPF USED FROM 01-OCT-2000 TO 30-SEP-2001

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2000 TO SEPTEMBER 2001  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1									1.9	0	.24	.93
2									1.8	0	.26	.93
3									1.8	.93	2.1	.93
4									3.3	4.3	3.1	.89
5									3.8	4.5	3	.79
6									3.6	4.2	3	.73
7									3.8	4	3	.73
8									3.7	3.6	2.9	.7
9									3.7	3.1	2.6	.62
10									3.8	2.3	2.1	.56
11									3.7	.73	.53	.49
12									4.4	.31	.42	.39
13									3.1	.16	1.3	.33
14									2.1	.36	.39	.17
15									1.7	1.1	3.8	.24
16									1.3	4.8	3.3	.88
17									1.2	5.4	3.3	.93
18									.73	4.8	3.1	.83
19									.52	4.5	3.1	.8
20									.41	4.1	3.1	.69
21									.41	3.6	4	.62
22									.36	3.8	3.9	.62
23								1.8	.36	3.6	3.2	.62
24								1.8	.21	8.3	3.1	2.2
25								1.8	.16	1.3	3.3	1.7
26								1.8	.26	35	4.5	.93
27								1.8	.05	.35	4.1	1.6
28								1.8	0	.21	4.3	2.4
29								1.7	0	.21	1.8	2.4
30								1.8	0	.21	.84	2.4
31								1.8	---	.22	.84	---
TOTAL								16.1	52.17	109.99	78.52	29.05
MEAN								.52	1.74	3.55	2.53	.97
AC-FT								32	103	218	156	58
MAX								1.8	4.4	35	4.5	2.4
MIN								0	0	0	.24	.17

GAGE STARTED ON 5-23-2001. PARTIAL YEAR RECORD ONLY.

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

PURGATOIRE RIVER below HIGHLAND DAM near LAS ANIMAS, CO (COMBINED)(WY2001)

HIGHLAND CANAL nearLAS ANIMAS, CO

**LOCATION.**--Lat 37°54'03", Long 103°17'56" (Hackamore Ranch, CO Quadrangle, Scale 1:24,000), NE1/4, SW1/4, Section 1, T25S, R53W. On the left bank approximately ¼ mile downstream of the Highland Canal Diversion Dam, Bent County, 11 mi southwest of Las Animas, Colorado.

**DRAINAGE AREA.**--N/A

**GAGE.**--Gage established during the water year and put into continuous daily operation on May 23, 2001. The record for WY2001 is a partial year record only. The combined record of discharges was obtained by the addition of Highland Canal daily flows to the corresponding daily flows in the Purgatoire River below Highland Dam.

**REMARKS.**--Combined record is fair, except during periods of estimated flow and flows greater than 500 cfs, which should be considered poor.

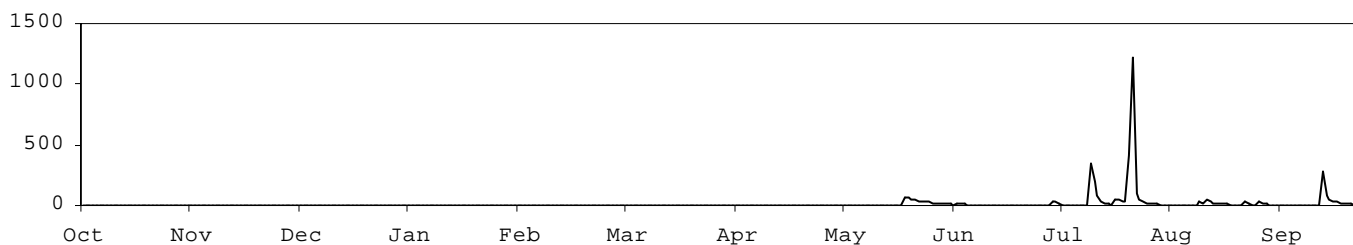
**RATING TABLE.**--COMBINED RECORD

PURGATOIRE RIVER BELOW HIGHLAND DAM NEAR LAS ANIMAS, CO AND HIGHLAND CANAL (COMBINED)  
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2000 TO SEPTEMBER 2001 (PARTIAL YEAR RECORD)  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	17	0	15	27
2	0	0	0	0	0	0	0	0	13	0	10	16
3	0	0	0	0	0	0	0	0	9	5.1	8.6	9.9
4	0	0	0	0	0	0	0	0	10	26	6.6	5.8
5	0	0	0	0	0	0	0	0	8.8	41	5.3	4
6	0	0	0	0	0	0	0	0	6.6	22	4.9	2.9
7	0	0	0	0	0	0	0	0	13	6.3	4.6	2.1
8	0	0	0	0	0	0	0	0	18	4.5	3.8	1.9
9	0	0	0	0	0	0	0	0	10	3.5	3.2	1.8
10	0	0	0	0	0	0	0	0	7.3	2.3	2.4	1.7
11	0	0	0	0	0	0	0	0	4.9	.73	.74	.98
12	0	0	0	0	0	0	0	0	4.9	.31	.68	.67
13	0	0	0	0	0	0	0	0	3.2	.39	1.5	.53
14	0	0	0	0	0	0	0	0	2.2	.81	.49	.34
15	0	0	0	0	0	0	0	0	1.9	351	36	.46
16	0	0	0	0	0	0	0	0	1.5	197	22	4.3
17	0	0	0	0	0	0	0	0	1.2	86	42	3.1
18	0	0	0	0	0	0	0	0	.73	36	25	2.2
19	0	0	0	0	0	0	0	0	.52	14	14	278
20	0	0	0	0	0	0	0	0	.41	9.5	8.4	84
21	0	0	0	0	0	0	0	0	.41	7	12	44
22	0	0	0	0	0	0	0	0	.36	51	12	29
23	0	0	0	0	0	0	0	72	.36	55	8.5	27
24	0	0	0	0	0	0	0	58	.21	40	6.2	23
25	0	0	0	0	0	0	0	47	.16	36	4.8	17
26	0	0	0	0	0	0	0	47	.26	419	5.4	11
27	0	0	0	0	0	0	0	40	.05	1220	4.7	8.3
28	0	0	0	0	0	0	0	35	0	105	27	6.9
29	0	0	0	0	---	0	0	30	0	52	13	6.5
30	0	0	0	0	---	0	0	26	0	31	7.6	5.6
31	0	---	0	0	---	0	---	20	---	20	7.1	---
TOTAL	0	0	0	0	0	0	0	375	135.97	2842.44	323.51	625.98
MEAN	0	0	0	0	0	0	0	12.1	4.53	91.7	10.4	20.9
AC-FT	0	0	0	0	0	0	0	744	270	5640	642	1240
MAX	0	0	0	0	0	0	0	72	18	1220	42	278
MIN	0	0	0	0	0	0	0	0	0	0	.49	.34

WTR YR 2001 TOTAL 4302.9 MEAN 11.8 MAX 1220 MIN 0 AC-FT 8530  
(PARTIAL YEAR RECORD)

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





ARKANSAS RIVER BASIN

PURGATOIRE RIVER below HIGHLAND DAM near LAS ANIMAS, CO (WY2002)

**LOCATION.**--Lat 37°54'03", Long 103°17'56" (Hackamore Ranch, CO Quadrangle, Scale 1:24,000), NE1/4, SW1/4, Section 1, T25S, R53W. On the left bank approximately ¼ mile downstream of the Highland Canal Diversion Dam, Bent County, 11 mi southwest of Las Animas, Colorado.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water stage recorder, gas-purge manometer, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in a 4 ft x 4 ft steel shelter. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. Primary reference gage is outside staff gage on left side of channel approximately 150 ft east of shelter.

**REMARKS.**--Record is complete and reliable except during the period: Dec 17-21, 2001 when the manometer ran out of nitrogen gas. Satellite data was missing for several periods during the water year due to DCP and shaft encoder malfunction. Chart data was complete and reliable and used during these periods to fill in missing satellite data. Record fair, except during periods when flows were greater than 500 cfs, which is poor. Gage operated and maintained by Adam Adame.

**RATING TABLE.**--PURHILCO02 USED FROM 01-OCT-2001 TO 30-SEP-2002

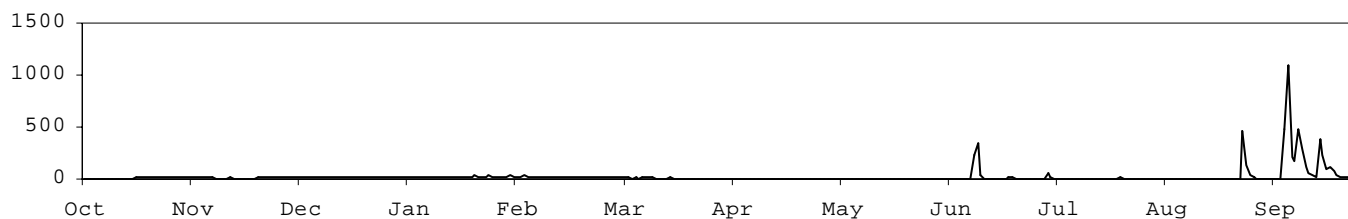
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	2.4	13	19	18	28	19	3.4	1.7	0	1.1	.03	19
2	1.8	13	19	21	25	16	2.5	1.5	0	.73	0	7.1
3	1.3	13	18	14	24	16	2	1.5	0	.69	.02	2.7
4	1.3	13	19	19	29	19	2.9	1.4	0	51	0	1.2
5	.86	13	16	18	28	18	2.9	1.3	0	12	0	.8
6	.78	13	17	17	27	14	2.4	1.3	.01	5.7	0	.43
7	.61	12	20	19	28	8.5	2.2	1.3	.01	2.1	0	.41
8	.42	6.5	20	24	26	11	3.3	1.3	0	.8	0	.36
9	.31	4.7	18	27	25	8.5	6.3	.88	0	.56	0	.4
10	.1	4.8	17	25	19	12	6.2	.65	0	.28	0	479
11	.11	7.4	17	25	23	14	6.2	.54	0	.11	0	1100
12	1.1	9.9	19	23	21	12	6.4	.46	0	.09	0	206
13	6.8	9.3	17	23	20	10	6.9	.41	233	.04	0	174
14	7.5	8.7	19	24	22	8.2	7.6	.39	341	.01	0	490
15	8.8	8.1	21	26	22	6	4.6	.42	43	.14	0	283
16	9.8	6.7	21	21	20	8.1	5	.25	9.3	0	0	115
17	10	6.1	20	25	22	8.1	4.8	.25	4.8	0	0	50
18	12	8.1	17	24	20	11	4.1	.27	1.8	0	0	29
19	13	9.5	20	28	19	8.9	4	.27	.41	0	0	20
20	12	10	19	28	20	8.1	5.2	.24	.26	0	0	376
21	12	12	18	31	19	9.4	3.5	.24	.1	0	0	222
22	12	13	18	27	20	7	2.4	.23	.12	0	0	95
23	12	13	20	27	20	6.1	1.7	.25	17	0	0	117
24	12	15	21	23	19	7.7	.97	.2	13	0	0	76
25	12	16	19	29	15	7.2	.8	.2	8.1	14	0	41
26	12	15	17	27	14	7.2	.91	.2	4.6	9.3	0	24
27	12	15	15	28	18	6.7	2.2	.16	7.5	4	0	16
28	12	16	15	25	20	9	3	.16	2.9	1.9	0	13
29	13	17	18	26	---	7.8	2.5	.13	3.2	.82	465	11
30	13	19	15	24	---	5.5	2	.12	2.3	.69	139	5.8
31	13	---	18	29	---	7.6	---	.04	---	.25	41	---
TOTAL	225.99	340.8	567	745	613	317.6	108.88	18.26	692.41	106.31	645.05	3975.2
MEAN	7.29	11.4	18	24	22	10.2	3.63	.59	23.1	3.43	20.8	133
AC-FT	448	676	1120	1480	1220	630	216	36	1370	211	1280	7880
MAX	13	19	21	31	29	19	7.6	1.7	341	51	465	1100
MIN	.1	4.7	15	14	14	5.5	.8	.04	0	0	0	.36

CAL YR	2001	TOTAL	NA	MEAN	NA	MAX	NA	MIN	NA	AC-FT	NA
WTR YR	2002	TOTAL	8355.5	MEAN	22.9	MAX	1100	MIN	0	AC-FT	16570

MAX DISCH: 2490 CFS AT 21:30 ON Jun. 13, 2002 GH 9.47 FT. SHIFT 0 FT.  
MAX GH: 9.47 FT. AT 21:30 ON Jun. 13, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

HIGHLAND CANAL below HIGHLAND DAM near LAS ANIMAS, CO (WY2002)

**LOCATION.**--Lat 37°54'03", Long 103°17'56" (Hackamore Ranch, CO Quadrangle, Scale 1:24,000), NE1/4, SW1/4, Section 1, T25S, R53W. On the left bank approximately ¼ mile downstream of the Highland Canal Diversion Dam, Bent County, 11 mi southwest of Las Animas, Colorado.

**DRAINAGE AREA.**--N/A

**GAGE.**--Float-activated graphic water-stage recorder and shaft encoder in small shelter over CMP stilling well. Shaft encoder wired to satellite-monitored data collection platform (Sutron 8004 DCP) in Purgatoire River below Highland Dam gage shelter. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. Standard 5-ft steel Parshall flume is the control. Primary reference gage is outside staff gage installed in flume.

**REMARKS.**--Record is complete and reliable except for the period from April 28 to May 1, 2002 when the flume was submerged. Record good. Gage is operated and maintained by Adam Adame.

**RATING TABLE.**--STD05FTPF USED FROM 01-OCT-2001 TO 30-SEP-2002

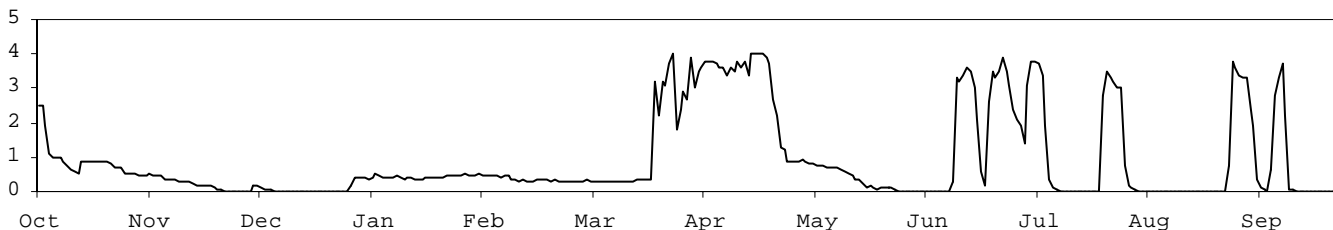
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	2.5	.52	.15	.37	.51	.29	3.9	.9	0	2.1	.19	3.4
2	2.5	.47	.12	.39	.46	.3	3	.95	0	1.9	.09	3.3
3	1.9	.44	.08	.51	.48	.32	3.5	.86	0	1.4	.04	3.3
4	1.1	.44	.04	.46	.45	.31	3.6	.8	0	3.1	.02	2.4
5	1	.36	.03	.38	.44	.3	3.8	.79	0	3.8	0	1.9
6	.98	.36	.02	.38	.44	.29	3.8	.78	0	3.8	0	.34
7	.98	.36	0	.39	.38	.28	3.8	.78	0	3.7	0	.11
8	.88	.36	0	.41	.44	.29	3.7	.75	0	3.4	0	.05
9	.78	.28	0	.44	.49	.28	3.6	.69	0	1.9	0	.01
10	.62	.29	0	.4	.34	.3	3.6	.69	0	.35	0	.65
11	.56	.29	0	.37	.34	.3	3.4	.7	0	.09	0	2.8
12	.53	.27	0	.41	.31	.29	3.6	.68	0	.05	0	3.3
13	.88	.23	0	.39	.33	.29	3.5	.64	.27	.02	0	3.7
14	.88	.18	0	.36	.3	.3	3.8	.59	3.3	0	0	2.2
15	.88	.17	0	.37	.31	.29	3.6	.55	3.2	0	0	.06
16	.88	.17	0	.37	.31	.29	3.8	.46	3.4	0	0	.03
17	.88	.17	0	.39	.33	.32	3.4	.37	3.6	0	0	.01
18	.88	.15	0	.42	.32	.36	4	.34	3.5	0	0	0
19	.88	.11	0	.43	.33	.36	4	.23	3	0	0	0
20	.88	.06	0	.42	.32	.36	4	.14	2.1	0	0	0
21	.79	.03	0	.41	.31	.36	4	.19	.6	0	0	0
22	.69	.01	0	.4	.32	3.2	3.9	.1	.16	0	0	0
23	.69	0	0	.45	.3	2.2	3.7	.05	2.6	0	0	0
24	.69	0	0	.45	.31	3.2	2.7	.11	3.5	0	0	0
25	.53	0	0	.44	.29	3.1	2.2	.12	3.3	2.8	0	0
26	.52	0	0	.45	.29	3.7	1.3	.12	3.5	3.5	0	0
27	.52	0	.16	.49	.3	4	1.2	.09	3.9	3.3	0	0
28	.52	0	.41	.52	.3	1.8	.9	.04	3.5	3.2	0	0
29	.45	0	.41	.46	---	2.4	.9	.02	3.1	3	.76	0
30	.44	.16	.38	.44	---	2.9	.9	0	2.4	3	3.8	0
31	.47	---	.38	.47	---	2.7	---	0	---	.74	3.6	---
TOTAL	27.68	5.88	2.18	13.04	10.05	35.68	95.1	13.53	48.93	45.15	8.5	27.56
MEAN	.89	.2	.07	.42	.36	1.15	3.17	.44	1.63	1.46	.27	.92
AC-FT	55	12	4.3	26	20	71	189	27	97	90	17	55
MAX	2.5	.52	.41	.52	.51	4	4	.95	3.9	3.8	3.8	3.7
MIN	.44	0	0	.36	.29	.28	.9	0	0	0	0	0

CAL YR	2001	TOTAL	NA	MEAN	NA	MAX	NA	MIN	NA	AC-FT	NA
WTR YR	2002	TOTAL	333.28	MEAN	.91	MAX	4	MIN	0	AC-FT	661

MAX DISCH: 29.6 CFS AT 10:15 ON Mar. 22, 2002 GH 1.28 FT. SHIFT 0 FT.  
MAX GH: 1.28 FT. AT 10:15 ON Mar. 22, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## ARKANSAS RIVER BASIN

PURGATOIRE RIVER below HIGHLAND DAM near LAS ANIMAS, CO (COMBINED)(WY2002)

HIGHLAND CANAL near LAS ANIMAS, CO

**LOCATION.**--Lat 37°54'03", Long 103°17'56" (Hackamore Ranch, CO Quadrangle, Scale 1:24,000), NE1/4, Section 1, T25S, R53W. On the left bank approximately ¼ mile downstream of the Highland Canal Diversion Dam, Bent County, 11 mi southwest of Las Animas, Colorado.

**DRAINAGE AREA.**--N/A

**GAGE.**--The combined record of discharges was obtained by the addition of Highland Canal daily flows to the corresponding daily flows in the Purgatoire River below Highland Dam. The peak discharge for the year was 2490 cfs on June 13, 2002.

**REMARKS.**--Combined record is fair, except during periods of estimated flow and flows greater than 500 cfs, which should be considered poor.

**RATING TABLE.**--COMBINED RECORD

PURGATOIRE RIVER BELOW HIGHLAND DAM NEAR LAS ANIMAS, CO AND HIGHLAND CANAL (COMBINED)  
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

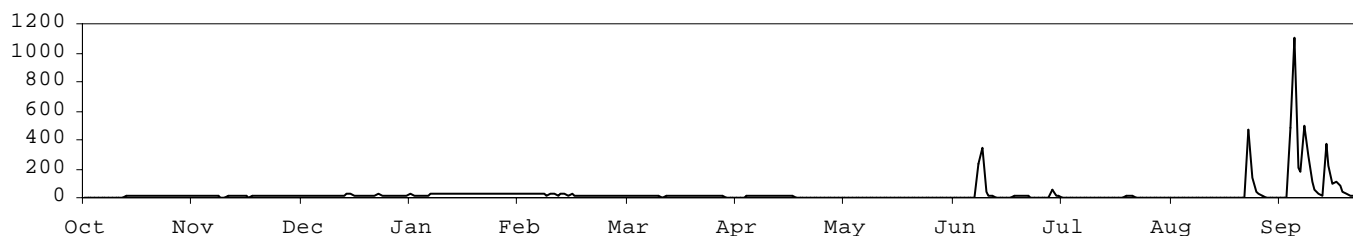
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	4.9	14	19	18	29	19	7.3	2.6	0	3.2	.22	22
2	4.3	13	19	21	25	16	5.5	2.5	0	2.6	.09	10
3	3.2	13	18	15	24	16	5.5	2.4	0	2.1	.06	6
4	2.4	13	19	19	29	19	6.5	2.2	0	54	.02	3.6
5	1.9	13	16	18	28	18	6.7	2.1	0	16	0	2.7
6	1.8	13	17	17	27	14	6.2	2.1	.01	9.5	0	.77
7	1.6	12	20	19	28	8.8	6	2.1	.01	5.8	0	.52
8	1.3	6.9	20	24	26	11	7	2	0	4.2	0	.41
9	1.1	5	18	27	25	8.8	9.9	1.6	0	2.5	0	.41
10	.72	5.1	17	25	19	12	9.8	1.3	0	.63	0	480
11	.67	7.7	17	25	23	14	9.6	1.2	0	.2	0	1100
12	1.6	10	19	23	21	12	10	1.1	0	.14	0	209
13	7.7	9.5	17	23	20	10	10	1.1	233	.06	0	178
14	8.4	8.9	19	24	22	8.5	11	.98	344	.01	0	492
15	9.7	8.3	21	26	22	6.3	8.2	.97	46	.14	0	283
16	11	6.9	21	21	20	8.4	8.8	.71	13	0	0	115
17	11	6.3	20	25	22	8.4	8.2	.62	8.4	0	0	50
18	13	8.3	17	24	20	11	8.1	.61	5.3	0	0	29
19	14	9.6	20	28	19	9.3	8	.5	3.4	0	0	20
20	13	10	19	28	20	8.5	9.2	.38	2.4	0	0	376
21	13	12	18	31	19	9.8	7.5	.43	.7	0	0	222
22	13	13	18	27	20	10	6.3	.33	.28	0	0	95
23	13	13	20	27	20	8.3	5.4	.3	20	0	0	117
24	13	15	21	23	19	11	3.7	.31	17	0	0	76
25	13	16	19	29	15	10	3	.32	11	17	0	41
26	13	15	17	27	14	11	2.2	.32	8.1	13	0	24
27	13	15	15	28	18	11	3.4	.25	11	7.3	0	16
28	13	16	15	26	20	11	3.9	.2	6.4	5.1	0	13
29	13	17	18	26	---	10	3.4	.15	6.3	3.8	466	11
30	13	19	15	24	---	8.4	2.9	.12	4.7	3.7	143	5.8
31	13	---	18	29	---	10	---	.04	---	.99	45	---
TOTAL	256.29	344.5	567	747	614	349.5	203.2	31.84	741	151.97	654.39	3999.21
MEAN	8.27	11.5	18	24	22	11.3	6.8	1.03	24.7	4.9	21.1	133
AC-FT	508	683	1120	1480	1220	693	403	63	1470	301	1300	7930
MAX	14	19	21	31	29	19	11	2.6	344	54	466	1100
MIN	.67	5	15	15	14	6.3	2.2	.04	0	0	0	.41

CAL YR 2001 TOTAL 4302.9 MEAN 11.8 MAX 1220 MIN 0 AC-FT 8530  
(PARTIAL YEAR RECORD)

WTR YR 2002 TOTAL 8659.9 MEAN 23.7 MAX 1100 MIN 0 AC-FT 17180

MAX DISCH.: 2490 CFS AT 21:30 ON JUN. 13, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ARKANSAS RIVER BASIN

07134125 ARKANSAS RIVER below X-Y DITCH DAM nr CARLTON, CO

**LOCATION.**--Lat 38°06'17", long 102°25'17", SE¼SW¼ sec.25, T. 22 S., R.45 W., Prowers Co., Hydrologic Unit 11020009, on the right bank, 0.75 mi. west of Co Rd. 19, 0.3 mi. downstream of the former X-Y Ditch diversion dam and headgate and 1 mile northwest of Carlton, Co.

**DRAINAGE AREA.** --Undetermined.

**GAGE.**--October 1, 2001 to September 14, 2002 Graphic water-stage recorder, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in metal half shelter over 24-inch diameter CMP well. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. On September 14, 2002, new satellite-monitoring equipment (Accubar water level sensor, orifice line and satellite-monitored data collection platform, Sutron 8200 DCP) in a new 4' x 4' steel shelter were started in use. Primary record is DCP log data with satellite-monitored data used for backup. Outside staff gage on right side of channel below shelter is primary reference gage.

**REMARKS.**--Record is complete and reliable. Record good. Station maintained and record developed by Adam Adame.

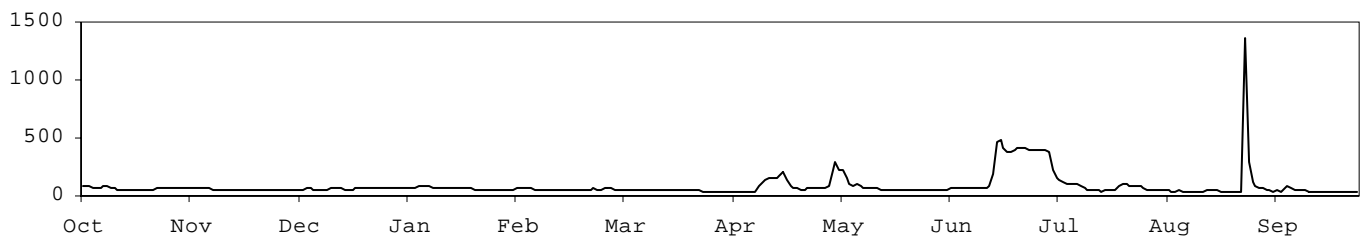
**RATING TABLE.**--ARKCARCO04 USED FROM 01-OCT-2001 TO 03-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	83	72	59	64	59	68	41	61	47	393	60	84
2	78	73	59	65	61	60	40	94	46	399	56	72
3	78	68	58	70	62	60	39	229	47	395	53	63
4	74	61	61	75	61	60	39	293	49	378	53	52
5	73	61	61	81	63	58	38	224	59	221	51	46
6	74	61	60	82	62	59	37	218	68	163	48	42
7	86	59	60	81	58	57	39	159	70	136	45	44
8	81	56	60	78	58	55	39	100	69	118	41	43
9	72	56	60	76	58	57	39	86	70	110	41	45
10	67	56	60	75	59	54	39	98	69	104	51	82
11	59	55	62	74	58	55	39	80	69	103	41	62
12	59	54	63	69	58	53	80	69	63	96	39	50
13	58	51	62	68	59	52	115	65	63	87	39	54
14	55	51	61	65	59	51	143	65	63	70	40	57
15	55	50	60	66	60	49	160	63	70	60	42	50
16	55	49	59	65	60	49	148	63	74	56	42	43
17	55	49	59	63	60	47	151	60	80	49	42	40
18	55	49	61	62	60	47	169	58	198	46	44	40
19	57	49	61	63	60	48	200	55	458	43	44	41
20	58	49	61	63	60	48	143	51	478	44	47	38
21	58	50	61	59	60	47	84	50	406	47	46	33
22	62	49	63	59	60	46	69	47	378	50	42	29
23	65	52	63	58	60	45	62	46	384	56	41	28
24	70	51	63	56	61	45	59	49	400	85	42	26
25	72	50	63	57	60	46	59	49	418	100	40	27
26	69	50	62	58	57	44	63	47	415	98	38	34
27	70	50	63	58	61	43	64	47	409	89	38	31
28	72	50	63	58	62	43	62	47	401	84	39	31
29	72	51	63	58	---	41	61	46	394	84	1360	32
30	75	53	64	58	---	41	61	46	394	79	299	32
31	73	---	63	59	---	41	---	46	---	66	120	---
TOTAL	2090	1635	1898	2043	1676	1569	2382	2711	6209	3909	3024	1351
MEAN	67	55	61	66	60	51	79	88	207	126	98	45
AC-FT	4150	3240	3760	4050	3320	3110	4720	5380	12320	7750	6000	2680
MAX	86	73	64	82	63	68	200	293	478	399	1360	84
MIN	55	49	58	56	57	41	37	46	46	43	38	26

CAL YR 2001 TOTAL 64265 MEAN 176 MAX 927 MIN 41 AC-FT 127500  
WTR YR 2002 TOTAL 30497 MEAN 83.6 MAX 1360 MIN 26 AC-FT 60490

MAX DISCH: 3320 CFS AT 09:30 ON Aug. 29, 2002 GH 6.16 FT. SHIFT 0.01 FT.  
MAX GH: 6.16 FT. AT 09:30 ON Aug. 2, 2002  
FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



TRANSMOUNTAIN DIVERSION TO

ARKANSAS RIVER BASIN

09061500 COLUMBINE DITCH NEAR FREEMONT PASS, CO.

**LOCATION.**--Lat 39°22'25", long 106°13'38". Columbine ditch diverts water from tributaries of Eagle River in sec. 5, T.8 S., R. 79 W., in Colorado River basin to Chalk Creek (tributary to East Fork Arkansas River) in NW¼ sec. 9, T.8 S., R 79 W., in Arkansas River basin.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in a 30" diameter metal pipe shelter and well. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. Shaft encoder and chart are set to outside staff gage. Control is a 6-foot steel Parshall flume.

**REMARKS.**--Record is complete and reliable, except for the following: May 5-28, 2002 when ice affected the stage-discharge relationship. Record good, except for periods of ice affected record, which are poor. Station maintained and record developed by L.R. Schultz.

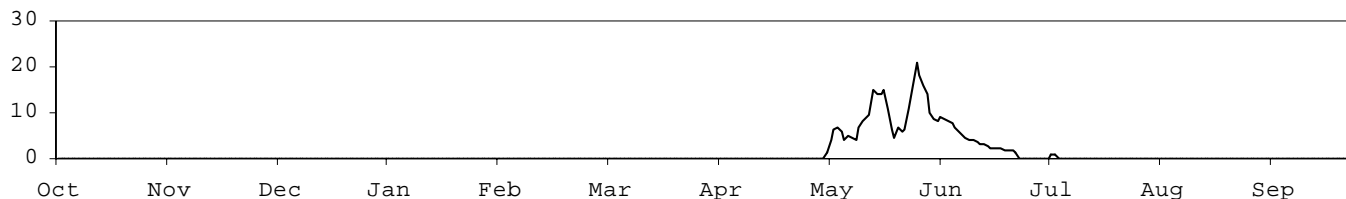
**RATING TABLE.**--COLDITCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	16	0	0	0
2	0	0	0	0	0	0	0	0	14	0	0	0
3	0	0	0	0	0	0	0	0	10	0	0	0
4	0	0	0	0	0	0	0	0	8.6	0	0	0
5	0	0	0	0	0	0	0	1.5	8.2	0	0	0
6	0	0	0	0	0	0	0	4.2	9	0	0	0
7	0	0	0	0	0	0	0	6.5	8.5	.82	0	0
8	0	0	0	0	0	0	0	6.8	8.4	.71	0	0
9	0	0	0	0	0	0	0	5.9	7.9	0	0	0
10	0	0	0	0	0	0	0	4.2	6.9	0	0	0
11	0	0	0	0	0	0	0	5.1	6.1	0	0	0
12	0	0	0	0	0	0	0	4.4	5.1	0	0	0
13	0	0	0	0	0	0	0	4.1	4.5	0	0	0
14	0	0	0	0	0	0	0	6.8	4.3	0	0	0
15	0	0	0	0	0	0	0	8.2	3.9	0	0	0
16	0	0	0	0	0	0	0	8.9	3.6	0	0	0
17	0	0	0	0	0	0	0	9.5	3.3	0	0	0
18	0	0	0	0	0	0	0	15	3	0	0	0
19	0	0	0	0	0	0	0	14	2.7	0	0	0
20	0	0	0	0	0	0	0	14	2.5	0	0	0
21	0	0	0	0	0	0	0	15	2.4	0	0	0
22	0	0	0	0	0	0	0	11	2.4	0	0	0
23	0	0	0	0	0	0	0	6.5	2.2	0	0	0
24	0	0	0	0	0	0	0	4.6	2	0	0	0
25	0	0	0	0	0	0	0	6.9	1.9	0	0	0
26	0	0	0	0	0	0	0	5.9	1.7	0	0	0
27	0	0	0	0	0	0	0	6.5	1.2	0	0	0
28	0	0	0	0	0	0	0	11	0	0	0	0
29	0	0	0	0	---	0	0	16	0	0	0	0
30	0	0	0	0	---	0	0	21	0	0	0	0
31	0	---	0	0	---	0	---	18	---	0	0	---
TOTAL	0	0	0	0	0	0	0	241.5	150.3	1.53	0	0
MEAN	0	0	0	0	0	0	0	7.79	5.01	.05	0	0
AC-FT	0	0	0	0	0	0	0	479	298	3	0	0
MAX	0	0	0	0	0	0	0	21	16	.82	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0
CAL YR 2001	TOTAL	901.83	MEAN	2.47	MAX	31	MIN	0	AC-FT	1790		
WTR YR 2002	TOTAL	393.33	MEAN	1.08	MAX	21	MIN	0	AC-FT	780		

MAX DISCH: 43.9 CFS AT 17:00 ON May. 30, 2002 GH 1.42 FT. SHIFT 0.04 FT.  
MAX GH: 1.42 FT. AT 17:00 ON May. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



TRANSMOUNTAIN DIVERSION TO  
ARKANSAS RIVER BASIN

09062000 EWING DITCH AT TENNESSEE PASS, CO

**LOCATION.**--Lat 39°21'40", long 106°18'22", diverts water from Piney Creek in sec. 11, T.8 S., R.80 W., in Eagle River basin, to Thayer Gulch (tributary to Tennessee Creek) in sec. 11, T. 8 S., R.80 W., in Arkansas River basin

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder, satellite-monitored data collection platform (DCP) and shaft encoder in a 30" diameter metal pipe shelter and well. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. Shaft encoder and chart are set to outside staff gage. Control is a 4-foot steel Parshall flume.

**REMARKS.**--Record is complete and reliable, except for the following days when the stage-discharge relationship was affected by ice in the flume: Oct. 6,10, 2001; Apr. 19, 21-23, 29,30; May 1-6,9, 13, 23, 25, 2002. Record fair. Station maintained and record developed by L.R. Schultz.

**RATING TABLE.**--STD04FTPF USED FROM 01-OCT-2001 TO 30-SEP-2002

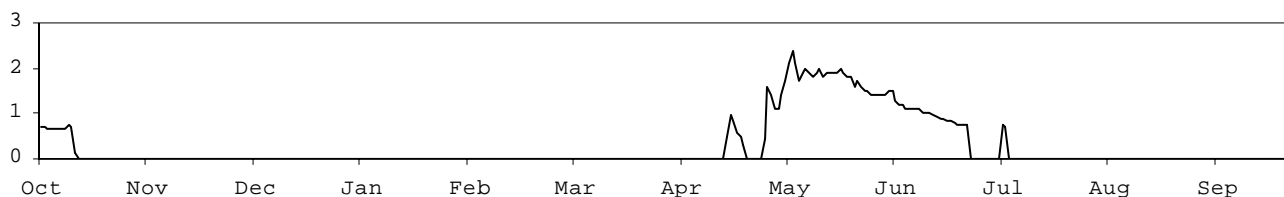
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.71	0	0	0	0	0	0	1.4	1.4	0	0	0
2	.69	0	0	0	0	0	0	1.1	1.4	0	0	0
3	.66	0	0	0	0	0	0	1.1	1.4	0	0	0
4	.65	0	0	0	0	0	0	1.4	1.5	0	0	0
5	.66	0	0	0	0	0	0	1.7	1.5	0	0	0
6	.67	0	0	0	0	0	0	2.1	1.3	0	0	0
7	.68	0	0	0	0	0	0	2.4	1.2	.75	0	0
8	.68	0	0	0	0	0	0	2.1	1.2	.72	0	0
9	.75	0	0	0	0	0	0	1.7	1.1	0	0	0
10	.72	0	0	0	0	0	0	1.9	1.1	0	0	0
11	.15	0	0	0	0	0	0	2	1.1	0	0	0
12	0	0	0	0	0	0	0	1.9	1.1	0	0	0
13	0	0	0	0	0	0	0	1.8	1.1	0	0	0
14	0	0	0	0	0	0	0	1.9	1	0	0	0
15	0	0	0	0	0	0	0	2	1	0	0	0
16	0	0	0	0	0	0	0	1.8	1	0	0	0
17	0	0	0	0	0	0	0	1.9	.97	0	0	0
18	0	0	0	0	0	0	.47	1.9	.92	0	0	0
19	0	0	0	0	0	0	.98	1.9	.89	0	0	0
20	0	0	0	0	0	0	.84	1.9	.88	0	0	0
21	0	0	0	0	0	0	.56	2	.86	0	0	0
22	0	0	0	0	0	0	.49	1.9	.86	0	0	0
23	0	0	0	0	0	0	.3	1.8	.81	0	0	0
24	0	0	0	0	0	0	0	1.8	.77	0	0	0
25	0	0	0	0	0	0	0	1.6	.76	0	0	0
26	0	0	0	0	0	0	0	1.7	.76	0	0	0
27	0	0	0	0	0	0	0	1.6	.77	0	0	0
28	0	0	0	0	0	0	0	1.5	0	0	0	0
29	0	0	0	0	---	0	.42	1.5	0	0	0	0
30	0	0	0	0	---	0	1.58	1.4	0	0	0	0
31	0	---	0	0	---	0	---	1.4	---	0	0	---
TOTAL	7.02	0	0	0	0	0	5.64	54.1	28.65	1.47	0	0
MEAN	.23	0	0	0	0	0	.19	1.8	.95	.05	0	0
AC-FT	14	0	0	0	0	0	11	107	57	2.9	0	0
MAX	.75	0	0	0	0	0	1.58	2.4	1.5	.75	0	0
MIN	0	0	0	0	0	0	0	1.1	0	0	0	0

CAL YR	2001	TOTAL	478.88	MEAN	1.31	MAX	9.9	MIN	0	AC-FT	950
WTR YR	2002	TOTAL	96.9	MEAN	.27	MAX	2.4	MIN	0	AC-FT	192

MAX DISCH: 3.62 CFS AT 17:30 ON May 7, 2002 GH 0.42 FT. SHIFT -0.03 FT.  
MAX GH: 0.42 FT. AT 17:30 ON May 7, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## ARKANSAS RIVER BASIN

09062500 WURTZ DITCH NEAR TENNESSEE PASS, CO

**LOCATION.**--Lat 39°21'15", long 106°21'09"; diverts water from tributaries of Eagle River in Colorado River basin to West Tennessee Creek (tributary to Tennessee Creek) in sec. 17, T.8 S., R.80 W., in Arkansas River basin.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in a 30" diameter metal pipe shelter and well. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. Shaft encoder and chart are set to outside staff gage. Control is a 6-foot steel Parshall flume.

**REMARKS.**--Record is complete and reliable, except for the following periods: April 23; May 25, 2002 when the stage was ice-affected. Record good, except for those periods of ice affected record, which are poor. Station maintained and record developed by L.R. Schultz.

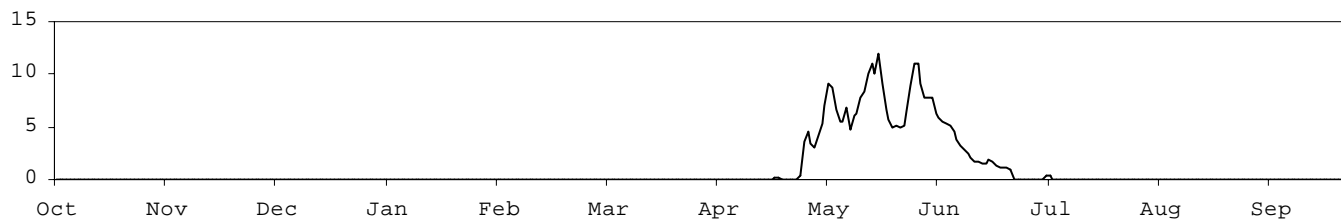
**RATING TABLE.**--WURDITCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	4.5	11	0	0	0
2	0	0	0	0	0	0	0	3.5	9.2	0	0	0
3	0	0	0	0	0	0	0	3.1	7.8	0	0	0
4	0	0	0	0	0	0	0	4.1	7.8	0	0	0
5	0	0	0	0	0	0	0	5.3	7.7	0	0	0
6	0	0	0	0	0	0	0	7.1	6.2	0	0	0
7	0	0	0	0	0	0	0	9.1	5.8	.43	0	0
8	0	0	0	0	0	0	0	8.7	5.5	.41	0	0
9	0	0	0	0	0	0	0	6.7	5.4	0	0	0
10	0	0	0	0	0	0	0	5.5	5.2	0	0	0
11	0	0	0	0	0	0	0	5.6	4.5	0	0	0
12	0	0	0	0	0	0	0	6.8	3.8	0	0	0
13	0	0	0	0	0	0	0	4.8	3.3	0	0	0
14	0	0	0	0	0	0	0	6	2.9	0	0	0
15	0	0	0	0	0	0	0	6.2	2.4	0	0	0
16	0	0	0	0	0	0	0	7.7	2	0	0	0
17	0	0	0	0	0	0	0	8.4	1.8	0	0	0
18	0	0	0	0	0	0	0	10	1.7	0	0	0
19	0	0	0	0	0	0	0	11	1.5	0	0	0
20	0	0	0	0	0	0	0	10	1.6	0	0	0
21	0	0	0	0	0	0	0	12	1.9	0	0	0
22	0	0	0	0	0	0	.16	9.1	1.7	0	0	0
23	0	0	0	0	0	0	.2	6.7	1.4	0	0	0
24	0	0	0	0	0	0	0	5.7	1.2	0	0	0
25	0	0	0	0	0	0	0	4.9	1.2	0	0	0
26	0	0	0	0	0	0	0	5.1	1.1	0	0	0
27	0	0	0	0	0	0	0	4.9	.94	0	0	0
28	0	0	0	0	0	0	0	5.2	.02	0	0	0
29	0	0	0	0	---	0	.41	6.5	0	0	0	0
30	0	0	0	0	---	0	3.7	9	0	0	0	0
31	0	---	0	0	---	0	---	11	---	0	0	---
TOTAL	0	0	0	0	0	0	4.47	214.2	106.56	.84	0	0
MEAN	0	0	0	0	0	0	.15	6.9	3.55	.03	0	0
AC-FT	0	0	0	0	0	0	8.9	425	211	1.7	0	0
MAX	0	0	0	0	0	0	3.7	12	11	.43	0	0
MIN	0	0	0	0	0	0	0	3.1	0	0	0	0
CAL YR 2001	TOTAL	1124.65	MEAN	3.08	MAX	39	MIN	0	AC-FT	2230		
WTR YR 2002	TOTAL	326.07	MEAN	.89	MAX	12	MIN	0	AC-FT	647		

MAX DISCH: 16.5 CFS AT 21:00 ON May 18, 2002 GH 0.74 FT. SHIFT 0.05 FT.  
MAX GH: 0.74 FT. AT 21:00 ON May 18, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



TRANSMOUNTAIN DIVERSION TO  
 ARKANSAS RIVER BASIN

WURTZ DITCH EXTENSION NEAR LEADVILLE, CO AT TENNESSEE PASS

LOCATION.--Lat 39°23'41", long 106°21'10", sec. 32, T.7 S., R.80 W., Eagle County.

DRAINAGE AREA.--N/A

GAGE.--Graphic water-stage recorder, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in a 30" diameter metal pipe shelter and well. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. Shaft encoder and chart are set to outside staff gage. Control is a 6-foot steel Parshall flume.

REMARKS.--Record is complete and reliable except for the following periods: May 24-26, 2002 due to ice affected flow in the flume. Record good, except that for estimated days, which is poor. Station maintained and record developed by L.R. Schultz.

RATING TABLE.--WUREXDCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

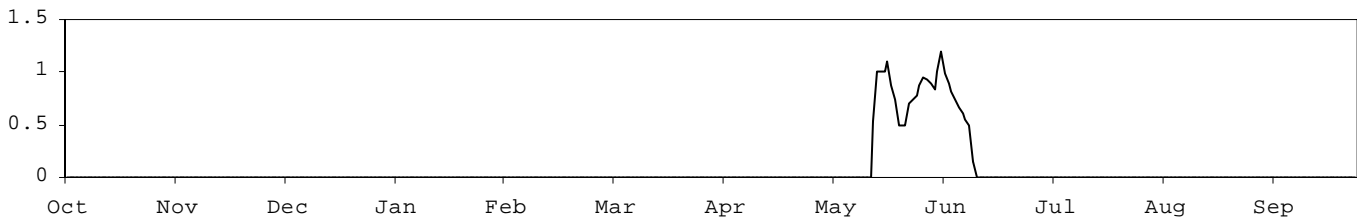
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
 MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	.93	0	0	0
2	0	0	0	0	0	0	0	0	.9	0	0	0
3	0	0	0	0	0	0	0	0	.84	0	0	0
4	0	0	0	0	0	0	0	0	1	0	0	0
5	0	0	0	0	0	0	0	0	1.2	0	0	0
6	0	0	0	0	0	0	0	0	.98	0	0	0
7	0	0	0	0	0	0	0	0	.9	0	0	0
8	0	0	0	0	0	0	0	0	.82	0	0	0
9	0	0	0	0	0	0	0	0	.74	0	0	0
10	0	0	0	0	0	0	0	0	.66	0	0	0
11	0	0	0	0	0	0	0	0	.61	0	0	0
12	0	0	0	0	0	0	0	0	.55	0	0	0
13	0	0	0	0	0	0	0	0	.49	0	0	0
14	0	0	0	0	0	0	0	0	.16	0	0	0
15	0	0	0	0	0	0	0	0	0	0	0	0
16	0	0	0	0	0	0	0	0	0	0	0	0
17	0	0	0	0	0	0	0	.53	0	0	0	0
18	0	0	0	0	0	0	0	1	0	0	0	0
19	0	0	0	0	0	0	0	1	0	0	0	0
20	0	0	0	0	0	0	0	1	0	0	0	0
21	0	0	0	0	0	0	0	1.1	0	0	0	0
22	0	0	0	0	0	0	0	.88	0	0	0	0
23	0	0	0	0	0	0	0	.75	0	0	0	0
24	0	0	0	0	0	0	0	.5	0	0	0	0
25	0	0	0	0	0	0	0	.5	0	0	0	0
26	0	0	0	0	0	0	0	.5	0	0	0	0
27	0	0	0	0	0	0	0	.71	0	0	0	0
28	0	0	0	0	0	0	0	.74	0	0	0	0
29	0	0	0	0	---	0	0	.78	0	0	0	0
30	0	0	0	0	---	0	0	.87	0	0	0	0
31	0	---	0	0	---	0	---	.94	---	0	0	---
TOTAL	0	0	0	0	0	0	0	11.8	10.78	0	0	0
MEAN	0	0	0	0	0	0	0	.38	.36	0	0	0
AC-FT	0	0	0	0	0	0	0	23	21	0	0	0
MAX	0	0	0	0	0	0	0	1.1	1.2	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0

CAL YR	2001	TOTAL	228.59	MEAN	0.63	MAX	9.1	MIN	0	AC-FT	453
WTR YR	2002	TOTAL	22.58	MEAN	.062	MAX	1.2	MIN	0	AC-FT	45

MAX DISCH: 1.99 CFS AT 13:15 ON Jun. 5, 2002 GH 0.22 FT. SHIFT -0.01 FT.  
 MAX GH: 0.22 FT. AT 13:15 ON Jun. 5, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





TRANSMOUNTAIN DIVERSION TO

ARKANSAS RIVER BASIN

09063700 HOMESTAKE TUNNEL NEAR GOLD PARK, CO

LOCATION.--Lat 39°16'52", long 106°25'56"; Homestake tunnel diverts water from Homestake Lake, in sec. 17, T. 8 S., R. 81 W., in Eagle River basin, to Lake Fork Creek in Arkansas River basin.

GAGE.--Graphic water-stage recorder, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in a 4' x 4' wood shelter and concrete well. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. Shaft encoder and chart are set to inside staff gage. Control is a 12-foot concrete Parshall flume.

REMARKS.--Record is complete and reliable. Record good. Station maintained and records developed by L.R. Schultz.

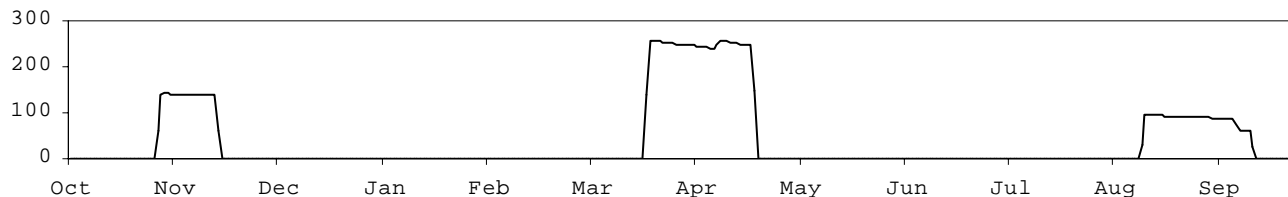
RATING TABLE.--HOMTUNCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	141	0	0	0	0	248	0	0	0	0	91
2	0	141	0	0	0	0	247	0	0	0	0	90
3	0	141	0	0	0	0	246	0	0	0	0	90
4	0	140	0	0	0	0	246	0	0	0	0	90
5	0	140	0	0	0	0	244	0	0	0	0	89
6	0	140	0	0	0	0	243	0	0	0	0	85
7	0	140	0	0	0	0	243	0	0	0	0	85
8	0	140	0	0	0	0	242	0	0	0	0	85
9	0	141	0	0	0	0	240	0	0	0	0	85
10	0	141	0	0	0	0	239	0	0	0	0	85
11	0	140	0	0	0	0	250	0	0	0	0	85
12	0	141	0	0	0	0	257	0	0	0	0	72
13	0	141	0	0	0	0	256	0	0	0	0	63
14	0	60	0	0	0	0	255	0	0	0	0	63
15	0	0	0	0	0	0	253	0	0	0	30	63
16	0	0	0	0	0	0	252	0	0	0	94	63
17	0	0	0	0	0	0	251	0	0	0	94	26
18	0	0	0	0	0	0	250	0	0	0	94	0
19	0	0	0	0	0	0	249	0	0	0	94	0
20	0	0	0	0	0	0	247	0	0	0	94	0
21	0	0	0	0	0	140	246	0	0	0	94	0
22	0	0	0	0	0	257	150	0	0	0	93	0
23	0	0	0	0	0	257	0	0	0	0	92	0
24	0	0	0	0	0	256	0	0	0	0	92	0
25	0	0	0	0	0	256	0	0	0	0	92	0
26	0	0	0	0	0	254	0	0	0	0	91	0
27	63	0	0	0	0	253	0	0	0	0	91	0
28	141	0	0	0	0	252	0	0	0	0	91	0
29	142	0	0	0	---	251	0	0	0	0	91	0
30	142	0	0	0	---	250	0	0	0	0	91	0
31	141	---	0	0	---	250	---	0	---	0	91	---
TOTAL	629	1887	0	0	0	2676	5354	0	0	0	1509	1310
MEAN	20.3	62.9	0	0	0	86.3	178	0	0	0	48.7	43.7
AC-FT	1250	3740	0	0	0	5310	10620	0	0	0	2990	2600
MAX	142	141	0	0	0	257	257	0	0	0	94	91
MIN	0	0	0	0	0	0	0	0	0	0	0	0
CAL YR 2001	TOTAL	20548	MEAN	56.3	MAX	307	MIN	0	AC-FT	40760		
WTR YR 2002	TOTAL	13365	MEAN	36.6	MAX	257	MIN	0	AC-FT	26510		

MAX DISCH: 283 CFS AT 17:00 ON Aug. 15, 2002 GH 3.00 FT. SHIFT 0.08 FT.  
MAX GH: 3.00 FT. AT 17:00 ON Aug. 15, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



TRANSMOUNTAIN DIVERSION TO

ARKANSAS RIVER BASIN

09077160 BOUSTEAD TUNNEL AT EAST PORTAL NEAR LEADVILLE, CO

**LOCATION.**--Lat 39°16'40", long 106°25'40"; Charles H. Boustead Tunnel diverts water from the main stem and tributaries of Fryingpan River in Colorado River basin, to Lake Fork in sec. 10, T. 9 S., R. 81 W., in Arkansas River basin.

**GAGE.**--Graphic water-stage recorder with satellite-monitored data collection platform (Sutron 8210 high data rate DCP) and shaft encoder in a 5'x 5' concrete shelter. Primary record is DCP log file with satellite-monitored data and chart record serving as backup. Shaft encoder and chart are set to inside drop tape and RP with an outside staff gage in the flume used as a supplemental reference gage. Control is a 15-foot concrete Parshall flume.

**REMARKS.**--Record is complete and reliable except for the following period: May 8, 2002, when both the DCP and the chart recorder were malfunctioning. Record fair. Additional measurements are needed at high flows to verify shift distribution. At medium flow, slick moss on the flume floor makes wading measurements extremely dangerous. Station maintained and records developed by L.R.Schultz.

**RATING TABLE.**--BOUTUNCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

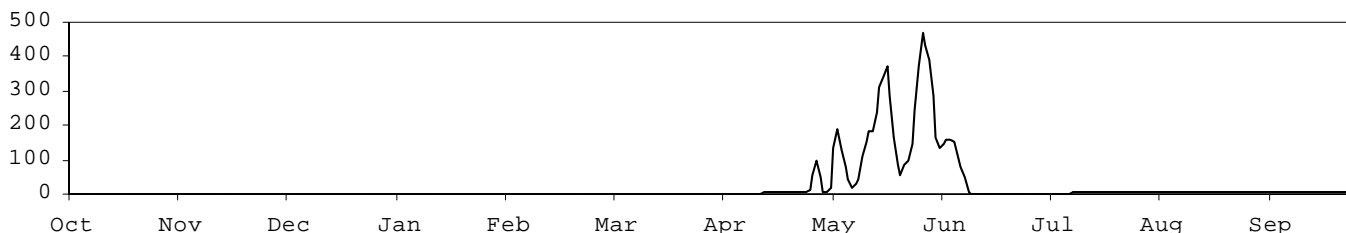
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	2.8	2.2	2.2	2.2	2.2	2.5	2.2	95	434	2.5	3.7	3.7
2	2.8	2.2	2.2	2.2	2.2	2.5	2.2	47	390	2.5	3.9	3.7
3	2.8	2.2	2.2	2.2	2.2	2.5	2.2	7.8	287	2.6	3.9	3.6
4	2.8	2.2	2.3	2.2	2.2	2.5	2.2	4.7	166	2.7	3.8	3.5
5	2.8	2.2	2.5	2.2	2.2	2.5	2.2	21	133	2.8	3.8	3.6
6	2.8	2.2	2.5	2.2	2.2	2.6	2.3	136	145	2.8	3.8	3.7
7	2.8	2.2	2.4	2.2	2.2	2.8	2.4	191	157	2.8	3.9	3.5
8	2.8	2.2	2.3	2.2	2.2	2.8	2.5	126	158	2.8	3.8	3.6
9	2.8	2.2	2.2	2.4	2.2	2.5	2.5	81	154	2.8	3.7	3.4
10	2.7	2.2	2.2	2.5	2.2	2.5	2.5	43	129	2.8	3.8	3.6
11	2.5	2.2	2.2	2.5	2.2	2.6	2.5	16	77	2.8	4.1	3.5
12	2.5	2.2	2.2	2.5	2.2	2.5	2.6	32	46	2.9	4.1	3.7
13	2.5	2.2	2.2	2.5	2.2	2.5	2.6	40	3.3	3.1	4.1	3.7
14	2.5	2.2	2.2	2.5	2.2	2.5	2.8	107	2.5	3.1	4.1	3.7
15	2.5	2.2	2.2	2.5	2.2	2.5	2.8	151	2.5	3.1	4.1	3.7
16	2.5	2.2	2.2	2.5	2.2	2.5	4.1	180	2.5	3.1	4.1	3.7
17	2.5	2.2	2.2	2.5	2.2	2.6	4.5	180	2.5	3.1	4.1	3.7
18	2.5	2.2	2.2	2.5	2.2	2.5	5.7	236	2.5	3.1	4.1	3.7
19	2.5	2.2	2.2	2.5	2.2	2.5	6.1	309	2.5	3.1	4.1	3.9
20	2.2	2.2	2.2	2.5	2.2	2.5	5.6	344	2.5	3.2	4	4.1
21	2.2	2.2	2.2	2.5	2.2	2.5	3.3	374	2.5	3.4	3.7	4.1
22	2.2	2.2	2.2	2.5	2.3	2.5	4.9	286	2.5	3.4	3.7	4.1
23	2.2	2.2	2.2	2.5	2.5	2.5	3.4	164	2.5	3.4	3.7	4.1
24	2.2	2.2	2.2	2.5	2.5	2.5	3.4	84	2.5	3.4	3.7	4.1
25	2.2	2.2	2.2	2.4	2.5	2.5	3.4	56	2.5	3.4	3.7	4.1
26	2.2	2.2	2.2	2.2	2.5	2.5	3.4	84	2.5	3.4	3.7	4.1
27	2.2	2.2	2.2	2.2	2.5	2.5	3.4	95	2.5	3.5	3.7	4.1
28	2.2	2.2	2.2	2.2	2.5	2.5	3.4	145	2.5	3.7	3.7	4.1
29	2.2	2.2	2.2	2.2	---	2.5	11	244	2.5	3.7	3.7	4.1
30	2.2	2.2	2.2	2.2	---	2.5	55	373	2.5	3.7	3.7	4.1
31	2.2	---	2.2	2.2	---	2.4	---	468	---	3.7	3.6	---
TOTAL	76.8	66	69.2	73.1	63.5	78.3	157.1	4720.5	2321.8	96.4	119.6	114.3
MEAN	2.5	2.2	2.2	2.4	2.3	2.5	5.2	152	77.4	3.1	3.9	3.8
AC-FT	152	131	137	145	126	155	312	9360	4610	191	237	227
MAX	2.8	2.2	2.5	2.5	2.5	2.8	55	468	434	3.7	4.1	4.1
MIN	2.2	2.2	2.2	2.2	2.2	2.4	2.2	4.7	2.5	2.5	3.6	3.4

CAL YR	2001	TOTAL	25458.3	MEAN	69.8	MAX	803	MIN	2.2	AC-FT	50500
WTR YR	2002	TOTAL	7956.6	MEAN	21.8	MAX	468	MIN	2.2	AC-FT	15780

MAX DISCH: 660 CFS AT 22:00 ON May. 30, 2002 GH 4.37 FT. SHIFT 0.21 FT.  
MAX GH: 4.37 FT. AT 22:00 ON May. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



TRANSMOUNTAIN DIVERSION TO

ARKANSAS RIVER BASIN

09077500 BUSK-IVANHOE TUNNEL AT EAST PORTAL NEAR MALTA, CO

**LOCATION.**--Lat 39°14'55", long 106°28'14"; Water diverted from Ivanhoe Lake, tributary to Fryingpan River in sec. 13, T. 9 S., R. 82 W., in Roaring Fork River basin, to Busk Creek (tributary to Lake Fork) in sec. 20, T. 9 S., R. 81 W., in Arkansas River basin.

**GAGE.**--Graphic water-stage recorder, satellite-monitored data collection platform (8004 DCP) and shaft encoder in a 3'x3' metal and wood shelter. Satellite monitored DCP is the primary source of stage data with chart record used for backup. Shaft encoder and chart are set to outside staff gage in the flume. Control is an 8-foot steel Parshall flume.

**REMARKS.**--Record is complete and reliable. Record good. Station maintained and records developed by L.R.Schultz.

**RATING TABLE.**--BUSTUNCO02 USED FROM 01-OCT-2001 TO 30-SEP-2002

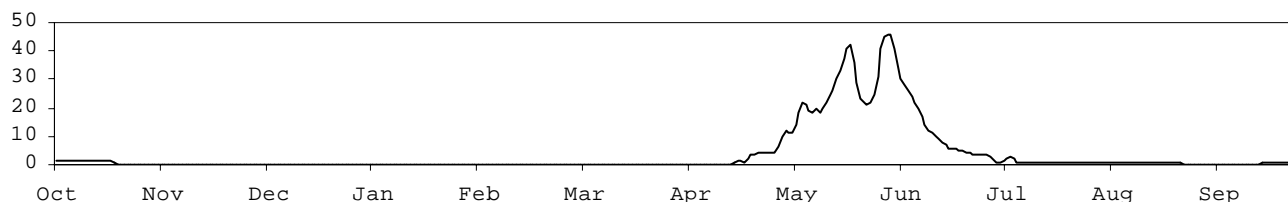
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1.4	0	0	0	0	0	0	6.6	45	3.2	.79	.35
2	1.4	0	0	0	0	0	0	9.6	46	3	.79	.35
3	1.4	0	0	0	0	0	0	12	46	2.3	.79	.35
4	1.4	0	0	0	0	0	0	11	41	.92	.79	.35
5	1.3	0	0	0	0	0	0	11	34	.94	.71	.35
6	1.3	0	0	0	0	0	0	14	30	1.1	.68	.35
7	1.2	0	0	0	0	0	0	18	28	1.9	.67	.35
8	1.2	0	0	0	0	0	0	22	26	3	.67	.35
9	1.3	0	0	0	0	0	0	21	24	2.3	.67	.35
10	1.3	0	0	0	0	0	0	19	22	.99	.67	.35
11	1.3	0	0	0	0	0	0	18	20	.67	.67	.35
12	1.3	0	0	0	0	0	0	20	17	.67	.67	.35
13	1.4	0	0	0	0	0	0	18	14	.67	.67	.35
14	1.4	0	0	0	0	0	0	20	12	.67	.67	.35
15	1.3	0	0	0	0	0	0	22	11	.67	.61	.35
16	1.2	0	0	0	0	0	0	25	10	.69	.55	.35
17	1.2	0	0	0	0	0	0	26	9	.73	.55	.35
18	.4	0	0	0	0	0	1	30	7.9	.79	.55	.35
19	0	0	0	0	0	0	1.2	33	6.7	.79	.55	.35
20	0	0	0	0	0	0	1.1	37	5.7	.79	.45	.36
21	0	0	0	0	0	0	1	41	5.6	.8	.45	.38
22	0	0	0	0	0	0	2	42	5.3	.79	.45	.45
23	0	0	0	0	0	0	3.3	36	5.1	.79	.45	.45
24	0	0	0	0	0	0	3.6	29	4.6	.79	.45	.45
25	0	0	0	0	0	0	4	23	4.4	.79	.45	.41
26	0	0	0	0	0	0	4.1	22	4.1	.89	.45	.45
27	0	0	0	0	0	0	4.1	21	3.8	.91	.41	.45
28	0	0	0	0	0	0	4.1	22	3.7	.91	.35	.45
29	0	0	0	0	---	0	4.1	25	3.5	.81	.35	1
30	0	0	0	0	---	0	4.5	31	3.4	.79	.35	1.7
31	0	---	0	0	---	0	---	41	---	.79	.35	---
TOTAL	22.7	0	0	0	0	0	38.1	726.2	498.8	35.85	17.68	13.2
MEAN	.73	0	0	0	0	0	1.27	23.4	16.6	1.16	.57	.44
AC-FT	45	0	0	0	0	0	76	1440	989	71	35	26
MAX	1.4	0	0	0	0	0	4.5	42	46	3.2	.79	1.7
MIN	0	0	0	0	0	0	0	6.6	3.4	.67	.35	.35

CAL YR 2001	TOTAL	2678.7	MEAN	7.34	MAX	63	MIN	0	AC-FT	5310
WTR YR 2002	TOTAL	1352.53	MEAN	3.71	MAX	46	MIN	0	AC-FT	2680

MAX DISCH: 47 CFS AT 13:00 ON June 2, 2002 GH 1.23 FT. SHIFT 0.04 FT.  
MAX GH: 1.23 FT. AT 13:00 ON June 2, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



TRANSMOUNTAIN DIVERSION TO

ARKANSAS RIVER BASIN

09073000 TWIN LAKES TUNNEL AT EAST PORTAL NEAR TWIN LAKES, CO

LOCATION.--Lat 39°04'56", long 106°32'24"; diverts water from tributaries of Roaring Fork River in Colorado River Basin to North Fork Lake Creek in sec. 22, T.11 S., R.82 W., in Arkansas River basin.

DRAINAGE AREA.--N/A

GAGE.--Graphic water-stage recorder, satellite-monitored data collection platform (Sutron 8004 DCP) and shaft encoder in a 5' x 5' concrete shelter and well. Primary record is satellite-monitored data with the graphic chart recorder used for backup purposes. Shaft encoder and chart are set to outside staff gage. Control is a 12-foot concrete Parshall flume. A high data rate Sutron 8210 DCP was installed on June 17, 2002.

REMARKS.--Record is complete and reliable, except for the following periods: Nov. 28-30, 2001, when the well was frozen, Mar. 25-27; June 7-10, 2002, when both DCP & chart recorder were malfunctioning Record fair. Additional high flow measurements are needed to better define shifts to the rating at higher stages and eventually a new rating for the flume. The standard Parshall flume rating only applies at stages less than about 1.7 feet. Station maintained and records developed by L.R. Schultz.

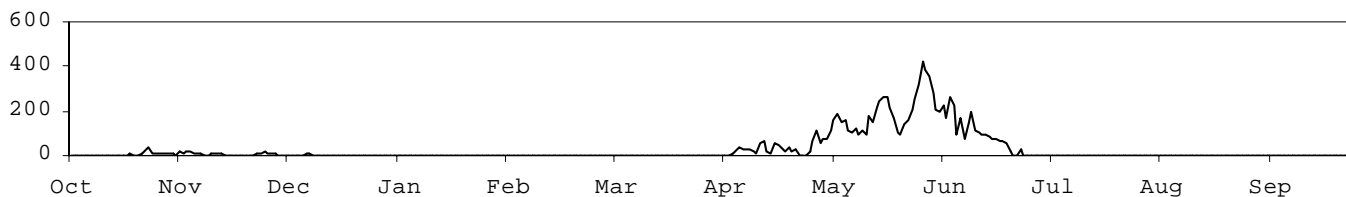
RATING TABLE.--STD12FTPF USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1.4	15	1.2	3.8	2	2	2	111	388	.39	.27	.24
2	1.4	9.1	1.2	3.8	2.1	2	2	58	354	.39	.3	.24
3	1.3	16	1.2	3.8	2.3	2	2	79	282	.39	.3	.27
4	1.2	20	1.2	3.8	2.2	2	2	79	209	.39	.27	.26
5	1.2	7.8	1.2	2.5	2.2	2	2.2	111	194	.97	.27	.29
6	1.2	8.5	1.2	1.2	2.2	2.1	3.9	155	227	.7	.27	.27
7	1.2	10	5.8	1.2	2.2	2.2	14	190	165	.39	.25	.25
8	1.2	.99	8.3	1.2	2.2	2.1	17	153	265	.39	.25	.25
9	1.2	3.8	4.2	1.4	2.2	2	33	162	225	.32	.27	.25
10	1.2	13	4.2	1.4	2.2	2	25	109	95	.27	.27	.24
11	1	13	4.2	1.4	2	2	31	99	171	.27	.25	.25
12	.52	13	4.2	1.4	1.7	2	30	125	78	.39	.25	.24
13	.52	4.8	4.2	1.4	1.8	2	20	94	152	.52	.24	.56
14	.52	.99	4.2	1.4	1.8	2	9.8	113	193	.49	.25	.66
15	.52	.99	4.2	1.5	1.8	2	53	97	110	.47	.25	.66
16	.52	1	4.2	1.6	1.8	2	64	180	99	.47	.25	.66
17	.65	1.2	4.2	1.6	1.8	2	19	152	97	.39	.26	.66
18	7.8	1.2	4.2	1.6	1.8	2	9.7	212	90	.39	.31	.66
19	1.2	1.2	4.1	1.6	1.8	2	52	241	83	.32	.32	.69
20	1.2	1.2	4.2	1.6	1.8	1.9	50	264	77	.3	.28	.77
21	11	1.2	4.2	1.7	1.8	1.8	35	267	71	.28	.28	.77
22	18	1.2	4.1	1.8	1.8	1.8	22	212	70	.27	.25	.66
23	37	5.1	4.1	1.8	1.8	1.8	35	168	64	.27	.24	.66
24	8.1	10	4	1.8	1.8	1.8	16	105	58	.27	.25	.66
25	12	16	4	1.8	1.8	1.8	26	98	22	.27	.24	.64
26	7.8	13	3.8	1.8	1.8	1.8	1.6	143	.56	.3	.23	.6
27	14	14	3.8	1.8	1.9	2	1.4	159	2.3	.33	.24	.6
28	13	9.5	3.8	2	2	2	1.3	206	27	.34	.24	.63
29	9.7	1.4	3.8	2	---	2	19	253	.87	.27	.24	.75
30	9.5	1.4	3.8	2	---	2	63	315	.39	.27	.24	.59
31	4	---	3.8	2	---	2	---	419	---	.27	.25	---
TOTAL	171.05	215.57	114.8	59.7	54.6	61.1	661.9	5129	3870.12	11.75	8.08	14.93
MEAN	5.52	7.19	3.7	1.9	2	2	22.1	165	129	.38	.26	.5
AC-FT	339	428	228	118	108	121	1310	10170	7680	23	16	30
MAX	37	20	8.3	3.8	2.3	2.2	64	419	388	.97	.32	.77
MIN	.52	.99	1.2	1.2	1.7	1.8	1.3	58	.39	.27	.23	.24

CAL YR 2001 TOTAL 23150.8 MEAN 63.4 MAX 0 MIN 0 AC-FT 45920  
WTR YR 2002 TOTAL 10372.6 MEAN 28.4 MAX 419 MIN .23 AC-FT 20570

MAX DISCH: 546 CFS AT 00:45 ON May 31, 2002 GH 4.57 FT. SHIFT 0.08 FT.  
MAX GH: 4.57 FT. AT 00:45 ON May 31, 2002  
FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## ARKANSAS RIVER BASIN

09115000 LARKSPUR DITCH NEAR MARSHALL PASS, CO

**LOCATION.**--Lat 38°23'00", long 106°15'00", diverts water from tributaries of Tomichi Creek between headgates (in sec. 11, T.48 N., R.6 E., and sec. 1, T.47 N., R.6 E.), and Marshall Pass, in Gunnison River basin, to Poncha Creek (tributary to South Arkansas River) in SE¼ sec. 24, T.48 N., R.6 E., in Arkansas River basin.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder (F-type), satellite-monitored data collection platform (8004 DCP) and shaft encoder in a 30"x 24" metal shelter and well. Primary record is satellite-monitored data with the chart recorder used for backup purposes. Shaft encoder and chart are set to outside staff gage. Control is a 2-foot steel Parshall flume, installed early in the 2002 Water Year.

**REMARKS.**--Due to the severe drought, the ditch was out of priority for the entire water year, and therefore, no water was taken. Station maintained and record developed by L.R. Schultz.

**RATING TABLE.**--STD04FTPF USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	0	0	0	0
2	0	0	0	0	0	0	0	0	0	0	0	0
3	0	0	0	0	0	0	0	0	0	0	0	0
4	0	0	0	0	0	0	0	0	0	0	0	0
5	0	0	0	0	0	0	0	0	0	0	0	0
6	0	0	0	0	0	0	0	0	0	0	0	0
7	0	0	0	0	0	0	0	0	0	0	0	0
8	0	0	0	0	0	0	0	0	0	0	0	0
9	0	0	0	0	0	0	0	0	0	0	0	0
10	0	0	0	0	0	0	0	0	0	0	0	0
11	0	0	0	0	0	0	0	0	0	0	0	0
12	0	0	0	0	0	0	0	0	0	0	0	0
13	0	0	0	0	0	0	0	0	0	0	0	0
14	0	0	0	0	0	0	0	0	0	0	0	0
15	0	0	0	0	0	0	0	0	0	0	0	0
16	0	0	0	0	0	0	0	0	0	0	0	0
17	0	0	0	0	0	0	0	0	0	0	0	0
18	0	0	0	0	0	0	0	0	0	0	0	0
19	0	0	0	0	0	0	0	0	0	0	0	0
20	0	0	0	0	0	0	0	0	0	0	0	0
21	0	0	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0	0	0
23	0	0	0	0	0	0	0	0	0	0	0	0
24	0	0	0	0	0	0	0	0	0	0	0	0
25	0	0	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0	0	0
27	0	0	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0	0	0
29	0	0	0	0	---	0	0	0	0	0	0	0
30	0	0	0	0	---	0	0	0	0	0	0	0
31	0	---	0	0	---	0	---	0	---	0	0	---
TOTAL	0	0	0	0	0	0	0	0	0	0	0	0
MEAN	0	0	0	0	0	0	0	0	0	0	0	0
AC-FT	0	0	0	0	0	0	0	0	0	0	0	0
MAX	0	0	0	0	0	0	0	0	0	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0
CAL YR 2001	TOTAL		0	MEAN		0	MAX		0	MIN		0
WTR YR 2002	TOTAL		0	MEAN		0	MAX		0	MIN		0
AC-FT												

MAX DISCH: 0 CFS

MAX GH: 0 FT.

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.

RIO GRANDE BASIN

08213500 RIO GRANDE AT THIRTYMILE BRIDGE, NEAR CREEDE, CO

**LOCATION.**--Lat 37°43'30", long 107°15'18", in NE¼ sec. 13, T.40 N., R.4 W., Hinsdale County, Hydrologic Unit 13010001, on right bank 70 ft downstream from bridge, 500 ft upstream from Squaw Creek, 0.7 mi downstream from Rio Grande Reservoir, and 20 mi southwest of Creede.

**DRAINAGE AREA AND PERIOD OF RECORD.**--163 mi<sup>2</sup>. June 1909 to Sep. 1923, May 1925 to current year. No winter records 1910, 1926. Monthly data only for some periods.

**GAGE.**--Water-stage recorder with satellite telemetry in a timber shelter and metal well. Elevation of gage is 9,300 ft above National Geodetic Vertical Datum of 1929.

**REMARKS.**--Record is complete and reliable except for Nov. 1, 2001 to April 1,2002, when the station was closed for the winter, Oct. 31, 2001 and April 2, July 14, 15, August 12 - 21, 29 - 31, Sept. 1, 2, 2002, when the station was isolated for periods during the day. Record good except for periods of no gage-height record, which are fair to poor. Station maintained and record developed by Div. III Hydrographic Staff.

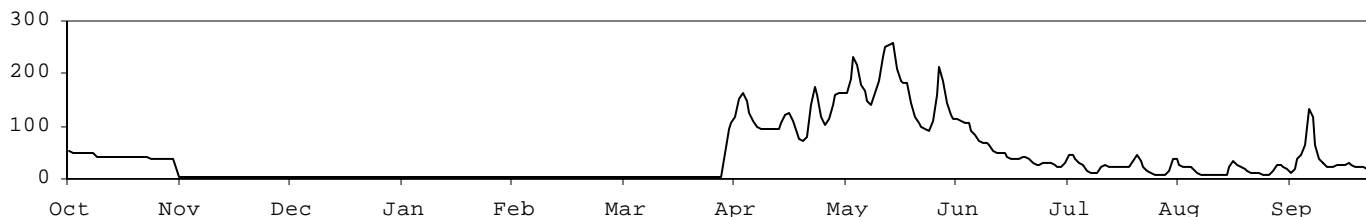
**RATING TABLE.**--RIOMILCO12 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	52	2.1	2.3	2.6	2.8	3.1	3.3	113	214	29	8	7.7
2	51	2.1	2.3	2.6	2.8	3.1	50	139	186	30	8	17
3	50	2.1	2.3	2.6	2.9	3.1	94	160	145	26	8	27
4	50	2.1	2.3	2.6	2.9	3.1	106	164	122	24	17	26
5	50	2.1	2.3	2.6	2.9	3.1	119	165	115	24	39	23
6	50	2.1	2.4	2.6	2.9	3.1	151	165	115	30	39	18
7	50	2.1	2.4	2.6	2.9	3.1	162	191	110	45	28	10
8	48	2.1	2.4	2.6	2.9	3.1	147	232	108	47	24	19
9	40	2.1	2.4	2.6	2.9	3.1	124	215	105	37	24	37
10	40	2.1	2.4	2.7	2.9	3.2	110	179	92	32	22	46
11	40	2.1	2.4	2.7	2.9	3.2	100	167	84	26	15	66
12	40	2.1	2.4	2.7	2.9	3.2	95	149	74	16	9.7	134
13	40	2.2	2.4	2.7	2.9	3.2	95	140	67	13	7.7	116
14	40	2.2	2.4	2.7	2.9	3.2	95	163	67	9.8	7.7	63
15	40	2.2	2.4	2.7	3	3.2	95	187	65	12	7.7	37
16	40	2.2	2.4	2.7	3	3.2	95	232	55	24	7.7	29
17	40	2.2	2.4	2.7	3	3.2	95	249	50	27	7.7	24
18	40	2.2	2.5	2.7	3	3.2	106	255	50	23	7.7	23
19	40	2.2	2.5	2.7	3	3.2	121	258	50	23	7.7	23
20	40	2.2	2.5	2.7	3	3.2	126	207	43	23	7.7	25
21	40	2.2	2.5	2.7	3	3.3	112	185	39	23	24	26
22	40	2.2	2.5	2.8	3	3.3	87	184	39	23	34	28
23	40	2.2	2.5	2.8	3	3.3	75	182	39	23	27	30
24	39	2.3	2.5	2.8	3	3.3	71	144	41	23	21	26
25	37	2.3	2.5	2.8	3	3.3	81	119	42	34	20	24
26	37	2.3	2.5	2.8	3.1	3.3	139	105	39	46	15	22
27	37	2.3	2.5	2.8	3.1	3.3	173	99	31	36	13	21
28	37	2.3	2.5	2.8	3.1	3.3	158	95	28	24	12	20
29	37	2.3	2.6	2.8	---	3.3	116	92	28	16	9.5	26
30	37	2.3	2.6	2.8	---	3.3	104	111	29	12	7.7	59
31	15	---	2.6	2.8	---	3.3	---	161	---	9.4	7.7	---
TOTAL	1277	65.5	75.6	83.8	82.7	99.4	3205.3	5207	2272	790.2	494.2	1052.7
MEAN	41	2.2	2.4	2.7	3	3.2	107	168	76	25.5	15.9	35.1
AC-FT	2530	130	150	166	164	197	6360	10330	4510	1570	980	2090
MAX	52	2.3	2.6	2.8	3.1	3.3	173	258	214	47	39	134
MIN	15	2.1	2.3	2.6	2.8	3.1	3.3	92	28	9.4	7.7	7.7
CAL YR 2001	TOTAL	81389.9	MEAN	223	MAX	1700	MIN	2.1	AC-FT	161400		
WTR YR 2002	TOTAL	14705.4	MEAN	40.3	MAX	258	MIN	2.1	AC-FT	29170		

MAX DISCH: 262 CFS AT 07:45 ON May. 18, 2002 GH 2.19 FT. SHIFT -0.07 FT.  
MAX GH: 2.19 FT. AT 07:45 ON May. 18, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08214500 NORTH CLEAR CREEK BELOW CONTINENTAL RESERVOIR, CO

**LOCATION.**--Lat 37°53'18", long 107°12'10", in NE¼SE¼ sec. 21, T.42 N., R.3 W., Hinsdale County, Hydrologic Unit 13010001, on left bank 100 ft downstream from bridge, 1,000 ft downstream from Continental Reservoir, and 15 mi west of Creede.

**DRAINAGE AREA.**--51.7 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder and a Sutron satellite monitoring system in a 4 ft. by 4 ft. timber shelter and concrete well at a concrete trapezoidal section until August 15, 2002, when a concrete ramp flume was constructed at the downstream end of the concrete section. Elevation of gage is 10,200 ft above National Geodetic Vertical Datum of 1929.

**REMARKS.**--Record is complete and reliable except for Nov. 1, 2001 through April 1, 2002, when the station was closed for the winter; and April 2, June 15-23, and July 15-18, 2002, when the station was isolated. Gage-height not representative of the flow August 12-15, 2002, due to the construction of the ramp flume. Record is fair to good except for periods of no gage-height record which is poor. Station maintained and record developed by Div. III Hydrographic staff.

**RATING TABLE.**--NCLCONCO20 USED FROM 01-OCT-2001 TO 15-AUG-2002  
 NCLCONCO21 USED FROM 15-AUG-2002 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
 MEAN VALUES

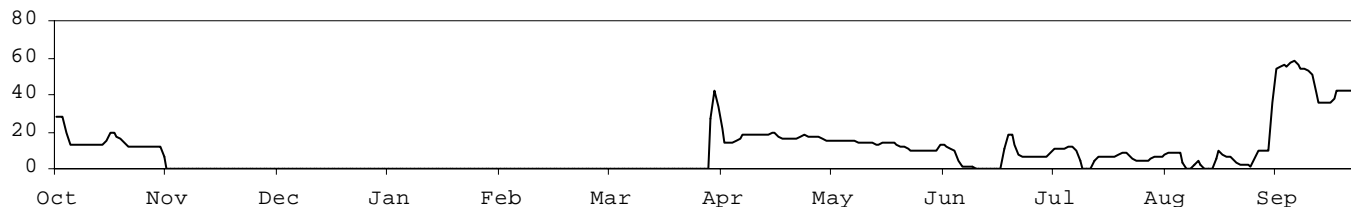
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	28	.31	.24	.24	.23	.23	.23	17	10	6.4	3.8	5.5
2	28	.24	.24	.24	.23	.23	.27	17	10	6.4	3.8	9.8
3	28	.24	.24	.24	.23	.23	42	16	9.5	6.4	5.4	9.8
4	19	.24	.24	.24	.23	.23	34	15	10	6.4	6.4	9.8
5	13	.24	.24	.24	.23	.23	22	15	13	6.4	6.4	9.8
6	13	.24	.24	.24	.23	.23	14	15	13	8.2	6.4	36
7	13	.24	.24	.24	.23	.23	14	15	12	11	7.4	54
8	13	.24	.24	.24	.23	.23	14	15	11	11	9.1	55
9	13	.24	.24	.24	.23	.23	15	15	9.4	11	9.1	56
10	13	.24	.24	.24	.23	.23	16	15	4.2	11	9.1	55
11	13	.24	.24	.24	.23	.23	18	15	1	12	9.1	57
12	13	.24	.24	.24	.23	.23	18	15	.95	12	3.7	58
13	13	.24	.24	.24	.23	.23	18	14	.89	10	.24	56
14	13	.24	.24	.24	.23	.23	18	14	.75	4.5	.24	54
15	15	.24	.24	.24	.23	.23	18	14	.47	.31	2.4	54
16	19	.24	.24	.23	.23	.23	18	14	.24	.24	4.5	53
17	19	.24	.24	.23	.23	.23	18	14	.24	.24	2.1	51
18	17	.24	.24	.23	.23	.23	18	13	.24	4.1	.17	41
19	16	.24	.24	.23	.23	.23	19	13	.24	6.8	.17	36
20	14	.24	.24	.23	.23	.23	19	14	.24	6.3	.18	36
21	12	.24	.24	.23	.23	.23	17	14	.24	6.4	5.8	36
22	12	.24	.24	.23	.23	.23	16	14	.24	6.4	9.8	36
23	12	.24	.24	.23	.23	.23	16	14	11	6.4	8.1	38
24	12	.24	.24	.23	.23	.23	16	13	18	6.4	6.7	42
25	12	.24	.24	.23	.23	.23	16	12	18	7.4	6.7	42
26	12	.24	.24	.23	.23	.23	16	12	13	8.2	5.1	42
27	12	.24	.24	.23	.23	.23	17	11	7.5	8.2	3.7	42
28	12	.24	.24	.23	.23	.23	18	10	6.4	6.9	2.7	42
29	12	.24	.24	.23	---	.23	17	10	6.4	5.9	1.9	44
30	12	.24	.24	.23	---	.23	17	10	6.4	4.8	1.7	45
31	6.2	---	.24	.23	---	.23	---	10	---	3.8	1.6	---
TOTAL	459.2	7.27	7.44	7.28	6.44	7.13	546.23	425	194.54	211.49	143.5	1205.7
MEAN	14.8	.24	.24	.23	.23	.23	18.2	14	6.48	6.82	4.63	40.2
AC-FT	911	14	15	14	13	14	1080	843	386	419	285	2390
MAX	28	.31	.24	.24	.23	.23	42	17	18	12	9.8	58
MIN	6.2	.24	.24	.23	.23	.23	.23	10	.24	.24	.17	5.5

CAL YR 2001 TOTAL 16291.43 MEAN 44.6 MAX 292 MIN 0.24 AC-FT 32310  
 WTR YR 2002 TOTAL 3221.22 MEAN 8.83 MAX 58 MIN 0.17 AC-FT 6390

MAX DISCH: 59.1 CFS AT 13:30 ON Sep. 11, 2002 GH 2.03 FT. SHIFT 0 FT.

MAX GH: 2.03 FT. AT 13:30 ON Sep. 11, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08217500 RIO GRANDE RIVER at WAGONWHEEL GAP, CO.

**LOCATION.**--Lat 37°46'01", long 106°49'51", in NW1/4 NE1/4 sec. 35, T. 41N, R. 1E., Mineral County, Hydrologic unit 13010001, on left bank 40 ft. downstream from private bridge, 0.3 mi. upstream from Goose Creek, and 0.3 mi. west of town of Wagonwheel Gap.

**DRAINAGE AREA.**--780 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder and Sutron satellite monitoring system in 4 ft. by 4 ft. timber shelter and 4 ft. diameter concrete well. This new station was constructed in September and October of 2000 and the State of Colorado, Division of Water Resources, began to operate this station in October, 2000. Well is connected to the river by 3 two inch intake pipes equipped with flush pipes and gate valves. Altitude of gage 8,430 ft. from topographic map. A cableway is located approximately 350 ft. upstream of the gage.

**REMARKS.**--Record is complete and reliable except for December 1 - 5, 2001, when the floats were affected by ice in well; December 6, 2001 through March 27, 2002, when the station was closed for the winter. Stage-discharge relation was affected by ice November 20-30, 2001 and March 28 - 31, 2002. Record is good except for periods of ice affected and no gage height record, which should be considered poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--RIOWAGCO04 USED FROM 01-OCT-2001 TO 30-SEP-2002

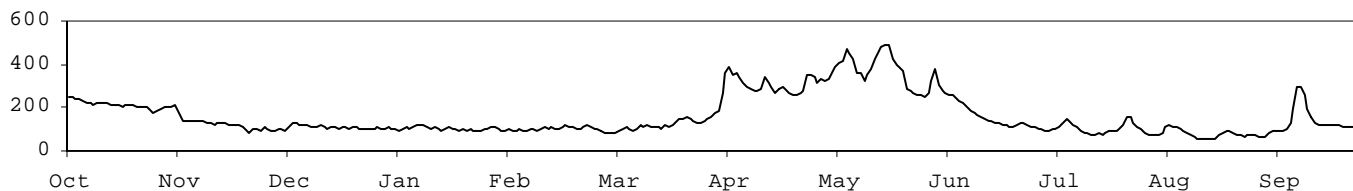
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	249	180	96	100	90	84	175	336	322	103	71	66
2	245	141	110	90	100	80	188	323	375	98	70	65
3	240	139	130	100	96	80	270	336	303	95	72	68
4	240	137	130	110	96	86	360	367	281	94	75	87
5	227	135	120	100	100	90	386	391	266	106	81	95
6	218	136	120	110	96	100	349	408	261	104	109	92
7	226	136	120	120	96	110	364	418	255	115	119	88
8	211	135	110	120	100	100	337	467	242	132	111	90
9	220	133	110	120	100	90	312	453	235	145	107	102
10	226	126	110	110	94	100	293	428	224	132	102	131
11	217	124	120	100	100	120	284	356	199	116	94	194
12	218	129	110	110	110	110	281	359	187	107	86	291
13	213	130	100	100	100	120	275	324	173	94	77	298
14	212	130	110	90	110	110	289	347	166	87	67	260
15	208	124	110	100	100	110	338	382	161	83	60	194
16	207	118	100	110	100	110	318	423	152	71	58	154
17	213	124	110	100	110	100	291	460	140	75	57	133
18	212	120	110	100	120	120	271	476	135	83	56	121
19	208	108	100	90	110	110	282	490	131	78	57	123
20	204	92	110	100	110	120	295	488	128	82	60	119
21	202	86	110	94	100	130	276	424	120	93	72	117
22	204	100	100	100	100	150	268	399	116	88	84	119
23	204	100	100	94	110	150	257	387	115	96	90	119
24	189	96	100	88	120	160	260	371	113	104	92	119
25	172	110	100	94	110	150	272	289	120	121	80	113
26	185	100	100	100	100	140	278	273	129	160	77	109
27	196	96	110	100	100	130	351	264	127	153	72	107
28	200	94	100	110	90	130	352	260	117	131	67	113
29	201	100	100	110	---	140	345	255	113	110	70	117
30	200	100	110	100	---	150	311	252	107	97	73	141
31	209	---	100	90	---	160	---	269	---	82	70	---
TOTAL	6576	3579	3366	3160	2868	3640	8928	11475	5513	3235	2436	3945
MEAN	212	119	109	102	102	117	298	370	184	104	79	132
AC-FT	13040	7100	6680	6270	5690	7220	17710	22760	10940	6420	4830	7820
MAX	249	180	130	120	120	160	386	490	375	160	119	298
MIN	172	86	96	88	90	80	175	252	107	71	56	65

CAL YR 2001 TOTAL 252581 MEAN 692 MAX 3900 MIN 80 AC-FT 501000  
WTR YR 2002 TOTAL 58721 MEAN 161 MAX 490 MIN 56 AC-FT 116500

MAX DISCH: 517 CFS AT 08:15 ON May. 20, 2002 GH 2.20 FT. SHIFT -0.02 FT.  
MAX GH: 2.20 FT. AT 08:15 ON May. 20, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





## RIO GRANDE BASIN

08218500 GOOSE CREEK AT WAGONWHEEL GAP, CO

**LOCATION.**--Lat 37°45'07", long 106°49'46", in SW¼SE¼ sec. 35, T.41 N., R.1 E., Mineral County, Hydrologic Unit 13010001, on left bank 0.2 mi downstream from Pierce Creek, 1.0 mi upstream from mouth, 1.0 mi south of Wagonwheel Gap, and 8.8 mi southeast of Creede.

**DRAINAGE AREA.**--90 mi<sup>2</sup>.

**GAGE.**--Water-stage recorder in a corrugated metal shelter and well with supplemental outside chain gage. Elevation of gage is 8,460 ft above National Geodetic Vertical Datum of 1929.

**REMARKS.**--Record is complete and reliable except for the following periods: Dec. 6, 2001 through Mar. 27, 2002, when station was closed for the winter; Nov. 26-Dec. 5, 2001, when the well was frozen; and Aug. 27-Sep. 10, 2002, when there was missing chart data. Stage-discharge relation affected by ice Nov. 20-25, 2001. Record is good except for periods of no gage height, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--GOOWAGCO09 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

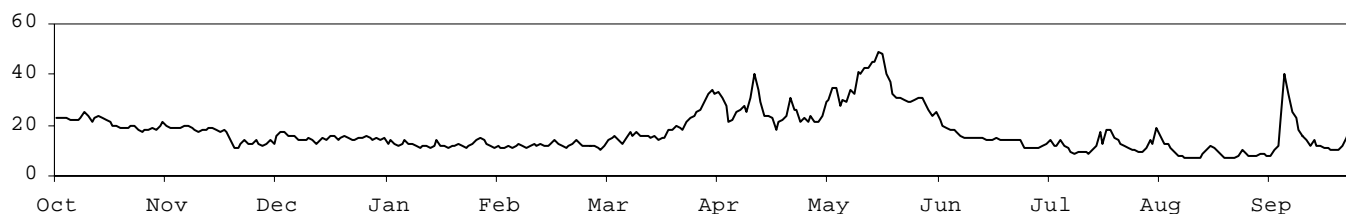
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	23	20	13	15	11	12	29	24	31	11	9.4	8
2	23	19	16	13	12	11	32	21	29	11	9.4	8
3	23	19	17	14	11	10	34	21	26	11	11	8
4	23	19	17	13	11	12	32	24	24	11	14	9
5	22	19	16	12	12	14	33	29	25	12	13	9
6	22	20	16	13	11	15	31	30	22	13	19	8
7	22	20	16	14	12	16	28	35	20	14	16	8
8	23	19	14	13	13	14	21	35	19	12	13	10
9	25	18	14	13	12	13	22	28	18	12	13	12
10	24	17	14	12	11	15	25	30	18	14	11	21
11	21	18	15	11	12	17	26	29	17	12	9.4	40
12	23	18	14	12	13	16	28	34	16	11	8	32
13	24	19	13	12	12	17	25	32	15	9.4	7.7	25
14	23	19	14	11	13	16	31	41	15	8.7	7.4	23
15	22	18	15	12	12	16	40	40	15	9.4	7.4	18
16	21	17	14	14	12	16	34	43	15	9.4	7.4	16
17	20	18	16	12	13	15	29	43	15	9.3	7.4	14
18	20	17	16	12	14	16	24	45	15	8.7	7.4	12
19	19	14	14	11	13	14	24	45	14	10	8.7	14
20	19	11	15	12	12	15	23	49	14	12	10	12
21	19	11	16	12	11	15	18	48	14	17	12	12
22	20	13	15	13	12	18	21	40	15	13	11	11
23	20	14	14	12	13	18	22	37	14	18	10	11
24	18	13	14	11	14	20	24	32	14	18	8.7	10
25	17	13	15	12	13	19	31	31	14	15	7.4	10
26	18	14	15	13	12	18	26	31	14	14	6.8	10
27	18	13	16	14	12	21	26	30	14	13	7	12
28	19	12	15	15	12	23	21	29	14	12	7	15
29	18	13	14	14	---	24	23	29	14	11	8	17
30	20	14	15	13	---	25	21	30	11	10	10	21
31	21	---	14	12	---	26	---	31	---	10	9	---
TOTAL	650	489	462	392	341	517	804	1046	521	371.9	306.5	436
MEAN	21	16	15	13	12	17	27	34	17	12	9.9	14.5
AC-FT	1290	970	916	778	676	1030	1590	2070	1030	738	608	865
MAX	25	20	17	15	14	26	40	49	31	18	19	40
MIN	17	11	13	11	11	10	18	21	11	8.7	6.8	8

CAL YR	2001	TOTAL	28311	MEAN	77.6	MAX	457	MIN	11	AC-FT	56150
WTR YR	2002	TOTAL	6336.4	MEAN	17.4	MAX	49	MIN	6.8	AC-FT	12570

MAX DISCH: 57.5 CFS AT 03:00 ON May. 20, 2002 GH 2.68 FT. SHIFT -0.03 FT.

MAX GH: 2.68 FT. AT 03:00 ON May. 20, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08219500 SOUTH FORK RIO GRANDE AT SOUTH FORK, CO

**LOCATION.**--Lat 37°39'25", long 106°38'55", in SW¼SE¼ sec. 3, T.39 N., R.3 E., Rio Grande County, Hydrologic Unit 13010001, on left bank near U.S. Highway 160, 0.1 mile downstream from Church Creek, 0.9 mi southwest of village of South Fork, and 1.5 mi upstream from mouth.

**DRAINAGE AREA AND PERIOD OF RECORD.**--216 mi<sup>2</sup>. Station established May 17, 1909 at different site with minimal records. Non-recording to 1910 when water-stage recorder installed. Moved to current site in May 1936.

**GAGE.**--Graphic water-stage recorder and Sutron satellite monitoring system with an air temperature sensor in a timber shelter and corrugated metal pipe well. Datum of gage is 8,221.79 ft above National Geodetic Vertical Datum of 1929.

**REMARKS.**--Record is complete and reliable except for December 9, 2001 through January 3, 2002, when the well was frozen, and January 4 through March 27, 2002, when the station was closed for the winter. Stage-discharge relation was affected by ice Nov. 21 through Dec. 8, 2001. Record is good except for periods of no gage-height record and ice effect, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--RIOSFKCO09 USED FROM 01-OCT-2001 TO 26-MAR-2002  
 RIOSFKCO10 USED FROM 27-MAR-2002 TO 30-SEP-2002

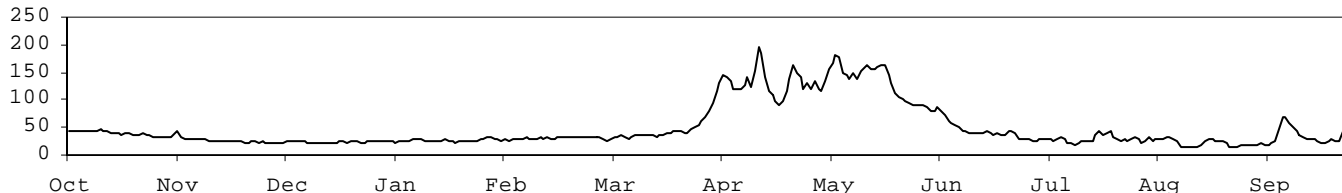
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
 MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	42	43	22	25	26	32	79	133	91	28	28	18
2	42	31	25	22	28	28	93	120	86	26	22	18
3	42	29	27	24	27	27	117	116	81	24	27	19
4	42	29	27	26	28	29	131	134	81	28	32	19
5	42	29	26	25	28	31	146	155	87	29	27	20
6	42	29	26	26	28	33	141	165	80	30	29	19
7	42	29	25	28	29	35	133	180	71	29	30	19
8	43	29	22	28	31	31	121	178	61	27	30	21
9	45	28	22	28	30	29	121	147	57	28	31	25
10	48	27	23	27	28	32	121	144	53	31	31	48
11	44	26	23	26	30	36	128	138	49	28	29	68
12	43	27	22	27	31	36	143	149	44	23	24	68
13	41	27	20	26	30	38	124	138	43	20	14	57
14	39	27	22	24	31	36	151	152	41	19	14	50
15	39	26	23	26	30	35	194	157	40	21	13	43
16	38	25	22	28	30	35	186	163	39	26	13	37
17	39	26	24	25	32	34	143	154	39	26	15	34
18	39	26	25	25	34	36	116	156	40	26	15	30
19	38	25	23	23	33	37	107	160	43	26	17	28
20	38	23	24	25	33	39	99	163	39	35	25	28
21	38	23	26	25	31	41	91	164	35	42	29	25
22	39	25	25	27	31	45	99	146	39	38	28	22
23	38	25	23	26	32	45	116	129	38	40	27	21
24	37	23	22	24	34	43	138	114	38	43	27	26
25	34	24	24	26	32	41	163	104	42	31	26	29
26	33	23	24	28	31	41	149	101	44	28	21	27
27	33	21	27	29	32	46	142	98	41	27	13	27
28	33	20	27	33	33	50	121	94	30	28	14	42
29	33	21	26	31	---	55	130	91	30	27	16	48
30	34	23	27	30	---	61	120	91	29	29	19	68
31	39	---	25	28	---	70	---	91	---	31	19	---
TOTAL	1219	789	749	821	853	1207	3863	4225	1531	894	705	1004
MEAN	39	26	24	27	31	39	129	136	51	29	23	34
AC-FT	2420	1560	1490	1630	1690	2390	7660	8380	3040	1770	1400	1990
MAX	48	43	27	33	34	70	194	180	91	43	32	68
MIN	33	20	20	22	26	27	79	91	29	19	13	18

CAL YR 2001 TOTAL 75029 MEAN 206 MAX 1580 MIN 20 AC-FT 148800  
 WTR YR 2002 TOTAL 17860 MEAN 48.9 MAX 194 MIN 13 AC-FT 35430

MAX DISCH: 236 CFS AT 00:45 ON Apr. 15, 2002 GH 2.5 FT. SHIFT 0.01 FT.  
 MAX GH: 2.5 FT. AT 00:45 ON Apr. 15, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08220000 RIO GRANDE RIVER NEAR DEL NORTE, CO

**LOCATION.**--Lat 37°41'22", long 106°27'38", in NW¼ sec. 29, T.40 N., R.5 E., Rio Grande County, Hydrologic Unit 13010001, on right bank 20 ft downstream from county highway bridge, 6.0 mi west of Del Norte, and 5 mi upstream from Pinos Creek.

**DRAINAGE AREA AND PERIOD OF RECORD.**--1,320 mi<sup>2</sup>. Measurements and staff gages with frequent readings begun in June of 1889. Various sites used until present site established in Nov. 1910, with a recorder installed in 1934. All missing periods have been estimated and discharge records are complete from July 1, 1889.

**GAGE.**--Graphic water-stage recorder and a Sutron satellite monitoring system in a 4 ft. by 4 ft. timber shelter and well. The satellite monitoring system collects gage height, air temperature, and water temperature data, and also has a modem system to provide gage heights via a dial-in option. Datum of gage is 7,980.25 ft above National Geodetic Vertical Datum of 1929.

**REMARKS.**--Record is complete and reliable. Stage-discharge relation affected by ice Nov. 28, 2001 through Mar. 16, 2002. Record is good except for periods of ice affected record which should be considered poor. Station maintained and record developed by Div. III Hydrographic Staff.

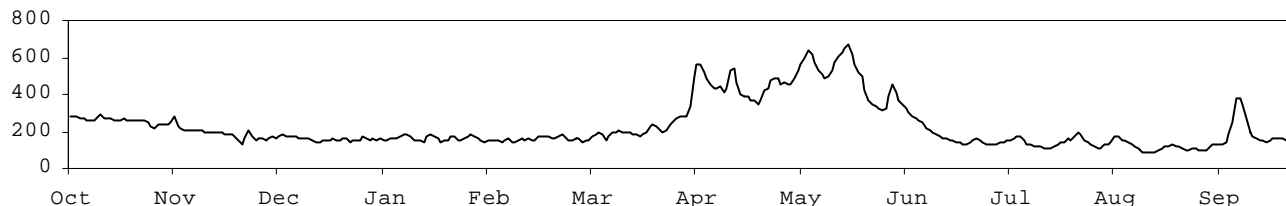
**RATING TABLE.**--RIODELCO03 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	283	286	160	160	140	160	277	462	384	128	118	101
2	283	226	170	150	150	140	284	459	449	131	107	96
3	284	211	180	150	150	150	340	449	413	132	112	98
4	274	205	170	160	150	150	500	486	364	138	125	111
5	265	204	170	160	150	170	562	535	348	140	128	129
6	256	203	170	160	140	180	557	565	320	156	143	128
7	258	204	170	170	150	190	515	599	301	149	178	125
8	260	206	160	180	160	180	488	637	285	166	170	128
9	267	206	160	180	140	150	455	614	272	176	155	142
10	291	200	160	170	140	170	436	577	261	170	151	186
11	275	191	160	150	150	200	437	526	244	150	141	251
12	267	195	150	150	160	190	443	508	218	134	135	377
13	269	197	140	150	150	210	413	488	205	127	114	375
14	261	196	140	140	160	200	437	492	194	122	104	344
15	258	195	150	170	150	190	527	527	189	120	91	267
16	257	187	150	180	150	190	540	570	175	118	88	196
17	265	187	150	170	170	184	466	604	167	107	88	168
18	264	189	160	160	170	188	402	626	158	113	88	158
19	262	178	150	140	170	177	384	644	153	111	88	153
20	256	153	150	150	170	185	386	671	146	115	99	154
21	255	132	160	150	160	199	367	611	141	135	109	145
22	259	159	160	170	160	223	365	563	136	144	114	154
23	259	202	140	170	170	235	348	521	135	141	124	160
24	248	172	150	150	180	223	370	496	134	165	127	165
25	226	156	150	150	160	205	417	423	138	152	120	165
26	218	159	150	160	150	191	432	364	153	175	115	157
27	238	157	170	170	150	205	478	349	157	190	103	154
28	239	150	160	180	160	234	483	334	146	179	94	171
29	240	160	150	170	---	252	486	320	140	153	95	188
30	238	170	160	160	---	266	449	315	135	140	105	205
31	251	---	150	150	---	280	---	328	---	128	108	---
TOTAL	8026	5636	4870	4980	4360	6067	13044	15663	6661	4405	3637	5351
MEAN	259	188	157	161	156	196	435	505	222	142	117	178
AC-FT	15920	11180	9660	9880	8650	12030	25870	31070	13210	8740	7210	10610
MAX	291	286	180	180	180	280	562	671	449	190	178	377
MIN	218	132	140	140	140	140	277	315	134	107	88	96
CAL YR 2001	TOTAL	365708	MEAN	1002	MAX	5910	MIN	120	AC-FT	725400		
WTR YR 2002	TOTAL	82700	MEAN	227	MAX	671	MIN	88	AC-FT	164000		

MAX DISCH: 689 CFS AT 14:15 ON May 20, 2002 GH 1.66 FT. SHIFT -0.03 FT.  
MAX GH: 2.81 FT. AT 11:15 ON Mar. 9, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08220500 PINOS CREEK NEAR DEL NORTE, CO

**LOCATION.**--Lat 37°35'30", long 106°27'05", in SW¼SE¼ sec. 29, T.39 N., R.5 E., Rio Grande County, Hydrologic Unit 13010002, on left bank 90 ft. downstream from Bennett Creek and 8.0 mi. southwest of Del Norte, Co.

**DRAINAGE AREA.**--53 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder in a 3 ft. by 3 ft. timber shelter and concrete well at a 12 ft. rectangular concrete box control. Sutron satellite monitoring system. Altitude of gage is 8,480 ft. from topographic map.

**REMARKS.**--Record is complete and reliable except for Nov. 26 through Dec. 5, 2001, when the stilling well was frozen; and Dec. 6, 2001 through March 27, 2002, when the station was closed for the winter. Stage-discharge relation was affected by ice Nov. 19 - 25, 2001. Record is good except for periods of no gage-height and ice affected record, which are poor. Station maintained and record developed by Div. III Staff.

**RATING TABLE.**--PINDELCO14 USED FROM 01-OCT-2001 TO 30-SEP-2002

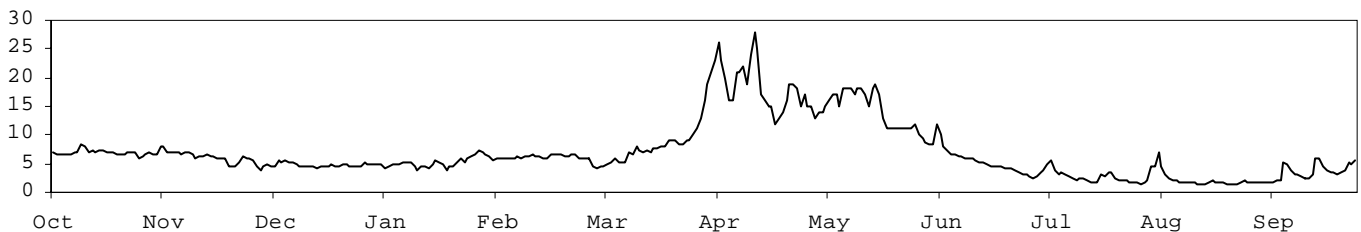
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	7	8	4.7	4.8	5.6	4.6	16	15	9.5	2.8	1.5	1.6
2	6.7	7.1	4.7	4.3	5.8	4.3	19	13	8.7	2.6	1.7	1.6
3	6.7	7.1	5.6	4.5	6	4.4	21	14	8.2	2.7	2.1	1.7
4	6.7	7	5.2	5	6	4.4	23	14	8.5	3.6	4.7	1.8
5	6.7	6.9	5.6	5	6	4.8	26	15	12	3.8	4.7	1.9
6	6.7	6.8	5.2	5	5.8	5.2	23	16	10	4.8	7.1	1.7
7	6.9	7	5.2	5.4	5.8	5.8	20	17	8.1	5.5	4.4	1.7
8	7	6.9	4.8	5.4	6.2	5.4	16	17	7.4	3.9	3.1	2
9	8.3	6.7	4.5	5.4	5.8	5.2	16	15	6.7	3.2	2.6	2.2
10	8.1	6	4.5	4.6	6.2	5.4	21	18	6.5	3.6	2.2	5.2
11	7.1	6.2	4.7	4	6.4	7	21	18	6.4	3.3	2	4.8
12	7.5	6.3	4.7	4.4	6.6	6.6	22	18	6.2	2.9	1.7	3.7
13	7.1	6.5	4.4	4.6	6.2	8	19	17	5.9	2.4	1.7	3.3
14	7.2	6.3	4.3	4.2	6.4	7.4	24	18	5.8	2.2	1.7	3.3
15	7.3	6.3	4.4	4.8	6	7	28	18	5.8	2.4	1.6	2.8
16	6.9	5.8	4.6	5.6	6	7.4	25	17	5.5	2.4	1.6	2.6
17	7	6	4.6	5.2	6.6	7	17	15	5.3	2	1.5	2.4
18	7	5.8	5	4.8	6.6	7.6	16	18	5.1	1.7	1.3	3.3
19	6.6	4.4	4.6	4	6.6	7.6	15	19	4.8	1.6	1.5	5.8
20	6.6	4.4	4.6	4.6	6.6	8	15	17	4.6	1.8	1.8	5.8
21	6.6	4.4	5	4.6	6.2	8	12	13	4.6	3.3	2.1	4.5
22	7.1	5.4	5	5.4	6.2	9	13	11	4.7	2.7	1.9	3.9
23	6.9	6.4	4.4	5.8	6.6	9	14	11	4.5	3.6	1.7	3.6
24	6.9	6	4.6	5.4	6.8	9	16	11	4.2	3.5	1.6	3.4
25	6.1	6	4.6	5.8	5.8	8.4	19	11	4.3	2.3	1.4	3.1
26	6.3	5.6	4.6	6.2	6	8.4	19	11	4.3	2.1	1.3	3.4
27	6.6	4.7	5.2	6.8	5.8	9	18	11	3.9	2.1	1.3	3.7
28	7	4	5	7.4	5.8	9	15	11	3.4	2.2	1.3	5.3
29	6.7	4.4	4.8	7	---	10	17	11	3.2	1.9	1.6	4.8
30	6.7	5	5	6.6	---	11	15	12	3	1.7	2.1	5.6
31	7.9	---	4.8	6.2	---	13	---	10	---	1.6	1.9	---
TOTAL	215.9	179.4	148.9	162.8	172.4	226.9	561	452	181.1	86.2	68.7	100.5
MEAN	7	6	4.8	5.3	6.2	7.3	19	15	6	2.8	2.2	3.4
AC-FT	428	356	295	323	342	450	1110	897	359	171	136	199
MAX	8.3	8	5.6	7.4	6.8	13	28	19	12	5.5	7.1	5.8
MIN	6.1	4	4.3	4	5.6	4.3	12	10	3	1.6	1.3	1.6

CAL YR 2001 TOTAL 9092.9 MEAN 24.9 MAX 180 MIN 3.4 AC-FT 18040  
WTR YR 2002 TOTAL 2555.8 MEAN 7.00 MAX 28 MIN 1.3 AC-FT 5070

MAX DISCH: 36.2 CFS AT 23:45 ON Apr. 14, 2002 GH 0.79 FT. SHIFT 0 FT.  
MAX GH: 0.79 FT. AT 23:45 ON Apr. 14, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08221500 RIO GRANDE NEAR MONTE VISTA, CO

**LOCATION.**--Lat 37°36'34", long 106°08'52", in NW¼SW¼ sec. 19, T.39 N., R.8 E., Rio Grande County, Hydrographic Unit 13010002, on left bank 50 ft. downstream from bridge on U.S. Highway 285, 2.0 mi. north of Monte Vista, and 12 mi. downstream from San Francisco Creek.

**DRAINAGE AREA.**--1,590 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder with satellite telemetry in 48" CMP shelter and well. Datum of gage is 7,654.16 ft., Colorado State Highway Datum.

**REMARKS.**--Record is complete and reliable. Stage-discharge relation affected by ice Nov. 24, 2001 through Mar. 22, 2002. Record is good except for periods of no gage height and ice affected record, which should be considered poor. Station maintained and record developed by the Division III Hydrographic Staff.

**RATING TABLE.**--RIOMONCO18 USED FROM 01-OCT-2001 TO 30-SEP-2002

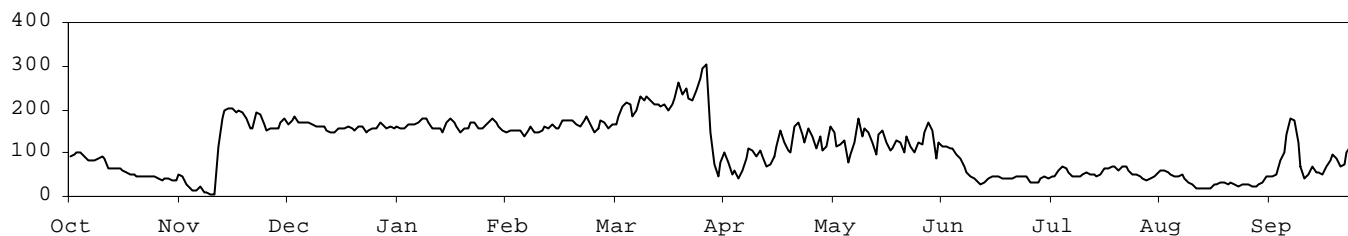
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	94	52	180	155	150	175	146	110	145	34	48	28
2	95	46	165	160	145	170	75	139	172	30	42	25
3	102	28	175	155	150	155	47	104	151	34	38	23
4	100	18	185	155	150	165	78	116	86	40	41	26
5	90	15	170	165	150	165	103	161	125	44	47	33
6	82	15	170	165	150	185	79	145	116	43	51	47
7	82	22	170	165	140	205	52	115	116	47	58	47
8	85	9.4	170	170	150	215	58	121	110	48	61	47
9	87	7.5	165	180	160	210	41	128	109	59	55	51
10	92	6.8	160	180	145	185	62	77	95	68	51	84
11	87	6.2	160	170	145	200	87	96	87	64	47	101
12	65	115	160	155	150	230	110	126	70	55	48	142
13	66	180	150	155	160	220	108	181	55	46	50	178
14	65	198	145	155	155	230	94	138	46	46	40	176
15	63	204	145	145	165	220	108	156	42	47	32	125
16	59	201	155	170	155	210	94	148	34	52	26	68
17	54	193	155	180	155	210	69	125	26	57	20	40
18	51	197	155	170	175	205	73	97	33	49	18	51
19	49	193	160	160	175	210	91	141	40	50	19	68
20	47	179	155	145	175	200	115	153	44	46	17	56
21	46	156	150	155	175	210	152	125	47	50	19	55
22	47	157	160	155	165	225	125	107	46	64	26	52
23	48	191	160	170	160	261	105	112	43	66	28	67
24	47	190	145	170	175	234	103	128	41	67	34	84
25	44	165	150	155	185	247	163	122	42	70	34	97
26	40	150	155	155	165	224	169	99	42	58	28	88
27	37	155	155	160	145	221	143	138	46	70	30	70
28	40	155	170	170	155	245	124	117	46	70	26	73
29	42	155	165	180	---	269	155	103	45	60	25	101
30	39	170	155	170	---	293	140	123	46	51	26	113
31	39	---	160	160	---	304	---	118	---	51	27	---
TOTAL	1984	3529.9	4975	5055	4425	6698	3069	3869	2146	1636	1112	2216
MEAN	64	118	160	163	158	216	102	125	72	53	36	74
AC-FT	3940	7000	9870	10030	8780	13290	6090	7670	4260	3250	2210	4400
MAX	102	204	185	180	185	304	169	181	172	70	61	178
MIN	37	6.2	145	145	140	155	41	77	26	30	17	23

CAL YR	2001	TOTAL	164562.9	MEAN	451	MAX	2960	MIN	6.2	AC-FT	326400
WTR YR	2002	TOTAL	40714.9	MEAN	112	MAX	304	MIN	6.2	AC-FT	80760

MAX DISCH: 329 CFS AT 01:45 ON Mar. 30, 2002 GH 3.3 FT. SHIFT 0.01 FT.  
MAX GH: 4.37 FT. AT 12:45 ON Feb. 19, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

RIO GRANDE AT RIO GRANDE-ALAMOSA COUNTY LINE, CO

**LOCATION.**--Lat 37°34'13", Long 106°02'43", SW¼NW¼ sec.6, T. 38 N., R. 9 E., Alamosa County, on left bank 125 feet downstream from the county line bridge, 5.0 miles East of Monte Vista and 2.4 miles North of U.S. Highway 160 and 285, on the County Line Road.

**DRAINAGE AREA.**--1,640 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder with satellite telemetry in a timber shelter and corrugated metal well. Datum of gage is 7,595 feet, from topographic map.

**REMARKS.**--Record is complete and reliable except for Nov. 26, 28-30, and Dec. 1-6, 2001, when the well was frozen. Stage-discharge relation affected by ice Nov. 24, 25, 27, and Dec. 7, 2001 through Mar. 18, 2002. The control was submerged May 24 through Jun. 4, 2002. Record is good except for periods of no gage-height, ice affected record, and submerged conditions which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--RIOLINCO06 USED FROM 01-OCT-2001 TO 30-SEP-2002

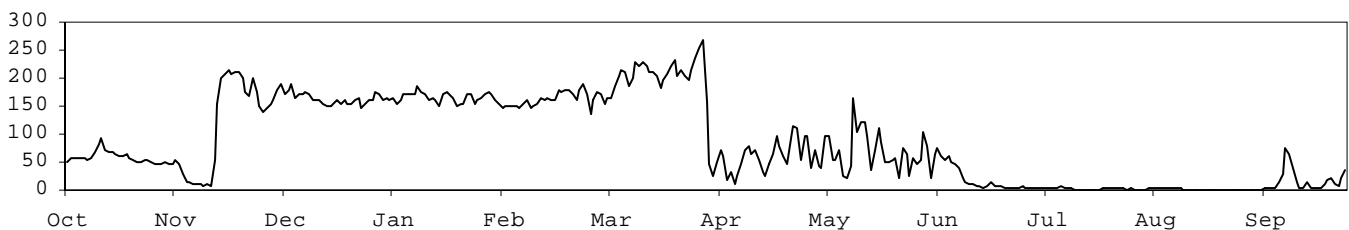
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	50	54	190	160	155	175	156	39	54	4.7	1.5	.5
2	56	46	170	165	145	170	47	73	104	4	1.5	.51
3	58	29	180	155	150	155	26	44	78	3.7	1.5	.18
4	57	16	190	160	150	165	51	38	23	3.4	1.5	.25
5	57	13	165	170	150	165	71	96	64	3.5	2.4	.69
6	57	10	170	170	150	185	59	98	74	3.7	2.5	.94
7	55	10	170	170	145	205	19	54	59	3.6	2.6	2.4
8	57	9.9	175	170	155	215	31	53	54	3.3	3.4	2.8
9	67	7.7	170	185	160	210	11	72	60	3.3	4.3	1.9
10	83	11	160	175	145	185	25	24	51	5	3.2	4.6
11	94	7.8	160	170	150	200	45	23	48	6.7	2.7	15
12	73	5.2	160	160	155	230	73	43	38	3.8	2.2	29
13	69	15.2	155	165	165	220	79	163	22	2.9	2.1	75
14	67	19.9	150	160	160	230	65	104	13	2.6	2.1	64
15	65	20.8	150	150	165	220	70	120	11	1.7	1.4	39
16	62	21.3	155	170	160	210	53	121	9.4	1.5	1.4	15
17	62	20.8	160	175	160	210	33	96	6	1.5	1.2	4.9
18	63	21.2	155	170	180	205	24	37	7	1.4	.82	3.5
19	58	21.2	160	165	175	183	46	70	4.8	1.2	.63	15
20	54	20.1	155	150	180	196	65	111	6.5	1	.73	4.9
21	50	17.4	155	155	180	208	95	87	13	1.1	1.3	3.4
22	51	16.9	160	155	170	222	79	50	5.6	1.1	1.4	3.5
23	54	20.1	165	170	160	231	61	51	6.4	2.5	1.3	2.5
24	54	17.5	145	170	180	204	46	54	6.1	1.8	.89	9.9
25	51	15.0	155	155	190	215	92	57	4	3.1	.74	19
26	48	14.0	160	160	170	203	116	20	3.8	2.5	.63	20
27	47	14.5	160	165	135	196	112	74	4.6	2	.56	10
28	47	15.5	175	170	160	214	55	63	4.7	2.4	.2	8
29	50	16.0	170	175	---	236	98	24	4.4	2	.64	23
30	48	18.0	160	170	---	254	97	57	7.3	1.4	1	35
31	47	---	165	160	---	269	---	45	---	1.8	.71	---
TOTAL	1811	3520.4	5070	5120	4500	6386	1900	2061	846.6	84.2	49.05	414.37
MEAN	58	11.7	164	165	161	206	63	67	28.2	2.7	1.58	13.8
AC-FT	3590	6980	10060	10160	8930	12670	3770	4090	1680	167	97	822
MAX	94	21.3	190	185	190	269	156	163	104	6.7	4.3	75
MIN	47	7.7	145	150	135	155	11	20	3.8	1	.2	.18

CAL YR 2001 TOTAL 111289.4 MEAN 305 MAX 1800 MIN 7.7 AC-FT 220700  
WTR YR 2002 TOTAL 31762.62 MEAN 87 MAX 269 MIN .18 AC-FT 63000

MAX DISCH: 283 CFS AT 05:30 ON Mar. 31, 2002 GH 2.81 FT. SHIFT 0.17 FT.  
MAX GH: 4.34 FT. AT 07:30 ON Dec. 10, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## RIO GRANDE BASIN

08223000 RIO GRANDE AT ALAMOSA, CO

**LOCATION.**--Lat 37°28'53", long 105°52'46", in SE¼NE¼ sec. 4, T. 37 N., R. 10 E., Alamosa County, on left bank 0.2 mile northwest of Adams State College and 9 miles upstream from Alamosa Creek.

**DRAINAGE AREA.**--1,710 mi<sup>2</sup>.

**GAGE.**--Water-stage recorder with satellite telemetry and air temperature probe in a 4'x6' exposed aggregate building with a 4' diameter concrete well. Datum of gage is 7,532.66 ft.

**REMARKS.**--Record is complete and reliable except for Feb. 2 - Mar. 5, 2002, when the well was frozen. Stage-discharge relation was affected by ice Nov. 24, 2001 - Feb. 1, 2002, and Mar. 6-18, 2002. Stage-discharge relation was affected by backwater from the Westside Diversion and/or beaver dams below the gage May 24 through Sep. 30, 2002. Record is good except for periods of no gage-height record, ice affected record, and backwater affected record which are fair to poor. Station maintained and record developed by the Division III Hydrographic Staff.

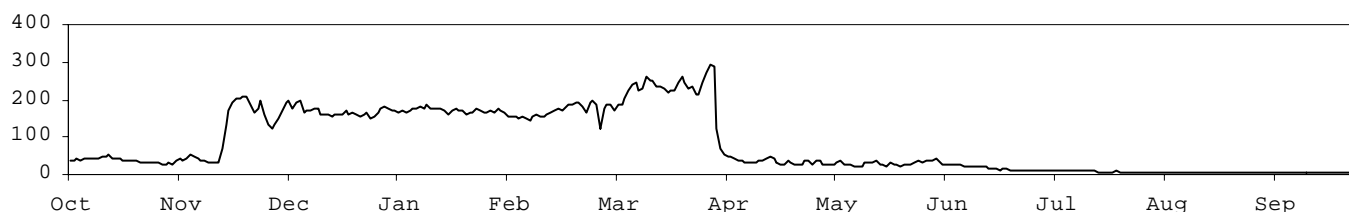
**RATING TABLE.**--RIOALACO21 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	37	43	190	170	165	175	290	36	40	11	6.5	3.6
2	36	40	200	165	155	185	122	28	40	11	6.1	3.7
3	42	45	175	170	155	185	72	28	42	11	5.8	3.9
4	40	52	190	165	155	170	53	26	34	11	5.6	3.8
5	43	46	195	170	150	185	49	25	28	11	5.7	3.7
6	43	42	165	175	155	185	50	31	26	12	6.1	3.7
7	43	38	170	175	150	205	44	36	29	12	6	3.7
8	42	36	170	180	145	225	38	26	28	12	5.9	3.8
9	42	34	175	175	155	240	35	26	26	11	5.8	4.1
10	48	33	175	185	160	245	33	25	25	11	5.6	4.4
11	50	33	160	175	155	225	31	24	23	11	5.6	4.1
12	52	32	160	175	155	230	30	24	23	10	5.6	4.1
13	45	70	160	175	160	260	34	24	22	10	5.4	4.1
14	42	135	155	175	165	250	40	31	22	9.8	5.1	4.1
15	41	173	160	170	170	250	40	30	23	9.2	5	4.2
16	38	194	160	160	175	235	44	34	22	9	4.7	3.9
17	37	203	160	170	170	235	47	35	20	8.6	4.4	3.9
18	35	205	170	175	175	230	43	29	15	8.2	4.1	4
19	35	210	160	170	185	218	30	25	14	7.9	4.3	4.1
20	35	207	165	170	185	223	29	24	14	7.2	4.5	3.5
21	33	189	160	160	190	225	29	31	13	6.9	4.6	3.4
22	33	166	155	165	190	247	35	28	14	6.9	4.6	3.6
23	32	176	160	165	180	264	32	25	14	7.4	4.7	3.4
24	31	200	165	175	165	246	29	24	13	8.9	4.6	3.3
25	30	160	150	170	190	231	26	25	13	7.9	4.7	3.5
26	30	135	155	165	195	236	27	28	12	7.8	4.5	4
27	29	125	165	165	185	215	38	27	12	8	4.4	3.9
28	29	135	175	170	125	216	39	31	12	7.6	4.3	3.6
29	30	150	180	165	---	244	29	35	12	7.3	4.2	3.7
30	29	170	175	175	---	270	37	33	11	6.9	4.1	3.6
31	40	---	170	170	---	293	---	37	---	6.7	3.8	---
TOTAL	1172	3477	5225	5290	4660	7043	1475	891	642	286.2	156.3	114.4
MEAN	38	116	169	171	166	227	49	29	21	9.2	5	3.8
AC-FT	2320	6900	10360	10490	9240	13970	2930	1770	1270	568	310	227
MAX	52	210	200	185	195	293	290	37	42	12	6.5	4.4
MIN	29	32	150	160	125	170	26	24	11	6.7	3.8	3.3
CAL YR	2001	TOTAL	99559	MEAN	273	MAX	1520	MIN	29	AC-FT	197500	
WTR YR	2002	TOTAL	30431.9	MEAN	83.4	MAX	293	MIN	3.3	AC-FT	60360	

MAX DISCH: 308 CFS AT 01:15 ON Apr. 1, 2002 GH 2.78 FT. SHIFT -0.21 FT.  
MAX GH: 4.34 FT. AT 15:00 ON Nov. 27, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

CLOSED BASIN PROJECT CANAL NEAR ALAMOSA, CO

RIO GRANDE COMPACT STATION

**LOCATION.**--Lat 37°28'33", long 105°45'58", SW¼SW¼, sec. 3, T.37 N., R.11 E., Alamosa County, Hydrologic Unit 13010002, 400 ft north of State Highway 160, 5.5 mi east of Alamosa, Co. on right bank of Closed Basin Project Canal.

**DRAINAGE AREA.**--

**GAGE.**--Graphic water-stage recorders on H<sub>a</sub> and H<sub>b</sub> in 8x10 ft. building with concrete stilling wells and satellite telemetry at 12' Parshall flume.

**REMARKS.**--Record is complete and reliable. Stage-discharge relation affected by ice January 29, and February 26, 2002. Record is good except for periods of ice affected record which should be considered fair. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--CBPALACO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

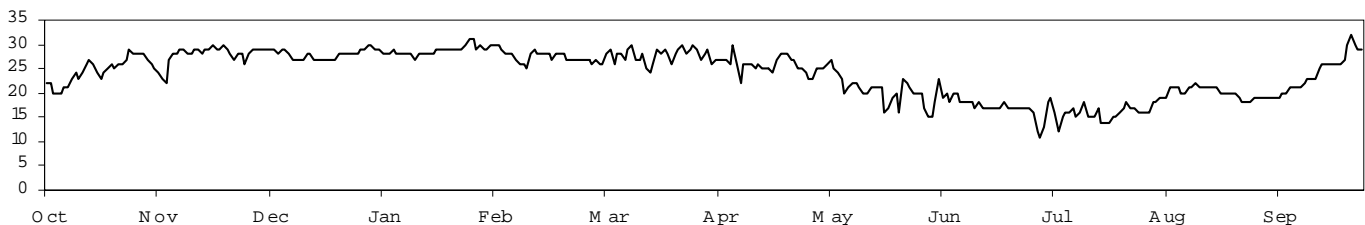
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	22	24	29	29	30	26	28	23	17	16	16	19
2	22	23	29	28	30	27	29	25	15	12	16	19
3	20	22	29	28	30	26	26	25	15	11	18	19
4	20	27	28	28	29	26	27	25	18	13	18	19
5	20	28	29	29	28	28	27	26	23	18	19	19
6	21	28	29	28	28	29	27	27	19	19	19	19
7	21	29	28	28	28	26	27	25	20	16	19	19
8	23	29	27	28	27	28	26	24	18	12	21	20
9	24	28	27	28	26	28	30	23	20	15	21	20
10	23	28	27	28	26	27	26	20	20	16	21	21
11	24	29	27	27	25	29	22	21	18	16	20	21
12	26	29	28	28	28	30	26	22	18	17	20	21
13	27	28	28	28	29	27	26	22	18	15	21	21
14	26	29	27	28	28	27	26	21	18	16	21	22
15	24	29	27	28	28	28	25	20	17	18	22	23
16	23	30	27	28	28	25	26	20	18	15	21	23
17	24	29	27	29	28	24	25	21	17	15	21	23
18	25	29	27	29	27	26	25	21	17	15	21	25
19	26	30	27	29	28	29	25	21	17	17	21	26
20	25	29	27	29	28	28	24	21	17	14	21	26
21	26	28	28	29	28	29	27	16	17	14	21	26
22	26	27	28	29	27	28	28	17	17	14	20	26
23	27	28	28	29	27	26	28	19	18	15	20	26
24	29	28	28	29	27	28	28	20	17	15	20	26
25	28	26	28	30	27	29	27	16	17	16	20	27
26	28	28	28	31	27	30	27	23	17	17	20	30
27	28	29	29	31	27	28	25	22	17	18	19	32
28	28	29	29	29	27	29	25	21	17	17	18	30
29	27	29	30	30	---	30	24	20	17	17	18	29
30	26	29	30	29	---	29	23	20	17	16	18	29
31	25	---	29	29	---	27	---	20	---	16	19	---
TOTAL	764	838	869	890	776	857	785	667	531	481	610	706
MEAN	25	28	28	29	28	28	26	22	18	16	20	24
AC-FT	1520	1660	1720	1770	1540	1700	1560	1320	1050	954	1210	1400
MAX	29	30	30	31	30	30	30	27	23	19	22	32
MIN	20	22	27	27	25	24	22	16	15	11	16	19

CAL YR	2001	TOTAL	9748	MEAN	26.7	MAX	36	MIN	10	AC-FT	19340
WTR YR	2002	TOTAL	8774	MEAN	24	MAX	32	MIN	11	AC-FT	17400

MAX DISCH: 34 CFS AT 10:15 ON Jan. 31, 2002 GH 0.84 FT. SHIFT -0.02 FT.  
MAX GH: 1.92 FT. AT 08:00 ON Jan. 29, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





## CLOSED BASIN IN SAN LUIS VALLEY

08224500 KERBER CREEK NEAR VILLA GROVE, CO

**LOCATION.**--Lat 38°13'12", long 105°58'33", in SW¼SW¼, sec. 21, T. 46 N., R. 8 E., Saguache County, on left bank 7 miles west of Villa Grove and 5 ½ miles downstream from the town of Bonanza.

**DRAINAGE AREA AND PERIOD OF RECORD.**--42 mi<sup>2</sup>. (approx.) Originally established with staff gage only in 1911. Station at various locations from that time.

**GAGE.**--Graphic water-stage recorder in a 42-inch diameter CMP shelter and well at Ashley Ranch site. On June 25, 2002 new control and gage with Graphic water-stage recorder and Sutron satellite monitoring system was established at new site approximately 1 1/2 mile downstream at a different datum. See station description. Record developed using data from Ashley Ranch site gage until June 25, 2002 at midnight. Data from new gage used from that point forward. Altitude of gage is 8,840 ft. from topographic map.

**REMARKS.**--Record is complete and reliable except for Nov. 23, 2001 through Apr. 10, 2002 when the station was closed for the winter. Stage-discharge relation was affected by ice Nov. 20-22, 2001. There is complete record for both gages June 25, 2002 through August 22, 2002 when Ashley Ranch gage was removed. The record for Water Year 2002 should be considered good for periods of gage height data, and poor for all other periods. Station maintained and record developed by the Division III Hydrographic Staff.

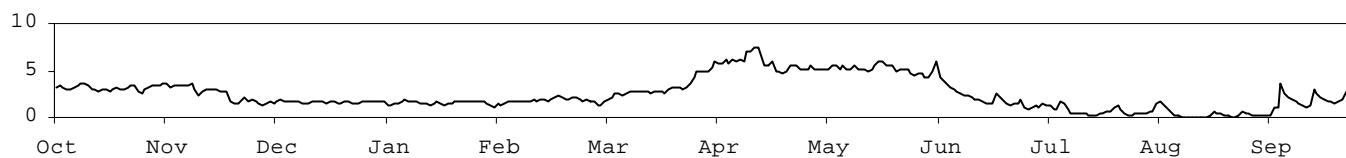
**RATING TABLE.**--KERVILCO16 USED FROM 01-OCT-2001 TO 25-JUN-2002  
KERVILCO17 USED FROM 26-JUN-2002 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	3.2	3.7	1.5	1.6	1.1	1.6	5	5.6	4.6	.93	.33	.34
2	3.5	3.2	1.7	1.2	1.5	1.3	5	5.2	4.3	.96	.42	.24
3	3.2	3.5	1.9	1.2	1.3	1.3	5.4	5.2	4.3	1.2	.49	.19
4	3	3.4	1.7	1.5	1.4	1.7	6	5.2	4.9	1	.54	.28
5	3	3.5	1.7	1.5	1.6	2	5.8	5.2	5.9	1.4	.71	.3
6	3.2	3.5	1.7	1.7	1.6	2.2	5.8	5.2	4.3	1.3	1.5	.18
7	3.5	3.5	1.7	1.9	1.6	2.6	6.2	5.6	4	1.2	1.7	.22
8	3.7	3.7	1.6	1.7	1.6	2.5	5.8	5.6	3.6	.8	1.2	1.1
9	3.7	2.9	1.5	1.7	1.6	2.3	6.2	5.2	3.2	.76	.89	.99
10	3.5	2.4	1.5	1.7	1.7	2.5	6	5.6	3	1.6	.62	3.7
11	3	2.7	1.5	1.5	1.8	2.8	6.2	5.2	2.7	1.4	.27	2.5
12	3	3	1.7	1.5	1.9	2.7	5.9	5.2	2.5	.83	.11	2.2
13	2.7	2.9	1.6	1.4	1.8	2.7	7	5.6	2.3	.5	.06	2
14	3	3	1.7	1.3	1.9	2.7	7	5.2	2.3	.38	.03	1.7
15	3	2.9	1.6	1.4	1.9	2.7	7.4	5.2	2.1	.38	.02	1.4
16	2.8	2.7	1.5	1.6	1.8	2.7	7.4	5.2	1.9	.42	.01	1.2
17	3	2.8	1.6	1.5	2	2.5	6.9	4.9	1.9	.35	.01	1.1
18	3.2	2.7	1.6	1.3	2.1	2.7	5.6	5.2	1.7	.24	.01	1.3
19	3	1.7	1.5	1.4	2.3	2.7	5.6	5.6	1.5	.2	.01	2.9
20	3	1.5	1.5	1.5	2.1	2.7	5.9	5.9	1.5	.17	.03	2.5
21	3.2	1.5	1.6	1.7	2	2.6	4.9	5.9	1.5	.52	.18	2.2
22	3.5	1.8	1.7	1.6	2	2.9	4.9	5.6	2.5	.52	.74	2
23	3.5	2.2	1.5	1.6	2.1	3.1	4.6	5.6	2.1	.61	.44	1.7
24	2.7	1.8	1.4	1.6	2.1	3.2	4.9	5.6	1.7	.6	.34	1.6
25	2.6	2	1.5	1.6	2	3.1	5.6	4.9	1.5	1	.2	1.5
26	3	1.7	1.6	1.7	1.8	3	5.6	5.2	1.3	1.3	.11	1.7
27	3.1	1.5	1.7	1.7	1.9	3.2	5.6	5.2	1.4	.76	.06	2
28	3.5	1.2	1.6	1.8	1.8	3.7	5.2	5.2	1.4	.36	.05	2.7
29	3.5	1.4	1.6	1.6	---	4.3	5.2	4.6	1.9	.21	.2	2.7
30	3.5	1.7	1.8	1.5	---	5	5.2	4.5	1.1	.25	.66	2.5
31	3.7	---	1.7	1.3	---	5	---	4.6	---	.4	.53	---
TOTAL	99	76	50	47.8	50.3	86	173.8	163.7	78.9	22.55	12.47	46.94
MEAN	3.2	2.5	1.6	1.5	1.8	2.8	5.8	5.3	2.6	.73	.4	1.56
AC-FT	196	151	99	95	100	171	345	325	156	45	25	93
MAX	3.7	3.7	1.9	1.9	2.3	5	7.4	5.9	5.9	1.6	1.7	3.7
MIN	2.6	1.2	1.4	1.2	1.1	1.3	4.6	4.5	1.1	.17	.01	.18

CAL YR 2001 TOTAL 5434.8 MEAN 14.9 MAX 186 MIN 1.2 AC-FT 10780  
WTR YR 2002 TOTAL 907.46 MEAN 2.49 MAX 7.4 MIN 0.01 AC-FT 1800  
MAX DISCH: 8.2 CFS AT 01:00 ON Apr. 15, 2002 GH 0.85 FT. SHIFT 0.08 FT.  
MAX GH: 0.91 FT. AT 16:30 ON Nov. 21, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN  
CLOSED BASIN IN SAN LUIS VALLEY  
GARNER CREEK near VILLA GROVE, CO

**LOCATION.**--Lat 38°10'27", long 105°48'29", in SE ¼ SE ¼ Sec. 1, T.45 N., R.10 E., NMPM, Saguache Co., on right bank, 12 miles SE of Villa Grove.

**DRAINAGE AREA.**--6.4 mi<sup>2</sup>.

**GAGE.**--2' Diameter CMP stilling well with steel box instrument shelter mounted on top at a 2' Parshall flume. Installed in 1999 water year with first reliable data on Mar. 21, 1999. Station equipped with satellite monitoring. Flume and staff gage there for several years previous. Elevation 8680 ft.

**REMARKS.**--Record is complete and reliable for the water year, except for November 28, 2001, and April 6-9, 2002, when the well was frozen; November 29, 2001 through April 3, 2002, when the station was closed for the winter; and June 2-6, and August 17, 2002, when there was missing satellite data. Record good, except during period of no gage-height record and ice affected record, which is poor. Station maintained and record developed by Div. III Hydrographic Staff.

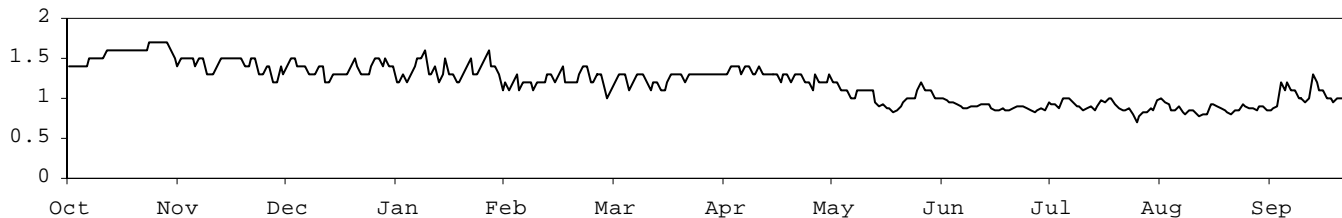
**RATING TABLE.**--GARVILCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1.4	1.4	1.3	1.4	1.1	1.3	1.3	1.3	1.1	.85	.78	.87
2	1.4	1.5	1.4	1.2	1.2	1.1	1.3	1.2	1.1	.82	.82	.87
3	1.4	1.5	1.5	1.2	1.1	1	1.3	1.2	1.1	.85	.83	.86
4	1.4	1.5	1.5	1.3	1.2	1.1	1.3	1.2	1	.88	.88	.89
5	1.4	1.5	1.4	1.2	1.3	1.2	1.3	1.3	1	.85	.84	.89
6	1.4	1.4	1.4	1.3	1.1	1.3	1.3	1.2	1	.94	.98	.86
7	1.5	1.5	1.4	1.4	1.2	1.3	1.4	1.2	.98	.93	1	.86
8	1.5	1.5	1.3	1.5	1.2	1.3	1.4	1.1	.96	.93	.95	.88
9	1.5	1.3	1.3	1.5	1.2	1.1	1.4	1.1	.94	.88	.93	.91
10	1.5	1.3	1.3	1.6	1.1	1.2	1.3	1.1	.93	.99	.86	1.2
11	1.5	1.3	1.4	1.3	1.2	1.3	1.4	1	.89	.99	.86	1.1
12	1.6	1.4	1.4	1.3	1.2	1.3	1.4	1	.88	.99	.89	1.2
13	1.6	1.5	1.2	1.4	1.2	1.3	1.3	1.1	.88	.94	.83	1.1
14	1.6	1.5	1.2	1.2	1.3	1.2	1.3	1.1	.9	.9	.8	1.1
15	1.6	1.5	1.3	1.3	1.3	1.1	1.4	1.1	.89	.91	.85	1
16	1.6	1.5	1.3	1.5	1.2	1.2	1.3	1.1	.9	.86	.84	1
17	1.6	1.5	1.3	1.3	1.3	1.2	1.3	1.1	.92	.87	.8	.96
18	1.6	1.5	1.3	1.3	1.4	1.1	1.3	.94	.93	.89	.78	1
19	1.6	1.5	1.3	1.2	1.2	1.1	1.3	.9	.92	.85	.79	1.3
20	1.6	1.4	1.4	1.2	1.2	1.2	1.3	.93	.88	.89	.8	1.2
21	1.6	1.4	1.5	1.3	1.2	1.3	1.2	.87	.84	.97	.93	1.1
22	1.6	1.5	1.4	1.4	1.2	1.3	1.3	.88	.84	.94	.93	1.1
23	1.6	1.5	1.3	1.5	1.3	1.3	1.3	.83	.87	.99	.91	1
24	1.7	1.3	1.3	1.3	1.4	1.3	1.2	.86	.86	.99	.88	.99
25	1.7	1.3	1.3	1.3	1.4	1.2	1.3	.91	.86	.93	.84	.95
26	1.7	1.4	1.4	1.4	1.2	1.3	1.3	.94	.87	.88	.83	1
27	1.7	1.4	1.5	1.5	1.2	1.3	1.3	1	.91	.86	.81	1
28	1.7	1.2	1.5	1.6	1.3	1.3	1.2	1	.91	.85	.84	1
29	1.7	1.2	1.4	1.4	---	1.3	1.2	1	.9	.88	.84	1
30	1.6	1.4	1.5	1.4	---	1.3	1.1	1.1	.87	.8	.92	1
31	1.5	---	1.4	1.3	---	1.3	---	1.2	---	.7	.89	---
TOTAL	48.4	42.6	42.4	42	34.4	38.1	39	32.76	27.83	27.8	26.73	30.19
MEAN	1.6	1.4	1.4	1.4	1.2	1.2	1.3	1.06	.93	.9	.86	1.01
AC-FT	96	84	84	83	68	76	77	65	55	55	53	60
MAX	1.7	1.5	1.5	1.6	1.4	1.3	1.4	1.3	1.1	.99	1	1.3
MIN	1.4	1.2	1.2	1.2	1.1	1	1.1	.83	.84	.7	.78	.86
CAL YR 2001	TOTAL	609.8	MEAN	1.67	MAX	4.0	MIN	0.9	AC-FT	1210		
WTR YR 2002	TOTAL	432.21	MEAN	1.18	MAX	1.7	MIN	0.7	AC-FT	857		

MAX DISCH: 3.08 CFS AT 13:45 ON Apr. 12, 2002 GH 0.56 FT. SHIFT -0.02 FT.  
MAX GH: 0.56 FT. AT 13:45 ON Apr. 12, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## RIO GRANDE BASIN

## CLOSED BASIN IN SAN LUIS VALLEY

## MAJOR CREEK near VILLA GROVE, CO

**LOCATION.**--Lat 38°09'26", long 105°48'32", in NE ¼ NE ¼ Sec. 13, T.45 N., R.10 E., NMPM, Saguache Co., on right bank, 11 miles SE of Villa Grove.

**DRAINAGE AREA.**--5.0 mi<sup>2</sup>.

**GAGE.**--Station established in water year 1999 with installation of 2' diameter CMP as stilling well with a steel equipment box mounted on top at a 2' Parshall flume. Flume already at the site. Satellite monitoring equipment installed Dec. 1998 but gage not operational till Mar. 21, 1999. Elevation of gage is 8410 ft.

**REMARKS.**--Record is complete and reliable except for November 29, 2001 through April 4, 2002, when the station was closed for the winter, and Nov. 28, 2001, when the well was frozen. Stage-discharge relation affected by ice November 25, 26, 27, 2001. Record good, except for period of no gage heights and period of ice-effect, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

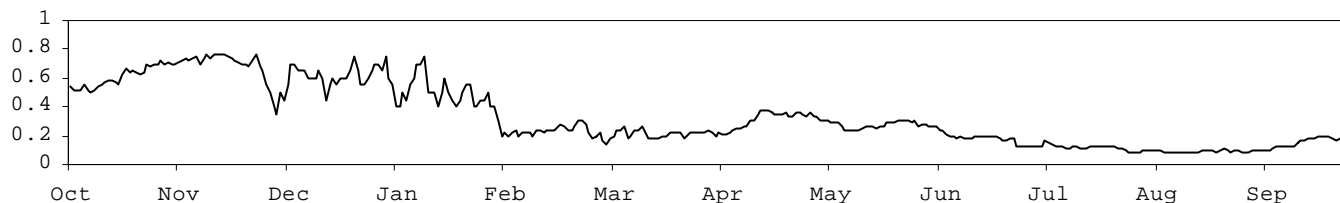
**RATING TABLE.**--MAJVILCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.54	.71	.45	.55	.2	.22	.24	.34	.28	.13	.09	.09
2	.51	.72	.55	.4	.22	.16	.22	.33	.28	.13	.09	.09
3	.51	.73	.7	.4	.2	.14	.2	.31	.26	.13	.1	.1
4	.51	.72	.7	.5	.22	.18	.22	.3	.26	.13	.1	.1
5	.56	.74	.65	.45	.24	.2	.21	.3	.26	.13	.1	.1
6	.51	.75	.65	.55	.2	.24	.21	.29	.24	.16	.1	.1
7	.5	.7	.65	.6	.22	.24	.22	.29	.23	.15	.1	.1
8	.52	.73	.6	.7	.22	.26	.23	.29	.21	.14	.1	.1
9	.54	.76	.6	.7	.22	.18	.25	.27	.19	.12	.09	.11
10	.56	.73	.6	.75	.2	.2	.25	.23	.19	.13	.09	.12
11	.57	.76	.65	.5	.24	.24	.26	.24	.18	.12	.09	.13
12	.59	.76	.6	.5	.24	.24	.27	.24	.19	.11	.09	.13
13	.59	.77	.45	.5	.22	.26	.31	.24	.18	.11	.09	.13
14	.57	.76	.55	.4	.24	.24	.31	.24	.18	.13	.09	.13
15	.56	.75	.6	.5	.24	.18	.35	.25	.18	.12	.09	.13
16	.63	.74	.55	.6	.24	.18	.37	.26	.19	.11	.09	.15
17	.66	.72	.6	.5	.26	.18	.37	.26	.19	.11	.09	.16
18	.64	.71	.6	.45	.28	.18	.37	.26	.19	.11	.09	.17
19	.65	.7	.6	.4	.26	.2	.36	.25	.19	.13	.09	.18
20	.64	.69	.65	.45	.24	.2	.35	.26	.19	.13	.1	.18
21	.63	.68	.75	.5	.24	.22	.35	.27	.19	.12	.1	.18
22	.64	.72	.65	.55	.26	.22	.35	.29	.19	.12	.1	.19
23	.7	.76	.55	.55	.3	.22	.36	.29	.18	.12	.1	.19
24	.68	.68	.55	.4	.3	.22	.33	.29	.17	.12	.09	.19
25	.7	.65	.6	.4	.28	.18	.33	.31	.16	.12	.1	.19
26	.7	.55	.65	.45	.22	.2	.36	.31	.18	.12	.11	.18
27	.72	.5	.7	.45	.18	.22	.36	.3	.18	.11	.1	.17
28	.7	.4	.7	.5	.2	.22	.35	.31	.13	.11	.09	.18
29	.71	.35	.65	.4	---	.22	.34	.29	.13	.1	.1	.16
30	.69	.5	.75	.4	---	.22	.36	.3	.13	.09	.1	.13
31	.7	---	.6	.3	---	.22	---	.27	---	.08	.09	---
TOTAL	18.93	20.44	19.15	15.3	6.58	6.48	9.06	8.68	5.9	3.74	2.95	4.26
MEAN	.61	.68	.62	.49	.24	.21	.3	.28	.2	.12	.1	.14
AC-FT	.38	.41	.38	.30	.13	.13	.18	.17	.12	.074	.059	.084
MAX	.72	.77	.75	.75	.3	.26	.37	.34	.28	.16	.11	.19
MIN	.5	.35	.45	.3	.18	.14	.2	.23	.13	.08	.09	.09
CAL YR 2001	TOTAL	254.50	MEAN	0.70	MAX	2.0	MIN	0.30	AC-FT	505		
WTR YR 2002	TOTAL	121.47	MEAN	0.33	MAX	0.77	MIN	0.08	AC-FT	241		

MAX DISCH: 0.82 CFS AT 10:45 ON Nov. 5, 2001 GH 0.2 FT. SHIFT 0.03 FT.  
MAX GH: 0.2 FT. AT 10:45 ON Nov. 5, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN  
CLOSED BASIN IN SAN LUIS VALLEY  
COTTON CREEK near MINERAL HOT SPRINGS, CO

**LOCATION.**--Lat 38°07'55", long 105°47'15", in SW ¼ SW ¼ Sec. 20, T.45 N., R.11 E., NMPM, Saguache Co., on left bank, 9 miles SE of Mineral Hot Springs.

**DRAINAGE AREA.**--12.8 mi<sup>2</sup>.

**GAGE.**--This station established in water year 1999 with installation of 4' diameter CMP stilling well and shelter. Satellite monitoring system installed Mar. 24, 1999. Strip chart recorder used as a backup added on Apr. 28, 1999. Elevation of gage is 8600 ft.

**REMARKS.**--Record is complete and reliable for the water year except Nov. 29, 2001 through Apr. 4, 2002, when the station was closed for the winter. Stage-discharge relation was affected by ice Nov.26-27, 2001 and by human activity Sep. 18-19, 2002. Record is good, except for periods of no stage, ice-affected and human activity, which is poor. Station maintained and record developed Div. III Hydrographic Staff.

**RATING TABLE.**--COCRMICO02 USED FROM 01-OCT-2001 TO 30-SEP-2002

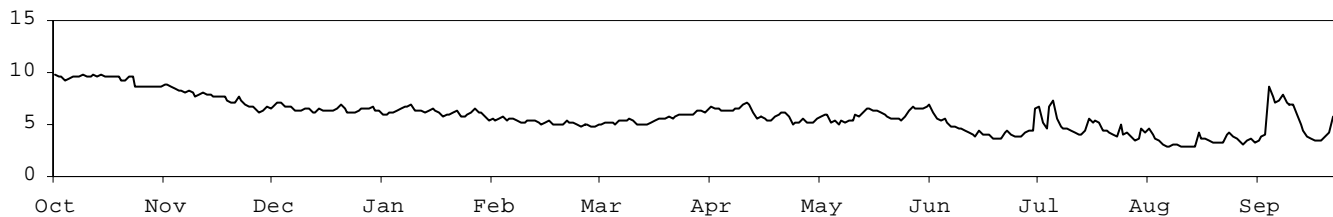
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	9.8	8.8	6.6	6.4	5.4	5	6.4	5.5	6.7	3.9	4.2	3.6
2	9.7	8.8	6.8	6	5.6	4.8	6.4	5.2	6.5	3.8	3.8	3.3
3	9.7	8.6	7.2	6	5.4	4.8	6.2	5.2	6.6	4.2	3.5	3.1
4	9.3	8.4	7.2	6.2	5.6	5	6.4	5.2	6.5	4.5	3.7	3.4
5	9.4	8.3	6.8	6.2	5.8	5	6.8	5.5	6.7	4.5	4.7	3.6
6	9.6	8.3	6.8	6.4	5.4	5.2	6.6	5.8	6.9	6.5	4.2	3.3
7	9.7	8.1	6.8	6.6	5.6	5.2	6.5	5.9	6.1	6.8	4.6	3.4
8	9.6	8.3	6.4	6.8	5.6	5.2	6.3	5.9	5.5	5.2	4.1	3.8
9	9.8	8	6.4	6.8	5.4	5	6.3	5.2	5.4	4.6	3.7	4.1
10	9.6	7.7	6.4	7	5.2	5.4	6.4	5.3	5.5	6.7	3.5	8.6
11	9.6	7.9	6.6	6.4	5.2	5.4	6.3	5	5.2	7.3	3.1	7.7
12	9.8	8	6.6	6.4	5.4	5.4	6.5	5.3	4.9	5.6	2.9	7.1
13	9.6	7.9	6.2	6.4	5.4	5.6	6.6	5.2	4.8	4.9	2.9	7.4
14	9.8	7.9	6.2	6.2	5.4	5.4	7	5.3	4.6	4.7	3.1	7.8
15	9.7	7.7	6.6	6.4	5.2	5	7.1	5.3	4.6	4.6	3	7.1
16	9.7	7.7	6.4	6.6	5	5	6.9	5.9	4.4	4.4	2.8	7
17	9.7	7.7	6.4	6.4	5.2	5	6.1	5.7	4.2	4.2	2.8	7
18	9.6	7.6	6.4	6.2	5.4	5	5.6	6.1	4.1	4	2.9	6
19	9.6	7.3	6.4	5.8	5	5.2	5.8	6.6	3.9	4	2.8	5
20	9.2	7.1	6.6	6	5	5.4	5.5	6.6	4.4	4.4	2.8	4.5
21	9.3	7.1	7	6	5	5.6	5.3	6.3	4.1	5.6	4.2	3.9
22	9.6	7.6	6.6	6.2	5	5.6	5.3	6.4	4.1	5.1	3.7	3.7
23	9.6	7.4	6.2	6.4	5.4	5.6	5.7	6.2	4	5.3	3.6	3.5
24	8.7	6.9	6.2	5.8	5.2	5.8	6	6	3.7	5.1	3.5	3.5
25	8.6	6.8	6.2	5.8	5.2	5.6	6.2	5.7	3.6	4.4	3.3	3.5
26	8.7	6.8	6.4	6	5	5.8	6.2	5.5	3.7	4.4	3.2	3.9
27	8.6	6.6	6.6	6.2	4.8	6	5.8	5.5	4.3	4.2	3.3	4.3
28	8.7	6.2	6.6	6.6	5	6	5	5.5	4.5	4	3.3	5.8
29	8.7	6.4	6.6	6.2	---	6	5.1	5.4	4.1	3.9	4	5.7
30	8.7	6.8	6.8	6.2	---	6	5.1	5.8	3.9	5	4.2	5.2
31	8.7	---	6.4	5.8	---	6	---	6.3	---	4.1	3.8	---
TOTAL	290.4	228.7	203.4	194.4	147.8	167	183.4	176.3	147.5	149.9	109.2	149.8
MEAN	9.4	7.6	6.6	6.3	5.3	5.4	6.1	5.7	4.9	4.8	3.5	5
AC-FT	576	454	403	386	293	331	364	350	293	297	217	297
MAX	9.8	8.8	7.2	7	5.8	6	7.1	6.6	6.9	7.3	4.7	8.6
MIN	8.6	6.2	6.2	5.8	4.8	4.8	5	5	3.6	3.8	2.8	3.1

CAL YR 2001 TOTAL 4234 MEAN 11.6 MAX 46 MIN 3.4 AC-FT 8400  
WTR YR 2002 TOTAL 2147.8 MEAN 5.88 MAX 9.8 MIN 2.8 AC-FT 4260

MAX DISCH: 10.8 CFS AT 07:30 ON Sep. 10, 2002 GH 2.28 FT. SHIFT 0.03 FT.  
MAX GH: 2.29 FT. AT 13:15 ON Oct. 9, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## RIO GRANDE BASIN

## CLOSED BASIN IN SAN LUIS VALLEY

## WILD CHERRY CREEK near CRESTONE, CO

**LOCATION.**--Lat 38°06'01", long 105°46'04", SW ¼ SW ¼ Sec. 33, T.45 N., R.11 E., NMPM, Saguache Co., on right bank, 12 miles SE of Mineral Hot Springs, 8 Miles NW of Crestone.

**DRAINAGE AREA.**--4.5 mi<sup>2</sup>.

**GAGE.**--Station established in water year 1999 with the installation of 4' diameter CMP stilling well and shelter. Satellite monitoring system installed Mar. 25, 1999 with chart recorder added on Apr. 28, 1999 as a backup. Elevation of gage is 8560 ft.

**REMARKS.**--Record complete and reliable for the water year, except November 29, 2001 through April 4, 2002, when station was closed for the winter. Stage-discharge relation affected by ice November 25-28, 2001. Record good except for periods of no gage height record which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--CHECRECO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

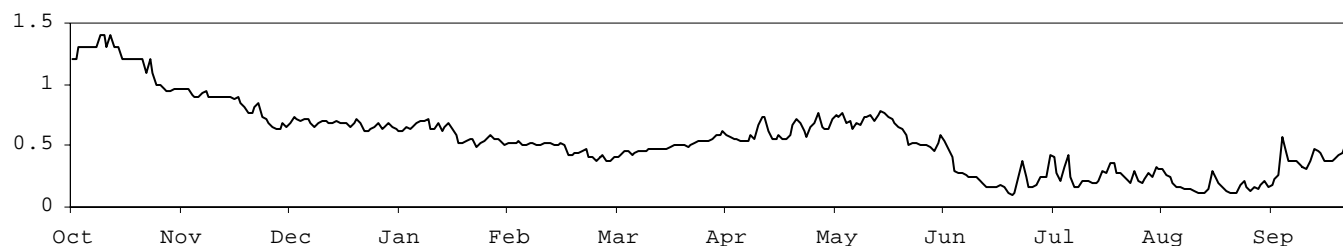
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1.2	.96	.66	.64	.5	.43	.56	.76	.51	.16	.2	.13
2	1.2	.96	.68	.62	.52	.38	.58	.66	.49	.18	.23	.16
3	1.3	.96	.74	.62	.52	.37	.58	.63	.46	.25	.27	.15
4	1.3	.92	.72	.66	.52	.4	.62	.64	.52	.25	.24	.18
5	1.3	.9	.7	.64	.54	.41	.59	.72	.59	.24	.33	.21
6	1.3	.9	.72	.66	.5	.43	.57	.75	.54	.42	.31	.16
7	1.3	.93	.72	.68	.5	.45	.56	.73	.48	.4	.31	.18
8	1.3	.95	.68	.7	.52	.45	.56	.76	.4	.27	.26	.23
9	1.4	.9	.66	.7	.52	.42	.54	.69	.3	.21	.24	.26
10	1.4	.9	.68	.72	.5	.44	.54	.7	.27	.33	.2	.57
11	1.3	.9	.7	.64	.5	.45	.53	.64	.27	.42	.17	.44
12	1.4	.9	.7	.64	.52	.45	.58	.69	.26	.25	.16	.37
13	1.3	.9	.68	.68	.52	.46	.56	.67	.25	.17	.15	.37
14	1.3	.9	.68	.62	.52	.48	.67	.73	.25	.16	.15	.37
15	1.2	.9	.7	.66	.5	.47	.74	.73	.25	.22	.14	.34
16	1.2	.88	.68	.68	.5	.48	.74	.75	.22	.22	.13	.33
17	1.2	.89	.68	.64	.52	.48	.62	.7	.19	.22	.12	.31
18	1.2	.85	.68	.58	.5	.47	.56	.75	.17	.2	.12	.37
19	1.2	.82	.66	.52	.43	.47	.56	.78	.16	.19	.12	.47
20	1.2	.77	.68	.52	.43	.49	.58	.77	.16	.22	.14	.46
21	1.2	.76	.72	.54	.44	.5	.55	.74	.16	.29	.3	.44
22	1.1	.82	.68	.56	.44	.5	.55	.71	.18	.27	.23	.37
23	1.2	.84	.62	.56	.46	.5	.58	.68	.17	.36	.2	.38
24	1.1	.73	.62	.49	.48	.5	.67	.66	.11	.36	.16	.38
25	1	.72	.64	.52	.4	.49	.72	.64	.09	.27	.13	.39
26	1	.68	.66	.54	.4	.5	.68	.59	.11	.27	.12	.43
27	.96	.66	.68	.56	.38	.52	.62	.51	.25	.25	.12	.44
28	.94	.64	.64	.58	.41	.54	.57	.52	.37	.22	.12	.53
29	.95	.64	.66	.56	---	.54	.66	.52	.24	.2	.18	.54
30	.96	.68	.68	.56	---	.54	.68	.51	.16	.3	.21	.53
31	.97	---	.66	.54	---	.54	---	.5	---	.21	.17	---
TOTAL	36.88	25.16	21.06	18.83	13.49	14.55	18.12	20.83	8.58	7.98	5.93	10.49
MEAN	1.19	.84	.68	.61	.48	.47	.6	.67	.29	.26	.19	.35
AC-FT	.73	.50	.42	.37	.27	.29	.36	.41	.17	.16	.12	.21
MAX	1.4	.96	.74	.72	.54	.54	.74	.78	.59	.42	.33	.57
MIN	.94	.64	.62	.49	.38	.37	.53	.5	.09	.16	.12	.13

CAL YR 2001 TOTAL 970.75 MEAN 2.66 MAX 18 MIN 0.4 AC-FT 1930  
WTR YR 2002 TOTAL 201.9 MEAN .55 MAX 1.4 MIN .09 AC-FT 400

MAX DISCH: 1.5 CFS AT 14:00 ON Oct. 9, 2001 GH 1.43 FT. SHIFT 0.09 FT.  
MAX GH: 1.48 FT. AT 14:30 ON Nov. 24, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN  
CLOSED BASIN IN SAN LUIS VALLEY  
RITO ALTO CREEK near CRESTONE, CO

**LOCATION.**--Lat 38°04'39", long 105°45'43", in SW1/4NE1/4 Sec. 9, T.44 N., R.11 E., NMPM, Saguache Co., on right bank 12 miles SE of Mineral Hot Springs, 7 miles NW of Crestone.

**DRAINAGE AREA.**--10.3 mi<sup>2</sup>.

**GAGE.**--Station established in 1999 with the installation of 4' diameter CMP stilling well and shelter. Satellite monitoring system installed April 1, 1999. Strip chart recorder installed on April 27, 1999 as a backup. Elevation of gage is 8380 ft.

**REMARKS.**--Water-year record is complete and reliable except for November 29, 2001 to April 4, 2002, when station was closed for the winter. Stage-discharge relation affected by ice November 26-28, 2001. Record good, except for periods of no gage-height data, or ice affected data, which is poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--RITCRECO3 USED FROM 01-OCT-2001 TO 30-SEP-2002

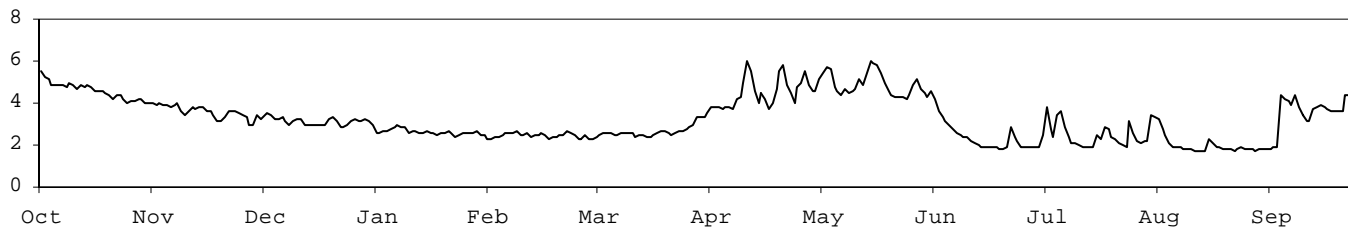
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	5.5	4	3.2	3	2.5	2.5	3.3	5.5	5.1	1.9	2.2	1.8
2	5.2	3.9	3.4	2.6	2.3	2.3	3.3	4.9	4.7	1.9	2.1	1.8
3	5.1	4	3.5	2.6	2.3	2.3	3.3	4.6	4.5	1.9	2.2	1.7
4	4.9	3.9	3.4	2.7	2.4	2.4	3.5	4.6	4.3	1.9	2.2	1.8
5	4.9	3.9	3.2	2.7	2.4	2.5	3.8	5.1	4.6	1.9	3.4	1.8
6	4.9	3.8	3.2	2.8	2.5	2.6	3.8	5.4	4.2	2.5	3.3	1.8
7	4.9	3.9	3.3	2.9	2.6	2.6	3.8	5.7	3.6	3.8	3.2	1.8
8	4.8	4	3.1	3	2.6	2.6	3.7	5.6	3.3	2.8	2.8	1.9
9	5	3.6	3	2.9	2.6	2.5	3.8	4.8	3.1	2.4	2.5	1.9
10	4.9	3.4	3.1	2.9	2.7	2.5	3.8	4.6	3	3.4	2.1	4.4
11	4.7	3.6	3.2	2.6	2.5	2.6	3.7	4.4	2.8	3.6	1.9	4.2
12	4.9	3.8	3.2	2.7	2.5	2.6	4.2	4.7	2.6	2.9	1.9	4.1
13	4.8	3.7	3	2.7	2.6	2.6	4.3	4.5	2.5	2.4	1.9	3.9
14	4.9	3.8	3	2.6	2.4	2.6	5	4.6	2.4	2.1	1.8	4.4
15	4.8	3.8	3	2.6	2.5	2.4	6	4.7	2.4	2.1	1.8	3.8
16	4.6	3.6	3	2.7	2.5	2.5	5.5	5.1	2.2	2	1.8	3.4
17	4.6	3.6	3	2.6	2.6	2.5	4.6	4.9	2.1	1.9	1.7	3.1
18	4.6	3.4	3	2.6	2.5	2.4	4	5.4	2	1.9	1.7	3.1
19	4.5	3.1	3	2.5	2.3	2.4	4.5	6	1.9	1.9	1.7	3.7
20	4.4	3.1	3.2	2.6	2.4	2.5	4.2	5.9	1.9	1.9	1.7	3.8
21	4.2	3.3	3.3	2.6	2.4	2.6	3.7	5.8	1.9	2.5	2.3	3.9
22	4.4	3.6	3.1	2.7	2.5	2.7	4	5.4	1.9	2.3	2.1	3.8
23	4.4	3.6	2.9	2.6	2.5	2.7	4.7	5	1.9	2.9	1.9	3.7
24	4.2	3.6	2.9	2.4	2.7	2.6	5.5	4.6	1.8	2.8	1.9	3.6
25	4	3.5	3	2.5	2.6	2.5	5.8	4.4	1.8	2.4	1.8	3.6
26	4.1	3.4	3.1	2.6	2.5	2.6	4.9	4.3	1.9	2.3	1.8	3.6
27	4.1	3.3	3.2	2.6	2.3	2.7	4.5	4.3	2.9	2.1	1.8	3.6
28	4.2	3	3.1	2.6	2.3	2.7	4	4.3	2.4	2	1.7	4.4
29	4.2	3	3.1	2.6	---	2.8	4.8	4.2	2.2	1.9	1.8	4.4
30	4	3.4	3.2	2.7	---	2.9	5	4.4	1.9	3.1	1.9	4.3
31	4	---	3.1	2.5	---	3	---	4.9	---	2.6	1.8	---
TOTAL	142.7	107.6	97	82.7	69.5	79.7	129	152.6	83.8	74	64.7	97.1
MEAN	4.6	3.6	3.1	2.7	2.5	2.6	4.3	4.9	2.8	2.4	2.1	3.2
AC-FT	283	213	192	164	138	158	256	303	166	147	128	193
MAX	5.5	4	3.5	3	2.7	3	6	6	5.1	3.8	3.4	4.4
MIN	4	3	2.9	2.4	2.3	2.3	3.3	4.2	1.8	1.9	1.7	1.7

CAL YR	2001	TOTAL	4573.1	MEAN	12.5	MAX	92	MIN	1.8	AC-FT	9070
WTR YR	2002	TOTAL	1180.4	MEAN	3.23	MAX	6	MIN	1.7	AC-FT	2340

MAX DISCH: 7 CFS AT 19:45 ON Apr. 15, 2002 GH 1.99 FT. SHIFT 0.01 FT.  
MAX GH: 1.99 FT. AT 19:45 ON Apr. 15, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## RIO GRANDE BASIN

## CLOSED BASIN IN SAN LUIS VALLEY

## SAN ISABEL CREEK near CRESTONE, CO

**LOCATION.**--Lat 38°02'04", long 105°43'03", in NW1/4,NW1/4, T.44 N., R.11 E., NMPM, Saguache Co., on left bank 3 miles NW of Crestone.

**DRAINAGE AREA.**--5.7 mi<sup>2</sup>.

**GAGE.**--Station established in 1999 with the installation of 4' diameter CMP stilling well and shelter. Satellite monitoring system installed on Apr. 01, 1999 with a chart recorder backup installed on Apr. 27, 1999. Elevation of gage is 8200 ft.

**REMARKS.**--Record is complete and reliable except for the following periods: November 28, 2001 when the well was frozen. November 29, 2001 through April 4, 2002, when station was closed for winter. Gage-height was affected by ice on November 24, 26, 27, 2001. Record good, except during periods of no stage data and ice effect, which is poor. Station maintained and record developed by Div. III Hydrographic Staff.

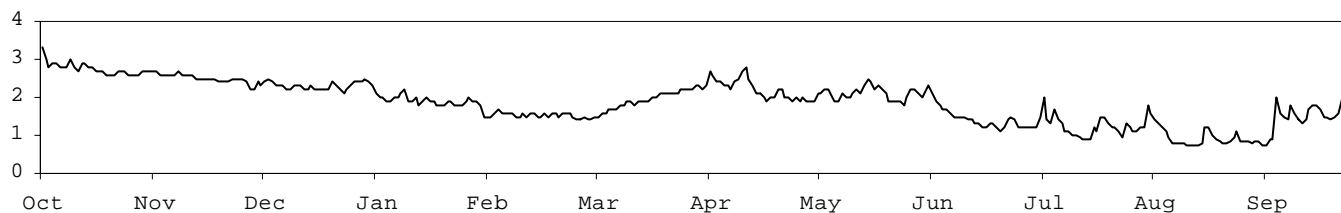
**RATING TABLE.**--SANCRECO01 USED FROM 01-OCT-2001 TO 31-DEC-2001  
SANCRECO02 USED FROM 01-JAN-2002 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	3.3	2.7	2.3	2.3	1.5	1.5	2.3	2	2.2	1.2	1.1	.84
2	3	2.7	2.4	2.1	1.5	1.4	2.3	1.9	2.1	1.2	1.1	.83
3	2.8	2.6	2.5	2	1.5	1.4	2.2	1.9	2	1.2	1.2	.81
4	2.9	2.6	2.4	2	1.6	1.5	2.3	1.9	2.1	1.2	1.2	.86
5	2.9	2.6	2.3	1.9	1.7	1.5	2.7	2.1	2.3	1.2	1.8	.83
6	2.8	2.6	2.3	1.9	1.6	1.6	2.6	2.1	2.1	1.5	1.6	.76
7	2.8	2.6	2.3	2	1.6	1.6	2.4	2.2	1.9	2	1.4	.74
8	2.8	2.7	2.2	2	1.6	1.7	2.4	2.2	1.8	1.4	1.3	.92
9	3	2.6	2.2	2.1	1.6	1.7	2.3	2	1.7	1.3	1.2	.91
10	2.8	2.6	2.3	2.2	1.5	1.7	2.3	1.9	1.7	1.7	1.1	2
11	2.7	2.6	2.3	1.9	1.5	1.8	2.2	1.9	1.6	1.4	.95	1.6
12	2.9	2.6	2.3	1.9	1.6	1.8	2.4	2.1	1.5	1.3	.77	1.5
13	2.9	2.5	2.2	2	1.5	1.9	2.5	2	1.5	1.1	.77	1.4
14	2.8	2.5	2.2	1.8	1.6	1.9	2.7	2	1.5	1.1	.77	1.8
15	2.8	2.5	2.3	1.9	1.6	1.8	2.8	2.1	1.5	1	.78	1.6
16	2.7	2.5	2.2	2	1.5	1.9	2.5	2.2	1.4	1	.76	1.4
17	2.7	2.5	2.2	1.9	1.5	1.9	2.3	2.1	1.4	.97	.72	1.3
18	2.7	2.5	2.2	1.9	1.6	1.9	2.1	2.3	1.3	.91	.73	1.4
19	2.6	2.4	2.2	1.8	1.5	1.9	2.1	2.5	1.3	.87	.74	1.7
20	2.6	2.4	2.2	1.8	1.6	2	2	2.4	1.2	.91	.81	1.8
21	2.6	2.4	2.4	1.8	1.6	2	1.9	2.2	1.2	1.2	1.2	1.8
22	2.7	2.4	2.3	1.9	1.5	2.1	2	2.3	1.3	1.1	1.2	1.7
23	2.7	2.5	2.2	1.9	1.6	2.1	2	2.2	1.3	1.5	1	1.5
24	2.7	2.5	2.1	1.8	1.6	2.1	2.2	2.1	1.2	1.5	.9	1.5
25	2.6	2.5	2.2	1.8	1.6	2.1	2.2	1.9	1.1	1.3	.85	1.4
26	2.6	2.5	2.3	1.8	1.5	2.1	2	1.9	1.2	1.2	.81	1.5
27	2.6	2.4	2.4	1.9	1.4	2.1	2	1.9	1.4	1.2	.79	1.6
28	2.6	2.2	2.4	2	1.4	2.2	1.9	1.9	1.5	1.1	.83	2
29	2.7	2.2	2.4	1.9	---	2.2	2	1.8	1.4	.97	.96	2
30	2.7	2.4	2.5	1.9	---	2.2	1.9	2	1.2	1.3	1.1	1.9
31	2.7	---	2.4	1.8	---	2.2	---	2.2	---	1.2	.84	---
TOTAL	85.7	75.3	71.1	59.9	43.4	57.8	67.5	64.2	46.9	38.03	31.28	41.9
MEAN	2.8	2.5	2.3	1.9	1.6	1.9	2.3	2.1	1.6	1.23	1.01	1.4
AC-FT	170	149	141	119	86	115	134	127	93	75	62	83
MAX	3.3	2.7	2.5	2.3	1.7	2.2	2.8	2.5	2.3	2	1.8	2
MIN	2.6	2.2	2.1	1.8	1.4	1.4	1.9	1.8	1.1	.87	.72	.74
CAL YR 2001	TOTAL	2559.3	MEAN	7.01	MAX	54	MIN	1.3	AC-FT	5080		
WTR YR 2002	TOTAL	683.01	MEAN	1.87	MAX	3.3	MIN	.72	AC-FT	1350		

MAX DISCH: 3.88 CFS AT 00:45 ON Oct. 1, 2001 GH 3.67 FT. SHIFT 0.09 FT.  
MAX GH: 3.91 FT. AT 11:30 ON Nov. 27, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08227000 SAGUACHE CREEK NEAR SAGUACHE, CO

**LOCATION.**--Lat 38°09'48", long 106°17'24", in SE¼SE¼ sec. 10, T. 45 N., R 6 E., Saguache County, Hydrologic Unit 13010004, on left bank 0.2 Mi downstream from Middle Creek and 10 mi northwest of Saguache.

**PERIOD OF RECORD AND DRAINAGE AREA.**--595 mi<sup>2</sup>. Aug. 1910-Sept. 1912, Jun. 1914 to current year. Monthly discharge only for some periods. Water-quality data available, Apr. 1993-Sep. 1995.

**GAGE.**--Graphic water-stage recorder and Sutron satellite monitoring equipment including an air temperature sensor in a metal pipe shelter and well. Datum of gage is approximately 8,030 ft. (from topographic map).

**REMARKS.**--Record is complete and reliable. The stage-discharge relation was affected by ice Nov. 25, 2001 through Apr. 4, 2002. Record is good except for periods of ice affected record, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--SAGSAGCO16 USED FROM 01-OCT-2001 TO 30-SEP-2002

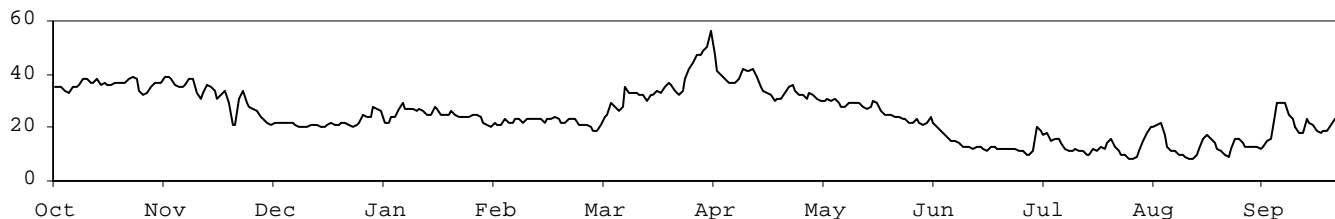
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	35	39	21	26	20	20	47	31	23	11	8.4	14
2	35	39	22	22	22	19	49	33	22	10	9	13
3	35	38	22	22	21	19	50	32	21	10	11	13
4	34	36	22	24	21	21	56	31	22	11	15	13
5	33	35	22	24	23	24	47	30	24	20	18	13
6	35	35	22	27	22	25	41	30	22	19	20	12
7	35	36	22	29	22	29	40	31	20	17	20	13
8	36	38	21	27	23	28	38	30	19	18	21	15
9	38	38	20	27	23	26	37	31	17	15	22	16
10	38	33	20	27	22	28	37	29	16	16	17	25
11	37	31	20	26	23	35	37	28	15	16	13	29
12	37	33	21	27	23	33	38	28	15	14	11	29
13	38	36	21	26	23	33	42	29	14	12	11	29
14	36	35	21	25	23	33	41	29	13	11	10	25
15	37	34	20	25	23	32	41	29	13	11	9.5	23
16	36	31	20	28	22	32	42	29	13	12	8.8	20
17	36	32	21	27	23	30	39	28	12	11	8.1	18
18	37	34	22	25	23	32	35	27	13	11	8.4	18
19	37	29	21	25	24	32	34	28	13	10	9.5	23
20	37	21	21	25	23	34	33	30	12	9.9	12	22
21	37	21	22	26	22	33	32	29	11	12	16	21
22	38	31	22	25	22	35	30	26	13	11	17	19
23	39	34	21	24	23	37	31	25	13	13	16	18
24	38	29	20	24	23	36	31	25	12	12	14	19
25	34	28	21	24	23	34	33	25	12	14	12	19
26	32	27	22	24	21	32	35	24	12	16	11	21
27	33	26	25	25	21	34	36	24	12	13	9.8	23
28	35	24	24	25	21	38	34	23	12	11	9.2	25
29	37	23	24	24	---	42	32	23	12	9.8	12	26
30	37	22	28	22	---	44	32	22	11	9.7	16	25
31	37	---	27	21	---	47	---	22	---	8.6	16	---
TOTAL	1119	948	678	778	625	977	1150	861	459	395	411.7	599
MEAN	36	32	22	25	22	32	38	28	15	12.7	13.3	20
AC-FT	2220	1880	1340	1540	1240	1940	2280	1710	910	783	817	1190
MAX	39	39	28	29	24	47	56	33	24	20	22	29
MIN	32	21	20	21	20	19	30	22	11	8.6	8.1	12

CAL YR	2001	TOTAL	25361	MEAN	69.5	MAX	371	MIN	14	AC-FT	50300
WTR YR	2002	TOTAL	9000.7	MEAN	24.7	MAX	56	MIN	8.1	AC-FT	17850

MAX DISCH: 67.1 CFS AT 20:00 ON Apr. 5, 2002 GH 1.76 FT. SHIFT -0.02 FT.  
MAX GH: 2.48 FT. AT 15:45 ON Mar. 13, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





## RIO GRANDE BASIN

## CLOSED BASIN IN SAN LUIS VALLEY, CO

08227500 NORTH CRESTONE CREEK NEAR CRESTONE, CO

**LOCATION.**--Lat 38°00'49", long 105°41'32", Saguache County, Hydrologic Unit 13010003, on right bank in canyon, 1.5 mi. northeast of Crestone, and 3.2 mi. upstream from South Crestone Creek.

**DRAINAGE AREA.**--10.7 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder in a timber shelter and well. Altitude of gage is 8,360 ft from topographic map.

**REMARKS.**--Record is complete and reliable except for Dec. 1 - 25, 2001, when the well was frozen; March 30 through April 24, 2002, when the chart recorder malfunctioned; and Dec. 26, 2001 through March 29, 2002, when the station was closed for the winter. Stage-discharge relation was affected by ice November 26-30, 2001. Record is good except for periods of no gage-height, ice affected record, and recorder malfunction, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--NOCRESCO10 USED FROM 01-OCT-2001 TO 30-SEP-2002

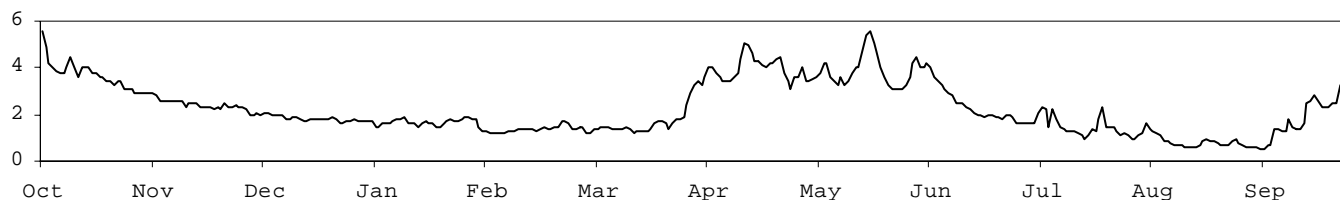
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	5.6	2.9	2	1.7	1.3	1.5	3.3	4	4.2	1.6	.98	.67
2	4.9	2.8	2.1	1.5	1.3	1.2	3.4	3.4	4.5	1.6	.98	.56
3	4.2	2.6	2.1	1.5	1.2	1.2	3.3	3.4	4	1.6	1.1	.56
4	4	2.6	2	1.6	1.2	1.4	3.6	3.5	4	1.6	1.2	.61
5	3.9	2.6	2	1.6	1.2	1.4	4	3.6	4.2	1.6	1.6	.59
6	3.8	2.6	2	1.6	1.2	1.5	4	3.8	4	2.1	1.4	.48
7	3.8	2.6	2	1.7	1.2	1.5	3.8	4.2	3.6	2.3	1.3	.52
8	4	2.6	1.8	1.8	1.3	1.5	3.6	4.2	3.4	2.2	1.2	.7
9	4.5	2.6	1.8	1.8	1.3	1.4	3.4	3.6	3.3	1.5	1.1	.72
10	4	2.3	1.9	1.9	1.3	1.4	3.4	3.4	3.1	2.2	.9	1.4
11	3.6	2.5	1.9	1.6	1.4	1.4	3.4	3.3	2.9	1.8	.83	1.4
12	4	2.5	1.8	1.6	1.4	1.4	3.6	3.6	2.8	1.5	.75	1.3
13	4	2.5	1.7	1.6	1.4	1.5	3.8	3.3	2.5	1.4	.72	1.3
14	4	2.3	1.7	1.5	1.4	1.4	4.4	3.4	2.5	1.3	.72	1.8
15	3.8	2.3	1.8	1.6	1.4	1.2	5.1	3.8	2.5	1.3	.67	1.5
16	3.8	2.3	1.8	1.7	1.3	1.3	5	4	2.3	1.3	.61	1.4
17	3.6	2.3	1.8	1.6	1.4	1.3	4.6	4	2.2	1.2	.58	1.4
18	3.6	2.2	1.8	1.6	1.5	1.3	4.3	4.7	2.1	1.1	.56	1.6
19	3.4	2.3	1.8	1.5	1.4	1.3	4.3	5.4	2	.98	.61	2.5
20	3.4	2.2	1.8	1.5	1.4	1.4	4.1	5.6	2	1.1	.67	2.6
21	3.3	2.5	1.9	1.6	1.5	1.6	4	5.1	1.9	1.4	.83	2.8
22	3.4	2.3	1.8	1.7	1.5	1.7	4.2	4.7	2	1.3	.93	2.6
23	3.4	2.3	1.6	1.8	1.7	1.7	4.2	4	2	1.8	.83	2.3
24	3.1	2.4	1.6	1.7	1.7	1.6	4.4	3.6	1.9	2.3	.83	2.3
25	3.1	2.3	1.7	1.7	1.6	1.4	4.5	3.3	1.9	1.5	.78	2.3
26	3.1	2.3	1.7	1.8	1.4	1.6	3.8	3.1	1.8	1.5	.67	2.5
27	2.9	2.2	1.8	1.9	1.4	1.8	3.4	3.1	2	1.5	.67	2.5
28	2.9	2	1.7	1.9	1.5	1.8	3.1	3.1	2	1.3	.67	3.3
29	2.9	2	1.7	1.8	---	1.9	3.6	3.1	1.9	1.1	.83	3.3
30	2.9	2.1	1.7	1.8	---	2.4	3.6	3.3	1.6	1.2	.95	3.3
31	2.9	---	1.7	1.5	---	2.9	---	3.6	---	1.1	.78	---
TOTAL	113.8	72	56.5	51.7	38.8	47.9	117.2	118.2	81.1	47.28	27.25	50.81
MEAN	3.7	2.4	1.8	1.7	1.4	1.6	3.9	3.8	2.7	1.53	.88	1.69
AC-FT	226	143	112	103	77	95	232	234	161	94	54	101
MAX	5.6	2.9	2.1	1.9	1.7	2.9	5.1	5.6	4.5	2.3	1.6	3.3
MIN	2.9	2	1.6	1.5	1.2	1.2	3.1	3.1	1.6	.98	.56	.48

CAL YR 2001 TOTAL 4741.6 MEAN 13.0 MAX 90 MIN 1.2 AC-FT 9400  
WTR YR 2002 TOTAL 822.54 MEAN 2.25 MAX 5.6 MIN .48 AC-FT 1630

MAX DISCH: 8.9 CFS AT 23:30 ON April 14, 2002 GH 1.62 FT. SHIFT 0.06 FT.  
MAX GH: 1.62 FT. AT 23:30 ON Apr. 14, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

CLOSED BASIN IN SAN LUIS VALLEY

SOUTH CRESTONE CREEK near CRESTONE, CO

LOCATION.--Lat 37°58'55", long 105°42'41", in NE1/4SW1/4 Sec. 12, T.43 N., R.11 E., NMPM, Saguache Co., on right bank, 1 mile SE of Crestone.

DRAINAGE AREA.--4.6 mi<sup>2</sup>.

GAGE.--2' diameter CMP installed as stilling well with small shelter on top for equipment at an existing 2.5' Parshall flume. Satellite monitoring system installed and put into operation Apr. 6, 1999. Elevation of gage is 7740 ft.

REMARKS.--Gage-height data complete and reliable except for the following periods: Nov. 28, 2001 through Mar. 29, 2002, when the station was closed for the winter. Mar. 30, 31, Apr. 1-9, 14, 16-18, 2002, when there was flow and the station was isolated. There was no flow for 210 days this water year. Record good, except for periods of missing or incomplete gage-height data, which is poor. Station maintained and record developed by Div. III Hydrographic Staff.

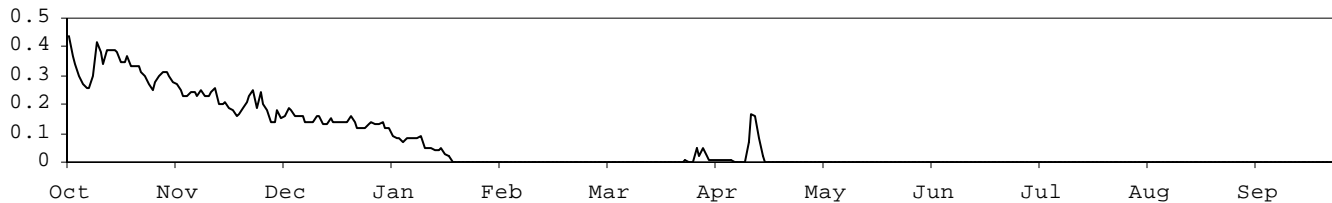
RATING TABLE.--SOUCRECO1 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.44	.27	.15	.12	0	0	.05	0	0	0	0	0
2	.37	.25	.16	.09	0	0	.02	0	0	0	0	0
3	.34	.23	.19	.08	0	0	.01	0	0	0	0	0
4	.3	.23	.18	.08	0	0	.01	0	0	0	0	0
5	.27	.24	.16	.07	0	0	.01	0	0	0	0	0
6	.26	.24	.16	.08	0	0	.01	0	0	0	0	0
7	.26	.23	.16	.08	0	0	.01	0	0	0	0	0
8	.3	.25	.14	.08	0	0	.01	0	0	0	0	0
9	.42	.23	.14	.08	0	0	.01	0	0	0	0	0
10	.38	.23	.14	.09	0	0	0	0	0	0	0	0
11	.34	.24	.16	.05	0	0	0	0	0	0	0	0
12	.39	.26	.16	.05	0	0	0	0	0	0	0	0
13	.39	.2	.13	.05	0	0	0	0	0	0	0	0
14	.39	.2	.13	.04	0	0	.07	0	0	0	0	0
15	.38	.21	.15	.04	0	0	.17	0	0	0	0	0
16	.35	.19	.14	.05	0	0	.16	0	0	0	0	0
17	.35	.18	.14	.03	0	0	.08	0	0	0	0	0
18	.37	.16	.14	.02	0	0	.02	0	0	0	0	0
19	.33	.17	.14	0	0	0	0	0	0	0	0	0
20	.33	.19	.14	0	0	0	0	0	0	0	0	0
21	.33	.21	.16	0	0	0	0	0	0	0	0	0
22	.31	.23	.14	0	0	0	0	0	0	0	0	0
23	.3	.25	.12	0	0	0	0	0	0	0	0	0
24	.27	.19	.12	0	0	0	0	0	0	0	0	0
25	.25	.24	.12	0	0	0	0	0	0	0	0	0
26	.28	.2	.13	0	0	0	0	0	0	0	0	0
27	.3	.18	.14	0	0	.01	0	0	0	0	0	0
28	.31	.14	.13	0	0	0	0	0	0	0	0	0
29	.31	.14	.13	0	---	0	0	0	0	0	0	0
30	.3	.18	.14	0	---	.05	0	0	0	0	0	0
31	.28	---	.12	0	---	.02	---	0	---	0	0	---
TOTAL	10.2	6.36	4.46	1.18	0	.08	.64	0	0	0	0	0
MEAN	.33	.21	.14	.04	0	0	.02	0	0	0	0	0
AC-FT	20	13	8.8	2.3	0	.2	1.3	0	0	0	0	0
MAX	.44	.27	.19	.12	0	.05	.17	0	0	0	0	0
MIN	.25	.14	.12	0	0	0	0	0	0	0	0	0
CAL YR 2001	TOTAL	657.6	MEAN	1.80	MAX	15	MIN	0	AC-FT	1300		
WTR YR 2002	TOTAL	22.92	MEAN	.063	MAX	.44	MIN	0	AC-FT	45		

MAX DISCH: 0.58 CFS AT 03:45 ON Oct. 1, 2001 GH 0.16 FT. SHIFT 0 FT.  
MAX GH: 0.23 FT. AT 05:30 ON Nov. 27, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

CLOSED BASIN IN SAN LUIS VALLEY

WILLOW CREEK near CRESTONE, CO

**LOCATION.**--Lat 37°57'29", long 105°41'59", in SE1/4NW1/4 Sec. 20, T.43 N., R.12 E., NMPM, Saguache Co. on right bank, 2 miles SE of Crestone.

**DRAINAGE AREA.**--8.0 mi<sup>2</sup>.

**GAGE.**--Station installed in 1999 with a 2' diameter CMP stilling well with a small steel box structure on top for equipment. Satellite monitoring system installed and put into operation April 1, 1999. Elevation of gage is 7740 ft.

**REMARKS.**--Gage-height record complete and reliable for the year except November 21, 24, 26-29, December 1, 2, 5-7, 2001, and March 30, 31, April 1, 30, May 1-9, 2002, when the station was isolated; December 8-25, 2001, when the well was frozen; and December 26, 2001 to March 29, 2002, when the station was shut down for the winter. Record good, except periods when gage heights were missing, ice-affected, or when station was isolated, which is poor. Station maintained and record developed by Div. III Hydrographic Staff.

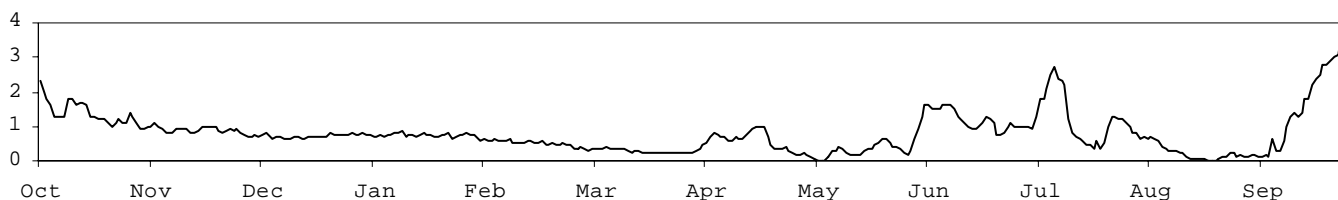
**RATING TABLE.**--WILCRECO02 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	2.3	1	.72	.78	.6	.39	.24	.15	.31	.96	.97	.15
2	2	1.1	.76	.7	.64	.32	.27	.22	.61	1	.82	.14
3	1.8	.97	.82	.7	.56	.3	.34	.16	.94	.99	.82	.13
4	1.6	.9	.68	.78	.6	.33	.45	.1	1.3	.96	.64	.2
5	1.3	.84	.66	.72	.64	.34	.54	.04	1.6	.92	.68	.15
6	1.3	.84	.7	.78	.56	.37	.69	0	1.6	1.3	.61	.09
7	1.3	.84	.7	.78	.58	.37	.82	0	1.5	1.8	.68	.1
8	1.3	.91	.66	.82	.58	.4	.77	0	1.5	1.8	.61	.19
9	1.8	.94	.66	.82	.62	.32	.68	.09	1.5	2.1	.56	.14
10	1.8	.94	.66	.86	.54	.34	.68	.31	1.6	2.5	.41	.63
11	1.6	.91	.72	.72	.54	.37	.59	.3	1.6	2.7	.34	.31
12	1.7	.84	.72	.74	.54	.33	.6	.38	1.6	2.4	.29	.29
13	1.7	.82	.66	.76	.54	.36	.69	.35	1.5	2.3	.29	.58
14	1.6	.87	.66	.7	.56	.31	.64	.25	1.3	2.2	.28	.96
15	1.3	1	.72	.74	.56	.26	.66	.19	1.2	1.2	.26	1.3
16	1.3	1	.7	.8	.5	.28	.77	.17	1.1	.81	.21	1.4
17	1.2	1	.7	.74	.52	.28	.89	.17	.98	.72	.09	1.3
18	1.2	1	.7	.74	.56	.24	.92	.17	.95	.64	.04	1.4
19	1.2	.99	.7	.7	.48	.24	.96	.31	.91	.58	.04	1.8
20	1.1	.86	.72	.72	.48	.24	.96	.35	.97	.44	.03	1.8
21	1	.82	.84	.74	.5	.25	.96	.35	1.1	.44	.08	2.2
22	1.1	.85	.78	.78	.44	.25	.69	.47	1.3	.34	.03	2.4
23	1.2	.9	.74	.8	.47	.25	.47	.54	1.2	.58	.01	2.5
24	1.1	.86	.74	.66	.5	.26	.36	.61	1.1	.32	0	2.8
25	1.1	.9	.74	.7	.48	.22	.32	.61	.76	.55	0	2.8
26	1.4	.84	.76	.74	.45	.22	.36	.54	.77	.99	.05	2.9
27	1.3	.78	.8	.76	.37	.22	.41	.4	.82	1.3	.12	3
28	1.1	.72	.78	.82	.37	.22	.28	.4	1	1.3	.14	3.1
29	.94	.72	.78	.76	---	.22	.26	.35	1.1	1.2	.22	3.5
30	.94	.76	.84	.76	---	.22	.18	.22	1	1.2	.22	3.6
31	.96	---	.78	.68	---	.22	---	.17	---	1.1	.13	---
TOTAL	42.54	26.72	22.6	23.3	14.78	8.94	17.45	8.37	34.72	37.64	9.67	41.86
MEAN	1.37	.89	.73	.75	.53	.29	.58	.27	1.16	1.21	.31	1.4
AC-FT	84	53	45	46	29	18	35	17	69	75	19	83
MAX	2.3	1.1	.84	.86	.64	.4	.96	.61	1.6	2.7	.97	3.6
MIN	.94	.72	.66	.66	.37	.22	.18	0	.31	.32	0	.09
CAL YR 2001	TOTAL	1879.71	MEAN	5.15	MAX	38	MIN	.25	AC-FT	3730		
WTR YR 2002	TOTAL	288.59	MEAN	.79	MAX	3.6	MIN	0	AC-FT	572		

MAX DISCH: 3.74 CFS AT 00:00 ON Sep. 30, 2002 GH 2.6 FT. SHIFT -0.24 FT.  
MAX GH: 2.6 FT. AT 00:00 ON Sep. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

CLOSED BASIN IN SAN LUIS VALLEY

SPANISH CREEK near CRESTONE, CO

LOCATION.--Lat 37°57'10", long 105°39'42", in NE1/4SW1/4 Sec. 21, T.43 N., R.12 E., NMPM, Saguache Co., on left bank, 3 1/2 miles SE of Crestone.

DRAINAGE AREA.--2.4 mi<sup>2</sup>.

GAGE.--Station installed in 1999 on a 2' diameter CMP stilling well with a small steel box on top for equipment. Satellite monitoring system was installed and in operation on April 1, 1999. Elevation of gage is 8240 ft.

REMARKS.--Record is complete and reliable except for Nov. 26, 27, 2001, when the stilling well was froze; and Nov. 28, 2001 through Mar. 29, 2002, when the station was closed for winter; and float affected by a floating ice plug in well Mar. 30, 31, Apr. 1-11, 2002; and Nov. 10, 18-21, 24, 2001, Apr. 12, Jul. 17-20, Aug. 11-27, Sep. 5, 6, 2002, when the gage was isolated during some portion of each day. Record is fair to poor due to extreme low flow conditions, except for periods of bad or missing gage height, which is poor. Station maintained and record developed by Div. III Hydrographic Staff.

RATING TABLE.--SPACRECO03 USED FROM 01-OCT-2001 TO 30-SEP-2002

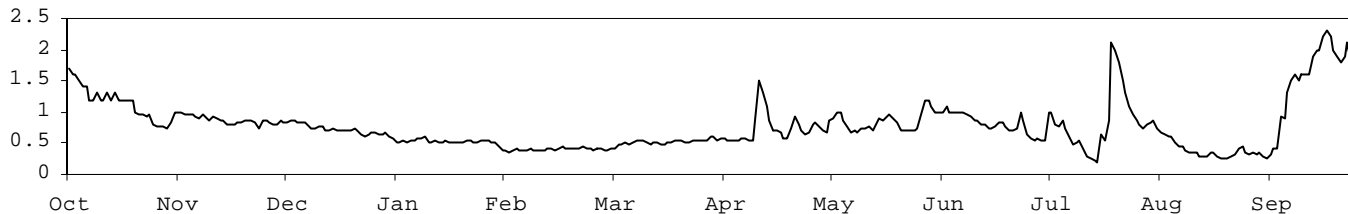
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1.7	.99	.82	.58	.37	.43	.6	.83	1.2	.57	.79	.33
2	1.6	.99	.84	.5	.39	.4	.6	.78	1.2	.55	.74	.36
3	1.6	.95	.88	.5	.36	.38	.56	.7	1.1	.58	.8	.33
4	1.5	.95	.86	.54	.39	.41	.58	.67	1	.54	.82	.35
5	1.4	.95	.82	.5	.42	.43	.58	.85	.98	.55	.86	.3
6	1.4	.92	.82	.54	.38	.47	.56	.89	1	1	.74	.25
7	1.2	.91	.82	.54	.4	.47	.54	1	1.1	1	.68	.32
8	1.2	.96	.78	.58	.4	.52	.54	1	1	.81	.65	.43
9	1.3	.89	.74	.58	.42	.49	.56	.86	1	.76	.61	.42
10	1.2	.86	.74	.6	.38	.5	.58	.78	1	.87	.61	.92
11	1.2	.92	.76	.52	.38	.56	.58	.68	1	.75	.5	.9
12	1.3	.91	.76	.52	.4	.54	.54	.7	1	.62	.45	1.3
13	1.2	.88	.7	.54	.4	.56	.55	.68	.95	.47	.45	1.5
14	1.3	.86	.7	.5	.41	.52	.88	.73	.93	.5	.4	1.6
15	1.2	.81	.74	.52	.41	.48	1.5	.73	.88	.54	.35	1.5
16	1.2	.81	.7	.54	.38	.52	1.3	.76	.88	.42	.35	1.6
17	1.2	.8	.7	.52	.42	.52	1.1	.7	.8	.3	.35	1.6
18	1.2	.82	.7	.52	.44	.48	.85	.76	.8	.26	.3	1.6
19	1.2	.84	.7	.5	.42	.48	.71	.9	.75	.22	.3	1.9
20	.98	.86	.7	.52	.42	.5	.71	.87	.73	.18	.3	2
21	.95	.86	.74	.52	.42	.52	.66	.93	.77	.63	.35	2
22	.97	.86	.7	.54	.41	.54	.58	.95	.82	.53	.35	2.2
23	.94	.82	.64	.56	.42	.54	.58	.91	.83	.87	.3	2.3
24	.95	.75	.62	.5	.44	.54	.74	.83	.77	2.1	.25	2.2
25	.8	.87	.64	.52	.42	.5	.92	.7	.69	2	.25	2
26	.78	.86	.66	.54	.41	.52	.81	.7	.69	1.8	.25	1.9
27	.78	.84	.66	.56	.4	.54	.71	.71	.75	1.5	.3	1.8
28	.77	.8	.64	.56	.41	.54	.63	.71	.99	1.3	.32	1.9
29	.74	.8	.64	.52	---	.56	.67	.71	.85	1.1	.41	2.1
30	.84	.86	.66	.52	---	.56	.81	.74	.64	.97	.45	1.8
31	.98	---	.6	.44	---	.56	---	.96	---	.88	.34	---
TOTAL	35.58	26.2	22.48	16.44	11.32	15.58	21.53	24.72	27.1	25.17	14.62	39.71
MEAN	1.15	.87	.73	.53	.4	.5	.72	.8	.9	.81	.47	1.32
AC-FT	71	52	45	33	22	31	43	49	54	50	29	79
MAX	1.7	.99	.88	.6	.44	.56	1.5	1	1.2	2.1	.86	2.3
MIN	.74	.75	.6	.44	.36	.38	.54	.67	.64	.18	.25	.25

CAL YR	2001	TOTAL	1065.94	MEAN	2.92	MAX	20	MIN	0.31	AC-FT	2110
WTR YR	2002	TOTAL	280.45	MEAN	0.77	MAX	2.3	MIN	0.18	AC-FT	556

MAX DISCH: 2.52 CFS AT 21:15 ON Jul. 6, 2002 GH 3.14 FT. SHIFT -0.10 FT.  
MAX GH: 3.20 FT. AT 23:15 ON Sep. 22, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

CLOSED BASIN IN SAN LUIS VALLEY

08229500 COTTONWOOD CREEK near CRESTONE, CO

**LOCATION.**--Lat 37°56'51", long 105°39'05", in SE1/4NE1/4 Sec. 22, T.43 N., R.12 E., NMPM, Saguache Co., on left bank, 5 miles SE of Crestone.

**DRAINAGE AREA.**--5.0 mi<sup>2</sup>.

**GAGE.**--Electronic shaft encoder and Data Collection Platform (DCP) with satellite transmitter in a 3 ft. by 3 ft. timber shelter and well. This gage is the original gage put in by the USGS in 1936.

**REMARKS.**--Gage-height record is complete and reliable except for Nov. 25-27, 2001, when well was frozen, and Nov. 28, 2001 through Mar. 29, 2002, when station was closed for the winter. Record is fair to good except for periods of no gage-height data, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

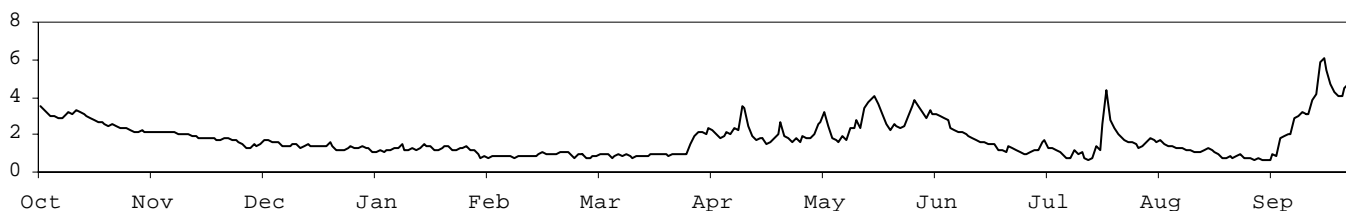
**RATING TABLE.**--COCRESCO03 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	4	2.1	1.4	1.3	.8	1	1.9	1.9	3.8	.98	1.5	.71
2	3.5	2.1	1.5	1.1	.86	.8	2.1	1.8	3.5	1	1.3	.7
3	3.3	2.1	1.7	1.1	.8	.7	2.1	1.8	3.2	1.1	1.4	.67
4	3.1	2.1	1.7	1.2	.86	.84	2	2	2.9	1.2	1.6	.72
5	3	2.1	1.6	1.1	.9	.84	2.3	2.6	3.3	1.2	1.8	.69
6	3	2.1	1.6	1.2	.84	.94	2.2	2.7	3.1	1.6	1.7	.68
7	2.9	2.1	1.6	1.2	.9	.94	2	3.2	3.1	1.7	1.6	.69
8	2.9	2.1	1.4	1.3	.9	1	1.8	2.5	3	1.3	1.7	.96
9	3.1	2	1.4	1.3	.86	.8	1.9	1.8	2.9	1.3	1.5	.88
10	3.2	2	1.4	1.5	.8	.86	2.1	1.7	2.8	1.2	1.4	1.8
11	3.1	2	1.5	1.2	.9	.96	2	1.6	2.4	1.1	1.4	1.9
12	3.3	2	1.5	1.2	.9	.9	2.3	1.9	2.2	1	1.3	2
13	3.2	1.9	1.3	1.3	.86	1	2.2	1.7	2.1	.77	1.3	2
14	3.1	1.9	1.4	1.2	.9	.9	3.5	2.3	2.1	.8	1.3	2.9
15	3	1.8	1.5	1.3	.9	.8	3.4	2.4	2	1.2	1.2	3
16	2.9	1.8	1.4	1.5	.9	.86	2.5	2.8	1.9	.95	1.2	3.2
17	2.8	1.8	1.4	1.4	1	.86	1.9	2.4	1.8	1.1	1.1	3.1
18	2.7	1.8	1.4	1.4	1.1	.82	1.7	3.4	1.7	.74	1.1	3.1
19	2.7	1.8	1.4	1.2	1	.86	1.8	3.7	1.6	.68	1.1	3.8
20	2.6	1.7	1.4	1.2	1	.92	1.8	3.9	1.6	.72	1.2	4.2
21	2.5	1.7	1.6	1.3	1	1	1.5	4.1	1.5	1.4	1.3	5.9
22	2.6	1.8	1.4	1.4	1	1	1.6	3.6	1.5	1.2	1.2	6.1
23	2.5	1.8	1.2	1.4	1.1	1	1.8	3.1	1.5	2.6	1.1	5.4
24	2.3	1.7	1.2	1.2	1.1	1	2	2.6	1.2	4.4	.92	4.7
25	2.3	1.7	1.2	1.2	1.1	.9	2.7	2.2	1.2	2.8	.8	4.3
26	2.3	1.6	1.3	1.3	.9	.94	1.9	2.6	1.1	2.3	.71	4.1
27	2.2	1.5	1.4	1.3	.8	1	1.8	2.5	1.4	2	.84	4.1
28	2.1	1.3	1.3	1.4	.94	1	1.6	2.4	1.3	1.9	.73	4.5
29	2.1	1.3	1.3	1.2	---	1	1.8	2.5	1.2	1.7	.82	4.7
30	2.2	1.5	1.4	1.2	---	1	1.6	3	1.1	1.6	.96	4.4
31	2.1	---	1.3	1	---	1.5	---	3.5	---	1.6	.76	---
TOTAL	86.6	55.2	44.1	39.1	25.92	28.94	61.8	80.2	64	45.14	37.84	85.9
MEAN	2.8	1.8	1.4	1.3	.93	.93	2.1	2.6	2.1	1.46	1.22	2.86
AC-FT	172	109	87	78	51	57	123	159	127	90	75	170
MAX	4	2.1	1.7	1.5	1.1	1.5	3.5	4.1	3.8	4.4	1.8	6.1
MIN	2.1	1.3	1.2	1	.8	.7	1.5	1.6	1.1	.68	.71	.67
CAL YR 2001	TOTAL	2573.8	MEAN	7.05	MAX	66	MIN	0.76	AC-FT	5110		
WTR YR 2002	TOTAL	654.74	MEAN	1.79	MAX	6.1	MIN	0.67	AC-FT	1300		

MAX DISCH: 9.84 CFS AT 20:15 ON Jul. 23, 2002 GH 1.99 FT. SHIFT -0.1 FT.  
MAX GH: 1.99 FT. AT 20:15 ON Jul. 23, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

CLOSED BASIN IN SAN LUIS VALLEY

DEADMAN CREEK near CRESTONE, CO

LOCATION.--Lat 37°53'05", long 105°38'47", in NE1/4, SE1/4, Sec. 3, T.42 N., R.12 E., NMPM, Saguache Co., on right bank 8 miles SE of Crestone.

DRAINAGE AREA.--8.4 mi<sup>2</sup>.

GAGE.--Station installed on a 2' diameter CMP stilling well with a small steel box on top for equipment at a 6' Parshall flume already on site in 1998. Satellite monitoring equipment installed in 1999. Elevation of gage is 7800 ft.

REMARKS.--Record is complete and reliable except for the following periods: November 26, 2001 - March 31, 2002, when the inlets and or the well was frozen. Stage-discharge relation affected by ice November 21-25, 2001. There was no flow for 161 days this water year. Records are fair because of the low number of measurements, except for periods of no gage height record which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

RATING TABLE.--DEDCRECO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

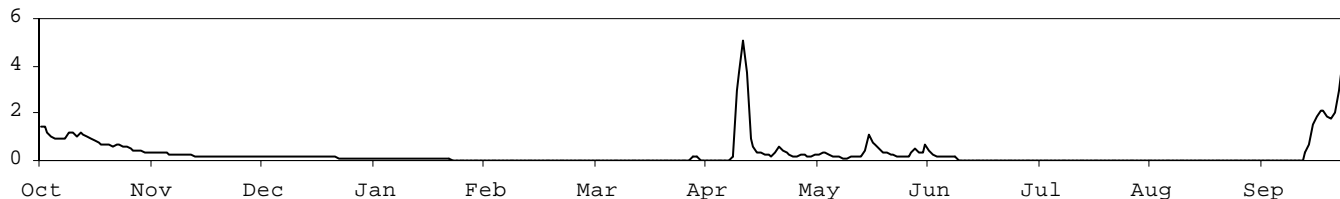
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1.4	.36	.18	.12	0	0	.21	.25	.35	0	0	0
2	1.4	.35	.18	.1	0	0	.18	.22	.51	0	0	0
3	1.2	.35	.18	.1	0	0	.04	.2	.32	0	0	0
4	1	.35	.18	.1	0	0	0	.14	.33	0	0	0
5	.97	.35	.18	.1	0	0	0	.24	.65	0	0	0
6	.93	.27	.16	.1	0	0	0	.27	.4	0	0	0
7	.91	.27	.16	.1	0	0	0	.38	.28	0	0	0
8	.92	.27	.16	.1	0	0	0	.37	.21	0	0	0
9	1.2	.27	.16	.1	0	0	0	.29	.2	0	0	0
10	1.2	.27	.16	.1	0	0	0	.2	.16	0	0	0
11	1	.27	.16	.08	0	0	.03	.14	.14	0	0	0
12	1.2	.24	.16	.08	0	0	.14	.14	.14	0	0	0
13	1.1	.2	.14	.08	0	0	3	.1	.13	0	0	0
14	1	.2	.14	.08	0	0	3.7	.12	.04	0	0	0
15	.89	.2	.14	.08	0	0	5.1	.14	0	0	0	0
16	.82	.2	.14	.08	0	0	3.7	.16	0	0	0	0
17	.78	.2	.14	.06	0	0	.89	.14	0	0	0	0
18	.69	.2	.14	.06	0	0	.56	.2	0	0	0	.02
19	.66	.2	.14	.06	0	0	.38	.46	0	0	0	.35
20	.64	.2	.14	.06	0	0	.33	1.1	0	0	0	.69
21	.61	.2	.14	.06	0	0	.28	.77	0	0	0	1.5
22	.69	.2	.14	.06	0	0	.22	.67	0	0	0	1.9
23	.68	.2	.12	.06	0	0	.21	.48	0	0	0	2.1
24	.57	.2	.12	.04	0	0	.31	.36	0	0	0	2.1
25	.56	.2	.12	.04	0	0	.55	.32	0	0	0	1.9
26	.53	.2	.12	.04	0	0	.41	.28	0	0	0	1.8
27	.43	.18	.12	.04	0	0	.37	.26	0	0	0	2
28	.42	.18	.12	.04	0	0	.24	.2	0	0	0	3
29	.4	.18	.12	.04	---	0	.2	.2	0	0	0	3.6
30	.36	.18	.12	.04	---	0	.2	.18	0	0	0	3.4
31	.35	---	.12	.02	---	0	---	.21	---	0	0	---
TOTAL	25.51	7.14	4.5	2.22	0	0	21.25	9.19	3.86	0	0	24.36
MEAN	.82	.24	.15	.07	0	0	.71	.3	.13	0	0	.81
AC-FT	51	14	8.9	4.4	0	0	42	18	7.7	0	0	48
MAX	1.4	.36	.18	.12	0	0	5.1	1.1	.65	0	0	3.6
MIN	.35	.18	.12	.02	0	0	0	.1	0	0	0	0

CAL YR	2001	TOTAL	1906.43	MEAN	5.22	MAX	47	MIN	0.12	AC-FT	3780
WTR YR	2002	TOTAL	98.03	MEAN	0.27	MAX	5.1	MIN	0	AC-FT	194

MAX DISCH: 5.57 CFS AT 06:00 ON Apr. 15, 2002 GH 0.40 FT. SHIFT 0 FT.  
MAX GH: 0.40 FT. AT 06:00 ON Apr. 15, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## RIO GRANDE BASIN

## LITTLE SPRING CREEK AT MEDANO RANCH NEAR MOSCA, CO

**LOCATION.**--Lat 37°42'49", long 105°38'55", in Alamosa county, in the NE¼SW¼, sec. 15, T.40 N., R.12 E., New Mexico Principal Meridian.

**DRAINAGE AREA AND PERIOD OF RECORD.**--0.2 mi<sup>2</sup>. Flow primarily due to groundwater accretions. First record produced for water year 2000.

**GAGE.**--Shelter and stilling well made of 30-inch smooth steel pipe, connected to 2-foot Parshall flume by small intake pipe. Flume is in fair to good condition. Recorder is Stevens data logger. Outside staff gage attached to flume.

**REMARKS.**--Record was complete and reliable except for December 15, 2001 to April 1, 2002, when the well was frozen; and April 20, 2002, when there was missing datalogger data. The gage heights were adjusted from May 14 to June 25, 2002, when it was discovered that the datalogger was set up to use a 12 inch pulley instead of the 18 inch pulley that it had. It was assumed that this mistake in the setup occurred on May 14, when the datalogger was being downloaded. Therefore, an adjustment sheet was used to adjust the gage heights during this period. Record good for periods of gage-height record, fair for the other periods. Station maintained and records developed and Division III Hydrographic Staff.

**RATING TABLE.**--LITSPGCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

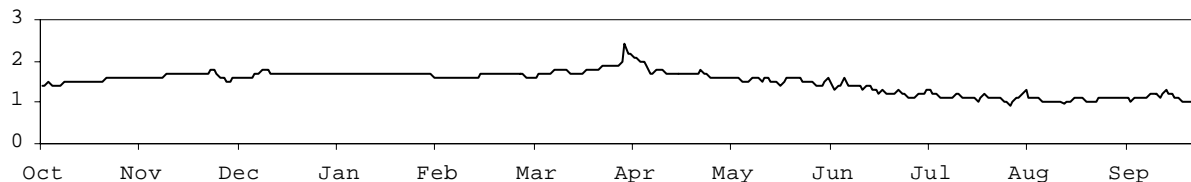
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1.4	1.6	1.6	1.7	1.6	1.7	2	1.6	1.4	1.1	.94	1.1
2	1.4	1.6	1.6	1.7	1.6	1.6	2.4	1.6	1.4	1.1	1	1.1
3	1.5	1.6	1.6	1.7	1.6	1.6	2.2	1.6	1.4	1.2	1.1	1.1
4	1.4	1.6	1.6	1.7	1.6	1.6	2.2	1.6	1.5	1.2	1.1	1.1
5	1.4	1.6	1.6	1.7	1.6	1.6	2.1	1.6	1.6	1.2	1.2	1.1
6	1.4	1.6	1.6	1.7	1.6	1.7	2.1	1.6	1.4	1.3	1.3	1.1
7	1.4	1.6	1.7	1.7	1.6	1.7	2	1.6	1.3	1.3	1.1	1.1
8	1.5	1.6	1.7	1.7	1.6	1.7	2	1.6	1.4	1.2	1.1	1
9	1.5	1.7	1.8	1.7	1.6	1.7	1.9	1.5	1.4	1.2	1.1	1.1
10	1.5	1.7	1.8	1.7	1.6	1.7	1.7	1.5	1.6	1.1	1.1	1.1
11	1.5	1.7	1.8	1.7	1.6	1.8	1.7	1.5	1.4	1.1	1	1.1
12	1.5	1.7	1.7	1.7	1.6	1.8	1.8	1.6	1.4	1.1	1	1.1
13	1.5	1.7	1.7	1.7	1.6	1.8	1.8	1.6	1.4	1.1	1	1.1
14	1.5	1.7	1.7	1.7	1.6	1.8	1.8	1.6	1.4	1.1	1	1.2
15	1.5	1.7	1.7	1.7	1.6	1.8	1.7	1.5	1.4	1.2	1	1.2
16	1.5	1.7	1.7	1.7	1.7	1.7	1.7	1.6	1.3	1.2	1	1.2
17	1.5	1.7	1.7	1.7	1.7	1.7	1.7	1.6	1.4	1.1	1	1.1
18	1.5	1.7	1.7	1.7	1.7	1.7	1.7	1.5	1.4	1.1	.96	1.2
19	1.5	1.7	1.7	1.7	1.7	1.7	1.7	1.5	1.3	1.1	1	1.3
20	1.5	1.7	1.7	1.7	1.7	1.7	1.7	1.5	1.3	1.1	1	1.2
21	1.6	1.7	1.7	1.7	1.7	1.8	1.7	1.4	1.2	1.1	1.1	1.2
22	1.6	1.7	1.7	1.7	1.7	1.8	1.7	1.5	1.3	1	1.1	1.1
23	1.6	1.8	1.7	1.7	1.7	1.8	1.7	1.6	1.2	1.1	1.1	1.1
24	1.6	1.8	1.7	1.7	1.7	1.8	1.7	1.6	1.2	1.2	1.1	1
25	1.6	1.7	1.7	1.7	1.7	1.8	1.7	1.6	1.2	1.1	1	1
26	1.6	1.6	1.7	1.7	1.7	1.9	1.8	1.6	1.2	1.1	1	1
27	1.6	1.6	1.7	1.7	1.7	1.9	1.7	1.6	1.3	1.1	1	1
28	1.6	1.5	1.7	1.7	1.7	1.9	1.7	1.5	1.2	1.1	1	1
29	1.6	1.5	1.7	1.7	---	1.9	1.6	1.5	1.2	1.1	1.1	.99
30	1.6	1.6	1.7	1.7	---	1.9	1.6	1.5	1.1	1	1.1	.91
31	1.6	---	1.7	1.7	---	1.9	---	1.5	---	1	1.1	---
TOTAL	47	49.7	52.4	52.7	46.1	54.5	54.8	48.2	40.2	35	32.7	32.9
MEAN	1.5	1.7	1.7	1.7	1.6	1.8	1.8	1.6	1.3	1.1	1.05	1.1
AC-FT	93	99	104	105	91	108	109	96	80	69	65	65
MAX	1.6	1.8	1.8	1.7	1.7	1.9	2.4	1.6	1.6	1.3	1.3	1.3
MIN	1.4	1.5	1.6	1.7	1.6	1.6	1.6	1.4	1.1	1	.94	.91
CAL YR 2001	TOTAL	577.5	MEAN	1.6	MAX	2.1	MIN	1.1	AC-FT	1150		
WTR YR 2002	TOTAL	546.2	MEAN	1.5	MAX	2.4	MIN	.91	AC-FT	1080		

MAX DISCH: 2.48 CFS AT 00:00 ON Apr. 2, 2002 GH 0.49 FT. SHIFT -0.02 FT.

MAX GH: 0.56 FT. AT 02:00 ON Dec. 14, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

CLOSED BASIN IN SAN LUIS VALLEY

BIG SPRING CREEK at MEDANO RANCH near GREAT SAND DUNES NATIONAL MONUMENT

**LOCATION.**--Lat 37°44'03", long 105°39'50", in NE ¼ NW ¼ Sec. 9, T.40 N., R.12 E., NMPM, Alamosa Co., on left bank approximately ¼ mile above Los Ojos Diversion.

**DRAINAGE AREA AND PERIOD OF RECORD.**--0.3 mi<sup>2</sup>. First record produced in 1999. Flow primarily due to groundwater accretions.

**GAGE.**--Station consists of a 2 ½ foot diameter stilling well at a 4' Parshall flume. Shelter and well are one unit with the top at ground level. Gage-height recorder is a Stevens Datalogger. Flume and station have been in place for several years. Elevation of gage is 7580 ft.

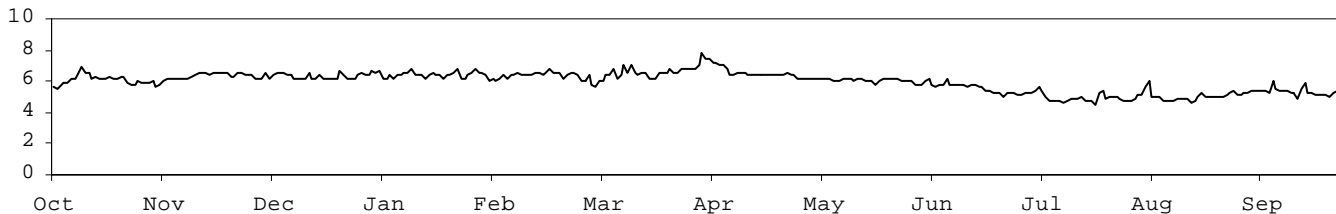
**REMARKS.**--Record is complete and reliable for the water year, except for the following periods: January 15 through February 25, 2002, when the well was frozen; March 17 through April 10, 2002, when the datalogger float sank; and April 11 through June 25, 2002, when there was missing data. Stage - discharge relation affected by ice Nov. 20, 21, 23-30, Dec. 1,2, 6-11, 13-20, 22-29, 2001, and Jan. 2-4, 2002. Gage height not representative of flow due to water in/ice on the float Jan. 5-14, Feb.26-28, Mar. 1-16, 2002. Record good, except for periods described above, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--BIGSPGCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	5.6	6	6.2	6.7	6	6.4	7	6.2	5.8	5.1	4.7	5.1
2	5.5	6.2	6.4	6.2	6.2	5.8	7.8	6.2	5.8	5.2	4.9	5.2
3	5.7	6.2	6.5	6.2	6	5.6	7.4	6.2	5.8	5.2	5.1	5.2
4	5.9	6.2	6.5	6.4	6.2	6	7.4	6.2	6	5.3	5.1	5.4
5	5.9	6.2	6.5	6.2	6.4	6	7.2	6.2	6.2	5.4	5.7	5.4
6	6.1	6.2	6.4	6.4	6.2	6.4	7.2	6.2	5.8	5.7	6	5.4
7	6.2	6.1	6.4	6.4	6.4	6.4	7	6.2	5.6	5.4	5	5.4
8	6.4	6.2	6.2	6.6	6.4	6.8	7	6.2	5.8	5	5	5.4
9	6.9	6.3	6.2	6.6	6.6	6.2	6.8	6	5.8	4.8	5	5.3
10	6.6	6.4	6.2	6.8	6.4	6.4	6.4	6	6.2	4.8	4.8	6
11	6.5	6.5	6.2	6.4	6.4	7	6.4	6	5.8	4.8	4.8	5.5
12	6.2	6.6	6.6	6.4	6.4	6.6	6.6	6.2	5.8	4.7	4.8	5.4
13	6.3	6.5	6.2	6.4	6.4	7	6.6	6.2	5.8	4.6	4.8	5.4
14	6.2	6.4	6.2	6.2	6.6	6.6	6.6	6.2	5.8	4.7	4.9	5.4
15	6.2	6.5	6.4	6.4	6.6	6.4	6.4	6	5.8	4.9	4.9	5.3
16	6.2	6.6	6.2	6.6	6.4	6.6	6.4	6.2	5.6	4.9	4.9	5.2
17	6.3	6.5	6.2	6.4	6.6	6.6	6.4	6.2	5.8	4.9	4.9	4.9
18	6.2	6.5	6.2	6.4	6.8	6.2	6.4	6	5.8	5	4.6	5.5
19	6.2	6.6	6.2	6.2	6.6	6.2	6.4	6	5.6	4.7	4.8	5.9
20	6.3	6.3	6.2	6.4	6.6	6.2	6.4	6	5.6	4.7	5	5.2
21	6.3	6.3	6.7	6.4	6.6	6.6	6.4	5.8	5.4	4.8	5.3	5.2
22	5.9	6.6	6.4	6.6	6.2	6.6	6.4	6	5.4	4.5	5	5.1
23	5.8	6.6	6.2	6.8	6.4	6.6	6.4	6.2	5.2	5.2	5	5.1
24	5.8	6.4	6.2	6.2	6.6	6.8	6.4	6.2	5.2	5.4	5	5.1
25	6	6.4	6.2	6.2	6.6	6.6	6.4	6.2	5.2	4.9	5	5.1
26	5.9	6.4	6.4	6.4	6.4	6.6	6.6	6.2	5	5	5	5
27	5.9	6.2	6.6	6.6	6	6.8	6.4	6.2	5.3	5	5	5.3
28	5.9	6.2	6.4	6.8	6	6.8	6.4	6	5.3	5	5.1	5.4
29	6	6.2	6.4	6.6	---	6.8	6.2	6	5.2	4.9	5.3	5.3
30	5.7	6.6	6.7	6.6	---	6.8	6.2	6	5.1	4.8	5.4	5.1
31	5.8	---	6.6	6.4	---	6.8	---	6	---	4.8	5.1	---
TOTAL	188.4	190.9	196.9	199.9	179	201.2	199.6	189.4	168.5	154.1	155.9	159.2
MEAN	6.1	6.4	6.3	6.5	6.4	6.5	6.7	6.1	5.6	5	5	5.3
AC-FT	374	379	391	397	355	399	396	376	334	306	309	316
MAX	6.9	6.6	6.7	6.8	6.8	7	7.8	6.2	6.2	5.7	6	6
MIN	5.5	6	6.2	6.2	6	5.6	6.2	5.8	5	4.5	4.6	4.9
CAL YR 2001	TOTAL	2183.5	MEAN	5.98	MAX	8.0	MIN	5.0	AC-FT	4330		
WTR YR 2002	TOTAL	2183	MEAN	5.98	MAX	7.8	MIN	4.5	AC-FT	4330		

MAX DISCH: 7.8 CFS ON Apr. 2, 2002 GH -- FT. SHIFT -- FT.  
MAX GH: 1.13 FT. AT 12:30 ON Nov. 29, 2001  
FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





RIO GRANDE BASIN

CLOSED BASIN IN SAN LUIS VALLEY, CO

08230500 CARNERO CREEK NEAR LA GARITA, CO

**LOCATION.**--Lat 37°51'35", long 106°19'08", in SW¼NE¼ sec 28, T.42 N., R.6 E., (projected) Saguache County, Hydrologic Unit 13010004, on left bank 4.5 mi. northwest of La Garita and 6.6 mi. downstream from North Fork.

**DRAINAGE AREA.**--117 mi<sup>2</sup>.

**GAGE.**--Water-stage recorder and Sutron Satellite system in a 4' diameter well and shelter. Datum of gage is 8,150 ft. from topographic map.

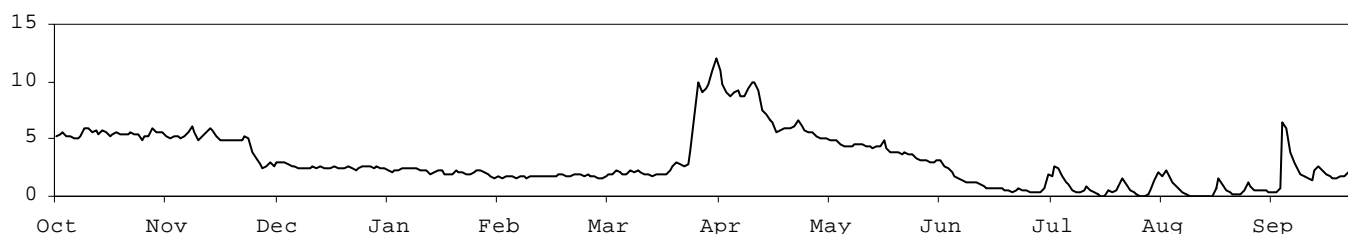
**REMARKS.**--Record is complete and reliable except for the following periods: November 26-30, Dec. 1-19, 2001, and March 15-19, 26, 2002, when ice in the well was affecting the floats. December 20, 2001 to March 13, 2002, while the station was closed for the winter. Gage-height affected by ice November 17-20, 23, 24, 2001, and March 14, 20-25, 27-31, April 1-3, 2002. There was no flow August 16-21, 2002. Record good, except that for periods of missing and ice-affected data, which is poor. Station maintained and record developed by the Division III Hydrographic Staff.

**RATING TABLE.**--CARLAGCO15 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	5.2	5.3	2.7	2.4	1.5	1.7	9.4	5.5	3.2	.4	.08	.82
2	5.4	5	2.9	2.2	1.7	1.6	9.8	5.2	3.1	.31	.03	.55
3	5.5	5.3	3	2.1	1.6	1.6	11	5	2.9	.31	.19	.46
4	5.2	5.2	2.9	2.3	1.7	1.7	12	5.1	3	.33	.48	.46
5	5.2	5.1	2.8	2.2	1.8	1.9	11	5	3.1	.75	1.4	.49
6	5.1	5.2	2.7	2.4	1.7	2	9.8	4.8	3.1	1.9	2.1	.43
7	5.1	5.6	2.7	2.5	1.6	2.2	9	4.9	2.7	1.7	1.8	.34
8	5.2	6.1	2.5	2.4	1.7	2.1	8.8	4.8	2.5	2.7	2.2	.36
9	6	5.5	2.4	2.4	1.8	2	9	4.6	2.1	2.4	2	.74
10	6	4.9	2.4	2.4	1.6	2	9.3	4.4	1.8	1.7	1.3	6.5
11	5.5	5.3	2.4	2.3	1.7	2.2	8.8	4.4	1.6	1.3	.81	5.9
12	5.7	5.6	2.6	2.3	1.8	2.1	8.8	4.4	1.4	1.1	.44	3.8
13	5.4	5.9	2.5	2.2	1.7	2.2	9.5	4.6	1.3	.57	.31	2.9
14	5.7	5.7	2.6	2	1.8	2.1	10	4.5	1.3	.4	.17	2.3
15	5.5	5.2	2.5	2.1	1.8	2	10	4.5	1.3	.33	.03	2
16	5.3	4.9	2.4	2.3	1.7	2	9.3	4.3	1.3	.57	0	1.8
17	5.4	4.8	2.5	2.2	1.8	1.8	7.5	4.3	1.1	.85	0	1.5
18	5.5	4.8	2.6	1.9	1.8	2	7.1	4.2	.93	.49	0	1.4
19	5.4	4.8	2.4	2	2	2	6.6	4.3	.77	.3	0	2.3
20	5.4	4.8	2.4	2	1.9	2	6.4	4.4	.78	.18	0	2.7
21	5.4	4.8	2.5	2.2	1.8	2	5.6	4.9	.78	.08	0	2.3
22	5.6	4.8	2.6	2.1	1.8	2.2	5.7	4.2	.64	.03	.65	1.9
23	5.4	5.3	2.5	2.1	1.9	2.7	5.9	3.9	.69	.6	1.6	1.7
24	5.4	5	2.3	2	2	3	5.9	3.8	.6	.37	1.1	1.5
25	4.8	3.9	2.4	2	2	2.8	5.9	3.8	.54	.48	.57	1.5
26	5.2	3.3	2.6	2.1	1.8	2.6	6.1	3.7	.42	.82	.31	1.7
27	5.2	2.8	2.7	2.2	1.9	2.8	6.7	3.8	.57	1.6	.19	1.8
28	6	2.5	2.6	2.2	1.8	4	6.1	3.7	.64	1.1	.11	2.1
29	5.6	2.7	2.5	2.1	---	7	5.8	3.6	.54	.55	.1	2.2
30	5.5	2.9	2.6	2	---	10	5.6	3.4	.52	.31	.54	2.2
31	5.5	---	2.4	1.7	---	9	---	3.2	---	.19	1.2	---
TOTAL	168.3	143	79.6	67.3	49.7	87.3	242.4	135.2	45.22	24.72	19.71	56.65
MEAN	5.4	4.8	2.6	2.2	1.8	2.8	8.1	4.4	1.51	.8	.64	1.89
AC-FT	334	284	158	133	99	173	481	268	90	49	39	112
MAX	6	6.1	3	2.5	2	10	12	5.5	3.2	2.7	2.2	6.5
MIN	4.8	2.5	2.3	1.7	1.5	1.6	5.6	3.2	.42	.03	0	.34
CAL YR 2001	TOTAL	6654.8	MEAN	18.2	MAX	139	MIN	0.7	AC-FT	13200		
WTR YR 2002	TOTAL	1119.1	MEAN	3.07	MAX	12	MIN	0	AC-FT	2220		

MAX DISCH: 18.1 CFS AT 17:00 ON Apr. 4, 2002 GH 2.33 FT. SHIFT 0.01 FT.  
MAX GH: 2.52 FT. AT 04:00 ON Mar. 15, 2002  
FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

CLOSED BASIN IN SAN LUIS VALLEY,

08231000 LA GARITA CREEK NEAR LA GARITA, CO

**LOCATION.**--Lat 37°48'48", long 106°19'05", in NW¼SE¼ sec. 9, T.41 N., R.6 E., Saguache County, Hydrologic Unit 13010004, on right bank 4.5 mi. downstream from Little La Garita Creek and 4.5 mi. southwest of La Garita, Co.

**DRAINAGE AREA AND PERIOD OF RECORD.**--61 mi<sup>2</sup>. Non-recording station Apr. 01, 1919-June 23, 1927. Recording station from June 1927-Oct. 1998, at which time a Data Logger was installed. April 1999 satellite telemetry system installed. Station at various sites all within ¼ mile of present site.

**GAGE.**--Graphic water-stage recorder and satellite-monitored data collection platform in 4-foot diameter CMP shelter and well. Altitude of gage is 8,030 ft from topographic map.

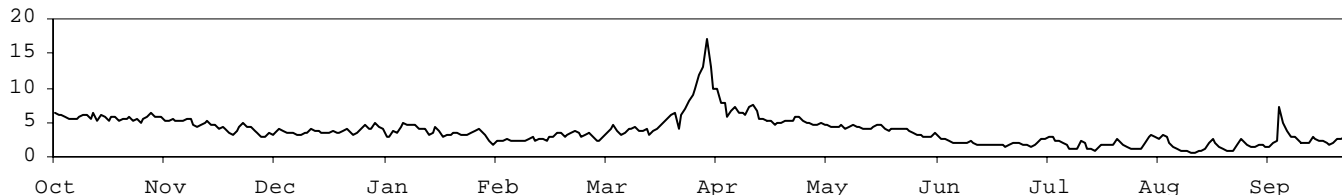
**REMARKS.**--Record is complete and reliable except for the following periods; Nov. 25, - Dec. 19, 2001, March 14-21, 26-31, 2002, when the well was frozen. Dec. 20, 2001 to March 13, 2002, when the station was closed for the winter. Stage-discharge relation was affected by ice Nov. 19, 22-24, 2001. Record is good, except for periods of missing gage heights and ice-affected record, which is poor. Station maintained and record developed by the Division III Hydrographic Staff.

**RATING TABLE.**--LAGLAGCO12 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	6.4	5.1	3.2	4.2	1.8	3	13	4.9	3.2	1.6	1.1	1.6
2	6.2	5.2	3.6	3	2.4	2.2	17	4.6	3	1.4	1.3	1.5
3	6	5.4	4.2	2.8	2.2	2.2	13	4.7	2.8	1.6	1.9	1.5
4	5.8	5.1	3.8	3.8	2.4	2.8	10	4.8	3	2	2.8	1.6
5	5.6	5.2	3.6	3.4	2.6	3.4	10	4.5	3.5	2.5	3.3	1.7
6	5.6	5.3	3.6	4.4	2.4	4	7.9	4.5	3	2.6	3	1.4
7	5.6	5.4	3.6	4.8	2.4	4.6	7.7	4.4	2.6	3	2.6	1.4
8	5.9	5.6	3.2	4.6	2.4	3.8	5.9	4.4	2.5	3	3.3	2
9	6.2	4.7	3.2	4.6	2.4	3.2	6.8	4.3	2.2	2.3	2.9	2.2
10	6.2	4.3	3.4	4.6	2.2	3.4	7.3	4.5	2.1	2.2	1.9	7.3
11	5.4	4.5	3.4	4.2	2.6	4.2	6.3	4.2	2	2.1	1.4	4.8
12	6.5	4.8	4	4.2	2.8	4.2	6.3	4.4	1.9	1.8	1.1	3.7
13	5.2	5.3	3.8	4	2.4	4.4	6.2	4.7	2	1.3	.87	2.9
14	6	4.7	3.8	3.2	2.6	3.8	7.2	4.4	1.9	1.1	.84	2.9
15	5.9	4.6	3.6	3.6	2.6	3.8	7.6	4.4	2.2	1.3	.76	2.5
16	5.3	4	3.4	4.4	2.4	4	6.8	4.2	2.1	2.3	.63	2
17	5.7	4.3	3.6	3.8	2.8	3.2	5.5	4.1	1.8	1.9	.66	1.9
18	5.8	4.2	3.9	3	3	3.8	5.4	4.1	1.7	1.3	.73	1.9
19	5.3	3.6	3.6	3.2	3.6	4	5.2	4.3	1.7	1.1	.9	2.9
20	5.4	3.1	3.6	3.2	3.4	4.6	5.2	4.5	1.8	1	1.2	2.7
21	5.6	3.8	3.8	3.6	3	4.8	4.5	4.6	1.8	1.4	1.9	2.4
22	5.9	4.4	4.2	3.6	3.2	5.4	5	4	1.8	1.6	2.5	2.2
23	5.3	5	3.4	3.2	3.6	6	5	3.9	1.7	1.7	2	2
24	5.6	4.4	3.2	3.2	3.8	6.3	5.2	4.1	1.6	1.7	1.5	1.8
25	4.8	4.4	3.5	3.2	3.4	4.2	5.1	4.1	1.5	1.7	1.1	2.1
26	5.5	3.8	4.2	3.4	2.8	6	5.3	4	1.8	2.6	.92	2.5
27	5.8	3.4	4.6	3.8	3.2	7	5.9	4.1	2	2.4	.86	2.7
28	6.3	2.8	4.2	4	3.4	8	5.7	4	2.1	1.8	.84	3
29	5.8	3	4	3.6	---	9	5.1	3.7	2.1	1.5	1.7	3
30	5.8	3.4	4.8	3.2	---	10	5	3.4	1.8	1.2	2.5	3.3
31	5.9	---	4.4	2.2	---	12	---	3.2	---	1.1	2	---
TOTAL	178.3	132.8	116.4	114	77.8	151.3	212.1	132	65.2	56.1	51.01	75.4
MEAN	5.8	4.4	3.8	3.7	2.8	4.9	7.1	4.3	2.2	1.8	1.65	2.5
AC-FT	354	263	231	226	154	300	421	262	129	111	101	150
MAX	6.5	5.6	4.8	4.8	3.8	12	17	4.9	3.5	3	3.3	7.3
MIN	4.8	2.8	3.2	2.2	1.8	2.2	4.5	3.2	1.5	1	.63	1.4
CAL YR 2001	TOTAL	6644.8	MEAN	18.2	MAX	154	MIN	2.3	AC-FT	13180		
WTR YR 2002	TOTAL	1362.41	MEAN	3.73	MAX	17	MIN	0.63	AC-FT	2700		

MAX DISCH: 29.7 CFS AT 22:30 ON Apr. 1, 2002 GH 2.50 FT. SHIFT 0.07 FT.  
MAX GH: 2.50 FT. AT 22:30 ON Apr. 1, 2002  
FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08236000 ALAMOSA CREEK ABOVE TERRACE RESERVOIR, CO

**LOCATION.**--Lat 37°22'29", long 106°20'03", in NW¼NE¼ sec. 17, T.36 N., R.6 E., Conejos County, Hydrologic Unit 13100002, on left bank 0.8 mi upstream from high-water line of Terrace Reservoir at elevation 8,568 ft., 3.0 mi. downstream from French Creek, and 15 mi. northwest of Capulin.

**DRAINAGE AREA.**--107 mi².

**GAGE.**--Graphic water-stage recorder in a 4-ft. diameter metal shelter and well. Gage is also equipped with a Sutron river satellite monitoring system with thermistor. The gage was reset on Jul. 25, 2002 to deal with the problems of isolation during very low flows. Datum of gage is 8,600 ft., from topographic map.

**REMARKS.**--Record is complete and reliable except for Dec. 7-12, 2001 when the well was frozen, Dec. 13, 2001 through Mar. 29, 2002, when the station was closed for the winter, and Nov. 19-21, 24, 2001, Jul. 12-25, 2002, when the gage was isolated. Stage-discharge relation was affected by ice Nov. 22, 23, 25-30, and Dec. 1-6, 2001. Record is good except for the periods of ice affected record, no gage height record, and isolation, which are poor. Station maintained and record developed by the Division III Hydrographic Staff.

**RATING TABLE.**--ALATERCO16 USED FROM 01-OCT-2001 TO 30-SEP-2002

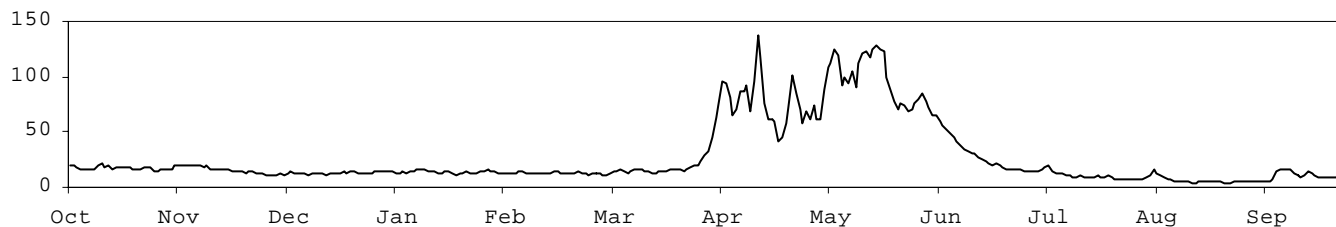
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	19	19	11	14	12	12	33	74	85	14	6.5	4.7
2	19	19	12	12	13	10	46	61	78	14	6.5	4.7
3	18	19	14	13	13	11	64	61	72	15	8	5
4	17	20	13	14	13	12	74	88	65	15	9.8	5
5	17	20	13	13	13	14	96	108	65	16	10	5.4
6	17	19	12	14	14	15	94	112	59	18	16	5
7	17	19	12	15	14	16	82	125	56	19	13	4.6
8	17	18	11	16	12	14	65	120	52	15	11	5
9	20	19	12	17	12	13	71	93	49	13	9.2	7
10	21	17	13	16	13	15	87	99	46	13	7.6	14
11	18	16	12	14	13	16	87	94	41	12	6.9	17
12	19	16	12	14	12	16	92	104	38	11	5.9	17
13	17	17	11	15	13	17	68	91	35	10	5.7	16
14	18	17	12	12	13	15	95	112	33	9.3	5.6	16
15	18	16	13	13	13	14	137	121	31	9.7	5.2	13
16	18	15	13	15	14	13	117	123	30	10	5.1	11
17	18	15	13	14	14	13	76	117	28	9.5	4.3	9.6
18	18	15	14	13	13	14	62	125	26	9.1	4.2	10
19	17	14	13	11	13	14	61	128	24	8.5	4.6	15
20	17	13	14	12	12	15	59	124	22	8.5	5.7	13
21	17	14	15	12	12	16	41	123	20	10	5.8	11
22	18	14	13	14	12	16	46	100	22	9.5	6.3	9.7
23	18	13	12	13	14	17	57	89	20	9.5	6.1	9
24	18	12	12	12	13	16	72	78	18	10	5.6	8.6
25	15	12	13	13	12	15	101	71	17	9.5	4.8	8.2
26	15	11	13	14	11	16	85	76	16	8.1	4.5	9.1
27	16	11	14	14	12	18	71	74	16	7.7	4.2	9.7
28	17	10	14	16	12	19	58	69	17	8	4.3	13
29	17	11	14	15	---	20	68	71	17	7.6	5	14
30	17	12	15	14	---	24	62	76	15	7.2	5.6	17
31	19	---	14	12	---	29	---	80	---	7	5.4	---
TOTAL	547	463	399	426	357	485	2227	2987	1113	343.7	208.4	307.3
MEAN	18	15	13	14	13	16	74	96	37	11.1	6.7	10.2
AC-FT	1080	918	791	845	708	962	4420	5920	2210	682	413	610
MAX	21	20	15	17	14	29	137	128	85	19	16	17
MIN	15	10	11	11	11	10	33	61	15	7	4.2	4.6
CAL YR 2001	TOTAL	37089	MEAN	102	MAX	901	MIN	10	AC-FT	73570		
WTR YR 2002	TOTAL	9863.4	MEAN	27	MAX	137	MIN	4.2	AC-FT	19560		

MAX DISCH: 176 CFS AT 01:15 ON Apr. 15, 2002 GH 1.72 FT. SHIFT -0.03 FT.

MAX GH: 1.72 FT. AT 01:15 ON Apr. 15, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08236500 ALAMOSA CREEK BELOW TERRACE RESERVOIR, CO

**LOCATION.**--Lat 37°21'15", long 106°16'45", NE¼SE¼ sec. 23, T.36 N., R.6 E., Conejos County, Hydrologic Unit 13010002, on left bank 0.5 mi downstream from Terrace Reservoir, 12.0 mi northwest of Capulin, Co.

**DRAINAGE AREA.**--116 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder and Sutron satellite system in an approximately 3-ft square timber shelter and corrugated metal well. Altitude of gage is 8,375 ft, from topographic map.

**REMARKS.**--Record is complete and reliable except for Nov. 28 - 30, Dec. 1 - 12, 2001, when the well was frozen; and Dec. 13, 2001 through Mar. 29, 2002, when the station was closed for the winter. Record is good except for the periods when the well was frozen and no gage height record which are fair to poor. Station maintained and record developed by the Division III Hydrographic Staff.

**RATING TABLE.**--ALABELCO12 USED FROM 01-OCT-2001 TO 30-SEP-2002

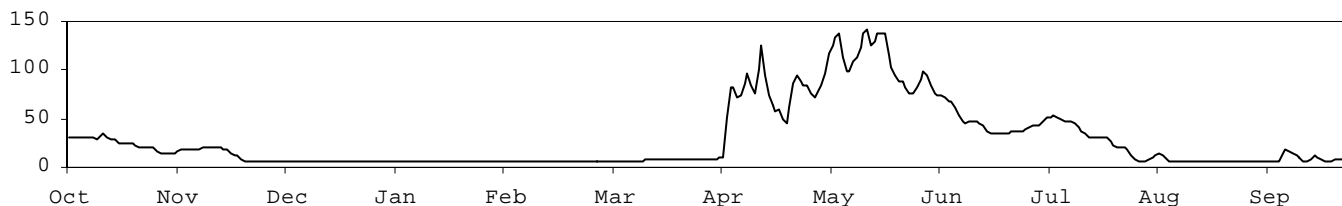
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	31	16	6	6.1	6.3	6.7	8.8	72	98	42	5.7	5.7
2	31	18	6	6.1	6.4	6.7	9	80	95	44	5.7	5.7
3	31	19	6	6.1	6.4	6.7	9.1	85	85	44	5.8	5.7
4	31	19	6	6.1	6.4	6.7	9.3	97	77	44	7.8	5.7
5	31	19	6	6.1	6.4	6.7	9.4	118	75	47	9.8	5.7
6	31	19	6	6.1	6.4	6.7	52	126	74	51	12	5.7
7	31	19	6	6.1	6.4	6.7	83	133	71	52	14	5.7
8	31	21	6	6.1	6.4	6.8	82	138	68	54	12	5.7
9	29	21	6	6.1	6.4	6.8	72	113	68	52	8.6	6
10	32	21	6	6.1	6.4	6.9	75	98	62	49	6.2	7
11	34	21	6	6.1	6.4	7	86	98	53	48	5.5	14
12	30	21	6	6.1	6.4	7	97	108	48	48	5.5	19
13	28	21	6	6.1	6.4	7.1	85	113	46	47	5.6	16
14	28	19	6	6.1	6.4	7.2	76	124	47	46	5.7	14
15	25	18	6	6.1	6.5	7.2	101	138	47	42	5.7	13
16	24	14	6	6.1	6.5	7.3	125	141	47	37	5.7	10
17	24	12	6	6.2	6.5	7.4	94	125	45	35	5.7	6.7
18	24	12	6	6.2	6.5	7.4	74	129	44	31	5.7	5.3
19	24	8.2	6	6.2	6.5	7.5	64	137	38	30	5.9	9.2
20	22	6	6	6.2	6.5	7.6	58	137	35	31	6	12
21	21	6	6	6.2	6.6	7.6	59	137	35	31	6	11
22	21	6	6	6.2	6.6	7.7	50	115	35	31	6	9.1
23	21	6	6	6.2	6.6	7.8	45	102	34	30	6	6.8
24	21	6	6	6.2	6.6	7.8	62	94	34	27	6	5.2
25	21	6	6	6.3	6.6	7.9	86	89	35	23	6	6.9
26	17	6	6.1	6.3	6.6	8	94	89	36	21	6	8.3
27	15	6	6.1	6.3	6.7	8	88	82	36	21	6	8.5
28	15	6	6.1	6.3	6.7	8.1	85	77	36	21	6	9.2
29	14	6	6.1	6.3	---	8.1	85	77	38	18	6	11
30	14	6	6.1	6.3	---	8.4	76	83	39	13	6	13
31	15	---	6.1	6.3	---	8.5	---	91	---	7.8	5.9	---
TOTAL	767	404.2	186.6	191.3	181.5	228	1999.6	3346	1581	1117.8	210.5	266.8
MEAN	25	13.5	6	6.2	6.5	7.3	66.7	108	53	36.1	6.8	8.9
AC-FT	1520	802	370	379	360	452	3970	6640	3140	2220	418	529
MAX	34	21	6.1	6.3	6.7	8.5	125	141	98	54	14	19
MIN	14	6	6	6.1	6.3	6.7	8.8	72	34	7.8	5.5	5.2

CAL YR	2001	TOTAL	38612.9	MEAN	106	MAX	805	MIN	1.9	AC-FT	76590
WTR YR	2002	TOTAL	10480.3	MEAN	28.7	MAX	141	MIN	5.2	AC-FT	20790

MAX DISCH: 143 CFS AT 11:30 ON May. 4, 2002 GH 3.30 FT. SHIFT -0.03 FT.  
MAX GH: 3.30 FT. AT 11:30 ON May. 4, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## RIO GRANDE BASIN

08238000 LA JARA CREEK AT GALLEGOS RANCH, NEAR CAPULIN, CO

**LOCATION.**--Lat 37°12'32", long 106°11'16", in NE¼ sec. 10, T.34 N., R.7 E., Conejos County, Hydrologic Unit 13010002, on left bank 2.7 mi. downstream from Canyon Del Rancho, 7 mi. southwest of Capulin, and 16.5 mi. downstream from La Jara Reservoir.

**DRAINAGE AREA.**--98 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder with satellite telemetry in 42" diameter CMP shelter and well. Altitude of gage is 8,130 ft from topographic map.

**REMARKS.**--Record is complete and reliable except for Nov. 27-Dec.12, 2001, when the well was frozen, and Dec.13, 2001 through Mar. 29, 2002, when the station was closed for the winter. Stage-discharge relation was affected by ice Nov. 20-26, 2001. Record is good, except for periods of no gage-height and ice affected record, which are poor. Station maintained and record developed by the Division III Hydrographic Staff.

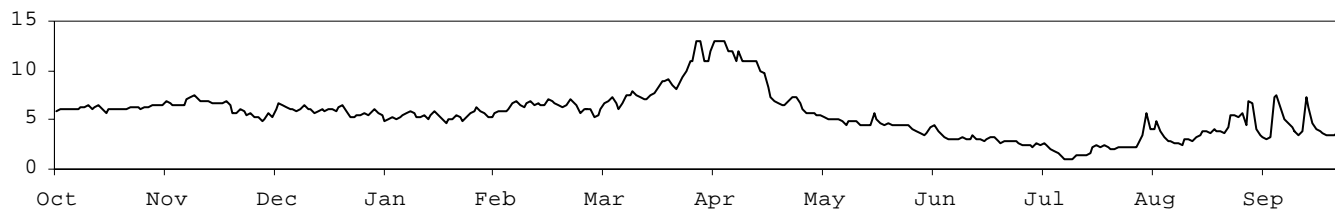
**RATING TABLE.**--LAJCAPCO18 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	5.9	6.8	5.2	5.4	5.2	6	13	5.7	3.9	2.5	2.2	5.6
2	6	6.6	6	4.8	5.6	5.2	11	5.6	3.7	2.4	2.3	4.5
3	6.1	6.4	6.6	5	5.8	5.4	11	5.6	3.5	2.4	2.6	6.8
4	6	6.4	6.4	5.2	5.8	6	12	5.5	3.6	2.3	3.5	6.6
5	6	6.4	6.2	5	5.8	6.6	13	5.4	4.3	2.6	5.6	4
6	6	6.4	6	5.2	6	6.8	13	5.2	4.4	2.4	4.1	3.5
7	6	7.1	6	5.4	6.6	7.2	13	5.1	3.8	2.7	4.1	3.2
8	6.2	7.3	5.8	5.6	6.8	6.6	13	5.1	3.6	2.5	4.9	3.1
9	6.2	7.4	6	5.8	6.4	6	12	5.1	3.3	2.1	3.9	3.3
10	6.4	7.1	6.4	5.6	6.2	6.6	12	5	3.1	1.9	3.2	7.2
11	6.1	6.8	6	5.2	6.6	7.4	11	4.9	3.1	1.7	2.9	7.4
12	6.2	6.8	6	5.2	6.8	7.6	12	4.5	3	1.3	2.8	6.3
13	6.4	6.8	5.6	5.4	6.4	8	11	4.9	3	1.1	2.7	5.1
14	6.1	6.7	5.8	5	6.6	7.4	11	4.8	3.2	.97	2.6	4.7
15	5.7	6.7	6	5.4	6.4	7.2	11	4.8	3.1	1	2.5	4.2
16	6	6.7	5.8	5.8	6.4	7	11	4.5	3	1.4	3	3.8
17	6	6.7	6	5.4	7	7	11	4.4	3.4	1.4	3	3.5
18	6	6.8	6	5	6.8	7.6	10	4.4	3	1.4	2.9	3.8
19	6	6.4	5.8	4.6	6.6	7.8	9.7	4.5	3	1.4	3.2	7.2
20	6	5.6	6.2	5	6.4	8.4	8.3	5.6	2.9	1.7	3.4	6.3
21	6	5.6	6.4	5	6.2	9	7.2	5.1	3	2.3	3.9	4.6
22	6.2	6	5.8	5.4	6.4	9	6.9	4.6	3.3	2.5	3.8	4.1
23	6.3	5.8	5.2	5.2	7	9.2	6.7	4.5	3.2	2.3	3.7	3.8
24	6.2	5.4	5.2	4.8	6.8	8.6	6.5	4.6	2.8	2.4	4	3.7
25	6	5.6	5.4	5.2	6.4	8.2	6.5	4.4	2.7	2.2	3.9	3.4
26	6.2	5.2	5.4	5.6	5.6	8.6	6.9	4.4	2.8	2	3.9	3.4
27	6.2	5.2	5.6	5.8	6	9.4	7.2	4.4	2.8	2.1	3.7	3.4
28	6.4	4.8	5.4	6.2	6	10	7.2	4.4	2.8	2.3	4.2	3.9
29	6.4	5	5.6	5.8	---	11	6.7	4.4	2.8	2.3	5.4	4.2
30	6.4	5.6	6	5.6	---	11	6.1	4.4	2.6	2.2	5.5	4.1
31	6.5	---	5.6	5.2	---	13	---	4.1	---	2.2	5.3	---
TOTAL	190.1	188.1	181.4	164.8	176.6	244.8	296.9	149.9	96.7	61.97	112.7	138.7
MEAN	6.1	6.3	5.8	5.3	6.3	7.9	9.9	4.8	3.2	2	3.6	4.6
AC-FT	377	373	360	327	350	486	589	297	192	123	224	275
MAX	6.5	7.4	6.6	6.2	7	13	13	5.7	4.4	2.7	5.6	7.4
MIN	5.7	4.8	5.2	4.6	5.2	5.2	6.1	4.1	2.6	.97	2.2	3.1
CAL YR 2001	TOTAL	5777.9	MEAN	15.8	MAX	161	MIN	4.0	AC-FT	11460		
WTR YR 2002	TOTAL	2002.67	MEAN	5.49	MAX	13	MIN	0.97	AC-FT	3970		

MAX DISCH: 18.4 CFS AT 17:45 ON Nov. 7, 2001 GH 1.24 FT. SHIFT 0 FT.  
MAX GH: 1.34 FT. AT 06:15 ON Nov. 22, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

SOUTH CHANNEL NORTON DRAIN DITCH NEAR LA SAUSES, CO

LOCATION.--Lat 37°17'54", long 105°51'00, SW¼SW¼ sec. 2, T.35 N., R.10 E., Conejos County, Hydrologic Unit 13100002, on right bank of ditch.

DRAINAGE AREA.--N/A

GAGE.--Graphic water-stage recorder with satellite telemetry in a steel shelter and a 24" diameter CMP well at a 3' Parshall Flume.

REMARKS.--Record is complete and reliable except for Dec. 13, 2001 to Jan. 9, 2002 and Jan. 20, 2002 to April 3, 2002, when station was closed for the winter; and Nov. 24, 29, 30, Dec. 1-4, 9-12, 2001, when the well was frozen. Stage-discharge relation affected by ice Nov. 20-22, Dec. 5-8, 2001, Jan. 12-19, 2002. Record is good except for periods of no gage-height and ice affected record, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

RATING TABLE.--NORDSCCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

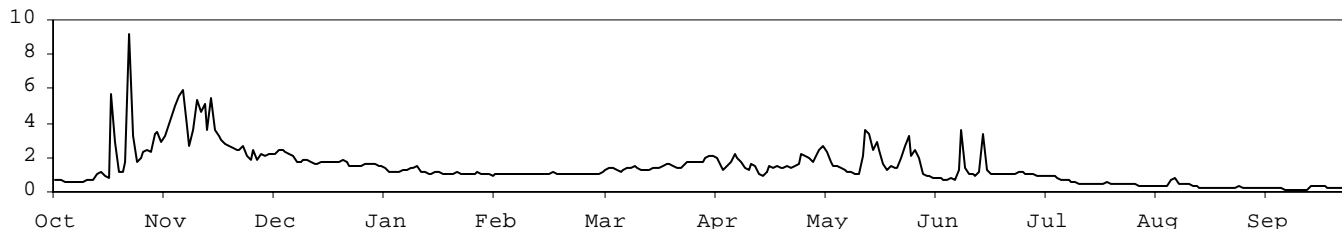
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.66	3.3	2.2	1.5	.94	1.1	1.8	2	2	1.1	.42	.25
2	.65	4	2.2	1.4	1	1	2	1.8	1	1.1	.38	.23
3	.68	4.6	2.5	1.2	1	1.1	2.1	2	.89	1.1	.38	.24
4	.63	5	2.4	1.2	1	1.2	2.1	2.5	.89	.97	.34	.23
5	.58	5.6	2.3	1.2	1	1.3	2	2.7	.87	.96	.33	.23
6	.59	5.9	2.2	1.2	1	1.4	1.7	2.3	.82	.96	.31	.23
7	.6	3.8	2.1	1.3	1.1	1.4	1.3	1.7	.79	.96	.33	.23
8	.59	2.7	1.8	1.3	1.1	1.3	1.5	1.5	.75	.96	.33	.19
9	.61	3.6	1.8	1.4	1.1	1.2	1.7	1.5	.75	.96	.33	.2
10	.68	5.3	1.9	1.4	1.1	1.3	2.2	1.4	.76	.84	.35	.23
11	.72	4.6	1.9	1.5	1.1	1.4	2	1.3	.71	.7	.69	.2
12	.75	5.1	1.8	1.2	1.1	1.4	1.8	1.2	1.3	.68	.8	.12
13	1	3.6	1.6	1.2	1.1	1.5	1.4	1.2	3.6	.67	.51	.09
14	1.2	5.5	1.6	1.1	1.1	1.4	1.3	1.1	1.4	.61	.49	.1
15	.89	3.6	1.7	1.1	1	1.3	1.6	1.1	1	.6	.49	.09
16	.81	3.2	1.7	1.2	1	1.3	1.5	2.1	1	.51	.43	.12
17	5.7	3	1.7	1.2	1.1	1.3	1	3.6	.93	.5	.38	.12
18	2.9	2.8	1.7	1.1	1.2	1.4	.98	3.4	1.2	.48	.32	.09
19	1.2	2.7	1.7	1.1	1.1	1.4	1.2	2.5	3.4	.49	.23	.34
20	1.2	2.6	1.7	1.1	1.1	1.4	1.5	2.9	1.3	.49	.23	.33
21	1.8	2.4	1.9	1.1	1.1	1.5	1.4	2.4	1.1	.49	.23	.32
22	9.2	2.5	1.7	1.2	1.1	1.6	1.5	1.6	1	.49	.23	.33
23	3.2	2.7	1.5	1.1	1.1	1.6	1.4	1.3	1	.5	.23	.31
24	1.8	2.1	1.5	1	1.1	1.5	1.4	1.5	1	.53	.22	.21
25	2	1.9	1.5	1	1.1	1.4	1.5	1.4	1	.49	.21	.21
26	2.3	2.5	1.5	1.1	1.1	1.4	1.4	1.4	1.1	.52	.22	.23
27	2.5	1.9	1.6	1.1	1.1	1.6	1.5	2	1.1	.5	.24	.23
28	2.3	2.2	1.6	1.2	1.1	1.8	1.6	2.7	1.1	.49	.27	.26
29	3.4	2.1	1.6	1.1	---	1.8	2.2	3.2	1.2	.49	.26	.23
30	3.5	2.2	1.6	1.1	---	1.8	2.1	2.1	1.2	.48	.3	.23
31	2.9	---	1.5	1	---	1.8	---	2.4	---	.49	.26	---
TOTAL	57.54	103	56	36.9	30.04	43.9	48.68	61.8	36.16	21.11	10.74	6.42
MEAN	1.86	3.4	1.8	1.2	1.07	1.4	1.62	2	1.21	.68	.35	.21
AC-FT	114	204	111	73	60	87	97	123	72	42	21	13
MAX	9.2	5.9	2.5	1.5	1.2	1.8	2.2	3.6	3.6	1.1	.8	.34
MIN	.58	1.9	1.5	1	.94	1	.98	1.1	.71	.48	.21	.09

CAL YR	2001	TOTAL	1251.97	MEAN	3.43	MAX	20	MIN	0.58	AC-FT	2480
WTR YR	2002	TOTAL	512.29	MEAN	1.4	MAX	9.2	MIN	.09	AC-FT	1020

MAX DISCH: 25.4 CFS AT 11:00 ON Oct. 22, 2001 GH 1.61 FT. SHIFT 0 FT.  
MAX GH: 1.61 FT. AT 11:00 ON Oct. 22, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## RIO GRANDE BASIN

## NORTON DRAIN NEAR LA SAUSES, CO

**LOCATION.**--Lat 37°20'10", long 105°46'13", NE¼SW¼ sec. 28, T.36 N., R.11 E., Conejos County, Hydrologic Unit 13010002, on left bank 2.5 mi east by northeast along canal from State Route 158.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder and a Sutron satellite monitoring system in a 36 inch diameter CMP shelter and well at a six foot Parshall Flume. Note: June 11, 2002 Parshall flume width modified to two foot in an attempt to keep the well from isolating and to get a more accurate measurement of low flows.

**REMARKS.**--Record is complete and reliable except for May 17, 18, July 11 - Sept. 10, and Sept. 16-18, 21-27, 2002, when the well was isolated; Nov. 28 - Dec. 12, 2001, when the well was frozen; Dec. 13, 2001 - April 3, 2002, when the station was closed for the winter; Stage-discharge relation was affected by ice Nov. 19-27, 2001. There was no flow Aug. 16 - 28, Sept. 3 - 8, 2002. Record is good except for periods of no gage-height, gage isolation, and ice affected record which are fair to poor. Station maintained and record developed by the Division III Hydrographic Staff.

**RATING TABLE.**--NORDLSCO03 USED FROM 01-OCT-2001 TO 11-JUN-2002  
STD02FTPF USED FROM 11-JUN-2002 TO 30-SEP-2002

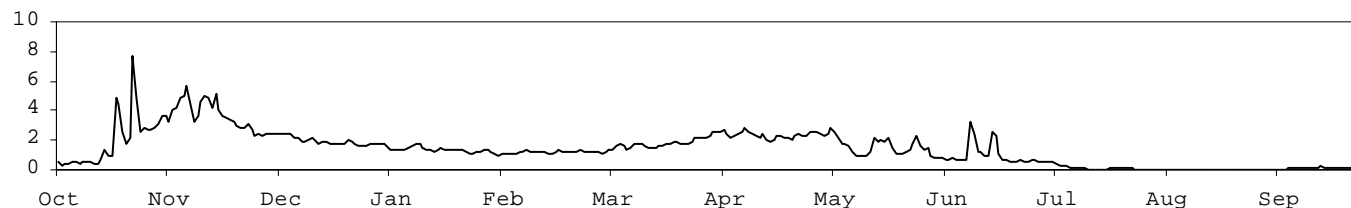
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.52	3.3	2.4	1.6	1	1.2	2.3	2.6	1.5	.62	.04	.05
2	.28	4.1	2.4	1.3	1.1	1.1	2.6	2.4	.99	.5	.03	.05
3	.34	4.2	2.5	1.3	1.1	1.2	2.6	2.3	.83	.5	.02	0
4	.46	4.9	2.4	1.4	1.1	1.3	2.6	2.5	.82	.57	.01	0
5	.53	5	2.4	1.4	1.1	1.4	2.7	2.8	.84	.53	.01	0
6	.51	5.7	2.2	1.4	1.1	1.6	2.5	2.6	.71	.5	.01	0
7	.43	4.5	2.1	1.5	1.2	1.7	2.2	2.1	.71	.42	.05	0
8	.52	3.2	1.9	1.6	1.2	1.6	2.3	1.8	.76	.33	.05	0
9	.52	3.7	1.9	1.7	1.3	1.4	2.4	1.8	.69	.27	.04	.05
10	.52	4.6	2	1.7	1.2	1.5	2.6	1.6	.72	.22	.04	.1
11	.43	5	2.1	1.5	1.2	1.7	2.8	1.2	.72	.18	.03	.19
12	.43	4.8	1.9	1.3	1.2	1.7	2.6	1	.72	.16	.03	.19
13	.61	4.2	1.8	1.3	1.2	1.8	2.4	1	3.2	.16	.02	.19
14	1.3	5.2	1.9	1.2	1.2	1.6	2.3	1	2.5	.16	.02	.19
15	1	4.1	1.9	1.3	1.1	1.5	2.2	1	1.2	.1	.01	.19
16	1	3.7	1.8	1.5	1.1	1.5	2.5	1.2	1.2	.05	0	.1
17	4.9	3.5	1.8	1.4	1.2	1.5	2	2.1	.95	.05	0	.1
18	4.5	3.4	1.8	1.3	1.3	1.6	1.9	1.9	.99	.05	0	.15
19	2.6	3.2	1.8	1.3	1.2	1.6	2	2	2.6	.05	0	.21
20	1.8	3	1.8	1.3	1.2	1.7	2.3	1.9	2.3	.05	0	.19
21	2.2	2.8	2	1.3	1.2	1.8	2.3	2.1	1.1	.05	0	.15
22	7.7	2.9	1.9	1.4	1.2	1.9	2.2	1.5	.74	.15	0	.15
23	4.8	3.1	1.7	1.2	1.2	1.9	2.2	1.1	.61	.15	0	.15
24	2.6	2.7	1.6	1.1	1.3	1.8	2	1.1	.58	.1	0	.1
25	2.9	2.3	1.6	1.1	1.2	1.7	2.3	1.1	.56	.1	0	.1
26	2.7	2.5	1.6	1.2	1.2	1.7	2.4	1.2	.55	.1	0	.1
27	2.7	2.3	1.7	1.2	1.2	1.9	2.3	1.3	.63	.1	0	.15
28	2.8	2.5	1.7	1.4	1.2	2.1	2.3	1.8	.57	.1	0	.19
29	3.1	2.4	1.7	1.3	---	2.1	2.6	2.3	.49	.05	.01	.19
30	3.7	2.4	1.7	1.2	---	2.2	2.6	1.6	.7	.05	.05	.19
31	3.7	---	1.7	1.1	---	2.2	---	1.3	---	.05	.05	---
TOTAL	62.1	109.2	59.7	41.8	33	51.5	71	53.2	31.48	6.47	.52	3.42
MEAN	2	3.6	1.9	1.4	1.2	1.7	2.4	1.7	1.05	.21	.02	.11
AC-FT	123	217	118	83	65	102	141	106	62	13	1	6.8
MAX	7.7	5.7	2.5	1.7	1.3	2.2	2.8	2.8	3.2	.62	.05	.21
MIN	.28	2.3	1.6	1.1	1	1.1	1.9	1	.49	.05	0	0

CAL YR 2001 TOTAL 1974.27 MEAN 5.41 MAX 33 MIN 0.28 AC-FT 3920  
WTR YR 2002 TOTAL 523.39 MEAN 1.43 MAX 7.7 MIN 0 AC-FT 1040

MAX DISCH: 20.3 CFS AT 15:30 ON Oct. 22, 2001 GH 0.85 FT. SHIFT 0.05 FT.  
MAX GH: 0.85 FT. AT 15:30 ON Oct. 22, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08240000 RIO GRANDE ABOVE MOUTH OF TRINCHERA CREEK, NEAR LASAUSES, CO

**LOCATION.**--Lat 37°18'58", long 105°44'32", in sec. 35, T.36 N., R.11 E., Conejos County, Hydrologic Unit 13010002, on right bank 0.2 mi upstream from the historical channel of Trinchera Creek, 3.2 mi north of Lasauses, and 13 mi southeast of Alamosa.

**DRAINAGE AREA AND PERIOD OF RECORD.**--5,740 mi<sup>2</sup>., approximately, includes 2,940 mi<sup>2</sup>. in closed basin in northern part of San Luis Valley, Co. May 1936 to current year. Water quality data from 1993 to 1996.

**GAGE.**--Water-stage recorder with satellite telemetry. Elevation of gage is 7,500 ft, estimated from nearby level lines. Although the name of the station is Rio Grande above Mouth of Trinchera Creek, over a period of years Trinchera Creek has shifted allowing the majority of Trinchera Creek water to enter the Rio Grande River above the station.

**REMARKS.**--Record is complete and reliable except for Jan. 30 - March 7, 2002 when the well was frozen. Stage-discharge relation affected by ice Nov. 24 - Dec. 31, 2001, Jan. 1 - 29, March 8 - 12, 2002. Record is good except for periods of no gage height and ice affected record, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--RIOTRICO11 USED FROM 01-OCT-2001 TO 30-SEP-2002

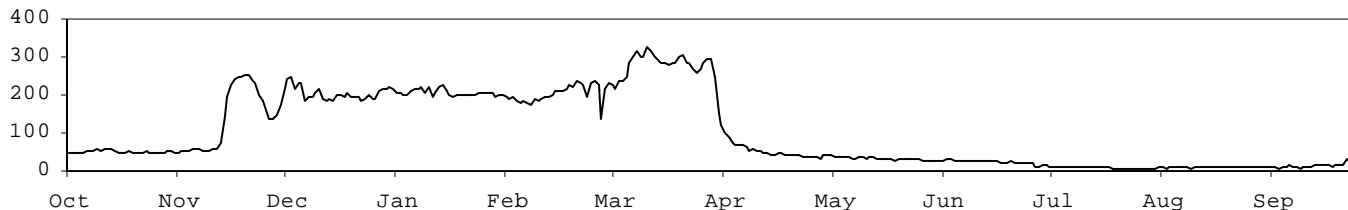
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	45	50	215	215	200	135	297	39	27	19	4.2	8.2
2	47	52	240	205	195	215	250	34	25	13	4.7	9.6
3	46	51	250	205	190	230	155	40	25	11	6.3	9.8
4	47	53	215	200	195	225	119	41	27	15	4.4	9.9
5	48	59	230	200	185	215	102	40	28	15	6	9.8
6	52	59	230	210	180	235	87	39	28	13	12	8.3
7	52	57	185	215	185	235	74	38	30	13	8.7	8.3
8	53	55	195	215	180	250	71	38	29	11	6.1	8.4
9	56	55	195	220	175	285	68	38	27	9.9	9.8	7.7
10	51	55	205	205	190	300	66	37	27	9.8	9.8	11
11	56	56	215	220	185	315	63	34	27	8.8	9.8	10
12	59	56	190	195	190	300	55	34	26	9.1	9.8	14
13	57	73	185	205	195	299	56	35	27	10	9.4	11
14	52	141	190	220	195	328	54	38	28	9.8	9.5	8.4
15	48	194	185	225	200	316	51	33	26	10	7.1	7.3
16	50	227	200	210	210	302	49	36	25	9.8	12	12
17	50	243	200	200	210	289	45	35	25	9.1	11	13
18	53	248	195	195	210	285	44	33	25	8.2	10	12
19	50	250	205	200	215	282	44	33	24	8.5	9.9	17
20	48	254	195	200	225	278	48	33	25	8.2	9.8	16
21	48	251	195	200	220	282	46	33	24	8.4	9.8	15
22	50	237	195	200	235	282	43	32	23	8	9.7	14
23	52	232	185	200	230	301	44	28	22	8.5	9.6	14
24	50	200	190	200	225	305	40	30	22	7.6	9.2	13
25	50	185	200	205	195	282	41	30	25	6.3	9	14
26	50	155	190	205	230	284	42	30	22	5.2	9.2	14
27	50	135	190	205	235	270	38	30	21	4.7	10	18
28	49	135	210	205	225	256	37	33	22	4.7	11	29
29	51	145	215	205	---	268	37	32	21	3.9	13	28
30	52	175	215	195	---	286	35	30	20	5	9	26
31	50	---	220	200	---	293	---	27	---	4.9	8	---
TOTAL	1572	4138	6325	6380	5705	8428	2201	1063	753	288.4	277.8	396.7
MEAN	51	138	204	206	204	272	73	34	25	9.3	9	13.2
AC-FT	3120	8210	12550	12650	11320	16720	4370	2110	1490	572	551	787
MAX	59	254	250	225	235	328	297	41	30	19	13	29
MIN	45	50	185	195	175	135	35	27	20	3.9	4.2	7.3

CAL YR 2001 TOTAL 106228 MEAN 291 MAX 1500 MIN 26 AC-FT 210700  
WTR YR 2002 TOTAL 37527.9 MEAN 103 MAX 328 MIN 3.9 AC-FT 74440

MAX DISCH: 340 CFS AT 13:00 ON Mar. 14, 2002 GH 2.74 FT. SHIFT 0.01 FT.  
MAX GH: 3.79 FT. AT 15:15 ON Mar. 12, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





## RIO GRANDE BASIN

08240500 TRINCHERA CREEK ABOVE TURNERS RANCH, NEAR FORT GARLAND, CO

**LOCATION.**--Lat 37°22'29", long 105°17'40", Costilla County, Hydrologic Unit 13010002, in Sangre de Cristo Grant, on right bank 0.9 mi downstream from North Fork, 1.0 mi upstream from Turners Ranch, and 8.3 mi southeast of Fort Garland.

**DRAINAGE AREA.**--45 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder with satellite telemetry. Altitude of gage is 8,520 ft, from topographic map.

**REMARKS.**--Record is complete and reliable except for Jan. 3-10,15-17, 19-27,30, Feb. 2-13, Mar. 2-9, 2002, when the well was frozen. Stage-discharge relation was affected by ice Nov. 21-30, Dec. 1, 2, 6-20, 22-29, 2001, Jan. 2, 11-14, 18, 31, Feb. 1, 14-28, Mar. 1,10, 15-17, 2002. Record is good except for periods of ice affected or no gage height record, which is poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--TRITURCO12 USED FROM 01-OCT-2001 TO 31-MAY-2002  
TRITURCO13 USED FROM 01-JUN-2002 TO 30-SEP-2002

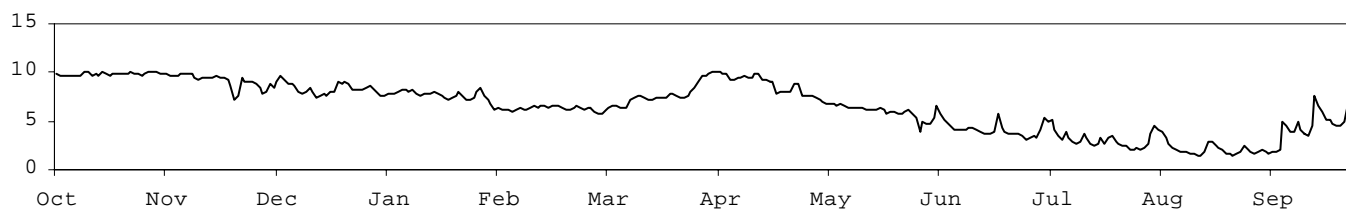
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	9.8	9.8	8.4	7.7	6.2	6	9.7	7.6	5	3.2	2.1	1.8
2	9.7	9.7	9	7.8	6.4	5.8	9.8	7.4	4.8	3.5	2.3	1.6
3	9.7	9.7	9.7	7.9	6.2	5.8	10	7.1	4.7	3.3	2.6	1.8
4	9.6	9.7	9.2	7.8	6.2	6.2	10	6.9	5.4	4.1	3.6	2
5	9.6	9.8	8.9	8	6.2	6.4	10	6.8	6.5	5.3	4.6	1.8
6	9.7	9.8	8.8	8.2	6	6.6	9.8	6.7	5.7	4.9	4.2	1.7
7	9.6	9.9	8.6	8.2	6.2	6.6	9.8	6.7	5.1	5.1	3.9	1.8
8	9.6	9.9	8	8	6.4	6.4	9.3	6.6	4.7	4.1	3.3	1.9
9	10	9.5	7.8	8.2	6.2	6.4	9.3	6.7	4.4	3.4	2.7	2.1
10	10	9.3	8	7.8	6.2	6.4	9.4	6.5	4.2	3.1	2.3	4.9
11	9.6	9.4	8.4	7.6	6.4	7.1	9.4	6.3	4.2	4	2	4.5
12	9.9	9.5	8	7.8	6.6	7.4	9.6	6.4	4.2	3.3	1.8	4
13	9.7	9.4	7.4	7.8	6.4	7.6	9.4	6.4	4.1	2.8	1.9	3.9
14	10	9.4	7.6	7.8	6.6	7.6	9.5	6.4	4.3	2.6	1.8	5
15	9.9	9.6	7.8	8	6.6	7.4	9.8	6.3	4.4	2.8	1.6	4.1
16	9.7	9.4	7.6	7.9	6.4	7.2	9.9	6.2	4.2	3.7	1.6	3.6
17	9.8	9.4	8	7.7	6.6	7.2	9.2	6.2	4	3.3	1.4	3.4
18	9.8	9.3	8	7.4	6.6	7.5	9.2	6.1	3.8	2.7	1.4	4.5
19	9.8	8.7	9	7.2	6.6	7.5	9	6.2	3.6	2.4	1.8	7.6
20	9.8	7.1	8.8	7.4	6.4	7.5	9	6.3	3.6	2.7	2.8	6.6
21	9.8	7.6	9	7.6	6.2	7.4	7.9	6.1	3.9	3.3	2.8	5.9
22	10	9.4	8.8	8	6.2	7.9	8	5.8	5.7	2.7	2.4	5.2
23	9.8	9	8.2	7.6	6.4	7.8	8	5.9	4.4	3.3	2.2	5.1
24	9.8	9	8.2	7.2	6.6	7.7	8	6	3.9	3.4	2	4.8
25	9.7	9	8.2	7.2	6.4	7.4	8	5.8	3.7	2.9	1.7	4.5
26	9.9	8.8	8.2	7.4	6.2	7.5	8.8	5.8	3.6	2.6	1.6	4.5
27	10	8.4	8.4	8	6.4	7.7	8.8	6	3.7	2.4	1.5	4.9
28	10	7.8	8.6	8.4	6.4	8	7.7	6.1	3.7	2.4	1.6	6.9
29	10	8	8.2	7.6	---	8.4	7.7	5.7	3.5	2.1	1.9	6.4
30	9.8	8.8	8	7.2	---	9.1	7.6	5.4	3.1	2.1	2.5	5.9
31	9.8	---	7.7	6.8	---	9.6	---	4	---	2.3	2.1	---
TOTAL	303.9	274.1	258.5	239.2	178.2	225.1	271.6	194.4	130.1	99.8	72	122.7
MEAN	9.8	9.1	8.3	7.7	6.4	7.3	9.1	6.3	4.3	3.2	2.3	4.1
AC-FT	603	544	513	474	353	446	539	386	258	198	143	243
MAX	10	9.9	9.7	8.4	6.6	9.6	10	7.6	6.5	5.3	4.6	7.6
MIN	9.6	7.1	7.4	6.8	6	5.8	7.6	4	3.1	2.1	1.4	1.6

CAL YR 2001 TOTAL 6893.3 MEAN 18.9 MAX 116 MIN 5.0 AC-FT 13670  
WTR YR 2002 TOTAL 2369.6 MEAN 6.49 MAX 10 MIN 1.4 AC-FT 4700

MAX DISCH: 12.2 CFS AT 09:45 ON Mar. 19, 2002 GH 1.34 FT. SHIFT -0.13 FT.  
MAX GH: 3.05 FT. AT 09:20 ON Jan. 12, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08241000 TRINCHERA CREEK ABOVE MOUNTAIN HOME RESERVOIR, CO

**LOCATION.**--Lat 37°23'40", long 105°22'10", NE¼SW¼ sec. 31, T.31 S., R.71 W., (unsurveyed) Costilla County, Hydrologic Unit 13010002, on right bank 150 ft downstream from bridge, 1000 ft upstream from Mountain Home Reservoir, and 5 mi southeast of Ft. Garland, Co.

**DRAINAGE AREA.**--57 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder in a 4' diameter corrugated metal shelter and well. Sutron satellite sysem insatlld April 24, 2001.

**REMARKS.**--Record is complete and reliable. Backwater from a beaver dam submerged the control on Nov. 3-21, 2001. Record is good. Station maintained and record developed by the Division III Hydrographic Staff.

**RATING TABLE.**--TRIMTNC07 USED FROM 01-OCT-2001 TO 30-SEP-2002

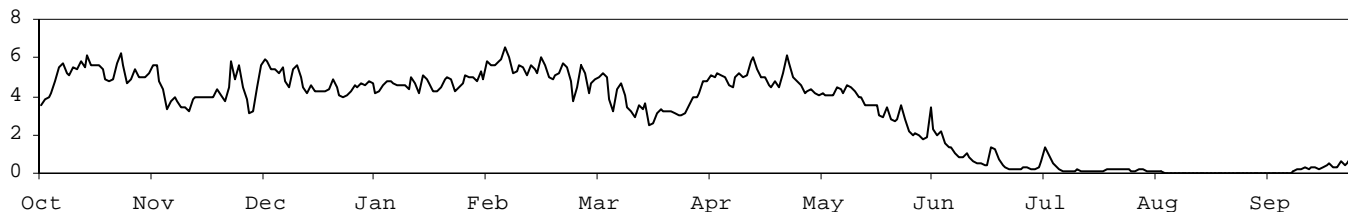
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	3.5	5.6	5.6	4.7	4.9	5.2	4	4.2	2.1	.35	.13	.02
2	3.8	5.6	5.9	4.2	5.8	4.2	4.2	4.3	2	.26	.18	.02
3	3.9	4.8	5.8	4.3	5.6	4.7	4.8	4.4	1.8	.18	.18	.02
4	4.2	4.4	5.4	4.6	5.6	4.9	4.8	4.2	1.9	.21	.15	.02
5	4.8	3.3	5.4	4.8	5.8	5	5.1	4.1	3.4	.29	.1	.02
6	5.5	3.7	5.2	4.8	5.9	5.2	5	4.2	2.3	.63	.07	.01
7	5.7	3.9	5.5	4.7	6.5	5	5.2	4.1	2	1.3	.06	.01
8	5.2	3.7	4.8	4.6	6	3.8	5.1	4.1	2.2	.94	.06	.01
9	5.1	3.4	4.5	4.6	5.2	3.2	5	4.1	1.6	.51	.04	.01
10	5.5	3.4	5.4	4.6	5.3	4.4	4.6	4.5	1.4	.26	.04	.04
11	5.4	3.2	5.6	4.4	5.6	4.7	4.5	4.4	1.4	.17	.04	.05
12	5.8	3.8	5	5	5.5	4.1	5	4.2	1	.11	.02	.03
13	5.5	4	4.5	4.7	5.1	3.4	5.2	4.6	.79	.09	.03	.04
14	6.1	4	4.2	4.2	5.6	3.2	5	4.5	.83	.09	.03	.1
15	5.6	4	4.6	5.1	5.4	2.9	5.1	4.3	1	.1	.01	.18
16	5.6	4	4.3	4.9	5.2	3.5	5.8	3.9	.83	.18	.01	.21
17	5.6	4	4.3	4.7	6	3.3	6	4	.65	.13	.01	.28
18	5.4	4	4.3	4.3	5.6	3.6	5.4	3.5	.55	.1	.01	.21
19	4.9	4.4	4.3	4.3	5	2.5	5	3.5	.55	.1	.01	.28
20	4.8	4.1	4.4	4.5	4.9	2.6	5	3.5	.41	.11	.02	.27
21	4.9	3.7	4.9	4.9	5.1	3.1	4.6	3.5	.42	.1	.03	.18
22	5.7	4.5	4.5	5	5.2	3.3	4.5	3	1.4	.1	.03	.27
23	6.2	5.8	4.1	4.9	5.7	3.2	4.8	2.9	1.2	.1	.04	.43
24	5.6	4.9	4	4.3	5.5	3.2	4.5	3.4	.71	.17	.03	.49
25	4.7	5.6	4.1	4.5	4.8	3.2	5.2	2.8	.45	.17	.02	.3
26	4.9	4.5	4.3	4.7	3.7	3.1	6.1	2.7	.3	.17	.02	.29
27	5.4	3.8	4.6	5.1	4.5	3	5.7	2.8	.24	.17	.05	.6
28	5	3.1	4.5	5	5.6	3	5	3.5	.22	.17	.02	.43
29	5	3.2	4.7	5	---	3.1	4.8	2.8	.19	.16	.03	.51
30	5	4.5	4.6	4.8	---	3.5	4.6	2.2	.18	.16	.05	.78
31	5.2	---	4.8	5.3	---	3.9	---	2	---	.15	.04	---
TOTAL	159.5	124.9	148.1	145.5	150.6	115	149.6	114.2	34.02	7.73	1.56	6.11
MEAN	5.2	4.2	4.8	4.7	5.4	3.7	5	3.7	1.13	.25	.05	.2
AC-FT	316	248	294	289	299	228	297	227	67	15	3.1	12
MAX	6.2	5.8	5.9	5.3	6.5	5.2	6.1	4.6	3.4	1.3	.18	.78
MIN	3.5	3.1	4	4.2	3.7	2.5	4	2	.18	.09	.01	.01

CAL YR	2001	TOTAL	4318.30	MEAN	11.8	MAX	78	MIN	2.5	AC-FT	8570
WTR YR	2002	TOTAL	1156.82	MEAN	3.17	MAX	6.5	MIN	.01	AC-FT	2290

MAX DISCH: 11.7 CFS AT 12:15 ON Mar. 6, 2002 GH 0.56 FT. SHIFT 0.01 FT.  
MAX GH: 0.69 FT. AT 14:15 ON Nov. 19, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## RIO GRANDE BASIN

08241500 SANGRE DE CRISTO CREEK NEAR FORT GARLAND, CO

**LOCATION.**--Lat 37°25'30", long 105°24'52", Costilla County, Hydrologic Unit 13010002, in Sangre de Cristo Grant, on left bank at road bridge, 2,200 ft upstream from Garland Canal, 1.0 mi east of Fort Garland, and 6.3 mi upstream from Ute Creek.

**DRAINAGE AREA.**--190 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder with satellite monitoring system in a 4' diameter CMP shelter and well. Altitude of gage is 7,900 ft, from topographic map.

**REMARKS.**--Record is complete and reliable except for January 25, 2002 through March 14, 2002, when the inlets were frozen. Record is good except for periods of no gage-height, which is poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--SANFTGCO18 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

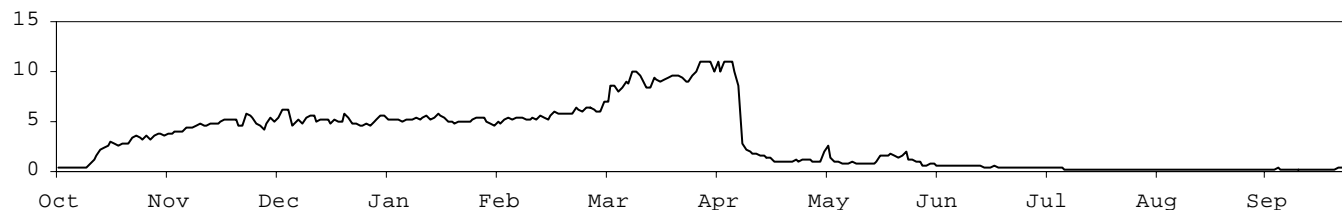
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.5	3.8	5.1	5.6	4.7	6.2	11	1.2	.91	.35	.19	.2
2	.45	3.9	5.4	5.2	5	6	11	1	.7	.35	.2	.2
3	.45	4	6.3	5.2	4.9	6	11	.99	.7	.35	.21	.2
4	.45	4	6.2	5.3	5.2	7	10	1.1	.77	.35	.21	.19
5	.45	4.1	6.3	5.3	5.4	7	11	2	.86	.38	.26	.21
6	.45	4.4	4.6	5.1	5.2	8.6	10	2.7	.67	.38	.23	.2
7	.49	4.4	5.1	5.2	5.4	8.6	11	1.4	.65	.38	.21	.2
8	.44	4.5	5.2	5.2	5.4	8	11	1	.61	.38	.21	.21
9	.49	4.7	4.8	5.3	5.4	8.4	11	1	.56	.34	.19	.22
10	.73	4.8	5.4	5.4	5.2	9	10	.87	.52	.33	.19	.32
11	1.2	4.7	5.6	5.2	5.2	8.8	8.6	.88	.55	.31	.19	.27
12	1.6	4.7	5.6	5.5	5.4	10	2.8	.9	.57	.3	.19	.24
13	2.2	4.9	5.1	5.7	5.2	10	2.3	.94	.55	.28	.2	.24
14	2.5	4.9	5.2	5.3	5.6	9.6	2	.78	.59	.26	.18	.26
15	2.6	4.9	5.3	5.5	5.4	9.3	1.9	.85	.55	.27	.18	.23
16	3	5	5.2	5.8	5.2	8.5	1.9	.9	.57	.29	.17	.23
17	2.8	5.2	4.8	5.7	5.6	8.4	1.6	.9	.55	.25	.16	.21
18	2.7	5.3	5.2	5.4	6	9.4	1.6	.87	.55	.25	.18	.24
19	2.8	5.3	5	5	5.8	9.2	1.5	.9	.45	.23	.19	.27
20	2.9	5.3	5.1	5.1	5.8	9	1.5	.92	.5	.23	.2	.3
21	2.9	4.7	5.8	4.9	5.8	9.2	1.1	1.6	.45	.22	.2	.3
22	3.4	4.7	5.4	5.1	5.8	9.4	1.1	1.7	.52	.22	.21	.3
23	3.7	5.8	4.9	5.1	5.8	9.7	1	1.7	.44	.26	.2	.3
24	3.5	5.7	4.9	5.1	6.4	9.6	1	1.9	.46	.25	.19	.3
25	3.3	5.4	4.6	5	6.2	9.7	1.1	1.7	.44	.27	.18	.3
26	3.6	4.8	4.6	5.2	6	9.5	1.1	1.5	.43	.22	.18	.3
27	3.2	4.6	4.9	5.4	6.4	9	1.2	1.7	.41	.26	.19	.33
28	3.6	4.3	4.7	5.4	6.4	9.1	1.1	2.1	.4	.21	.2	.35
29	3.8	4.9	5	5.4	---	9.7	1.2	1.3	.39	.2	.21	.36
30	3.8	5.4	5.3	5	---	10	1.2	1.2	.37	.21	.22	.35
31	3.7	---	5.6	4.8	---	11	---	1.1	---	.2	.21	---
TOTAL	67.7	143.1	162.2	163.4	155.8	272.9	143.8	39.6	16.69	8.78	6.13	7.83
MEAN	2.18	4.8	5.2	5.3	5.6	8.8	4.8	1.28	.56	.28	.2	.26
AC-FT	134	284	322	324	309	541	285	79	33	17	12	16
MAX	3.8	5.8	6.3	5.8	6.4	11	11	2.7	.91	.38	.26	.36
MIN	.44	3.8	4.6	4.8	4.7	6	1	.78	.37	.2	.16	.19

CAL YR	2001	TOTAL	2478.72	MEAN	6.79	MAX	35	MIN	.23	AC-FT	4920
WTR YR	2002	TOTAL	1187.93	MEAN	3.25	MAX	11	MIN	.16	AC-FT	2360

MAX DISCH: 19.6 CFS AT 11:00 ON Mar. 18, 2002 GH 1.57 FT. SHIFT -0.04 FT.

MAX GH: 1.57 FT. AT 11:00 ON Mar. 18, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08242500 UTE CREEK NEAR FORT GARLAND, CO

**LOCATION.**--Lat 37°26'50", long 105°25'33", Costilla County, Hydrologic Unit 13010002, in Sangre de Cristo Grant, on left bank 2,300 ft upstream from Newton ditch, 1.4 mi north of Fort Garland, and 5.7 mi upstream from mouth.

**DRAINAGE AREA AND PERIOD OF RECORD.**--32 mi<sup>2</sup>. Staff gage established on weir Mar. 1915 and operated to Oct. 1916. Continuous record from May 1923 to present at various locations close to present site.

**GAGE.**--Graphic water-stage recorder with satellite telemetry. Altitude of gage is 8,045 ft, from topographic map.

**REMARKS.**--Record is complete and reliable except for Dec. 8-18, 2001 and Mar. 15 - Apr. 4, 2002, when the well was frozen; and Dec. 19, 2001 through Mar. 14, 2002, when the station was closed for the winter; and Jun. 18, 19, 2002, when gage was isolated from stream. Stage-discharge relation was affected by ice Nov. 25 - Dec. 7, 2001. There was no flow Jun. 21, 25-27, Jul. 3, 4, 17 - Sep. 9, 2002. (61 days). Record is good except for periods of no gage-height and ice affected record which are poor. Station maintained and record developed by the Division III Hydrographic Staff.

**RATING TABLE.**--UTEFTGCO17 USED FROM 01-OCT-2001 TO 30-SEP-2002

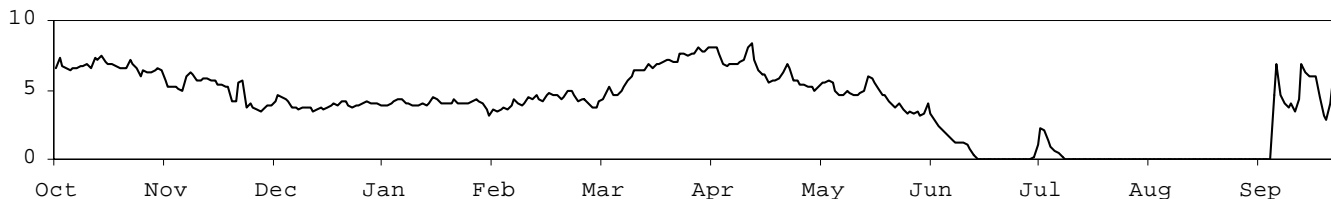
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	6.6	5.7	3.9	3.9	3.2	4	8	5.3	3.3	.02	0	0
2	7.3	5.2	4.2	3.9	3.6	3.8	7.8	5.2	3.4	.01	0	0
3	6.7	5.2	4.6	3.9	3.4	3.8	7.8	5.2	3.2	0	0	0
4	6.5	5.2	4.5	4.1	3.6	4.2	8	5	3.3	0	0	0
5	6.4	5.1	4.3	4.2	3.8	4.4	8	5.2	4.1	.2	0	0
6	6.5	5	4.2	4.3	3.6	5	8	5.5	3.3	1.1	0	0
7	6.5	5.9	3.8	4.3	3.9	5.2	7.6	5.5	2.8	2.2	0	0
8	6.7	6.2	3.7	4.1	4.3	4.7	6.9	5.7	2.4	2.1	0	0
9	6.7	6.1	3.6	4.1	4.1	4.7	6.7	5.5	2.1	1.3	0	0
10	6.9	5.7	3.7	3.9	3.9	5	6.9	5	1.9	.93	0	.02
11	6.6	5.7	3.8	3.9	4.1	5.2	6.8	4.6	1.7	.65	0	4.6
12	7.3	5.8	3.7	3.9	4.5	5.6	6.8	4.6	1.4	.46	0	6.9
13	7.2	5.8	3.4	4	4.3	6	7	4.9	1.2	.14	0	4.7
14	7.5	5.7	3.6	3.9	4.7	6.4	7.2	4.8	1.2	.03	0	4.1
15	7	5.6	3.7	4.1	4.4	6.4	8.1	4.7	1.2	.02	0	3.7
16	6.8	5.3	3.6	4.5	4.2	6.4	8.4	4.7	1	.01	0	4
17	6.8	5.4	3.7	4.3	4.6	6.4	7.2	4.8	.75	0	0	3.5
18	6.7	5.2	3.9	4.1	4.8	6.8	6.4	4.9	.3	0	0	4.3
19	6.6	5.2	4	4	4.6	6.6	6.1	5.9	.02	0	0	6.9
20	6.5	4.2	3.9	4	4.6	6.8	6.1	5.8	.01	0	0	6.2
21	6.5	4.2	4.2	4	4.3	6.8	5.5	5.5	0	0	0	6
22	7.2	5.5	4.2	4.3	4.5	7	5.7	5.1	.02	0	0	6
23	6.8	5.6	3.9	4.1	4.9	7.2	5.6	4.7	.04	0	0	5.9
24	6.5	3.8	3.8	4	4.9	7.2	5.8	4.6	.02	0	0	4.5
25	5.9	4	3.9	4	4.6	7	6.2	4.2	0	0	0	3.2
26	6.4	3.8	3.9	4	4.2	7	6.9	3.9	0	0	0	2.9
27	6.3	3.6	4.1	4.2	4.4	7.6	6.6	3.8	0	0	0	4
28	6.3	3.5	4.2	4.4	4.4	7.6	5.7	4	.01	0	0	6.7
29	6.4	3.6	4.1	4.2	---	7.4	5.6	3.6	.05	0	0	8.6
30	6.6	3.9	4.1	4	---	7.6	5.3	3.3	.03	0	0	6.9
31	6.4	---	4	3.6	---	7.6	---	3.4	---	0	0	---
TOTAL	207.1	150.7	122.2	126.2	118.4	187.4	204.7	148.9	38.75	9.17	0	103.62
MEAN	6.7	5	3.9	4.1	4.2	6	6.8	4.8	1.29	.3	0	3.45
AC-FT	411	299	242	250	235	372	406	295	77	18	0	206
MAX	7.5	6.2	4.6	4.5	4.9	7.6	8.4	5.9	4.1	2.2	0	8.6
MIN	5.9	3.5	3.4	3.6	3.2	3.8	5.3	3.3	0	0	0	0

CAL YR	2001	TOTAL	6875.10	MEAN	18.8	MAX	132	MIN	2.9	AC-FT	13640
WTR YR	2002	TOTAL	1417.14	MEAN	3.88	MAX	8.6	MIN	0	AC-FT	2810

MAX DISCH: 9.6 CFS AT 23:45 ON Sep. 28, 2002 GH 1.63 FT. SHIFT 0.04 FT.  
MAX GH: 2.38 FT. AT 07:15 ON Dec. 8, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## RIO GRANDE BASIN

08243500 TRINCHERA CREEK BELOW SMITH RESERVOIR, NEAR BLANCA, CO

**LOCATION.**--Lat 37°23'10", long 105°33'02", in sec. 4, T.31 S., R.73 W., (unsurveyed), Costilla County, Hydrologic Unit 13010002, on right bank 150 ft downstream from bridge, 0.6 mi downstream from Smith Reservoir, and 4.0 mi southwest of Blanca, Co.

**DRAINAGE AREA.**--396 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder with satellite telemetry in a 4' CMP shelter and well. Altitude of gage is 7,700 ft, estimated from nearby U.S. Coast and Geodetic Survey level lines.

**REMARKS.**--Record is complete and reliable except for Jan. 10, 11, Feb. 9-Mar. 8, 2002, when the chart recorder float was affected by ice and the satellite data was not complete. Stage-discharge relation affected by ice Jan. 24, Feb. 5, 6, 2002. Record is good except for periods of no gage-height record, which are fair. Station maintained and record developed by the Division III Hydrographic Staff.

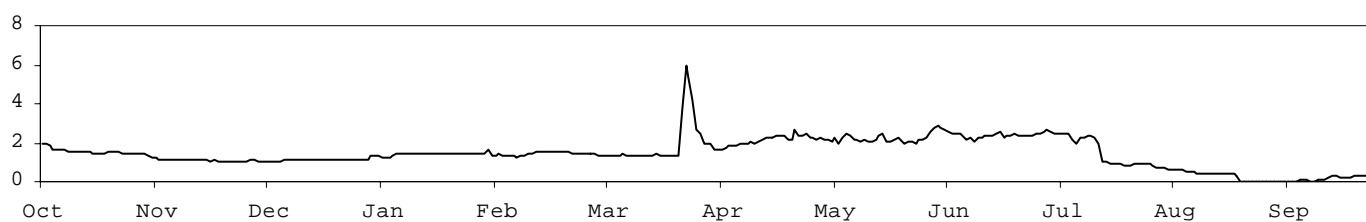
**RATING TABLE.**--TRISMIC011 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	2	1.2	1	1.3	1.3	1.4	2	2.2	2.6	2.5	.83	.01
2	1.9	1.1	1	1.2	1.3	1.3	1.9	2.3	2.8	2.6	.68	0
3	1.8	1.1	1	1.2	1.4	1.3	1.6	2.2	2.9	2.7	.7	0
4	1.6	1.1	1	1.2	1.3	1.3	1.6	2.2	2.8	2.6	.67	.02
5	1.6	1.1	1	1.3	1.3	1.3	1.6	2.1	2.7	2.5	.65	.02
6	1.6	1.1	1.1	1.4	1.3	1.3	1.7	2.3	2.6	2.5	.64	.02
7	1.6	1.1	1.1	1.4	1.3	1.3	1.8	2	2.5	2.5	.6	.02
8	1.5	1.1	1.1	1.4	1.2	1.3	1.8	2.3	2.5	2.5	.61	.02
9	1.5	1.1	1.1	1.4	1.3	1.4	1.8	2.5	2.5	2.5	.59	.03
10	1.5	1.1	1.1	1.4	1.3	1.3	2	2.4	2.4	2.2	.51	.11
11	1.5	1.1	1.1	1.4	1.4	1.3	2	2.2	2.2	2	.51	.07
12	1.5	1.1	1.1	1.4	1.4	1.3	2	2.2	2.3	2.3	.51	.06
13	1.5	1.1	1.1	1.4	1.5	1.3	2.1	2.1	2.1	2.3	.46	.04
14	1.5	1.1	1.1	1.4	1.5	1.3	2	2.2	2.3	2.4	.41	.05
15	1.4	1.1	1.1	1.4	1.5	1.3	2.1	2.1	2.3	2.4	.37	.1
16	1.4	1	1.1	1.4	1.5	1.3	2.2	2.1	2.4	2.3	.41	.12
17	1.4	1.1	1.1	1.4	1.5	1.3	2.3	2.2	2.4	1.9	.44	.12
18	1.4	1	1.1	1.4	1.5	1.4	2.3	2.4	2.4	1	.43	.18
19	1.5	1	1.1	1.4	1.5	1.3	2.3	2.5	2.5	.99	.41	.29
20	1.5	1	1.1	1.4	1.5	1.3	2.4	2.1	2.6	.91	.37	.27
21	1.5	1	1.1	1.4	1.5	1.3	2.4	2.1	2.3	.91	.37	.21
22	1.5	1	1.1	1.4	1.5	1.3	2.4	2.2	2.4	.91	.37	.21
23	1.4	1	1.1	1.4	1.4	1.3	2.2	2.3	2.4	.93	.37	.21
24	1.4	1	1.1	1.4	1.4	1.3	2.2	2.2	2.5	.86	.34	.25
25	1.4	1	1.1	1.4	1.4	3.8	2.7	2	2.4	.86	.02	.27
26	1.4	1	1.1	1.4	1.4	6	2.4	2.1	2.4	.86	0	.29
27	1.4	1.1	1.1	1.4	1.4	5.3	2.4	2.1	2.4	.91	.01	.32
28	1.4	1.1	1.1	1.4	1.4	4.2	2.5	2	2.4	.89	.01	.34
29	1.4	1	1.1	1.4	---	2.7	2.3	2.2	2.4	.88	0	.33
30	1.3	1	1.3	1.4	---	2.5	2.3	2.2	2.5	.91	.01	.29
31	1.2	---	1.3	1.6	---	2	---	2.3	---	.9	.01	---
TOTAL	46.5	31.9	34	42.8	39.2	58	63.3	68.3	73.9	53.42	12.31	4.27
MEAN	1.5	1.1	1.1	1.4	1.4	1.9	2.1	2.2	2.5	1.72	.4	.14
AC-FT	92	63	67	85	78	115	126	135	147	106	24	8.5
MAX	2	1.2	1.3	1.6	1.5	6	2.7	2.5	2.9	2.7	.83	.34
MIN	1.2	1	1	1.2	1.2	1.3	1.6	2	2.1	.86	0	0
CAL YR 2001	TOTAL	2513.5	MEAN	6.89	MAX	44	MIN	1	AC-FT	4990		
WTR YR 2002	TOTAL	527.9	MEAN	1.45	MAX	6	MIN	0	AC-FT	1050		

MAX DISCH: 9.25 CFS AT 10:30 ON Mar. 26, 2002 GH 3.12 FT. SHIFT 0.01 FT.  
MAX GH: 3.12 FT. AT 10:30 ON Mar. 26, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08245000 CONEJOS RIVER BELOW PLATORO RESERVOIR, CO

**LOCATION.**--Lat 37°21'18", long 106°32'37", Conejos County, Hydrologic Unit 13010005, on left bank 1,100 ft downstream from valve house for Platoro Reservoir and 0.7 mi northwest of Platoro.

**DRAINAGE AREA AND PERIOD OF RECORD.**--40 mi<sup>2</sup>. 1937 - 1953 at site one mile downstream. May 1952 to current year at present site.

**GAGE.**--Water-stage recorder with satellite telemetry on concrete control. Datum of gage is 9,866.60 ft above National Geodetic Vertical Datum of 1929.

**REMARKS.**--Record is complete and reliable except for November 2-11, 2001, and November 21, 2001 through March 28, 2002 when the station was closed for the winter; The station was isolated on August 16-22, and September 15, 2002. The gage height was not representative of the flow on March 29 - April 3, July 22, and August 13, 2002 because the lower inlet was partially blocked and not allowing the well to fill or drain satisfactorily during large flow changes. Record is good except for periods of no gage-height record and 'e' record which are fair. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--CONPLACO12 USED FROM 01-OCT-2001 TO 21-NOV-2001  
 CONPLACO13 USED FROM 28-MAR-2002 TO 30-SEP-2002

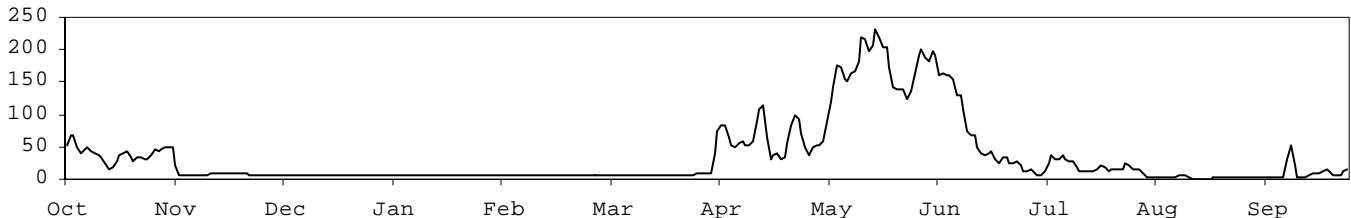
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
 MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	53	22	7	7.1	7.3	7.5	10	48	202	13	15	4
2	67	7.6	7	7.1	7.3	7.6	10	51	189	14	15	3.7
3	69	7.6	7	7.1	7.3	7.6	41	54	181	8.7	8.5	3.8
4	49	7.6	7	7.1	7.3	7.6	75	60	198	4.8	3.3	3.9
5	39	7.6	7	7.1	7.3	7.6	84	90	192	5.5	3.3	3.9
6	46	7.6	7	7.1	7.4	7.6	84	119	161	11	3.4	4
7	50	7.6	7	7.1	7.4	7.6	66	142	165	26	3.3	4
8	43	7.6	7	7.1	7.4	7.6	53	175	159	36	3.4	4
9	39	7.6	7	7.1	7.4	7.6	49	174	162	32	3.5	4
10	38	7.6	7	7.1	7.4	7.6	55	154	155	32	3.5	4
11	34	8.8	7	7.1	7.4	7.6	60	152	131	37	3.5	3.9
12	26	9.4	7	7.1	7.4	7.6	52	165	129	32	3.4	4
13	15	9.4	7	7.2	7.4	7.6	53	167	108	29	5.4	32
14	18	9.4	7	7.2	7.4	7.6	58	182	74	29	5.1	51
15	27	9.4	7	7.2	7.4	7.7	88	218	67	18	5.1	22
16	37	9.4	7	7.2	7.4	7.7	108	217	67	11	2.3	4
17	40	9.4	7	7.2	7.4	7.7	114	196	49	11	.6	4
18	44	9.4	7	7.2	7.5	7.7	64	206	39	12	.6	4
19	35	9.4	7	7.2	7.5	7.7	30	231	37	12	.6	6.4
20	27	9.4	7	7.2	7.5	7.7	37	219	39	13	.6	8.1
21	33	8.1	7	7.2	7.5	7.7	40	204	42	14	.6	8.1
22	33	7	7	7.2	7.5	7.7	31	204	30	23	1.5	8.1
23	32	7	7	7.2	7.5	7.7	35	173	24	20	3	11
24	31	7	7	7.2	7.5	7.7	56	143	34	13	3	14
25	36	7	7	7.3	7.5	7.7	83	138	34	14	3.1	11
26	46	7	7	7.3	7.5	7.7	99	138	26	14	2.5	7.4
27	44	7	7	7.3	7.5	7.7	94	138	25	14	2.8	5.4
28	46	7	7	7.3	7.5	7.7	70	123	29	14	3.8	7.7
29	48	7	7	7.3	---	8	49	136	21	26	3.8	13
30	48	7	7	7.3	---	9	37	163	13	23	3.7	15
31	49	---	7	7.3	---	10	---	191	---	14	3.8	---
TOTAL	1242	254.9	217	222.7	207.8	241.1	1785	4771	2782	576	121	279.4
MEAN	40	8.5	7	7.2	7.4	7.8	60	154	93	18.6	3.9	9.3
AC-FT	2460	506	430	442	412	478	3540	9460	5520	1140	240	554
MAX	69	22	7	7.3	7.5	10	114	231	202	37	15	51
MIN	15	7	7	7.1	7.3	7.5	10	48	13	4.8	.6	3.7

CAL YR	2001	TOTAL	32304.8	MEAN	88.5	MAX	577	MIN	7	AC-FT	64080
WTR YR	2002	TOTAL	12699.9	MEAN	34.8	MAX	231	MIN	.6	AC-FT	25190

MAX DISCH: 241 CFS AT 07:30 ON May. 19, 2002 GH 2.18 FT. SHIFT 0.03 FT.  
 MAX GH: 2.18 FT. AT 07:30 ON May. 19, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## RIO GRANDE BASIN

08246500 CONEJOS RIVER NEAR MOGOTE, CO

**LOCATION.**--Lat 37°03'14", long 106°11'13", in SE¼SE¼ sec. 34, T.33 N., R.7 E., Conejos County, Hydrologic Unit 13010005, on left bank 75 ft downstream from bridge on State Highway 174, 0.4 mi downstream from Fox Creek, 5.3 mi west of Mogote, and 10 mi west of Antonito.

**DRAINAGE AREA AND PERIOD OF RECORD.**--282 mi<sup>2</sup>. Intermittent, non-recording data from 1903-1915 at various sites. Water stage recorder from 1915-Oct. 1988 at different site. Oct. 1988-present, water stage recorder at current site.

**GAGE.**--Water-stage recorder with satellite telemetry in a 5 ft. metal shelter and well. Datum of gage is 8,271.54 ft, Colorado State Highway datum.

**REMARKS.**--Record is complete and reliable except for January 27-31, 2002 when ice in the well was affecting the floats. Stage-discharge relation was affected by ice Nov. 27, 2001 through January 26, 2002, and February 1 through March 17, 2002. Record is good except for the periods of no gage height and ice affected record, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

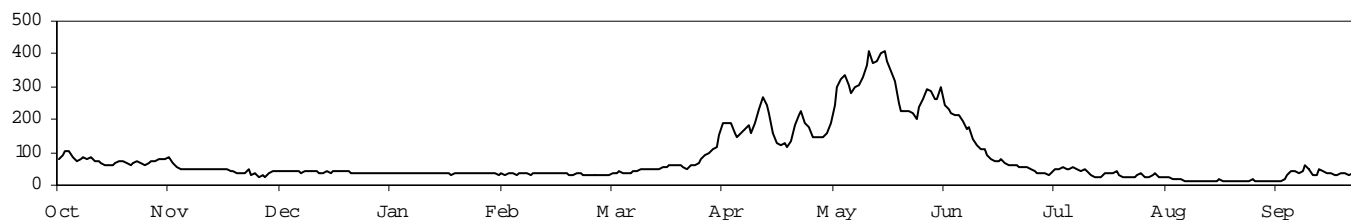
**RATING TABLE.**--CONMOGCO12 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	79	85	40	38	33	30	100	145	295	41	27	14
2	90	66	43	35	34	29	111	146	288	37	25	13
3	103	53	43	35	33	30	118	144	265	37	29	13
4	101	51	43	37	35	32	152	160	260	37	34	13
5	83	49	43	36	34	35	192	192	299	33	27	14
6	74	49	40	36	33	37	188	243	244	34	24	13
7	80	49	40	37	36	40	186	297	233	46	26	13
8	83	50	39	37	36	37	156	326	219	49	23	14
9	82	51	40	38	34	35	149	336	213	55	21	17
10	83	49	40	37	33	39	158	303	213	50	18	31
11	75	46	40	37	35	44	173	280	198	48	16	42
12	73	48	40	38	36	45	181	298	170	55	15	42
13	69	47	38	37	34	49	161	305	175	47	13	34
14	63	47	39	35	36	47	189	332	140	40	13	43
15	60	46	40	35	35	46	234	367	119	46	13	61
16	63	46	39	38	34	46	270	409	112	40	13	51
17	70	46	40	37	36	46	246	372	108	30	12	32
18	73	45	40	35	37	51	222	376	89	26	11	33
19	75	43	40	33	35	53	156	405	78	24	10	51
20	69	36	40	34	35	56	131	409	73	25	11	43
21	63	34	40	35	33	61	119	378	73	35	15	38
22	68	39	37	36	33	63	126	349	78	34	17	35
23	71	48	36	35	35	63	118	319	69	35	14	32
24	65	29	37	35	34	60	134	253	58	41	13	32
25	62	34	37	37	33	55	185	227	61	31	12	34
26	66	27	38	38	31	51	213	225	61	27	12	35
27	73	32	38	37	32	58	225	223	55	25	11	32
28	73	26	38	38	31	64	190	219	56	27	11	39
29	78	34	38	36	---	70	179	204	56	26	13	43
30	79	40	38	35	---	78	148	235	51	30	15	51
31	80	---	38	34	---	92	---	260	---	38	16	---
TOTAL	2326	1345	1222	1121	956	1542	5110	8737	4409	1149	530	958
MEAN	75	45	39	36	34	50	170	282	147	37	17	32
AC-FT	4610	2670	2420	2220	1900	3060	10140	17330	8750	2280	1050	1900
MAX	103	85	43	38	37	92	270	409	299	55	34	61
MIN	60	26	36	33	31	29	100	144	51	24	10	13
CAL YR 2001	TOTAL	103435	MEAN	283	MAX	1820	MIN	26	AC-FT	205200		
WTR YR 2002	TOTAL	29405	MEAN	80.6	MAX	409	MIN	10	AC-FT	58320		

MAX DISCH: 441 CFS AT 04:45 ON May. 16, 2002 GH 3.07 FT. SHIFT 0.01 FT.  
MAX GH: 3.07 FT. AT 04:45 ON May. 16, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08247500 SAN ANTONIO RIVER AT ORTIZ, CO

**LOCATION.**--Lat 36°59'35", long 106°02'17", in NE¼SE¼ sec. 24, T.32 N., R.8 E., Rio Arriba County, New Mexico, Hydrologic Unit 13010005, on left bank 800 ft south of Colorado-New Mexico State line, 0.4 mi southeast of Ortiz, and 0.4 mi upstream from Los Pinos River.

**DRAINAGE AREA AND PERIOD OF RECORD.**--110 mi². April 1919 to Oct. 1920, Oct. 1924 to current year(no winter record prior to 1941). Monthly data only for some periods.

**GAGE.**--Water-stage recorder with satellite telemetry. Elevation of gage is 7,970 ft above National Geodetic Vertical Datum of 1929.

**REMARKS.**--Record is complete and reliable except for the periods Dec. 17, 2001 - Mar. 15, 2002 when the station was closed for the winter, and Dec. 14-16, 2001, Mar. 19-20, 2002 when floats were affected by ice in well. The stage-discharge relation was affected by ice Nov. 23 - Dec. 13, 2001 and Mar. 16-18, 21-29, 2002. There was no flow May 30 - Sep. 18, 2002. Record is good except for periods of no gage height and ice affected record, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--SANORTCO13 USED FROM 01-OCT-2001 TO 30-SEP-2002

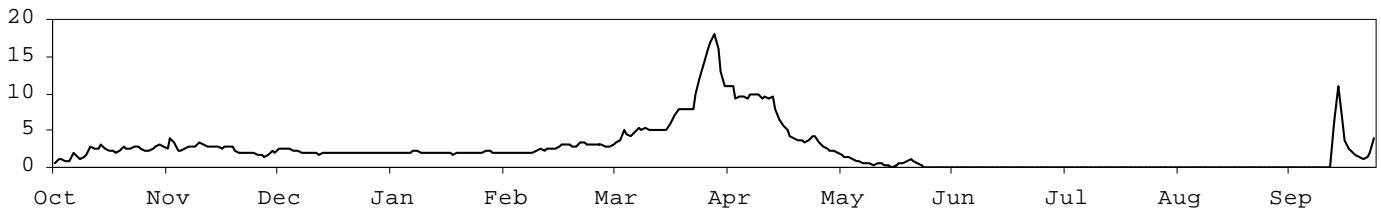
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.69	2.6	2.1	2	1.9	3	18	2.9	0	0	0	0
2	1.1	4	2.6	1.9	2.1	2.9	16	2.4	0	0	0	0
3	1.1	3.4	2.6	2	2	2.9	13	2.2	0	0	0	0
4	.78	2.3	2.6	2.1	2.1	3	11	2.2	0	0	0	0
5	.74	2.3	2.6	2	2	3.5	11	2	0	0	0	0
6	2	2.5	2.2	2	1.9	3.7	11	1.7	0	0	0	0
7	1.6	2.7	2.2	2.1	2.1	5	9.4	1.5	0	0	0	0
8	1.2	2.8	2	2.2	2	4.6	9.7	1.3	0	0	0	0
9	1.4	2.9	2	2.3	2	4.3	9.5	1.1	0	0	0	0
10	1.6	3.4	2	2.1	2	4.7	9.4	.93	0	0	0	0
11	2.7	3.2	1.9	2	2.2	5.4	9.8	.82	0	0	0	0
12	2.6	2.8	2.1	2.1	2.4	5.2	9.9	.66	0	0	0	0
13	2.4	2.8	1.8	2	2.3	5.4	9.9	.57	0	0	0	0
14	3.1	2.7	1.9	1.9	2.6	5.2	9.4	.48	0	0	0	0
15	2.6	2.7	2	2	2.6	5	9.5	.41	0	0	0	0
16	2.3	2.6	1.9	2.1	2.5	5.2	9.3	.45	0	0	0	0
17	2.2	2.7	1.9	2	2.8	5.2	9.5	.53	0	0	0	0
18	2.1	2.7	2	1.9	3.1	5.2	7.9	.42	0	0	0	0
19	2.3	2.7	1.9	1.8	3	5.2	6.4	.18	0	0	0	6.3
20	2.9	2.3	2	1.9	3	6	5.7	.09	0	0	0	11
21	2.4	1.9	2.1	2	2.8	7	5.2	.2	0	0	0	6.1
22	2.5	2	1.9	2.1	2.8	8	4.1	.59	0	0	0	3.7
23	2.9	2	1.9	2	3.3	8	4	.58	0	0	0	2.6
24	2.9	1.9	2	1.9	3.3	8	3.7	.73	0	0	0	2.1
25	2.5	2	2	2	3.2	8	3.6	1.2	0	0	0	1.6
26	2.2	1.8	2	2.1	3	8	3.4	.87	0	0	0	1.4
27	2.3	1.7	2.1	2.1	3.2	10	3.7	.62	0	0	0	1.2
28	2.4	1.5	2	2.3	3	12	4.2	.35	0	0	0	1.4
29	2.7	1.8	2	2.2	---	14	4.1	.08	0	0	0	2
30	3.2	2.2	2.1	2.1	---	16	3.3	0	0	0	0	3.9
31	2.9	---	2	2	---	17	---	0	---	0	0	---
TOTAL	66.31	74.9	64.4	63.2	71.2	206.6	244.6	28.06	0	0	0	43.3
MEAN	2.14	2.5	2.1	2	2.5	6.7	8.2	.91	0	0	0	1.44
AC-FT	132	149	128	125	141	410	485	56	0	0	0	86
MAX	3.2	4	2.6	2.3	3.3	17	18	2.9	0	0	0	11
MIN	.69	1.5	1.8	1.8	1.9	2.9	3.3	0	0	0	0	0

CAL YR	2001	TOTAL	6756.8	MEAN	18.5	MAX	254	MIN	0	AC-FT	13400
WTR YR	2002	TOTAL	862.57	MEAN	2.36	MAX	18	MIN	0	AC-FT	1710

MAX DISCH: 39.8 CFS AT 18:30 ON Apr. 1, 2002 GH 1.46 FT. SHIFT -0.05 FT.  
MAX GH: 2.18 FT. AT 19:00 ON Mar. 17, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





## 08248000 LOS PINOS RIVER NEAR ORTIZ, CO

**Location.**--Lat 36°58'56", long 106°04'23", on line between secs. 26 and 27, T.32 N., R.8 E., Rio Arriba County, New Mexico, Hydrologic Unit 13010005, on left bank 0.9 mi south of Colorado-New Mexico State line, 2.1 mi southwest of Ortiz, and 2.9 mi upstream from mouth.

**DRAINAGE AREA AND PERIOD OF RECORD.**--167 mi<sup>2</sup>. Jan. 1, 1915 to Apr. 14, 1955, water stage recorder at location 350' upstream. Apr. 15, 1955 relocated to present site.

**GAGE.**--Water-stage recorder with satellite telemetry in a metal pipe shelter and well with supplemental outside chain gage. Elevation of gage is 8,040 ft above National Geodetic Vertical Datum of 1929.

**REMARKS.**--Record is complete and reliable except for Dec. 3, 2001 through March 15, 2002 when the station was closed for the winter; and Nov. 28 - Dec. 2, 2001 when the well was frozen. Stage-discharge relation affected by ice Nov. 21-27, 2001, and Mar. 16-25, 2002. Record is good except for periods of no gage height and ice affected record, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

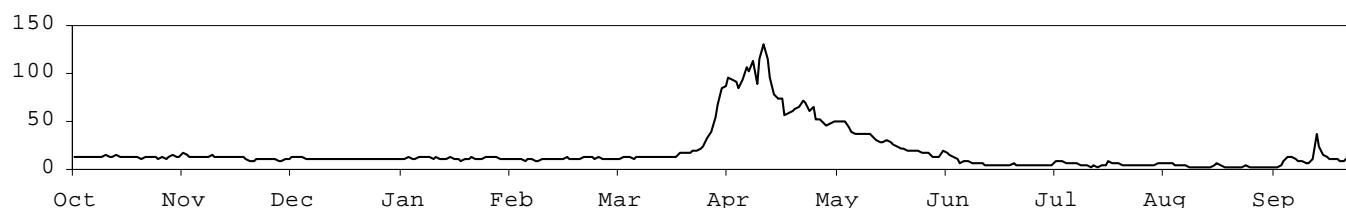
**RATING TABLE.**--LOSORTCO13 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	13	17	10	11	10	11	54	53	17	4.5	3.7	2.2
2	12	15	12	10	11	10	68	48	14	4.5	3.7	2.1
3	13	14	12	11	10	10	84	46	13	4.8	4.2	2.4
4	13	13	12	12	11	11	86	48	13	5.1	5.2	2.7
5	12	13	12	11	10	11	96	50	19	5.2	6.1	2.7
6	12	14	11	11	9	12	93	50	18	5.2	5.9	2.6
7	12	14	11	12	10	13	91	50	15	8.7	7.1	2.9
8	12	14	10	12	10	12	85	50	12	9.3	7	3.2
9	12	15	11	13	9	11	93	44	11	7.8	5.9	3.7
10	16	14	11	12	9	12	107	40	7.6	6.7	5.1	9.4
11	13	13	10	11	10	13	102	38	7.8	6.5	4.3	14
12	13	13	11	12	10	13	112	37	7.9	5.8	3.9	12
13	15	13	10	11	10	13	89	36	6.8	5.8	3.3	10
14	14	13	11	10	11	12	116	36	6	4.5	2.9	9.1
15	14	13	11	11	11	12	130	36	5.5	4.4	2.7	9
16	14	13	10	12	10	12	115	34	5.6	3.9	2.5	7.5
17	13	13	11	11	11	12	96	30	5	3.1	2.7	6.9
18	13	13	11	10	12	13	79	29	4.5	3.3	2.3	11
19	13	11	10	9	11	13	75	28	4.3	2.9	2.1	36
20	11	9.4	11	10	11	13	74	31	3.9	3.3	2.6	25
21	13	9.2	11	11	11	14	56	28	4.3	3.9	4.8	15
22	13	11	10	12	11	17	59	27	5	8.2	5.9	13
23	14	10	10	11	12	17	60	23	5.2	5.7	3.9	11
24	13	10	10	10	12	17	62	22	5.4	5.9	2.6	10
25	11	11	10	11	12	17	66	21	5.5	6.3	2	9.9
26	12	10	10	12	11	19	72	19	5	5	1.8	9.3
27	11	9.8	11	12	12	20	69	20	5.2	4.5	1.7	9.4
28	12	9.6	11	13	11	22	60	20	4.7	4.5	2	12
29	15	9.2	11	12	---	25	65	20	4.7	4	2.5	18
30	14	10	11	11	---	32	53	18	4.7	3.6	3.5	17
31	14	---	11	11	---	40	---	17	---	3.5	2.4	---
TOTAL	402	367.2	334	348	298	479	2467	1049	246.6	160.4	116.3	299
MEAN	13	12.2	11	11.2	10.6	16	82	34	8.2	5.2	3.8	10
AC-FT	797	728	662	690	591	950	4890	2080	489	318	231	593
MAX	16	17	12	13	12	40	130	53	19	9.3	7.1	36
MIN	11	9.2	10	9	9	10	53	17	3.9	2.9	1.7	2.1
CAL YR 2001	TOTAL	36127.4	MEAN	99	MAX	1010	MIN	9.2	AC-FT	71660		
WTR YR 2002	TOTAL	6566.5	MEAN	18	MAX	130	MIN	1.7	AC-FT	13020		

MAX DISCH: 162 CFS AT 01:15 ON Apr. 15, 2002 GH 3.04 FT. SHIFT -0.02 FT.  
MAX GH: 3.04 FT. AT 01:15 ON Apr. 15, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



08248500 SAN ANTONIO RIVER AT MOUTH, NEAR MANASSA, CO

**LOCATION.**--Lat 37°10'38", long 105°52'35", in SE¼NE¼ sec. 21, T.34 N., R.10 E., Conejos County, Hydrologic Unit 13010005, on right bank 0.3 mi. downstream from bridge on State Highway 142, 2.2 mi. upstream from mouth, and 3.3 mi. east of Manassa, Co.

**DRAINAGE AREA.**--348 mi².

**GAGE.**--Graphic water-stage recorder with satellite telemetry in metal pipe shelter and well. Altitude of gage is 7,650 ft. from topographic map.

**REMARKS.**--Record is complete and reliable except for the periods Jan. 18, 2002 through Apr. 3, 2002, when there was flow at the gage and the station was closed for the winter; There was no flow Oct. 1, 2001 - Jan. 17, 2002, May 6-25, and May 29 - Sep. 30, 2002. This site only had flow at it for 111 days this year. There was no flow for 254 days. Record is good except for periods of no gage height, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--SANMANCO18 USED FROM 01-OCT-2001 TO 30-SEP-2002

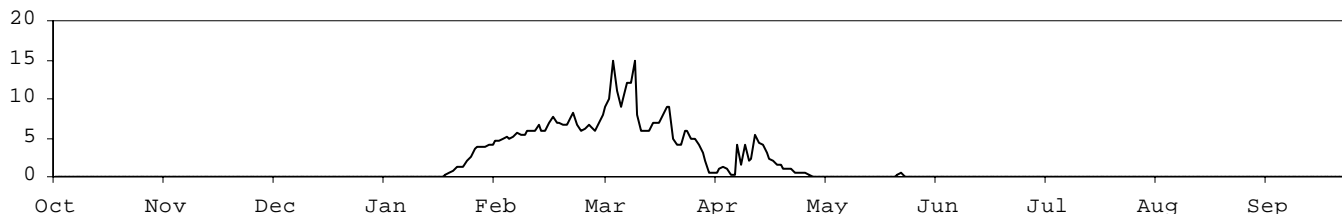
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	4	6.4	3	.13	0	0	0	0
2	0	0	0	0	4.5	6	2	.05	0	0	0	0
3	0	0	0	0	4.7	7	.6	.05	0	0	0	0
4	0	0	0	0	5	8	.44	.03	0	0	0	0
5	0	0	0	0	5.2	9	.44	.03	0	0	0	0
6	0	0	0	0	5	10	.93	0	0	0	0	0
7	0	0	0	0	5.2	15	1.4	0	0	0	0	0
8	0	0	0	0	5.6	11	1.1	0	0	0	0	0
9	0	0	0	0	5.4	9	.36	0	0	0	0	0
10	0	0	0	0	5.4	10	.19	0	0	0	0	0
11	0	0	0	0	5.8	12	4.1	0	0	0	0	0
12	0	0	0	0	6	12	1.5	0	0	0	0	0
13	0	0	0	0	6	15	4.1	0	0	0	0	0
14	0	0	0	0	6.6	8	2	0	0	0	0	0
15	0	0	0	0	6	6	2.3	0	0	0	0	0
16	0	0	0	0	6	6	5.3	0	0	0	0	0
17	0	0	0	0	7	6	4.3	0	0	0	0	0
18	0	0	0	.1	7.6	7	4.2	0	0	0	0	0
19	0	0	0	.2	7	7	3.1	0	0	0	0	0
20	0	0	0	.4	7	7	2.2	0	0	0	0	0
21	0	0	0	.8	6.6	8	2	0	0	0	0	0
22	0	0	0	1.3	6.6	9	1.6	0	0	0	0	0
23	0	0	0	1.2	7.8	9	1.5	0	0	0	0	0
24	0	0	0	1.2	8.2	5	1.1	0	0	0	0	0
25	0	0	0	2	6.6	4	.98	0	0	0	0	0
26	0	0	0	2.6	6	4	1.1	.38	0	0	0	0
27	0	0	0	3.5	6.2	6	.54	.52	0	0	0	0
28	0	0	0	3.9	6.6	6	.44	.07	0	0	0	0
29	0	0	0	3.8	---	5	.63	0	0	0	0	0
30	0	0	0	3.8	---	5	.62	0	0	0	0	0
31	0	---	0	4	---	4	---	0	---	0	0	---
TOTAL	0	0	0	28.8	169.6	242.4	54.07	1.26	0	0	0	0
MEAN	0	0	0	.93	6.1	7.8	1.8	.04	0	0	0	0
AC-FT	0	0	0	57	336	481	107	2.5	0	0	0	0
MAX	0	0	0	4	8.2	15	5.3	.52	0	0	0	0
MIN	0	0	0	0	4	4	.19	0	0	0	0	0

CAL YR	2001	TOTAL	23287.84	MEAN	63.8	MAX	766	MIN	0	AC-FT	46190
WTR YR	2002	TOTAL	496.13	MEAN	1.36	MAX	15	MIN	0	AC-FT	984

MAX DISCH: 15.8 CFS AT 14:45 ON Mar. 7, 2002 GH -- FT. SHIFT -- FT.  
MAX GH: 1.64 FT. AT 01:00 ON Apr. 11, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08249000 CONEJOS RIVER NEAR LASAUSES, MAIN (NORTH) CHANNEL, CO

**LOCATION.**--Lat 37°18'01", long 105°44'47", in SW¼SW¼ sec. 2, T. 35 N., R. 11 E., Conejos County, on left bank of main channel 125 ft downstream from bridge on State Route 158, 1.0 mi upstream from mouth, 2.1 mi north of LaSauses, and 13 mi southeast of Alamosa.

**DRAINAGE AREA AND PERIOD OF RECORD.**--887 mi<sup>2</sup>. Water stage recorder since March 29, 1921 at five sites close to present location.

**GAGE.**--Water-stage recorder with satellite telemetry in timber shelter and well with outside chain gage. Datum of gage is 7,495.02 ft above mean sea level (levels by Bureau of Reclamation). At present site and datum since Oct. 1, 1937.

**REMARKS.**--Record is complete and reliable except for March 27 through April 3, 2002, when the station was isolated. Stage-discharge relation affected by ice Nov. 26, 28-30, Dec. 1, 6, 8-11, 14-20, 22-26, 2001, and Jan. 2-4, 12-21, 23-25, 31, Feb. 1-11, 13, 15-16, 26-27, Mar. 2-4, 2002. There was no flow Oct. 1-11, 2001; May 18, 19, and May 22 through Sep. 30, 2002 (145 days). Record good except for periods of no gage height and ice affected record, which are poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--NORLASCO14 USED FROM 01-OCT-2001 TO 30-SEP-2002

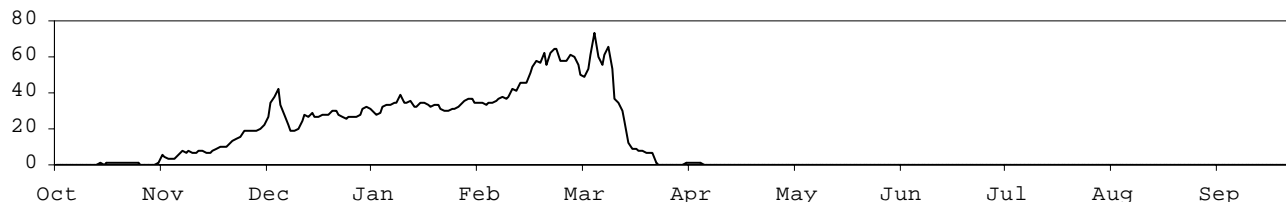
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	6	22	31	34	61	.3	.2	0	0	0	0
2	0	4.8	27	30	35	60	.4	.21	0	0	0	0
3	0	3.1	34	28	34	56	.5	.28	0	0	0	0
4	0	3.1	38	29	33	50	.99	.3	0	0	0	0
5	0	3.3	42	32	35	49	.84	.29	0	0	0	0
6	0	5.9	33	33	35	53	.62	.27	0	0	0	0
7	0	7.4	28	33	36	61	.68	.24	0	0	0	0
8	0	6.6	22	34	37	73	.57	.2	0	0	0	0
9	0	7.3	19	35	38	60	.35	.2	0	0	0	0
10	0	7.2	19	39	37	56	.25	.19	0	0	0	0
11	0	6.9	20	34	38	61	.2	.1	0	0	0	0
12	.42	7.4	25	34	42	66	.2	.1	0	0	0	0
13	.23	7.4	28	36	41	53	.2	.1	0	0	0	0
14	.78	7.2	27	32	46	37	.2	.1	0	0	0	0
15	.53	6.9	29	32	46	35	.2	.1	0	0	0	0
16	.63	8.3	27	34	46	30	.2	.06	0	0	0	0
17	1.1	8.4	27	34	51	24	.2	.05	0	0	0	0
18	.58	10	28	33	55	12	.2	0	0	0	0	0
19	1.2	10	28	32	58	9.4	.2	0	0	0	0	0
20	1.4	9.9	28	33	57	9.1	.2	.02	0	0	0	0
21	.86	12	30	33	62	8.3	.2	.01	0	0	0	0
22	.91	13	30	31	56	8.3	.2	0	0	0	0	0
23	1.2	15	28	30	62	7	.2	0	0	0	0	0
24	1.2	16	27	30	65	6.7	.2	0	0	0	0	0
25	1.3	19	26	31	64	6.5	.2	0	0	0	0	0
26	.54	19	27	31	58	1.6	.25	0	0	0	0	0
27	.25	19	27	32	58	.4	.18	0	0	0	0	0
28	.24	19	27	34	58	.35	.11	0	0	0	0	0
29	.34	19	28	36	---	.3	.1	0	0	0	0	0
30	.27	20	31	37	---	.25	.2	0	0	0	0	0
31	1.4	---	32	37	---	.2	---	0	---	0	0	---
TOTAL	15.38	308.1	864	1020	1317	955.4	9.34	3.02	0	0	0	0
MEAN	.5	10.3	28	33	47	30.8	.31	.1	0	0	0	0
AC-FT	31	611	1710	2020	2610	1900	19	6	0	0	0	0
MAX	1.4	20	42	39	65	73	.99	.3	0	0	0	0
MIN	0	3.1	19	28	33	.2	.1	0	0	0	0	0

CAL YR	2001	TOTAL	36088.21	MEAN	98.9	MAX	876	MIN	0	AC-FT	71580
WTR YR	2002	TOTAL	4492.24	MEAN	12.3	MAX	73	MIN	0	AC-FT	8910

MAX DISCH: 84 CFS AT 23:15 ON Feb. 24, 2002 GH 2.67 FT. SHIFT 0.02 FT.  
MAX GH: 3.37 FT. AT 09:30 ON Feb. 2, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08249000 CONEJOS RIVER NEAR LASAUSES, SECONDARY (SOUTH) CHANNEL, CO

**LOCATION.**--Lat 37°18'01", long 105°44'47", in SE¼NE¼ sec. 10, T. 35 N., R. 11 E., Conejos County, on left bank of secondary channel 230 ft upstream from bridge on State Route 158, 1.0 mi upstream from mouth, 2.0 mi north of LaSausés, and 13 mi southeast of Alamosa.

**DRAINAGE AREA AND PERIOD OF RECORD.**--887 mi<sup>2</sup>. Water stage recorder since March 29, 1921 at various sites close to present location.

**GAGE.**--Water-stage recorder with satellite telemetry. Datum of gage is 7,496.89 ft above mean sea level (levels by Bureau of Reclamation). At present site and datum since Oct. 14, 1965.

**REMARKS.**--Record is complete and reliable except for Nov. 26 through Dec. 2, 2001, and Mar. 2-20, 2002 when the well was frozen; and Dec. 3 through Feb. 28, 2002 when the station was closed for the winter. Stage-discharge relation affected by ice Nov. 25, 2001. The control was submerged Nov. 18-24, 2001. There was no flow Oct. 1-31, 2001, and May 29 through Sep. 30, 2002 (156 days). Record is good except for periods of no gage height, ice affected record, and backwater affected record which should be considered poor. Station maintained and record developed by Div. III Hydrographic Staff.

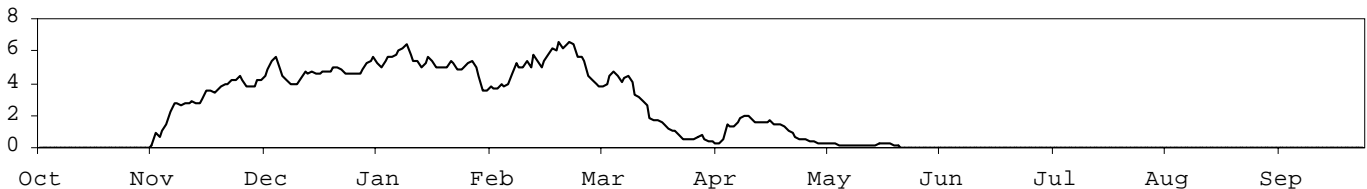
**RATING TABLE.**--SOULASCO07 USED FROM 01-NOV-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	.16	4.2	5.6	3.5	4.5	.75	.4	0	0	0	0
2	0	.92	4.4	5.2	3.8	4.2	.54	.36	0	0	0	0
3	0	.62	4.8	5	3.7	4	.44	.29	0	0	0	0
4	0	1	5.4	5.4	3.7	3.8	.43	.28	0	0	0	0
5	0	1.4	5.6	5.6	4	3.8	.32	.23	0	0	0	0
6	0	2.2	4.8	5.6	3.8	4	.32	.23	0	0	0	0
7	0	2.7	4.5	5.8	4	4.4	.58	.23	0	0	0	0
8	0	2.7	4.2	6	4.6	4.7	1.4	.21	0	0	0	0
9	0	2.6	3.9	6.2	5.2	4.4	1.3	.19	0	0	0	0
10	0	2.7	3.9	6.4	5	4.1	1.3	.16	0	0	0	0
11	0	2.7	4	5.8	5	4.3	1.6	.13	0	0	0	0
12	0	2.9	4.3	5.4	5.4	4.5	1.9	.09	0	0	0	0
13	0	2.8	4.7	5.4	5	4.1	2	.11	0	0	0	0
14	0	2.8	4.6	5	5.8	3.3	2	.12	0	0	0	0
15	0	3	4.7	5.2	5.4	3.1	1.7	.15	0	0	0	0
16	0	3.5	4.6	5.6	5	2.9	1.6	.15	0	0	0	0
17	0	3.5	4.6	5.4	5.4	2.6	1.6	.16	0	0	0	0
18	0	3.4	4.7	5	5.8	1.8	1.6	.16	0	0	0	0
19	0	3.5	4.7	5	6.2	1.7	1.6	.18	0	0	0	0
20	0	3.8	4.7	5	6	1.7	1.7	.23	0	0	0	0
21	0	3.9	5	5	6.6	1.6	1.5	.28	0	0	0	0
22	0	4	5	5.4	6.2	1.4	1.4	.25	0	0	0	0
23	0	4.2	4.8	5.2	6.4	1.2	1.4	.2	0	0	0	0
24	0	4.2	4.6	4.8	6.6	1.1	1.3	.14	0	0	0	0
25	0	4.4	4.6	4.8	6.4	1.1	1.1	.11	0	0	0	0
26	0	4.2	4.6	5	5.6	.82	.91	.06	0	0	0	0
27	0	3.8	4.6	5.2	5.6	.53	.64	.04	0	0	0	0
28	0	3.8	4.6	5.4	5.4	.57	.54	.02	0	0	0	0
29	0	3.8	4.8	5	---	.51	.49	0	0	0	0	0
30	0	4.2	5.2	4.4	---	.51	.46	0	0	0	0	0
31	0	---	5.4	3.6	---	.62	---	0	---	0	0	---
TOTAL	0	89.4	144.5	163.4	145.1	81.86	34.42	5.16	0	0	0	0
MEAN	0	2.98	4.7	5.3	5.2	2.64	1.15	.17	0	0	0	0
AC-FT	0	177	287	324	288	162	68	10	0	0	0	0
MAX	0	4.4	5.6	6.4	6.6	4.7	2	.4	0	0	0	0
MIN	0	.16	3.9	3.6	3.5	.51	.32	0	0	0	0	0
CAL YR 2001	TOTAL	1052.45	MEAN	2.88	MAX	91	MIN	0	AC-FT	2090		
WTR YR 2002	TOTAL	663.84	MEAN	1.82	MAX	6.6	MIN	0	AC-FT	1320		

MAX DISCH: 7.1 CFS AT 13:20 ON Feb. 15, 2002 GH --- FT. SHIFT --- FT.  
MAX GH: 1.95 FT. AT 00:30 ON Nov. 26, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## RIO GRANDE BASIN

08249000 CONEJOS RIVER NEAR LASAUSES, CO (COMBINED)

**LOCATION.**--Lat 37°18'01", long 105°44'47", in SW¼SW¼ sec. 2, and SE¼NE¼ sec. 10 (two channels), T.35 N., R.11 E., Conejos County, Hydrologic Unit 13010005, on left bank of main channel 125 ft downstream from bridge on State Highway 158 and on left bank of secondary channel 230 ft upstream from bridge on State Route 158, 1.0 mi upstream from mouth, 2.1 mi north of Lasauses, and 13 mi southeast of Alamosa.

**DRAINAGE AREA AND PERIOD OF RECORD.**--887 mi<sup>2</sup>. Mar. 1921, water stage recorders, at several locations close to present sites.

**GAGE.**--Two water-stage recorders with satellite telemetry. Datum of gage on main (north) channel is 7,495.02 ft above National Geodetic Vertical Datum of 1929, and on secondary (south) channel is 7,496.89 ft above National Geodetic Vertical Datum of 1929 (levels by U.S. Bureau of Reclamation).

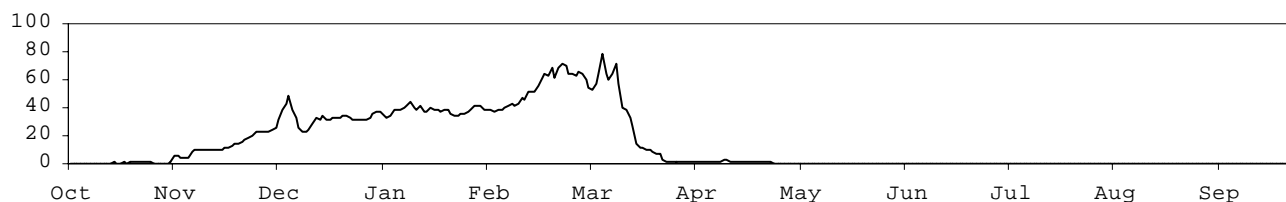
**REMARKS.**--Records should be good except for periods of no record and ice affected record, which are poor. Diversions above station for irrigation of about 75,000 acres. Practically entire flow is diverted and records represent mainly return flow. Record developed by Div. III Hydrographic Staff.

## COMBINED CONEJOS RIVER (NORLASCO, SOULASCO)

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	6.2	26	37	38	66	1.1	.6	0	0	0	0
2	0	5.7	31	35	39	64	.94	.57	0	0	0	0
3	0	3.7	39	33	38	60	.94	.57	0	0	0	0
4	0	4.1	43	34	37	54	1.4	.58	0	0	0	0
5	0	4.7	48	38	39	53	1.2	.52	0	0	0	0
6	0	8.1	38	39	39	57	.94	.5	0	0	0	0
7	0	10	33	39	40	65	1.3	.47	0	0	0	0
8	0	9.3	26	40	42	78	2	.41	0	0	0	0
9	0	9.9	23	41	43	64	1.7	.39	0	0	0	0
10	0	9.9	23	45	42	60	1.6	.35	0	0	0	0
11	0	9.6	24	40	43	65	1.8	.23	0	0	0	0
12	.42	10	29	39	47	71	2.1	.19	0	0	0	0
13	.23	10	33	41	46	57	2.2	.21	0	0	0	0
14	.78	10	32	37	52	40	2.2	.22	0	0	0	0
15	.53	9.9	34	37	51	38	1.9	.25	0	0	0	0
16	.63	12	32	40	51	33	1.8	.21	0	0	0	0
17	1.1	12	32	39	56	27	1.8	.21	0	0	0	0
18	.58	13	33	38	61	14	1.8	.16	0	0	0	0
19	1.2	14	33	37	64	11	1.8	.18	0	0	0	0
20	1.4	14	33	38	63	11	1.9	.25	0	0	0	0
21	.86	16	35	38	69	9.9	1.7	.29	0	0	0	0
22	.91	17	35	36	62	9.7	1.6	.25	0	0	0	0
23	1.2	19	33	35	68	8.2	1.6	.2	0	0	0	0
24	1.2	20	32	35	72	7.8	1.5	.14	0	0	0	0
25	1.3	23	31	36	70	7.6	1.3	.11	0	0	0	0
26	.54	23	32	36	64	2.4	1.2	.06	0	0	0	0
27	.25	23	32	37	64	.93	.82	.04	0	0	0	0
28	.24	23	32	39	63	.92	.65	.02	0	0	0	0
29	.34	23	33	41	---	.81	.59	0	0	0	0	0
30	.27	24	36	41	---	.76	.66	0	0	0	0	0
31	1.4	---	37	41	---	.82	---	0	---	0	0	---
TOTAL	15.38	397.1	1013	1182	1463	1037.84	44.04	8.18	0	0	0	0
MEAN	.5	13.2	33	38	52	33.5	1.47	.26	0	0	0	0
AC-FT	31	788	2010	2340	2900	2060	87	16	0	0	0	0
MAX	1.4	24	48	45	72	78	2.2	.6	0	0	0	0
MIN	0	3.7	23	33	37	.76	.59	0	0	0	0	0
CAL YR 2001	TOTAL	37140.41	MEAN	102	MAX	967	MIN	0	AC-FT	73670		
WTR YR 2002	TOTAL	5160.54	MEAN	14.1	MAX	78	MIN	0	AC-FT	10240		

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08250000 CULEBRA CREEK AT SAN LUIS, CO

**LOCATION.**--Lat 37°11'01", long 105°25'31", Costilla County, Hydrologic Unit 13010002, in Beaubien Grant, on left bank at bridge 1.0 mi. south of San Luis and 1.0 mi. upstream from Rito Seco.

**DRAINAGE AREA AND PERIOD OF RECORD.**--220 mi<sup>2</sup>. Station established April 1, 1927 by Colo. State Engineer's Office at present site, different datum. May 1931 new flume installed and datum established at the same site.

**GAGE.**--Graphic water-stage recorder and concrete control. Steven's Data logger installed Mar. 25, 1994. Altitude of gage is 8,000 ft from topographic map.

**REMARKS.**--Record is complete and reliable. Except for Feb. 3-6, 2002, when ice in the well was effecting floats, and Aug. 29 - Sep. 11, 2002, when the inlet was plugged. Record is good, except for periods when inlet was plugged or when ice in the well was effecting floats which are poor. During the winter the record may show a pattern of jagged peaks in the late morning hours. While this pattern does appear to be ice affected record, it has been verified by the hydrographic staff of Division 3 that this is caused by freezing and releasing of water above the gage, and that this is good record. Station maintained and records developed by Division III Hydrographic staff.

**RATING TABLE.**--CULSANCO05 USED FROM 01-OCT-2001 TO 30-SEP-2002

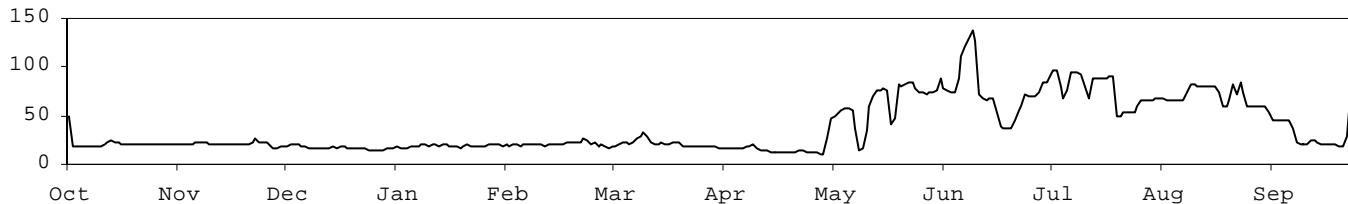
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	50	20	18	17	18	20	18	13	72	70	66	59
2	19	20	19	18	20	19	18	11	74	70	66	60
3	18	21	21	16	19	17	17	11	74	75	66	60
4	18	20	21	17	20	18	16	27	76	84	66	60
5	19	21	20	17	20	19	17	48	89	84	67	59
6	19	22	19	18	19	20	17	50	79	89	67	53
7	19	23	18	19	21	23	17	53	76	97	67	45
8	19	23	17	19	21	22	17	56	75	97	66	45
9	19	22	16	20	20	20	17	57	74	80	66	45
10	19	21	16	21	20	22	17	57	88	68	66	45
11	20	21	17	19	21	26	18	55	110	76	65	45
12	23	21	17	21	20	28	19	37	121	94	65	45
13	25	21	17	20	19	33	20	15	129	94	65	36
14	23	21	17	19	20	29	17	16	138	94	73	22
15	22	21	18	20	20	23	15	35	128	93	83	21
16	20	21	17	20	20	21	15	60	71	80	83	21
17	20	21	18	19	21	20	14	69	68	68	81	21
18	20	20	18	19	21	23	13	76	66	88	81	24
19	20	20	17	18	22	21	13	76	67	88	81	25
20	20	20	17	17	22	21	13	78	67	89	81	22
21	20	20	17	19	23	22	13	77	53	89	81	21
22	21	23	17	20	23	23	13	41	40	89	80	20
23	21	27	17	19	23	22	12	48	37	91	73	21
24	21	22	16	18	26	19	12	82	37	90	60	21
25	20	22	15	19	25	19	12	81	36	49	60	20
26	20	22	15	19	21	19	14	83	45	50	65	19
27	21	20	15	19	22	19	14	84	55	53	82	19
28	21	17	15	20	19	19	13	85	60	53	72	29
29	20	17	15	20	---	19	13	79	71	53	85	54
30	20	18	17	21	---	19	13	74	70	53	73	37
31	20	---	17	21	---	18	---	73	---	59	59	---
TOTAL	657	628	534	589	586	663	457	1707	2246	2407	2211	1074
MEAN	21	21	17	19	21	21	15	55	75	78	71	36
AC-FT	1300	1250	1060	1170	1160	1320	906	3390	4450	4770	4390	2130
MAX	50	27	21	21	26	33	20	85	138	97	85	60
MIN	18	17	15	16	18	17	12	11	36	49	59	19

CAL YR	2001	TOTAL	14811	MEAN	40.6	MAX	144	MIN	14	AC-FT	29380
WTR YR	2002	TOTAL	13759	MEAN	37.7	MAX	138	MIN	11	AC-FT	27290

MAX DISCH: 148 CFS AT 14:15 ON Jun. 14, 2002 GH 1.75 FT. SHIFT 0.13 FT.  
MAX GH: 1.75 FT. AT 14:15 ON Jun. 14, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



RIO GRANDE BASIN

08251500 RIO GRANDE NEAR LOBATOS, CO

**LOCATION.**--Lat 37°04'43", long 105°45'23", in NE¼NW¼ sec. 27, T.33 N., R.11 E., Conejos County, Hydrologic Unit 13010002, on right bank at highway bridge, 5.7 mi north of Colorado-New Mexico State line, 8 mi downstream from Culebra Creek, 11 mi east of Lobatos, and 14 mi east of Antonito.

**DRAINAGE AREA AND PERIOD OF RECORD.**--7,700 mi<sup>2</sup>. approximately, includes 2,940 mi<sup>2</sup>. in closed basin in northern part of San Luis Valley, Colo. June 28, 1899-Nov. 7, 1910, non-recording gage; Nov. 8, 1910, water stage recorder, at present site and datum.

**GAGE.**--Graphic water-stage recorder in a four foot square timber shelter and cobblestone well. Station contains a Stevens chart recorder, Sutron satellite monitoring equipment, and a water temperature sensor. Auxiliary outside slope gage. Datum of gage is 7,427.63 ft above National Geodetic Vertical Datum of 1929.

**REMARKS.**--Record is complete and reliable. Stage-discharge relation affected by ice November 24, 2001 through March 12, 2002. Record is good except for periods of ice affected record which are fair to poor. Station maintained and record developed by Div. III Hydrographic Staff.

**RATING TABLE.**--RIOLOBCO03 USED FROM 01-OCT-2001 TO 30-SEP-2002

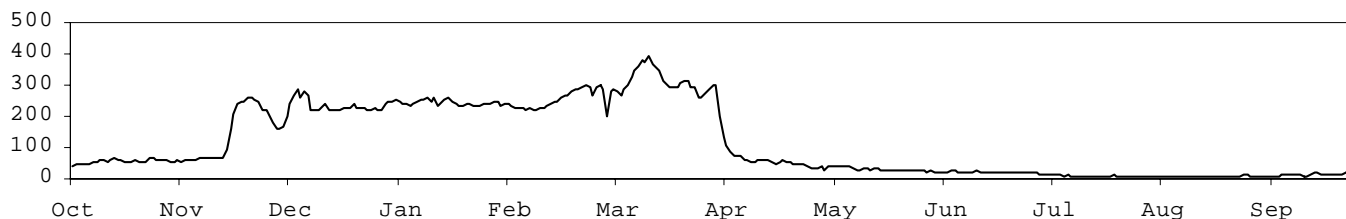
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	43	55	200	255	240	290	297	31	23	17	4.3	8.5
2	45	58	240	250	240	200	297	37	24	17	4.4	7.6
3	46	60	270	240	235	280	198	28	22	14	4.4	7.7
4	46	57	290	240	230	290	134	38	22	12	7.2	9.3
5	47	60	260	235	230	280	105	42	23	15	7.5	9.7
6	48	67	280	240	225	270	90	40	23	16	6.2	9.3
7	53	69	270	250	220	290	72	39	23	15	9.4	9
8	55	69	220	255	225	300	72	38	25	14	9.7	8.6
9	58	65	220	255	220	330	71	38	25	12	7.7	8.8
10	61	65	220	260	220	350	63	39	23	10	6.4	14
11	55	65	230	250	230	360	57	35	22	11	7.7	13
12	61	65	240	260	230	380	55	28	22	10	7.3	13
13	66	67	220	235	235	372	53	28	22	8	7.1	13
14	62	92	220	245	240	391	57	31	23	8.1	7.1	15
15	58	163	220	255	245	364	58	36	24	9.3	7.3	12
16	53	209	220	260	250	352	59	28	22	9.3	7.1	9.3
17	54	238	230	250	260	347	57	31	22	9.6	5.9	9
18	55	250	230	240	265	314	55	31	22	8.8	7.7	13
19	57	250	230	235	270	301	49	28	21	7.9	7.7	18
20	53	258	240	235	280	293	54	29	21	8.2	8.9	17
21	53	259	230	240	290	294	57	29	22	8.3	9.1	16
22	54	254	230	240	290	292	56	30	22	8.2	9.7	14
23	64	248	230	235	295	310	51	26	22	8.4	9	14
24	64	220	220	235	300	316	50	24	20	11	8.1	14
25	60	220	220	235	295	312	45	25	19	8.8	7.4	13
26	60	210	230	240	265	294	48	25	22	6.9	6.9	14
27	60	180	220	240	295	293	49	25	20	6.3	6.8	15
28	58	160	220	240	300	263	37	25	19	6	7.2	18
29	55	160	240	245	---	262	33	28	20	5.4	9.7	24
30	56	170	250	245	---	272	35	28	19	5	13	25
31	58	---	250	235	---	287	---	26	---	4.7	12	---
TOTAL	1718	4363	7290	7575	7120	9549	2414	966	659	311.2	239.9	391.8
MEAN	55	145	235	244	254	308	81	31	22	10	7.7	13.1
AC-FT	3410	8650	14460	15030	14120	18940	4790	1920	1310	617	476	777
MAX	66	259	290	260	300	391	297	42	25	17	13	25
MIN	43	55	200	235	220	200	33	24	19	4.7	4.3	7.6

CAL YR 2001 TOTAL 146361 MEAN 401 MAX 2140 MIN 29 AC-FT 290300  
WTR YR 2002 TOTAL 42596.9 MEAN 117 MAX 391 MIN 4.3 AC-FT 84490

MAX DISCH: 440 CFS AT 14:15 ON Mar. 12, 2002 GH 1.72 FT. SHIFT 0.14 FT.  
MAX GH: 3.01 FT. AT 11:45 ON Dec. 8, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



TRANSMOUNTAIN DIVERSION TO

RIO GRANDE BASIN

09118200 TARBELL DITCH NEAR COCHETOPA PASS, CO

**LOCATION.**--Tarbell ditch diverts water from Lake Fork Cochetopa Creek (tributary to Cochetopa Creek), in NW¼ sec. 18, T.43 N., R.2 E., in Gunnison River basin, to Lake Fork Creek (tributary to Middle Fork Saguache Creek) in NE¼ sec. 18, T.43 N., R.2 E., in Rio Grande basin.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder with satellite monitoring system at a 2.5' Parshall Flume.

**REMARKS.**--No water run on WY-2002. Station maintained and record developed by the Division III Hydrographic Staff.

**RATING TABLE.**--

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	0	0	0	0
2	0	0	0	0	0	0	0	0	0	0	0	0
3	0	0	0	0	0	0	0	0	0	0	0	0
4	0	0	0	0	0	0	0	0	0	0	0	0
5	0	0	0	0	0	0	0	0	0	0	0	0
6	0	0	0	0	0	0	0	0	0	0	0	0
7	0	0	0	0	0	0	0	0	0	0	0	0
8	0	0	0	0	0	0	0	0	0	0	0	0
9	0	0	0	0	0	0	0	0	0	0	0	0
10	0	0	0	0	0	0	0	0	0	0	0	0
11	0	0	0	0	0	0	0	0	0	0	0	0
12	0	0	0	0	0	0	0	0	0	0	0	0
13	0	0	0	0	0	0	0	0	0	0	0	0
14	0	0	0	0	0	0	0	0	0	0	0	0
15	0	0	0	0	0	0	0	0	0	0	0	0
16	0	0	0	0	0	0	0	0	0	0	0	0
17	0	0	0	0	0	0	0	0	0	0	0	0
18	0	0	0	0	0	0	0	0	0	0	0	0
19	0	0	0	0	0	0	0	0	0	0	0	0
20	0	0	0	0	0	0	0	0	0	0	0	0
21	0	0	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0	0	0
23	0	0	0	0	0	0	0	0	0	0	0	0
24	0	0	0	0	0	0	0	0	0	0	0	0
25	0	0	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0	0	0
27	0	0	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0	0	0
29	0	0	0	0	---	0	0	0	0	0	0	0
30	0	0	0	0	---	0	0	0	0	0	0	0
31	0	---	0	0	---	0	---	0	---	0	0	---
TOTAL	0	0	0	0	0	0	0	0	0	0	0	0
MEAN	0	0	0	0	0	0	0	0	0	0	0	0
AC-FT	0	0	0	0	0	0	0	0	0	0	0	0
MAX	0	0	0	0	0	0	0	0	0	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0

CAL YR 2001 TOTAL 531.84 MEAN 1.46 MAX 9.8 MIN 0 AC-FT 1050  
WTR YR 2002 TOTAL 0 MEAN 0 MAX 0 MIN 0 AC-FT 0

MAX DISCH: 0 CFS AT 00:00 ON -- GH -- FT. SHIFT -- FT.  
MAX GH: 0 FT. AT 00:00 ON --

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## RIO GRANDE BASIN

09121000 TABOR DITCH AT SPRING CREEK PASS, CO

**LOCATION.**--Lat 37°56'30", long 107°09'00"; Tabor ditch diverts water from tributaries of Cebolla Creek in secs, 29 and 36, T.43 N., R.3 W., in Gunnison River basin, to Big Spring Creek (tributary to North Clear Creek) in sec. 35, T.43 N., R.3 W., in Rio Grande basin.

**DRAINAGE AREA.**--N/A

**GAGE.**--Steven's Data Logger and satellite monitoring system at 3 ft Parshall flume.

**REMARKS.**--Record is complete and reliable. Station maintained and record developed by the Division III Hydrographic Staff.

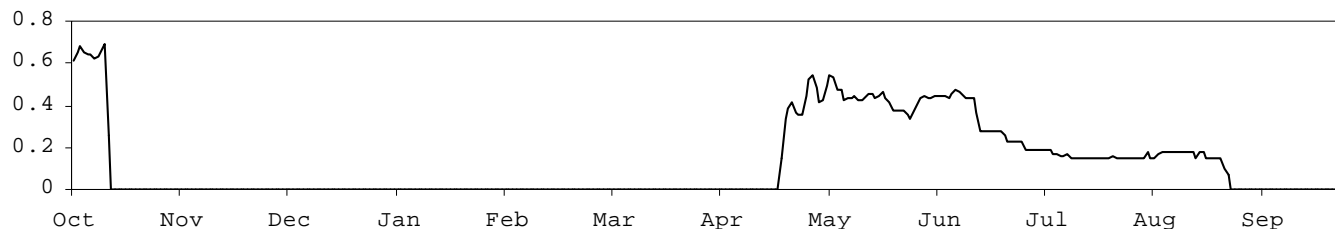
**RATING TABLE.**--TABDITCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.61	0	0	0	0	0	0	.54	.43	.19	.15	0
2	.65	0	0	0	0	0	0	.48	.44	.19	.15	0
3	.68	0	0	0	0	0	0	.41	.43	.19	.15	0
4	.65	0	0	0	0	0	0	.42	.43	.19	.15	0
5	.64	0	0	0	0	0	0	.49	.44	.19	.18	0
6	.64	0	0	0	0	0	0	.54	.44	.19	.15	0
7	.62	0	0	0	0	0	0	.53	.44	.19	.15	0
8	.63	0	0	0	0	0	0	.47	.44	.19	.17	0
9	.65	0	0	0	0	0	0	.47	.43	.17	.18	0
10	.69	0	0	0	0	0	0	.42	.45	.17	.18	0
11	.26	0	0	0	0	0	0	.43	.47	.16	.18	0
12	0	0	0	0	0	0	0	.43	.46	.16	.18	0
13	0	0	0	0	0	0	0	.44	.44	.17	.18	0
14	0	0	0	0	0	0	0	.42	.43	.15	.18	0
15	0	0	0	0	0	0	0	.42	.43	.15	.18	0
16	0	0	0	0	0	0	0	.43	.43	.15	.18	0
17	0	0	0	0	0	0	0	.45	.37	.15	.18	0
18	0	0	0	0	0	0	0	.45	.28	.15	.18	0
19	0	0	0	0	0	0	0	.43	.28	.15	.15	0
20	0	0	0	0	0	0	0	.44	.28	.15	.18	0
21	0	0	0	0	0	0	0	.46	.28	.15	.18	0
22	0	0	0	0	0	0	.15	.43	.28	.15	.15	0
23	0	0	0	0	0	0	.34	.41	.28	.15	.15	0
24	0	0	0	0	0	0	.39	.38	.28	.15	.15	0
25	0	0	0	0	0	0	.41	.38	.26	.15	.15	0
26	0	0	0	0	0	0	.37	.38	.23	.16	.15	0
27	0	0	0	0	0	0	.36	.38	.23	.15	.1	0
28	0	0	0	0	0	0	.36	.36	.23	.15	.07	0
29	0	0	0	0	---	0	.44	.34	.23	.15	0	0
30	0	0	0	0	---	0	.52	.38	.23	.15	0	0
31	0	---	0	0	---	0	---	.41	---	.15	0	---
TOTAL	6.72	0	0	0	0	0	3.34	13.42	10.77	5.06	4.48	0
MEAN	.22	0	0	0	0	0	.11	.43	.36	.16	.14	0
AC-FT	13	0	0	0	0	0	6.6	27	21	10	8.9	0
MAX	.69	0	0	0	0	0	.52	.54	.47	.19	.18	0
MIN	0	0	0	0	0	0	0	.34	.23	.15	0	0
CAL YR 2001	TOTAL	252.61	MEAN	.69	MAX	12	MIN	0	AC-FT	501		
WTR YR 2002	TOTAL	43.79	MEAN	.12	MAX	.69	MIN	0	AC-FT	87		

MAX DISCH: 0.75 CFS AT 13:45 ON Oct. 2, 2001 GH 0.13 FT. SHIFT 0.04 FT.  
MAX GH: 0.33 FT. AT 08:30 ON May. 1, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



TRANSMOUNTAIN DIVERSION TO

RIO GRANDE BASIN

09341000 TREASURE PASS DITCH AT WOLF CREEK PASS, CO

LOCATION.--Treasure Pass diversion ditch diverts water from tributaries of Wolf Creek in San Juan River basin, to tributary of South Fork Rio Grande in sec. 5, T.37 N., R.2 E., in Rio Grande basin.

DRAINAGE AREA.--N/A

GAGE.--Graphic water-stage recorder at a 2' Parshall Flume.

REMARKS.--No water run in WY-2002. Station maintained and record developed by the Division III Hydrographic Staff.

RATING TABLE.--

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	0	0	0	0
2	0	0	0	0	0	0	0	0	0	0	0	0
3	0	0	0	0	0	0	0	0	0	0	0	0
4	0	0	0	0	0	0	0	0	0	0	0	0
5	0	0	0	0	0	0	0	0	0	0	0	0
6	0	0	0	0	0	0	0	0	0	0	0	0
7	0	0	0	0	0	0	0	0	0	0	0	0
8	0	0	0	0	0	0	0	0	0	0	0	0
9	0	0	0	0	0	0	0	0	0	0	0	0
10	0	0	0	0	0	0	0	0	0	0	0	0
11	0	0	0	0	0	0	0	0	0	0	0	0
12	0	0	0	0	0	0	0	0	0	0	0	0
13	0	0	0	0	0	0	0	0	0	0	0	0
14	0	0	0	0	0	0	0	0	0	0	0	0
15	0	0	0	0	0	0	0	0	0	0	0	0
16	0	0	0	0	0	0	0	0	0	0	0	0
17	0	0	0	0	0	0	0	0	0	0	0	0
18	0	0	0	0	0	0	0	0	0	0	0	0
19	0	0	0	0	0	0	0	0	0	0	0	0
20	0	0	0	0	0	0	0	0	0	0	0	0
21	0	0	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0	0	0
23	0	0	0	0	0	0	0	0	0	0	0	0
24	0	0	0	0	0	0	0	0	0	0	0	0
25	0	0	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0	0	0
27	0	0	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0	0	0
29	0	0	0	0	---	0	0	0	0	0	0	0
30	0	0	0	0	---	0	0	0	0	0	0	0
31	0	---	0	0	---	0	---	0	---	0	0	---
TOTAL	0	0	0	0	0	0	0	0	0	0	0	0
MEAN	0	0	0	0	0	0	0	0	0	0	0	0
AC-FT	0	0	0	0	0	0	0	0	0	0	0	0
MAX	0	0	0	0	0	0	0	0	0	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0

CAL YR	2001	TOTAL	28.51	MEAN	.078	MAX	3	MIN	0	AC-FT	57
WTR YR	2002	TOTAL	0	MEAN	0	MAX	0	MIN	0	AC-FT	0

MAX DISCH: 0 CFS AT 00:00 ON -- GH -- FT. SHIFT -- FT.  
MAX GH: 0 FT. AT 00:00 ON --

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.

## TRANSMOUNTAIN DIVERSION TO

## RIO GRANDE BASIN

09347000 DON LA FONT DITCH NO.1 AT PIEDRA PASS, CO

LOCATION.--SW¼ sec. 33, T.39 N., R.1 W., at Piedra Pass, Co. Diversion is from tributaries of Piedra River Basin to Red Mountain Creek in Rio Grande River Basin.

DRAINAGE AREA.--N/A

GAGE.--Graphic water-stage recorder at 9 in. Parshall flume.

REMARKS.--No water flowed by station during water year. Station maintained and record developed by Div. III Hydrographic Staff.

## RATING TABLE.--

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	0	0	0	0
2	0	0	0	0	0	0	0	0	0	0	0	0
3	0	0	0	0	0	0	0	0	0	0	0	0
4	0	0	0	0	0	0	0	0	0	0	0	0
5	0	0	0	0	0	0	0	0	0	0	0	0
6	0	0	0	0	0	0	0	0	0	0	0	0
7	0	0	0	0	0	0	0	0	0	0	0	0
8	0	0	0	0	0	0	0	0	0	0	0	0
9	0	0	0	0	0	0	0	0	0	0	0	0
10	0	0	0	0	0	0	0	0	0	0	0	0
11	0	0	0	0	0	0	0	0	0	0	0	0
12	0	0	0	0	0	0	0	0	0	0	0	0
13	0	0	0	0	0	0	0	0	0	0	0	0
14	0	0	0	0	0	0	0	0	0	0	0	0
15	0	0	0	0	0	0	0	0	0	0	0	0
16	0	0	0	0	0	0	0	0	0	0	0	0
17	0	0	0	0	0	0	0	0	0	0	0	0
18	0	0	0	0	0	0	0	0	0	0	0	0
19	0	0	0	0	0	0	0	0	0	0	0	0
20	0	0	0	0	0	0	0	0	0	0	0	0
21	0	0	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0	0	0
23	0	0	0	0	0	0	0	0	0	0	0	0
24	0	0	0	0	0	0	0	0	0	0	0	0
25	0	0	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0	0	0
27	0	0	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0	0	0
29	0	0	0	0	---	0	0	0	0	0	0	0
30	0	0	0	0	---	0	0	0	0	0	0	0
31	0	---	0	0	---	0	---	0	---	0	0	---
TOTAL	0	0	0	0	0	0	0	0	0	0	0	0
MEAN	0	0	0	0	0	0	0	0	0	0	0	0
AC-FT	0	0	0	0	0	0	0	0	0	0	0	0
MAX	0	0	0	0	0	0	0	0	0	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0
CAL YR 2001	TOTAL		0	MEAN		0	MAX		0	MIN		0
WTR YR 2002	TOTAL		0	MEAN		0	MAX		0	MIN		0
									0	AC-FT		0
									0	AC-FT		0

MAX DISCH: 0 CFS AT 00:00 ON -- GH -- FT. SHIFT -- FT.

MAX GH: 0 FT. AT 00:00 ON --

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.

## TRANSMOUNTAIN DIVERSION TO

## RIO GRANDE BASIN

09347000 DON LA FONT DITCH N0.2 AT PIEDRA PASS, CO

LOCATION.--SW¼ sec. 33, T.39 N., R.1 W., at Piedra Pass, Co. Diversion is from tributaries of Piedra River in San Juan River Basin to Red Mountain Creek in Rio Grande River Basin.

DRAINAGE AREA.--N/A

GAGE.--Stevens Data logger and satellite monitoring system at 1.5 ft Parshall flume.

REMARKS.--No water flowed by station during water year. Station maintained and record developed by the Division III Hydrographic Staff.

## RATING TABLE.--

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	0	0	0	0
2	0	0	0	0	0	0	0	0	0	0	0	0
3	0	0	0	0	0	0	0	0	0	0	0	0
4	0	0	0	0	0	0	0	0	0	0	0	0
5	0	0	0	0	0	0	0	0	0	0	0	0
6	0	0	0	0	0	0	0	0	0	0	0	0
7	0	0	0	0	0	0	0	0	0	0	0	0
8	0	0	0	0	0	0	0	0	0	0	0	0
9	0	0	0	0	0	0	0	0	0	0	0	0
10	0	0	0	0	0	0	0	0	0	0	0	0
11	0	0	0	0	0	0	0	0	0	0	0	0
12	0	0	0	0	0	0	0	0	0	0	0	0
13	0	0	0	0	0	0	0	0	0	0	0	0
14	0	0	0	0	0	0	0	0	0	0	0	0
15	0	0	0	0	0	0	0	0	0	0	0	0
16	0	0	0	0	0	0	0	0	0	0	0	0
17	0	0	0	0	0	0	0	0	0	0	0	0
18	0	0	0	0	0	0	0	0	0	0	0	0
19	0	0	0	0	0	0	0	0	0	0	0	0
20	0	0	0	0	0	0	0	0	0	0	0	0
21	0	0	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0	0	0
23	0	0	0	0	0	0	0	0	0	0	0	0
24	0	0	0	0	0	0	0	0	0	0	0	0
25	0	0	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0	0	0
27	0	0	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0	0	0
29	0	0	0	0	---	0	0	0	0	0	0	0
30	0	0	0	0	---	0	0	0	0	0	0	0
31	0	---	0	0	---	0	---	0	---	0	0	---
TOTAL	0	0	0	0	0	0	0	0	0	0	0	0
MEAN	0	0	0	0	0	0	0	0	0	0	0	0
AC-FT	0	0	0	0	0	0	0	0	0	0	0	0
MAX	0	0	0	0	0	0	0	0	0	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0

CAL YR	2001	TOTAL	0	MEAN	0	MAX	0	MIN	0	AC-FT	0
WTR YR	2002	TOTAL	0	MEAN	0	MAX	0	MIN	0	AC-FT	0

MAX DISCH: 0 CFS AT 00:00 ON -- GH -- FT. SHIFT -- FT.  
MAX GH: 0 FT. AT 00:00 ON --

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.

## TRANSMOUNTAIN DIVERSION TO

## RIO GRANDE BASIN

09347000 DON LA FONT DITCH, COMBINED, AT PIEDRA PASS, CO

LOCATION.--Don La Font ditches 1 and 2 divert water from tributaries of Piedra River between headgates in NW¼ sec. 4, T.38 N., R.1 W., and SW¼ sec. 33, T.39 N., R.1 W., and Piedra pass, in San Juan River basin, to Red Mountain Creek in sec. 33, T.39 N., R.1 W., in Rio Grande basin.

DRAINAGE AREA.--N/A

GAGE.--Graphic water-stage recorders.

REMARKS.--Records combined to obtain this record. No water flowed by station during water year.

DON LA FONT DITCH, COMBINED, AT PIEDRA PASS

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	0	0	0	0
2	0	0	0	0	0	0	0	0	0	0	0	0
3	0	0	0	0	0	0	0	0	0	0	0	0
4	0	0	0	0	0	0	0	0	0	0	0	0
5	0	0	0	0	0	0	0	0	0	0	0	0
6	0	0	0	0	0	0	0	0	0	0	0	0
7	0	0	0	0	0	0	0	0	0	0	0	0
8	0	0	0	0	0	0	0	0	0	0	0	0
9	0	0	0	0	0	0	0	0	0	0	0	0
10	0	0	0	0	0	0	0	0	0	0	0	0
11	0	0	0	0	0	0	0	0	0	0	0	0
12	0	0	0	0	0	0	0	0	0	0	0	0
13	0	0	0	0	0	0	0	0	0	0	0	0
14	0	0	0	0	0	0	0	0	0	0	0	0
15	0	0	0	0	0	0	0	0	0	0	0	0
16	0	0	0	0	0	0	0	0	0	0	0	0
17	0	0	0	0	0	0	0	0	0	0	0	0
18	0	0	0	0	0	0	0	0	0	0	0	0
19	0	0	0	0	0	0	0	0	0	0	0	0
20	0	0	0	0	0	0	0	0	0	0	0	0
21	0	0	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0	0	0
23	0	0	0	0	0	0	0	0	0	0	0	0
24	0	0	0	0	0	0	0	0	0	0	0	0
25	0	0	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0	0	0
27	0	0	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0	0	0
29	0	0	0	0	---	0	0	0	0	0	0	0
30	0	0	0	0	---	0	0	0	0	0	0	0
31	0	---	0	0	---	0	---	0	---	0	0	---
TOTAL	0	0	0	0	0	0	0	0	0	0	0	0
MEAN	0	0	0	0	0	0	0	0	0	0	0	0
AC-FT	0	0	0	0	0	0	0	0	0	0	0	0
MAX	0	0	0	0	0	0	0	0	0	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0
CAL YR 2001	TOTAL	0	MEAN	0	MAX	0	MIN	0	AC-FT	0		
WTR YR 2002	TOTAL	0	MEAN	0	MAX	0	MIN	0	AC-FT	0		

MAX DISCH: 0 CFS AT 00:00 ON -- GH -- FT. SHIFT -- FT.

MAX GH: 0 FT. AT 00:00 ON --

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.

TRANSMOUNTAIN DIVERSION TO

RIO GRANDE BASIN

09348000 WILLIAM'S CREEK-SQUAW PASS DITCH AT SQUAW PASS, CO

LOCATION.--William's Creek-Squaw Pass ditch diverts water from William's Creek (tributary to Piedra River) in sec. 21, T.39 N., R.3 W., in San Juan River basin, to Squaw Creek in sec. 21, T.39 N., R.3 W., in Rio Grande basin.

DRAINAGE AREA.--N/A

GAGE.--Satellite monitored DCP at a 2' Parshall Flume.

REMARKS.--Record is complete and reliable. Station maintained and record developed by Div. III Hydrographic Staff.

RATING TABLE.--WCSBITCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

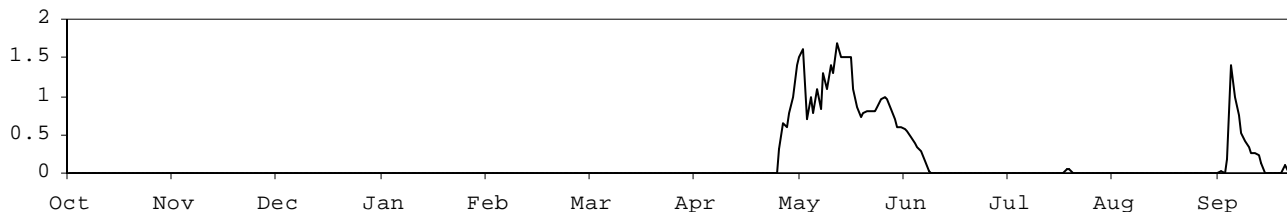
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	.66	.96	0	0	0
2	0	0	0	0	0	0	0	.61	.84	0	0	0
3	0	0	0	0	0	0	0	.77	.71	0	0	0
4	0	0	0	0	0	0	0	.99	.6	0	0	0
5	0	0	0	0	0	0	0	1.4	.6	0	0	0
6	0	0	0	0	0	0	0	1.5	.56	0	0	0
7	0	0	0	0	0	0	0	1.6	.54	0	0	0
8	0	0	0	0	0	0	0	.71	.48	0	0	.03
9	0	0	0	0	0	0	0	.99	.4	0	0	0
10	0	0	0	0	0	0	0	.77	.35	0	0	.18
11	0	0	0	0	0	0	0	1.1	.28	0	0	1.4
12	0	0	0	0	0	0	0	.83	.16	0	0	.99
13	0	0	0	0	0	0	0	1.3	.02	0	0	.76
14	0	0	0	0	0	0	0	1.1	0	0	0	.53
15	0	0	0	0	0	0	0	1.4	0	0	0	.42
16	0	0	0	0	0	0	0	1.3	0	0	0	.33
17	0	0	0	0	0	0	0	1.7	0	0	0	.26
18	0	0	0	0	0	0	0	1.5	0	0	0	.25
19	0	0	0	0	0	0	0	1.5	0	0	0	.23
20	0	0	0	0	0	0	0	1.5	0	0	0	.13
21	0	0	0	0	0	0	0	1.5	0	0	0	0
22	0	0	0	0	0	0	0	1.1	0	0	0	0
23	0	0	0	0	0	0	0	.85	0	0	0	0
24	0	0	0	0	0	0	0	.73	0	.05	0	0
25	0	0	0	0	0	0	0	.79	0	.05	0	0
26	0	0	0	0	0	0	0	.8	0	0	0	0
27	0	0	0	0	0	0	0	.81	0	0	0	.1
28	0	0	0	0	0	0	0	.81	0	0	0	0
29	0	0	0	0	---	0	0	.85	0	0	0	0
30	0	0	0	0	---	0	.31	.96	0	0	0	0
31	0	---	0	0	---	0	---	1	---	0	0	---
TOTAL	0	0	0	0	0	0	.31	33.43	6.5	.1	0	5.61
MEAN	0	0	0	0	0	0	.01	1.08	.22	0	0	.19
AC-FT	0	0	0	0	0	0	.6	66	13	.2	0	11
MAX	0	0	0	0	0	0	.31	1.7	.96	.05	0	1.4
MIN	0	0	0	0	0	0	0	.61	0	0	0	0

CAL YR	2001	TOTAL	195.31	MEAN	.54	MAX	7.1	MIN	0	AC-FT	387
WTR YR	2002	TOTAL	45.95	MEAN	.13	MAX	1.7	MIN	0	AC-FT	91

MAX DISCH: 3.91 CFS AT 06:45 ON Sep. 11, 2002 GH 0.58 FT. SHIFT 0.05 FT.  
MAX GH: 0.92 FT. AT 18:45 ON Apr. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## RIO GRANDE BASIN

09351500 PINE RIVER WEMINUCHE PASS DITCH AT WEMINUCHE PASS, CO

**LOCATION.**--Pine River-Weminuche Pass ditch diverts water from right bank of north fork of Los Pinos River in sec. 4, T.39 N., R.4 W., in San Juan River basin, to Weminuche Creek in sec. 33, T.40 N., R.4 W., in Rio Grande basin.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder and Sutron Satellite System at 3 ft Parshall flume.

**REMARKS.**--Record is complete and reliable. Station maintained and record developed by the Division III Hydrographic Staff.

**RATING TABLE.**--PRWDITCO04 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

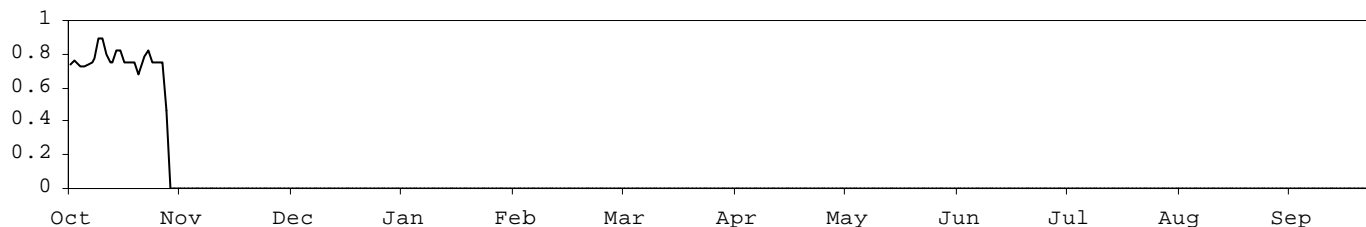
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.74	0	0	0	0	0	0	0	0	0	0	0
2	.76	0	0	0	0	0	0	0	0	0	0	0
3	.75	0	0	0	0	0	0	0	0	0	0	0
4	.73	0	0	0	0	0	0	0	0	0	0	0
5	.73	0	0	0	0	0	0	0	0	0	0	0
6	.74	0	0	0	0	0	0	0	0	0	0	0
7	.75	0	0	0	0	0	0	0	0	0	0	0
8	.77	0	0	0	0	0	0	0	0	0	0	0
9	.89	0	0	0	0	0	0	0	0	0	0	0
10	.89	0	0	0	0	0	0	0	0	0	0	0
11	.8	0	0	0	0	0	0	0	0	0	0	0
12	.75	0	0	0	0	0	0	0	0	0	0	0
13	.75	0	0	0	0	0	0	0	0	0	0	0
14	.82	0	0	0	0	0	0	0	0	0	0	0
15	.82	0	0	0	0	0	0	0	0	0	0	0
16	.75	0	0	0	0	0	0	0	0	0	0	0
17	.75	0	0	0	0	0	0	0	0	0	0	0
18	.75	0	0	0	0	0	0	0	0	0	0	0
19	.75	0	0	0	0	0	0	0	0	0	0	0
20	.68	0	0	0	0	0	0	0	0	0	0	0
21	.75	0	0	0	0	0	0	0	0	0	0	0
22	.79	0	0	0	0	0	0	0	0	0	0	0
23	.82	0	0	0	0	0	0	0	0	0	0	0
24	.75	0	0	0	0	0	0	0	0	0	0	0
25	.75	0	0	0	0	0	0	0	0	0	0	0
26	.75	0	0	0	0	0	0	0	0	0	0	0
27	.75	0	0	0	0	0	0	0	0	0	0	0
28	.47	0	0	0	0	0	0	0	0	0	0	0
29	0	0	0	0	---	0	0	0	0	0	0	0
30	0	0	0	0	---	0	0	0	0	0	0	0
31	0	---	0	0	---	0	---	0	---	0	0	---
TOTAL	21.2	0	0	0	0	0	0	0	0	0	0	0
MEAN	.68	0	0	0	0	0	0	0	0	0	0	0
AC-FT	42	0	0	0	0	0	0	0	0	0	0	0
MAX	.89	0	0	0	0	0	0	0	0	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0

CAL YR	2001	TOTAL	233.12	MEAN	.64	MAX	7.4	MIN	0	AC-FT	462
WTR YR	2002	TOTAL	21.2	MEAN	.058	MAX	.89	MIN	0	AC-FT	42

MAX DISCH: 2.97 CFS AT 14:00 ON Oct. 11, 2001 GH 0.45 FT. SHIFT -0.04 FT.

MAX GH: 0.55 FT. AT 21:45 ON Oct. 12, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## TRANSMOUNTAIN DIVERSION TO

## RIO GRANDE BASIN

09351500 WEMINUCHE PASS DITCH AT WEMINUCHE PASS, CO

**LOCATION.**--Weminuche Pass ditch diverts water from left bank of Rincon la Vaca Creek (tributary to Los Pinos River) in sec. 5, T.39 N., R.4 W., in San Juan River basin, to Weminuche Creek in sec. 33, T.40 N., R.4 W., in Rio Grande basin.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder at a 5' Parshall Flume.

**REMARKS.**--No water diverted in water year 2002. Station maintained and record developed by the Division III Hydrographic Staff.

**RATING TABLE.**--DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	0	0	0	0	0	0	0	0	0	0	0	0
2	0	0	0	0	0	0	0	0	0	0	0	0
3	0	0	0	0	0	0	0	0	0	0	0	0
4	0	0	0	0	0	0	0	0	0	0	0	0
5	0	0	0	0	0	0	0	0	0	0	0	0
6	0	0	0	0	0	0	0	0	0	0	0	0
7	0	0	0	0	0	0	0	0	0	0	0	0
8	0	0	0	0	0	0	0	0	0	0	0	0
9	0	0	0	0	0	0	0	0	0	0	0	0
10	0	0	0	0	0	0	0	0	0	0	0	0
11	0	0	0	0	0	0	0	0	0	0	0	0
12	0	0	0	0	0	0	0	0	0	0	0	0
13	0	0	0	0	0	0	0	0	0	0	0	0
14	0	0	0	0	0	0	0	0	0	0	0	0
15	0	0	0	0	0	0	0	0	0	0	0	0
16	0	0	0	0	0	0	0	0	0	0	0	0
17	0	0	0	0	0	0	0	0	0	0	0	0
18	0	0	0	0	0	0	0	0	0	0	0	0
19	0	0	0	0	0	0	0	0	0	0	0	0
20	0	0	0	0	0	0	0	0	0	0	0	0
21	0	0	0	0	0	0	0	0	0	0	0	0
22	0	0	0	0	0	0	0	0	0	0	0	0
23	0	0	0	0	0	0	0	0	0	0	0	0
24	0	0	0	0	0	0	0	0	0	0	0	0
25	0	0	0	0	0	0	0	0	0	0	0	0
26	0	0	0	0	0	0	0	0	0	0	0	0
27	0	0	0	0	0	0	0	0	0	0	0	0
28	0	0	0	0	0	0	0	0	0	0	0	0
29	0	0	0	0	---	0	0	0	0	0	0	0
30	0	0	0	0	---	0	0	0	0	0	0	0
31	0	---	0	0	---	0	---	0	---	0	0	---
TOTAL	0	0	0	0	0	0	0	0	0	0	0	0
MEAN	0	0	0	0	0	0	0	0	0	0	0	0
AC-FT	0	0	0	0	0	0	0	0	0	0	0	0
MAX	0	0	0	0	0	0	0	0	0	0	0	0
MIN	0	0	0	0	0	0	0	0	0	0	0	0

CAL YR	2001	TOTAL	0	MEAN	0	MAX	0	MIN	0	AC-FT	0
WTR YR	2002	TOTAL	0	MEAN	0	MAX	0	MIN	0	AC-FT	0

MAX DISCH: 0 CFS AT 00:00 ON -- GH -- FT. SHIFT -- FT.  
MAX GH: 0 FT. AT 00:00 ON --

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



GUNNISON RIVER BASIN

09131490 MUDDY CREEK ABOVE PAONIA RESERVOIR

**LOCATION.**--Lat 38°59'15", long 107°20'53", in the NE¼SE¼NW¼ sec 28, T.12 S., R.89 W. in Gunnison County on the right bank 700 ft. downstream from county bridge and 1400 ft. upstream from high water line of Paonia Reservoir.

**GAGE.**--Satellite (Sutron 8200 DCP) and Strip Chart Recorder (Stevens A35) in a culvert type shelter. The recorder and shaft encoder operate on separate floats and are set to an inside drop tape. An oil cylinder is used in the winter months. A new Sutron Accu-Bubbler was installed Nov.30,2001, and is in the process of calibration to the correct stage.

**REMARKS.**--The primary record this year is the electronic data logger from the 8200 DCP. The PRM was constructed by using the EDL record, and satellite telemetry, then compared it to the chart. The EDL/satellite record is missing several days from Dec.3,2001 to Dec.28,2001. The chart was used in this period except for Dec.25,2001 to Dec.28,2001, where the chart is also missing. These missing record days are flagged "a" and the discharge was estimated from the Paonia Reservoir fill record. The well froze below the oil in the cylinder in the well from Jan.31,2002 to March 26,2002, these days are flagged "a" and the discharge is estimated using the Paonia Reservoir fill record compared to the raw data. Station maintained by Stephen W. Tuck. Record developed by Stephen W. Tuck.

**RATING TABLE.**--MUDAPRCO07 USED FROM 01-OCT-2001 TO 30-SEP-2002

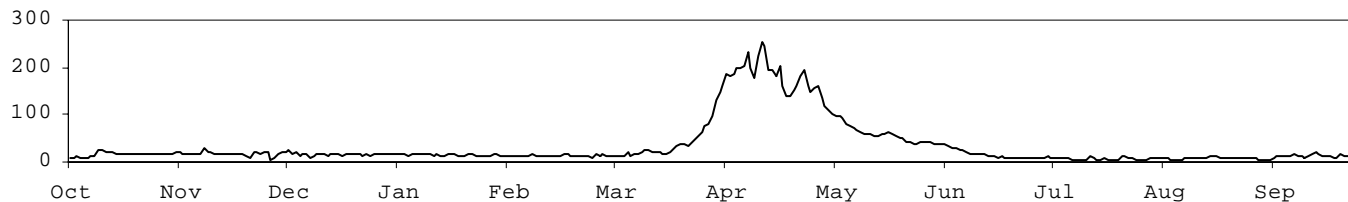
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	9	21	20	16	13	15	99	159	44	8.2	3.6	7.1
2	10	19	24	18	13	12	130	136	42	7.4	3.9	7.3
3	11	19	19	15	12	12	150	119	40	8.9	10	6.2
4	9.6	18	22	16	11	12	160	109	38	10	7.6	5.3
5	8.6	18	13	14	13	12	186	100	37	12	7.5	5.7
6	9.6	18	18	16	11	12	180	97	36	9.7	6.9	6.1
7	11	18	16	15	12	14	184	97	33	8.2	7.1	9.2
8	12	28	9	16	12	20	197	94	31	6.7	7.4	11
9	26	23	14	15	15	12	197	82	29	6.8	4.7	14
10	26	21	18	17	12	16	203	77	26	8.3	2.2	13
11	21	19	18	15	11	18	231	71	25	7.9	2.6	11
12	21	19	17	14	12	20	199	66	22	4.6	5.4	12
13	20	19	14	16	11	25	179	64	18	2.9	9.2	19
14	19	18	16	11	13	25	226	60	19	4	9.3	14
15	19	18	18	13	13	20	254	59	18	4.2	9.2	11
16	18	18	16	16	12	20	245	58	16	4.5	8.3	9.7
17	18	17	14	15	13	20	194	56	16	11	7.2	11
18	18	15	15	15	15	18	194	57	13	7.6	7.1	18
19	17	16	16	12	15	19	183	59	12	5	7.2	21
20	17	12	16	13	14	20	202	59	11	5.4	11	15
21	17	10	15	13	13	28	159	62	10	7	13	12
22	18	21	17	15	13	35	138	58	11	6	11	11
23	18	21	14	16	13	38	138	53	9.3	5.6	10	11
24	17	19	16	13	14	36	153	52	9.5	5.4	9	9.9
25	16	21	14	13	14	34	162	52	8.8	5.4	8	9.3
26	16	21	15	14	10	37	183	44	7.2	11	8.2	15
27	17	6	15	13	16	46	196	42	8.5	11	7.2	14
28	17	8	16	14	12	57	160	40	10	9.1	7	13
29	17	17	17	15	---	65	146	38	10	6.9	6.8	14
30	17	20	17	15	---	74	155	41	8.3	4.7	7.7	18
31	21	---	17	14	---	81	---	44	---	3.9	7.2	---
TOTAL	511.8	538	506	453	358	873	5383	2205	618.6	219.3	232.5	353.8
MEAN	16.5	17.9	16.3	15	13	28	179	71	20.6	7.1	7.5	11.8
AC-FT	1020	1070	1000	899	710	1730	10680	4370	1230	435	461	702
MAX	26	28	24	18	16	81	254	159	44	12	13	21
MIN	8.6	6	9	11	10	12	99	38	7.2	2.9	2.2	5.3

CAL YR	2001	TOTAL	25069.2	MEAN	68.7	MAX	628	MIN	6.0	AC-FT	49720
WTR YR	2002	TOTAL	12252	MEAN	33.6	MAX	254	MIN	2.2	AC-FT	24300

MAX DISCH: 320 CFS AT 3:30 ON April 15,2002 GH 6.75 FT. SHIFT 0.04 FT.  
MAX GH: 6.75 FT. AT 3:30 ON April 15,2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



GUNNISON RIVER BASIN

09131500 MUDDY CREEK BELOW PAONIA RESERVOIR

**LOCATION.**--Lat 38°56'26", long 107°21'24" in the SE¼NW¼ sec. 8, T.13 S., R. 89 W. (in Gunnison County on the right hand bank), and about 100 feet above county bridge and about 1100 feet below Paonia Reservoir outlet.

**GAGE.**--Satellite (Sutron 8200 DCP) and Strip Chart Recorder (Stevens A 35) in a culvert type shelter. The recorder and shaft encoder are on separate floats and set to an inside drop tape. The DCP is in an outside NEMA box. The DCP electronic data log is the primary record. Bank operated cableway installed April 1996.

**REMARKS.**--The primary record is the electronic data from the Sutron 8200. This record proves to be good. There was missing record from Jan.24,2002 to Feb.27,2002 and from March 5,2002 to April 8,2002, when the inlet was frozen and the well was isolated from the stream. The well drained down through this period, these are considered "a" days, therefore the discharge is estimated. The inlets were frozen on Jan.25,2002 when Meas.# 260 was made, therefore the GH and shift were not used to work the record, this is an "a" day. Record developed and station maintained by Stephen W. Tuck and Gerald M. Thrush.

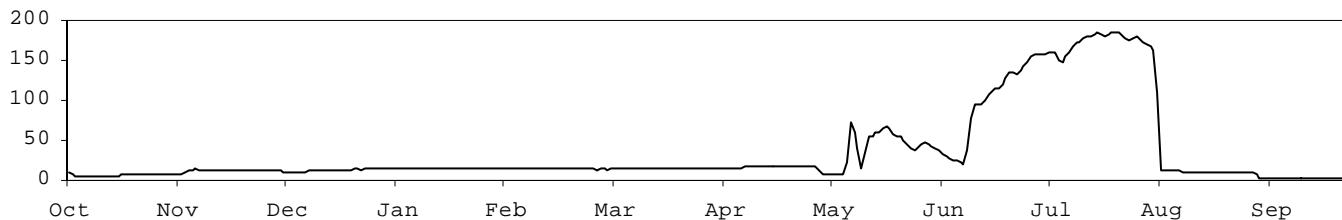
**RATING TABLE.**--MUDBPRCO07 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	9.8	7.1	11	14	14	14	15	17	48	155	178	9.8
2	8.2	7.1	11	14	14	14	15	12	45	158	173	9.8
3	5.1	11	11	14	14	13	15	7.1	42	158	171	7
4	5.4	13	11	14	14	14	15	7.1	39	158	168	3
5	5.7	13	11	15	14	14	16	7.1	38	158	162	3.1
6	5.7	14	11	15	14	14	16	7.1	32	159	109	3.2
7	5.7	13	11	14	14	14	16	7.2	29	161	12	3.1
8	5.7	13	12	14	14	14	16	7.2	28	160	12	2.5
9	5.8	13	12	14	14	14	16	7.3	26	151	12	2.5
10	5.3	13	12	14	14	14	16	23	25	147	12	2.5
11	5.1	13	12	14	14	14	17	72	23	156	12	2.5
12	5.7	13	12	14	14	14	17	61	21	161	12	2.5
13	5.7	13	12	14	14	14	17	41	38	168	10	2.5
14	5.7	13	12	14	14	14	17	14	77	173	9	2.5
15	5.7	13	12	14	14	14	17	34	94	173	9.4	2.5
16	6.3	13	12	14	14	14	17	56	94	177	9.8	2.5
17	6.4	12	12	14	14	14	17	54	94	179	11	2.5
18	6.6	12	12	14	14	14	17	59	101	179	11	2.5
19	7.1	12	12	14	14	14	17	61	107	183	10	2.5
20	7.1	12	13	14	14	14	17	65	109	184	9.8	2.5
21	7.1	12	14	14	14	14	18	68	115	182	9.8	2.5
22	7.1	12	14	14	14	14	18	65	115	180	9.8	2.5
23	7.6	12	13	14	14	14	18	58	119	183	9.8	2.5
24	7.1	12	14	14	14	14	18	56	128	185	9.8	2.5
25	7.1	12	14	14	14	14	18	55	135	185	9.8	2.5
26	7.1	12	14	14	14	14	17	49	134	185	9.8	2.5
27	7.1	12	14	14	14	14	17	44	133	180	9.8	2.5
28	7.1	12	14	14	13	14	17	41	137	177	9.8	2.6
29	7.1	12	14	14	---	15	17	38	143	176	9.8	2.8
30	7.1	12	14	14	---	15	17	39	147	177	9.8	3.1
31	7.1	---	14	14	---	15	---	44	---	181	9.8	---
TOTAL	202.4	363.2	387	436	391	436	501	1176.1	2416	5289	1220.8	97.5
MEAN	6.5	12.1	13	14	14	14	17	37.9	81	171	39.4	3.3
AC-FT	401	720	768	865	776	865	994	2330	4790	10490	2420	193
MAX	9.8	14	14	15	14	15	18	72	147	185	178	9.8
MIN	5.1	7.1	11	14	13	13	15	7.1	21	147	9	2.5
CAL YR 2001	TOTAL	26397.7	MEAN	72.3	MAX	536	MIN	3.0	AC-FT	52360		
WTR YR 2002	TOTAL	12916	MEAN	35.4	MAX	185	MIN	2.5	AC-FT	25620		

MAX DISCH: 591 CFS AT 15:30 ON Aug. 6, 2002 GH 4.57 FT. SHIFT 0.01 FT.  
MAX GH: 4.57 FT. AT 15:30 ON Aug. 6, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



GUNNISON RIVER BASIN

ABC LATERAL NEAR MONTROSE, CO

**LOCATION.**--Lat 38°29'06", long 107°44'57", in SE¼NE¼NE¼ sec. 27, T.49 N., R.8 W., Montrose County, on left bank of canal 270 ft. below takeout from South Canal, such takeout being 1700 ft. below the west portal of the Gunnison Tunnel.

**GAGE.**--Graphic water-stage recorder with satellite telemetry.

**REMARKS.**--Record is complete, good and reliable except for a period from Feb. 11, 2002 to Mar. 04, 2002, when ice in the stilling well may have affected the float's action, and has been rated fair. The data was imported from the DCP EDL. The normal operating period of the canal was from Oct. 01, 2001 through Oct. 31, 2001 and from Mar. 20, 2002 to Sep. 30, 2001. The intervening period, from Nov. 1, 2000 to Mar. 20, 2001 consisted of seepage from the Gunnison Tunnel. This winter shut down period is a normal operational occurrence. This year there were five occurrences of increased flow during this time. Some of these are periods when the Gunnison Tunnel was turned on to fill Fairview Reservoir and the AB Lateral head gate wasn't closed down tight. Station maintained and record developed by Gerald M. Thrush.

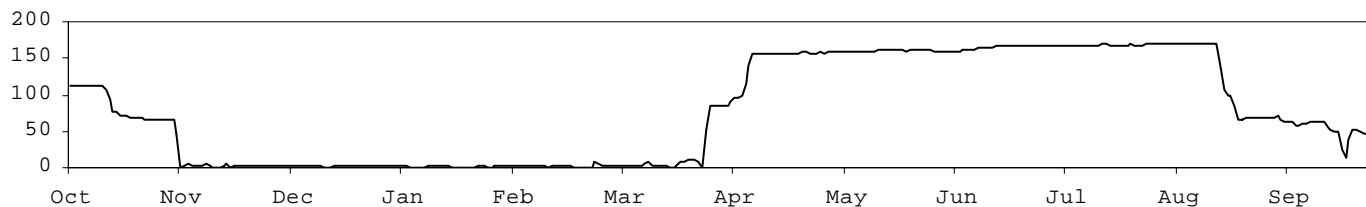
**RATING TABLE.**--ABCLATCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	112	.94	1.6	2	1.7	1.6	84	158	159	167	169	68
2	113	2.7	1.6	1.7	1.7	1.6	84	158	159	167	169	68
3	113	4.2	1.6	1.4	1.7	1.6	84	158	158	168	169	69
4	113	4.1	1.7	.57	1.7	1.6	91	158	158	168	169	70
5	113	4	1.9	.56	1.7	1.6	97	158	159	168	169	66
6	113	4	1.9	.54	1.8	1.6	97	158	160	168	169	64
7	113	4.1	1.9	.42	1.8	1.6	98	158	160	168	169	63
8	112	4.2	1.9	1.3	1.8	1.5	114	159	161	168	169	62
9	112	2.5	1.8	1.8	1.8	1.4	139	158	161	168	169	58
10	112	1.3	1.5	1.9	1.8	1.4	156	158	162	168	169	57
11	107	1.3	.93	1.8	1.8	4.7	157	158	163	168	170	59
12	93	1.2	.08	1.8	.85	7.2	157	159	164	168	170	60
13	76	3.4	1.3	1.8	1.4	1.5	156	158	164	168	170	62
14	76	4.4	2.2	2.4	1.8	1.5	157	158	165	168	170	62
15	72	.77	2.2	3	1.8	1.5	156	161	165	168	170	62
16	72	1.7	2.2	1.2	1.8	1.5	156	162	165	168	169	62
17	72	1.7	2.2	1	1.7	1.5	156	162	166	169	170	62
18	68	1.7	2.2	1.1	1.5	.94	156	162	166	169	169	56
19	68	1.7	2.1	1	1.1	.56	156	162	166	168	139	51
20	68	1.7	2.1	1.1	1	5.7	156	162	167	168	108	50
21	68	1.7	2	1.2	1	8.6	156	162	167	168	98	50
22	67	1.7	1.8	1.3	1	8.6	156	161	167	168	98	24
23	67	1.7	1.9	1.5	1	9.8	157	160	167	168	84	13
24	67	1.7	2	1.6	1	10	158	161	167	168	67	37
25	67	1.8	2	1.5	8.5	10	158	161	167	169	67	51
26	67	1.8	1.9	1.3	5.6	7.3	157	161	167	168	68	51
27	66	1.7	1.9	1.3	1.5	0	157	161	167	168	68	49
28	66	1.6	2	2.5	1.6	53	157	161	167	168	68	47
29	66	1.6	2	3.3	---	84	158	161	167	169	68	47
30	66	1.6	2	1.4	---	84	157	161	167	169	68	45
31	46	---	2	1.7	---	84	---	159	---	169	68	---
TOTAL	2611	68.51	56.41	46.99	53.45	401.4	4178	4954	4918	5212	4117	1645
MEAN	84	2.28	1.82	1.52	1.91	12.9	139	160	164	168	133	55
AC-FT	5180	136	112	93	106	796	8290	9830	9750	10340	8170	3260
MAX	113	4.4	2.2	3.3	8.5	84	158	162	167	169	170	70
MIN	46	.77	.08	.42	.85	0	84	158	158	167	67	13
CAL YR 2001	TOTAL	29183.42	MEAN	80.0	MAX	168	MIN	0.08	AC-FT	57880		
WTR YR 2002	TOTAL	28261.76	MEAN	77.4	MAX	170	MIN	0	AC-FT	56060		

MAX DISCH: 172 CFS AT 11:30 ON Aug. 10, 2002 GH 3.53 FT. SHIFT -0.07 FT.  
MAX GH: 3.53 FT. AT 11:30 ON Aug. 10, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



GUNNISON RIVER BASIN

SOUTH CANAL NEAR MONTROSE, CO

LOCATION.--Lat 38°29'01", long 107°45'20", in NE¼SW¼NE¼ sec 27, T.49 N., R.8 W., Montrose County, on right bank of canal approximately 3600 ft. below the west portal of the Gunnison Tunnel.

GAGE.--Water-stage recorder with satellite telemetry.

REMARKS.--Data was imported from the DCP EDL as the primary record. The DCP record is complete, reliable, and good during the normal operating season. The normal operating period was from the Oct. 1 to Oct.31, 2001 and from Mar. 20 to Sep 30, 2002. The intervening period reflected use on eight occasions to fill Fairview Reservoir. These periods were Nov 13-14, Dec.10-11, 2001, Jan. 2-3, Jan. 14-15, Jan. 28-29, 2002, Feb. 11-12, Feb 25-26,2002 and Mar.11-12, 2002. Station maintained and record developed by Gerald M. Thrush.

RATING TABLE.--SOUCANCO131 USED FROM 01-OCT-2001 TO 30-SEP-2002

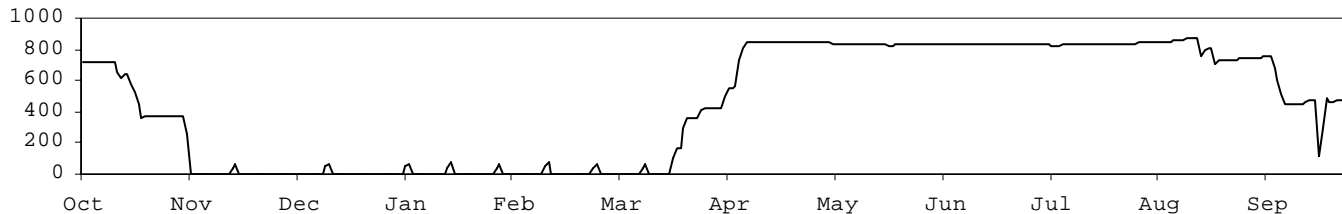
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	714	0	0	0	0	0	424	840	830	835	841	742
2	715	0	0	51	0	0	424	841	829	832	841	743
3	717	0	0	70	0	0	424	842	832	831	845	744
4	718	0	0	0	0	0	494	840	834	831	846	744
5	717	0	0	0	0	0	551	839	834	829	846	747
6	718	0	0	0	0	0	549	839	835	827	848	751
7	718	0	0	0	0	0	570	837	834	826	847	755
8	719	0	0	0	0	0	726	836	833	825	849	757
9	718	0	0	0	0	0	803	836	833	825	851	679
10	715	0	51	0	0	0	848	834	835	828	852	601
11	655	0	67	0	51	36	849	834	837	829	854	512
12	621	0	0	0	73	63	849	836	839	828	856	453
13	638	38	0	0	0	0	847	836	836	828	859	450
14	638	60	0	38	0	0	846	833	836	827	863	452
15	578	0	0	72	0	0	844	833	834	828	866	453
16	532	0	0	0	0	0	842	833	834	828	869	454
17	449	0	0	0	0	0	844	833	833	831	871	455
18	365	0	0	0	0	0	845	830	834	829	870	463
19	370	0	0	0	0	0	843	831	837	830	754	470
20	370	0	0	0	0	104	845	829	836	830	795	472
21	371	0	0	0	0	167	846	826	838	833	813	472
22	372	0	0	0	0	167	844	826	837	831	807	114
23	372	0	0	0	0	293	844	827	836	833	707	294
24	372	0	0	0	0	356	846	829	836	832	727	481
25	372	0	0	0	35	355	844	829	835	833	729	466
26	373	0	0	0	63	358	843	827	834	835	732	466
27	373	0	0	0	0	365	844	827	838	836	734	470
28	373	0	0	39	0	406	844	828	839	837	735	471
29	373	0	0	66	---	425	846	830	837	839	736	472
30	373	0	0	0	---	424	843	830	836	839	738	419
31	252	---	0	0	---	424	---	830	---	839	740	---
TOTAL	16361	98	118	336	222	3943	22711	25821	25051	25764	25121	16022
MEAN	528	3.27	3.81	10.8	7.93	127	757	833	835	831	810	534
AC-FT	32450	194	234	666	440	7820	45050	51220	49690	51100	49830	31780
MAX	719	60	67	72	73	425	849	842	839	839	871	757
MIN	252	0	0	0	0	0	424	826	829	825	707	114

CAL YR 2001	TOTAL	169059.5	MEAN	463	MAX	848	MIN	0	AC-FT	335300
WTR YR 2002	TOTAL	161568	MEAN	443	MAX	871	MIN	0	AC-FT	320500

MAX DISCH: 887 CFS AT 09:45 ON Apr. 9, 2002 GH 2.92 FT. SHIFT -0.01 FT.  
MAX GH: 3.27 FT. AT 00:45 ON Aug. 18, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## GUNNISON RIVER BASIN

## REDLANDS CANAL NEAR GRAND JUNCTION, CO

**LOCATION.**--Lat 39°01'49", long 108°33'51", in NW¼SW¼NW¼ sec 35, T.1 S., R.1 W., Mesa County, on the Right bank of canal 650 ft. below the Redlands diversion dam.

**GAGE.**--Water-stage recorder with satellite telemetry on a 4' diameter well in an 8'x10' steel shed on a concrete pad.

**REMARKS.**--Record is complete, good and reliable except when the stage to discharge relationship was effected by ice which are fair. These were from Dec. 24, 2001 to Dec. 29, 2001, and from Jan. 18, 2002 to Jan. 27, 2002 and Jan. 31, 2002 to Feb. 11, 2002. The primary record is taken from the Electronic Data Logger (EDL). The secondary record is the strip chart. Station maintained by Stephen W. Tuck and Jerry Thrush. Record developed by Jerry Thrush.

**RATING TABLE.**--RLCGRJCO04 USED FROM 01-OCT-2001 TO 23-OCT-2002

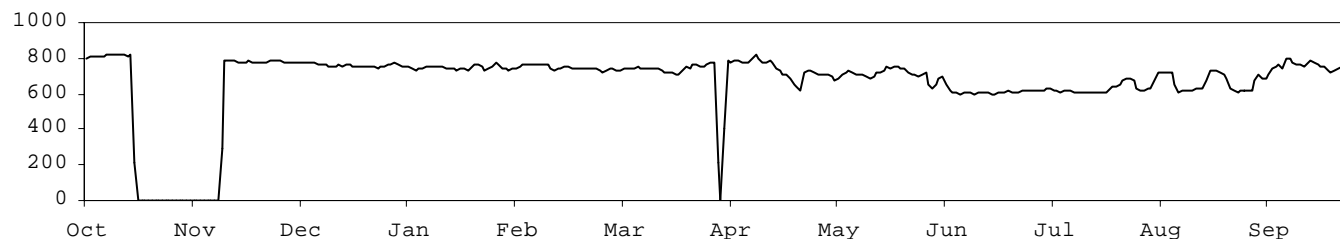
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	801	0	775	753	740	739	214	704	656	619	618	618
2	807	0	773	751	742	738	0	703	632	622	620	618
3	814	0	774	743	750	731	404	705	656	618	625	670
4	811	0	774	734	760	734	784	702	690	619	629	705
5	813	0	774	746	760	741	777	679	696	626	675	682
6	811	0	772	747	760	740	789	682	656	632	718	685
7	817	0	768	749	760	741	785	707	620	623	722	711
8	817	0	768	749	762	746	778	717	608	615	724	740
9	816	289	762	748	762	753	774	726	602	609	723	752
10	817	788	758	749	765	740	780	717	600	617	714	763
11	815	785	757	750	760	741	798	712	608	618	647	741
12	816	783	757	748	736	743	816	707	608	614	607	798
13	814	781	759	747	729	736	794	706	605	608	620	800
14	815	778	758	746	740	746	778	698	599	607	613	776
15	216	771	759	739	743	738	772	681	605	607	618	766
16	0	777	760	732	753	728	784	702	610	606	619	760
17	0	781	758	744	754	722	773	714	611	605	625	758
18	0	780	753	745	744	716	747	720	608	604	625	761
19	0	778	755	735	744	716	731	730	597	604	627	789
20	0	778	754	745	744	708	711	750	599	607	675	773
21	0	775	756	762	744	710	704	746	602	609	727	760
22	0	775	757	765	743	732	691	754	608	611	730	752
23	0	786	755	750	740	748	657	752	612	621	729	748
24	0	787	745	735	742	747	637	742	613	638	724	729
25	0	781	750	740	741	762	622	737	612	640	703	714
26	0	782	750	755	735	760	722	722	611	655	688	735
27	0	779	760	775	723	756	735	709	610	678	626	746
28	0	776	765	769	735	753	729	705	615	689	614	748
29	0	770	770	746	---	760	723	700	617	691	605	753
30	0	770	769	737	---	773	713	710	616	670	618	764
31	0	---	758	735	---	777	---	720	---	630	623	---
TOTAL	11600	16650	23603	23169	20911	22975	20722	22159	18582	19412	20431	22115
MEAN	374	555	761	747	747	741	691	715	619	626	659	737
AC-FT	23010	33030	46820	45960	41480	45570	41100	43950	36860	38500	40520	43870
MAX	817	788	775	775	765	777	816	754	696	691	730	800
MIN	0	0	745	732	723	708	0	679	597	604	605	618

CAL YR 2001 TOTAL 262636 MEAN 720 MAX 824 MIN 0 AC-FT 520900  
WTR YR 2002 TOTAL 242329 MEAN 664 MAX 817 MIN 0 AC-FT 480700

MAX DISCH: 885 CFS AT 08:30 ON Sep. 12, 2002 GH 7.48 FT. SHIFT 0.05 FT.  
MAX GH: 7.48 FT. AT 08:30 ON Sep. 12, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



GUNNISON RIVER BASIN

UNCOMPAHGRE RIVER NEAR OLATHE, CO

**LOCATION.**--Lat 38°36'5", long 107°58'58", SW¼SW¼ of NW¼ sec. 15, T.50 N., R. 10W, NMPM, and about 3,100 ft. above the S. H. 348 bridge and about 5,100 ft below the East Canal headgate and diversion structure, both stream distance. The gage is on the right bank and in Montrose County.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder with satellite telemetry. The DCP is the primary record with Electronic Data Logger as backup.

**REMARKS.**--The primary record is the electronic data from the Sutron 8200. This record proves to be reliable and complete except for the days of ice. This ice period is from Dec.17,2001 to March 6,2002 and is rated fair. The "b" days are affected only by anchor ice which has a minimal affect on stage. The missing record "a" days are when the well was frozen, but there was some movement of the block of ice in the well, thus giving a dampened movement of the float, therefore these flagged days are judged to be fair record. Station maintained by Jerry Thrush and Steven Tuck. Record developed by Steven W. Tuck.

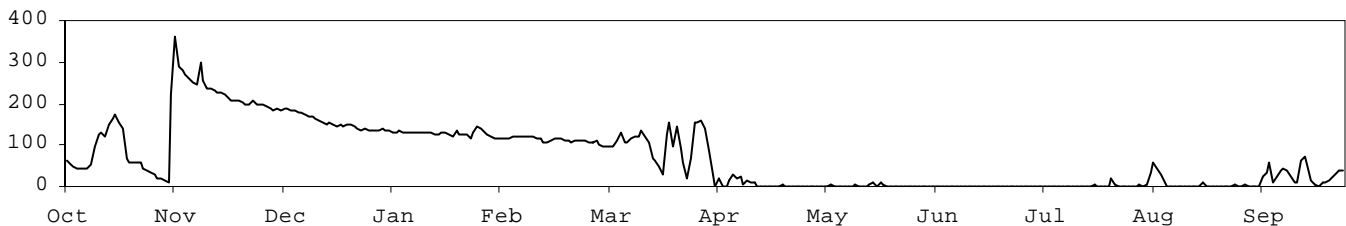
**RATING TABLE.**--UNCOLACO06 USED FROM 01-OCT-2001 TO 08-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	61	362	184	134	116	111	141	.68	1.2	.29	.24	1.9
2	52	289	186	132	116	99	85	.63	1.8	.27	.44	2.6
3	46	281	187	129	116	97	30	.82	1.5	.3	2.9	1.3
4	44	270	185	133	116	97	.62	.62	1.5	.5	.97	2.2
5	42	261	185	129	122	97	18	.6	1.5	.3	6.8	1.1
6	42	251	180	129	122	98	2	.56	1.5	.32	32	1
7	45	246	179	129	122	113	.23	5	1.4	.31	56	24
8	55	300	173	128	122	128	16	2.1	1.3	.38	43	32
9	97	254	170	131	122	106	27	.59	1.3	.42	27	59
10	124	236	171	132	119	107	20	.56	1.2	.39	9.6	10
11	129	234	162	131	119	115	24	.65	1.1	.4	1.5	24
12	122	231	158	128	117	119	5	.68	1.1	.44	1.2	38
13	151	226	154	130	114	119	15	.85	1	.46	.88	44
14	162	226	151	124	107	135	12	3.1	1	.44	1.3	38
15	175	220	154	127	107	121	11	.69	.97	.58	1.3	24
16	153	213	151	130	111	108	1.4	.91	1	.65	1.3	12
17	140	209	146	129	116	68	1.3	.77	1.1	.81	1.5	12
18	69	207	148	124	115	61	2	2.6	.94	.81	2	62
19	56	207	144	121	115	49	1.9	10	1	.92	2.3	73
20	57	201	147	137	113	31	1.6	.79	1.2	.81	2.2	32
21	59	197	147	125	112	123	1.3	12	1.3	4.1	8.8	13
22	57	197	146	123	108	152	1.4	3.6	1.3	.55	1.8	6.7
23	44	208	139	124	110	98	2.5	.97	1.1	.45	1.8	.32
24	37	198	136	115	111	143	1.5	1.8	1.1	.32	1.6	8.2
25	33	198	138	132	110	93	1.5	.83	1.1	.4	1.5	11
26	27	196	136	144	109	59	1.6	1.1	.9	.18	1.4	16
27	21	194	137	142	106	18	1.9	1.8	.82	4.4	1.4	24
28	20	188	135	128	106	69	1.6	1.2	1.1	.3	1.7	36
29	13	185	136	123	---	153	1.3	1.1	.56	.39	1.6	39
30	12	190	139	122	---	154	.79	1.1	.43	.32	3.9	40
31	220	---	137	117	---	157	---	1.2	---	.24	1.3	---
TOTAL	2365	6875	4841	3982	3199	3198	430.44	59.9	34.32	39.27	221.23	688.32
MEAN	76	229	156	128	114	103	14.3	1.93	1.14	1.27	7.14	22.9
AC-FT	4690	13640	9600	7900	6350	6340	854	119	68	78	439	1370
MAX	220	362	187	144	122	157	141	12	1.8	18	56	73
MIN	12	185	135	115	106	18	.23	.56	.43	.24	.24	.32
CAL YR 2001	TOTAL	39605.19	MEAN	108.5	MAX	395	MIN	.72	AC-FT	78560		
WTR YR 2002	TOTAL	25933.48	MEAN	71.1	MAX	362	MIN	.23	AC-FT	51440		

MAX DISCH: 560 CFS AT 17:10 ON Oct. 31, 2001 GH 3.71 FT. SHIFT 0.22 FT.  
MAX GH: 3.71 FT. AT 17:10 ON Oct. 31, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## BLUE RIVER BASIN

## BLUE RIVER AT HIGHWAY 9 BRIDGE BELOW BRECKENRIDGE, CO

**LOCATION.**--Lat 39°32'29", long 106°02'40", in SE¼SW¼ sec. 7, T.6 S., R.77 W., Hydrologic Unit 14010004, Summit County, on right bank 25 ft. above Highway 9 Bridge, 3 1/2 miles north of Breckenridge and 2 1/4 miles south of Dillon Reservoir(Blue River Arm).

**DRAINAGE AREA AND PERIOD OF RECORD.**--N/A, Satellite telemetry began Nov. 25, 1996 and chart recording began May 29, 1997.

**GAGE.**--Graphic water-stage recorder and Sutron 8004 satellite telemetry system in exposed aggregate building. Recorder and shaft encoder are referenced to inside drop tape. Primary record is satellite data and chart record is used for backup. Altitude of gage is 9,180 ft. from topographic map. Two 2" galvanized pipes connect well to stream. Control is rock and cobble riffle(low flows) and 8' culverts(high flows).

**REMARKS.**--Record is complete and reliable except for the following period when ice was in the well: November 28 - March 12. Record is good except for periods of well icing when record is poor. Transmountain diversions above the station occurred through the Continental-Hoosier Tunnel from April 10 - June 27 and through Boreas Pass Ditch from May 21 - June 27. Station maintained by Scott Hummer and George Wear. Records developed by George Wear.

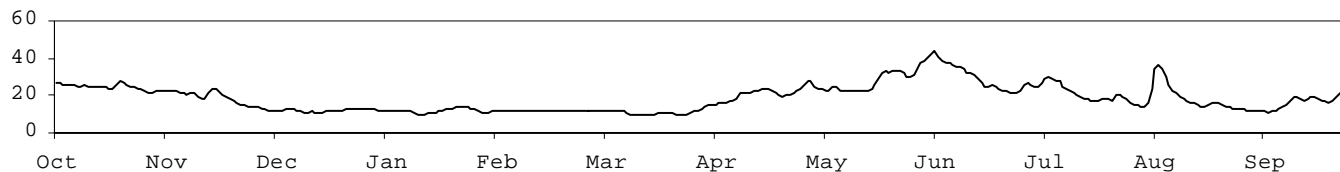
**RATING TABLE.**--BLUNINCO06 USED FROM 01-OCT-2001 TO 07-OCT-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	27	23	12	12	12	12	13	28	35	26	15	13
2	27	22	12	12	12	12	14	28	38	27	15	12
3	26	22	12	12	12	12	15	25	39	26	14	12
4	26	22	12	12	12	12	15	24	41	25	14	12
5	26	21	13	12	12	12	15	24	43	25	16	12
6	26	21	13	12	12	12	16	23	44	27	24	12
7	25	20	13	12	12	12	16	23	41	29	34	12
8	25	21	12	12	12	12	16	25	39	30	36	11
9	26	21	12	12	12	12	17	25	38	29	34	12
10	25	19	11	11	12	12	17	23	37	28	30	12
11	25	18	11	10	12	11	18	22	36	28	26	13
12	25	18	12	10	12	10	21	22	35	25	23	14
13	25	21	11	10	12	10	21	23	35	24	21	15
14	25	24	11	11	12	10	21	22	34	22	19	17
15	25	24	11	11	12	10	21	22	32	21	18	19
16	24	22	12	11	12	10	22	22	32	20	17	19
17	24	20	12	12	12	10	23	23	31	19	16	18
18	26	19	12	12	12	10	24	23	29	18	16	17
19	28	18	12	13	12	10	24	24	27	18	15	18
20	27	17	12	13	12	11	24	26	25	17	14	19
21	26	16	12	13	12	11	23	29	25	17	14	19
22	25	15	13	14	12	11	21	32	26	17	15	18
23	25	15	13	14	12	11	20	33	25	18	16	17
24	24	14	13	14	12	11	19	32	24	18	16	17
25	24	14	13	14	12	10	20	33	23	18	16	16
26	22	14	13	13	12	10	20	33	22	17	15	17
27	21	14	13	13	12	10	21	33	21	20	14	19
28	21	13	13	12	12	10	22	32	21	20	14	21
29	22	13	13	11	---	11	24	30	21	19	13	20
30	22	12	13	11	---	12	26	30	23	18	13	19
31	23	---	12	11	---	12	---	31	---	16	13	---
TOTAL	768	553	379	372	336	341	589	825	942	682	576	472
MEAN	25	18	12	12	12	11	20	27	31	22	19	16
AC-FT	1520	1100	752	738	666	676	1170	1640	1870	1350	1140	936
MAX	28	24	13	14	12	12	26	33	44	30	36	21
MIN	21	12	11	10	12	10	13	22	21	16	13	11
CAL YR 2001	TOTAL	20237	MEAN	55.4	MAX	251	MIN	11	AC-FT	40140		
WTR YR 2002	TOTAL	6835	MEAN	18.7	MAX	44	MIN	10	AC-FT	13560		

MAX DISCH: 77 CFS AT 11:45 ON Jun. 4, 2002 GH 1.05 FT. SHIFT 0 FT.  
MAX GH: 1.05 FT. AT 11:45 ON Jun. 4, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



ROARING FORK RIVER BASIN

ROARING FORK RIVER BELOW MAROON CREEK NEAR ASPEN, CO

**LOCATION.**--Lat 39°13'30", long 106°51'30", NW¼SW¼ sec. 35, T.9 S., R.85 W., Pitkin County, on left bank at Aspen Consolidated Sanitation Plant 0.5 mi east of Aspen Airport and 0.8 mi downstream from confluence of Maroon Creek.

**DRAINAGE AREA.**--N/A

**GAGE.**--Graphic water-stage recorder and Sutron 8004 satellite telemetry system in exposed aggregate building over stilling well. Recorder and shaft encoder are referenced to inside drop tape. Primary record is satellite data and chart record is used for backup. Control is a rock and cobble riffle(low flows)and boulders(high flows). Elevation of gage is 7560 ft from topographic map. Drop tape on inside of well with local datum of 16.56 ft.

**REMARKS.**--Record is complete and reliable except for the following days: October 4 and October 26 when both the recorder and the satellite system malfunctioned. Stage-discharge relationship was affected by ice November 29, December 9-11, 13-19, 23-30, January 2-5, 14, 15, 18-27, 31, February 1-14, 17, 26-28, and March 1-5, 9. Record is fair except for periods of ice affected and/or estimated record, which is fair to poor. Upstream transmountain diversions occurred through Twin Lakes Tunnel from November 1-13, April 6 through June 25, October 7-18 and through Hunter Tunnel for an undetermined period. Station maintained and records developed by George Wear.

**RATING TABLE.**--ROABMCCO03 USED FROM 01-OCT-2001 TO 30-SEP-2002

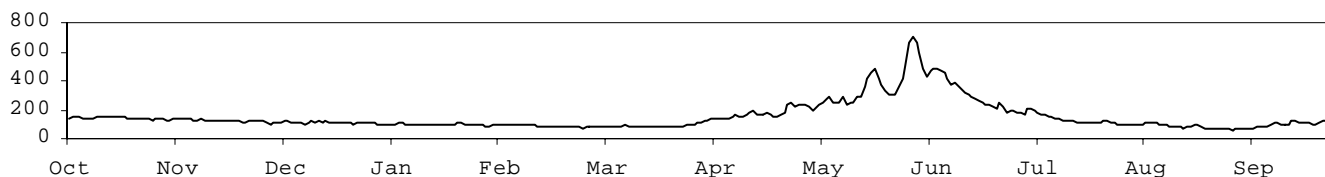
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	142	137	112	98	90	85	117	236	700	185	97	62
2	147	133	120	98	90	80	126	222	665	180	93	63
3	148	133	119	101	92	85	130	199	599	172	99	64
4	145	133	116	104	92	87	132	208	486	206	100	65
5	144	132	112	106	92	88	138	236	434	212	96	67
6	144	129	111	103	94	85	142	248	469	196	102	64
7	141	128	115	98	94	80	139	278	485	183	116	64
8	137	141	102	95	94	81	135	288	479	172	116	76
9	150	126	115	97	92	88	138	246	469	164	111	76
10	149	122	120	98	92	91	147	242	452	155	106	85
11	145	124	115	91	90	83	159	245	408	145	99	85
12	151	126	118	97	90	81	150	289	378	138	94	99
13	150	127	113	94	88	84	145	234	380	132	91	108
14	148	128	118	91	88	89	161	248	358	128	85	107
15	152	126	116	95	86	78	180	255	341	126	81	99
16	148	125	114	95	89	78	198	292	312	124	77	93
17	146	125	116	94	84	77	166	291	298	120	76	92
18	141	127	114	97	80	76	162	356	286	117	75	124
19	140	122	112	100	80	77	171	412	274	113	76	118
20	141	112	111	102	81	78	185	451	263	114	83	110
21	141	109	106	105	79	79	162	485	250	115	90	113
22	143	118	103	106	84	83	148	408	240	108	92	111
23	142	124	104	100	80	83	148	369	230	112	84	106
24	137	118	105	99	81	81	162	329	214	114	74	100
25	129	122	106	99	79	80	184	298	208	109	71	95
26	134	118	106	97	72	81	232	299	244	123	67	117
27	134	108	105	95	89	86	250	307	225	119	67	127
28	135	98	104	90	87	90	227	353	182	110	67	124
29	131	110	103	89	---	97	241	410	196	104	68	129
30	131	115	102	89	---	102	235	502	200	100	67	136
31	142	---	101	90	---	108	---	666	---	97	64	---
TOTAL	4408	3696	3434	3013	2429	2621	5010	9902	10725	4293	2684	2879
MEAN	142	123	111	97	87	85	167	319	358	138	87	96
AC-FT	8740	7330	6810	5980	4820	5200	9940	19640	21270	8520	5320	5710
MAX	152	141	120	106	94	108	250	666	700	212	116	136
MIN	129	98	101	89	72	76	117	199	182	97	64	62

CAL YR	2001	TOTAL	90198	MEAN	247	MAX	1220	MIN	84	AC-FT	178900
WTR YR	2002	TOTAL	55094	MEAN	151	MAX	700	MIN	62	AC-FT	109300

MAX DISCH: 891 CFS AT 00:30 ON June 1, 2002 GH 4.22 FT. SHIFT +0.07 FT.  
MAX GH: 4.22 FT. AT 00:30 ON June 1, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





ROARING FORK RIVER BASIN

09080300 ROCKY FORK CREEK NEAR MEREDITH, CO

**LOCATION.**--Lat 39°21'42", long 106°49'12", in NW¼NW¼ sec. 18, T.8 S., R.84 W., Pitkin County, Hydrologic Unit 14010004 on right bank at upstream end of flume constructed to carry Rocky Fork Creek across spillway to auxiliary outlet of Ruedi Dam on Frying Pan River and 4.6 mi west of Meredith.

**DRAINAGE AREA.**--12.3 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder in standard 42" corrugated metal pipe shelter and well; recorder connected to USBR digital equipment by means of chain; hard-wired to top of Ruedi Reservoir for satellite transmission. Recorder and USBR equipment are referenced to inside drop tape. Primary record is satellite data and chart record is used for backup. Control is v-notch, sharp crested weir. Datum of gage is 7,494.50 ft.

**REMARKS.**--Record is complete and reliable except for beaver activity on the following dates: October 1, October 4, October 12-23, October 25, October 30-November 6, November 8, November 11-13, December 5-6, April 6-22, May 9-13, May 18-20, May 22-June 4, July 7-8, July 11, August 4-12, August 14-15, August 17-20, September 8-10, September 12-19, and September 22-30. Corrected gage heights were based on satellite data with shift and datum distribution, with chart record used to fill in missing data. Ruedi Reservoir release data and preliminary data from Fryingpan River near Ruedi station were used to help estimate beaver-affected record. Record is fair to poor overall because of regular beaver activity in the control. Station maintained and records developed by George Wear.

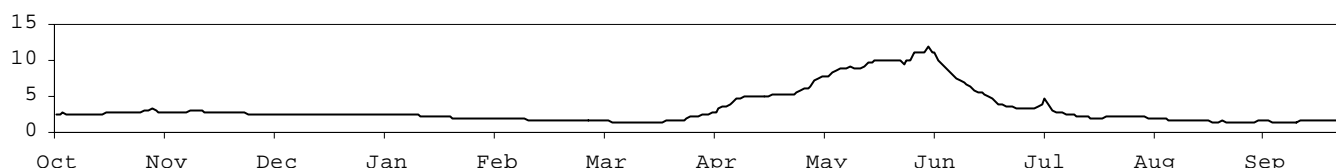
**RATING TABLE.**--RFCMERC001 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	2.6	2.8	2.4	2.4	1.9	1.7	2.4	6.2	11	3.4	2.1	1.4
2	2.5	2.8	2.4	2.4	1.9	1.7	2.5	6.5	11	3.4	2.1	1.4
3	2.7	2.8	2.4	2.4	1.9	1.7	2.6	7.1	11	3.4	2.1	1.4
4	2.5	2.9	2.4	2.4	1.9	1.7	2.7	7.6	12	3.4	2.1	1.4
5	2.5	2.9	2.5	2.4	1.9	1.7	2.7	7.8	11	3.6	1.9	1.6
6	2.5	2.9	2.5	2.4	1.9	1.6	3.2	7.8	11	3.9	1.9	1.7
7	2.5	2.9	2.5	2.4	1.9	1.5	3.6	7.9	10	4.8	1.9	1.7
8	2.5	3	2.5	2.4	1.9	1.5	3.7	8.4	9.5	3.8	1.9	1.6
9	2.5	3	2.5	2.6	1.9	1.5	3.8	8.7	8.9	3.1	1.9	1.5
10	2.5	3	2.5	2.5	1.9	1.5	4.3	8.8	8.3	2.8	1.9	1.4
11	2.5	3	2.5	2.4	1.8	1.5	4.7	8.9	8	2.8	1.8	1.3
12	2.5	2.9	2.5	2.3	1.8	1.5	4.8	9	7.6	2.7	1.8	1.3
13	2.6	2.8	2.5	2.1	1.8	1.5	4.9	9.1	7.3	2.6	1.8	1.4
14	2.6	2.8	2.5	2.1	1.8	1.5	5	8.8	7	2.5	1.8	1.4
15	2.7	2.7	2.5	2.1	1.8	1.5	5	9	6.6	2.4	1.8	1.5
16	2.7	2.7	2.5	2.1	1.8	1.5	5	8.8	6.3	2.3	1.8	1.5
17	2.7	2.7	2.5	2.1	1.8	1.5	5	9.3	5.9	2.2	1.8	1.6
18	2.7	2.7	2.5	2.1	1.8	1.5	5.1	9.7	5.6	2.2	1.7	1.7
19	2.7	2.7	2.4	2.1	1.8	1.5	5.1	9.7	5.5	2.2	1.7	1.7
20	2.7	2.7	2.4	2.1	1.8	1.5	5.1	10	5.3	2	1.7	1.8
21	2.7	2.7	2.4	2	1.8	1.5	5.2	10	5	1.9	1.7	1.8
22	2.7	2.7	2.4	1.9	1.8	1.6	5.2	10	4.6	1.9	1.6	1.8
23	2.7	2.7	2.4	1.9	1.8	1.8	5.2	10	4.3	2	1.5	1.8
24	2.8	2.6	2.4	1.9	1.8	1.8	5.2	10	4	2.1	1.5	1.8
25	2.9	2.5	2.4	1.9	1.7	1.8	5.2	10	3.8	2.1	1.5	1.8
26	3	2.5	2.4	1.9	1.7	1.8	5.4	10	3.7	2.3	1.6	1.8
27	3.1	2.5	2.4	1.9	1.7	1.8	5.4	10	3.6	2.2	1.5	1.8
28	3.2	2.5	2.4	1.9	1.7	2	5.6	9.5	3.5	2.1	1.5	1.8
29	3	2.5	2.4	1.9	---	2.2	5.8	10	3.4	2.1	1.5	1.8
30	2.9	2.4	2.4	1.9	---	2.2	6.1	10	3.4	2.1	1.4	1.8
31	2.8	---	2.4	1.9	---	2.2	---	11	---	2.2	1.4	---
TOTAL	83.5	82.3	75.8	66.8	51	51.8	135.5	279.6	208.1	82.5	54.2	48.3
MEAN	2.7	2.7	2.5	2.2	1.8	1.7	4.5	9	6.9	2.7	1.8	1.6
AC-FT	166	163	150	132	101	103	269	555	413	164	108	96
MAX	3.2	3	2.5	2.6	1.9	2.2	6.1	11	12	4.8	2.1	1.8
MIN	2.5	2.4	2.4	1.9	1.7	1.5	2.4	6.2	3.4	1.9	1.4	1.3

CAL YR 2001 TOTAL 2296.8 MEAN 6.29 MAX 37 MIN 1.9 AC-FT 4560  
WTR YR 2002 TOTAL 1219.4 MEAN 3.34 MAX 12 MIN 1.3 AC-FT 2420

MAX DISCH: 12.1 CFS AT 20:00 ON Jun. 4, 2002 GH 0.79 FT. SHIFT -0.05 FT.  
MAX GH: 0.79 FT. AT 20:00 ON Jun. 4, 2002  
FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



YAMPA RIVER BASIN

09238500 WALTON CREEK NEAR STEAMBOAT SPRINGS, CO

**LOCATION**--Lat. 40°24'29", long. 106°47'11", (Steamboat Springs, Colorado, Quad., scale, 1:24,000), in SW1/4NW1/4 sec. 11, T5N, R84W, (projected), Routt County, on left bank 0.4 miles downstream from Beaver Creek, 0.6 miles downstream from Storm King Creek, 4.5 miles upstream from its confluence with the Yampa River, and 6.0 miles southeast of Steamboat Springs.

**DRAINAGE AREA**--42.4 sq mi (from topographic maps)

**PERIOD OF RECORD**--1920 to 1922, State Engineer's Office; re-established 0.2 mile upstream 1965 to 1973, by USGS; re-established 1978 to 1987 by USGS at same datum; re-established by the State Engineer's Office in October of 2000, at the same datum as the USGS.

**GAGE**--Stevens A-71 water stage recorder and Sutron 8200A data collection platform with digital shaft encoder housed in a 6-ft X 42-inch corrugated metal shelter on a 6-ft X 42-inch metal well. Control is a concrete dam across stream. Altitude of gage is 7,050 ft (from topographic map).

**REMARKS**--Data collection platform installed May 21, 2002. Primary record beginning May 21 is hourly data from the data collection platform. Primary record prior to May 21 is from chart. Chart values were used: Oct. 1-4, 18-25; Apr. 6-May 12, May 14-16; AuG. 11-12, 24-29; Sep. 15-17, 22-25, 28-29. Hourly discharges were entered from the chart for the following days: Oct.17, May 13, May 17-20. Station closed for winter Oct. 26, 2001-Apr. 4, 2002. The record is complete and reliable except for the following days: Oct. 5-16 due to malfunction of clock and Apr. 5 due to possible ice-effect. The record is good except for the periods Apr. 26-28 and Apr. 30-June 11, which are considered poor due to lack of definition of the high water rating. Discharges were estimated for the following days: Oct. 5-16 and Apr. 5. Station maintained and record developed by Erin Light.

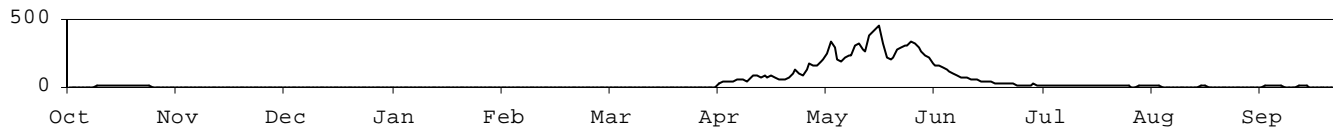
**RATING TABLE**--WLTNCKC007 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	6	-	-	-	-	-	-	180	296	17	7	5.2
2	6	-	-	-	-	-	-	162	261	17	6.9	4.9
3	5.7	-	-	-	-	-	-	166	236	16	9.2	4.7
4	5.7	-	-	-	-	-	-	184	225	25	8.8	4.8
5	5.7	-	-	-	-	-	26	208	180	18	9	4.6
6	6	-	-	-	-	-	37	254	166	16	12	4.6
7	6	-	-	-	-	-	37	335	157	16	9.8	5.1
8	6	-	-	-	-	-	42	300	148	14	9.1	7.6
9	7.4	-	-	-	-	-	49	208	134	13	8.1	9.4
10	8.9	-	-	-	-	-	54	188	120	12	7.3	7.7
11	8.1	-	-	-	-	-	57	226	103	11	6.3	7.9
12	8.9	-	-	-	-	-	52	239	90	11	5.7	14
13	9.4	-	-	-	-	-	49	241	80	9.8	5.7	9.1
14	9.8	-	-	-	-	-	68	311	73	9.5	5.7	7.3
15	10	-	-	-	-	-	88	329	68	9	5.5	5.7
16	11	-	-	-	-	-	84	274	62	8.6	5.2	5.4
17	12	-	-	-	-	-	71	272	57	8.8	5.1	5.4
18	15	-	-	-	-	-	81	388	52	10	4.8	10
19	13	-	-	-	-	-	73	414	48	9	4.8	13
20	13	-	-	-	-	-	88	443	45	9.8	5.6	8.2
21	15	-	-	-	-	-	71	451	42	15	8.4	6.8
22	15	-	-	-	-	-	62	319	40	9.9	8.4	5.7
23	14	-	-	-	-	-	54	226	36	8.7	7	5.4
24	7.7	-	-	-	-	-	62	204	32	11	5.7	5
25	5.7	-	-	-	-	-	79	226	28	8.8	5.4	4.8
26	-	-	-	-	-	-	102	278	26	19	5.4	6.7
27	-	-	-	-	-	-	130	295	24	12	5.1	6.8
28	-	-	-	-	-	-	105	316	24	9.8	5.1	5.4
29	-	-	-	-	---	-	93	307	21	8.4	5.4	5.4
30	-	-	-	-	---	-	136	334	19	7.4	5.7	8.1
31	-	---	-	-	---	-	---	329	---	7.4	5.5	---
TOTAL	231	-	-	-	-	-	1850	8607	2893	377.9	208.7	204.7
MEAN	7.45	-	-	-	-	-	61.7	278	96	12.2	6.7	6.8
AC-FT	458	-	-	-	-	-	3670	17070	5740	750	414	406
MAX	15	-	-	-	-	-	136	451	296	25	12	14
MIN	-	-	-	-	-	-	-	162	19	7.4	4.8	4.6

WTR YR 2002 TOTAL N/A

MAX DISCH: 633 CFS AT 20:00 ON May. 20, 2002 GH 2.18 FT. SHIFT -0.01 FT.  
MAX GH: 2.18 FT. AT 20:00 ON May. 20, 2002



NORTH PLATTE RIVER BASIN

06616500 MICHIGAN RIVER near MEADOW CREEK RESERVOIR

**LOCATION**--Lat. 40°36'48", Long. 106°05'05", (Gould, Colorado Quadrangle, 1955), SE1/4 of the SE1/4 in Section 36 T8N, R78W in Jackson County. Under bridge on County Road 30 about 700 feet upstream of its confluence with Peterson Creek.

**DRAINAGE AREA**--Approximately 99 sq. mi.

**PERIOD OF RECORD**--Formerly known as the Michigan River near Gould station and was relocated due to removal of bridge location. Station has been in operation at this location since 1997.

**GAGE**--Sutron 8200A data collection platform with digital shaft encoder and satellite monitoring equipment, located on bridge abutment several meters away from river channel. Outside staff gage located on downstream bridge abutment to left of stilling well.

**REMARKS**--Primary record is hourly data from the data collection platform. Continuous gage height records were kept from October 1 to November 15, 2001 and April 4 to September 30, 2002. The record is complete and reliable except for the following days: October 1 to 3, November 2 to 5, November 8 to 15, and April 18 to 22: Gage heights affected by beaver dam. The record is good. Discharges were estimated for the following days October 1 to 3, November 2 to 5, November 8 to 15, and April 18 to 22. Station was closed for winter November 16 to April 4. Station maintained and record developed by Erin Light.

**RATING TABLE**--MICMERC004 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

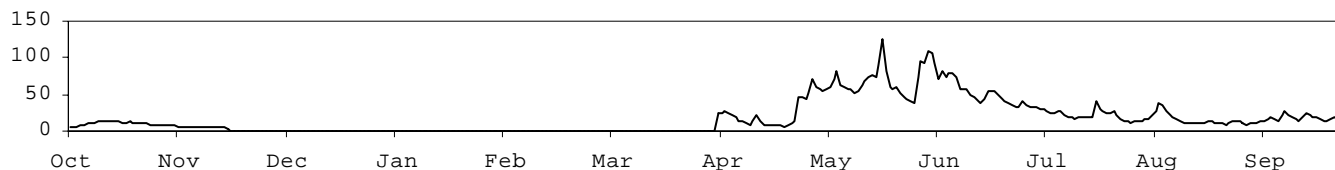
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	5.6	5.9	-	-	-	-	-	72	95	35	13	10
2	5.9	5.9	-	-	-	-	-	61	93	32	14	8.8
3	6.4	5.9	-	-	-	-	-	56	110	32	15	10
4	8.2	5.9	-	-	-	-	25	54	106	34	17	12
5	8.2	5.9	-	-	-	-	25	56	92	31	17	12
6	10	5.9	-	-	-	-	28	60	72	31	22	14
7	11	5.9	-	-	-	-	24	71	82	26	28	15
8	11	5.6	-	-	-	-	23	83	74	25	39	16
9	13	5.3	-	-	-	-	20	63	79	24	35	18
10	15	5.1	-	-	-	-	14	61	79	28	26	16
11	13	4.9	-	-	-	-	13	57	74	26	21	14
12	13	4.6	-	-	-	-	11	58	58	22	18	22
13	13	4.4	-	-	-	-	8.4	53	58	20	16	26
14	13	4.2	-	-	-	-	15	55	57	18	13	22
15	13	4	-	-	-	-	22	62	49	17	12	18
16	12	-	-	-	-	-	15	67	47	18	11	16
17	12	-	-	-	-	-	9	74	44	19	10	15
18	13	-	-	-	-	-	8.3	77	38	18	9.7	18
19	12	-	-	-	-	-	8	73	44	18	10	24
20	10	-	-	-	-	-	7.7	89	54	19	10	21
21	9.8	-	-	-	-	-	7.3	126	55	41	10	20
22	9.8	-	-	-	-	-	7	83	54	31	13	19
23	9.8	-	-	-	-	-	6.6	60	50	27	14	17
24	9.5	-	-	-	-	-	8.4	58	45	25	12	15
25	8.9	-	-	-	-	-	9.7	61	41	24	10	14
26	8.5	-	-	-	-	-	13	53	38	28	9.9	16
27	8.9	-	-	-	-	-	46	47	36	22	9.3	18
28	9.2	-	-	-	-	-	47	43	34	17	12	16
29	9.4	-	-	-	---	-	43	41	34	14	14	16
30	9.4	-	-	-	---	-	51	38	41	13	15	20
31	8.8	---	-	-	---	-	---	75	---	12	14	---
TOTAL	320.3	79.4	-	-	-	-	515.4	1987	1833	747	489.9	498.8
MEAN	10.3	2.65	-	-	-	-	17.2	64	61	24	15.8	16.6
AC-FT	635	157	-	-	-	-	1020	3940	3640	1480	972	989
MAX	15	5.9	-	-	-	-	51	126	110	41	39	26
MIN	5.6	-	-	-	-	-	-	38	34	12	9.3	8.8

WTR YR 2002 TOTAL N/A

MAX DISCH: 165 CFS AT 05:00 ON May. 21, 2002 GH 1.95 FT. SHIFT 0 FT.

MAX GH: 1.95 FT. AT 05:00 ON May. 21, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



NORTH PLATTE RIVER BASIN

06617100 MICHIGAN RIVER near WALDEN, CO

**LOCATION**--Lat. 40°44'29", Long. 106°16'38", (Walden, Colorado Quadrangle, 1955), NE1/4 of the NE1/4 in Section 21 T9N, R79W in Jackson County. On Jackson County property behind Town of Walden Water Treatment Facility.

**DRAINAGE AREA**--Approximately 182 sq. mi.

**PERIOD OF RECORD**--Originally established by the USGS at a location believed to be just downstream of the present in May 1904. Records kept by USGS from May 1904 to October 1905 and May 1923 to October 1947. Re-established by the State Engineer's Office in May 2002. Records kept by Town of Walden from 1916 to present.

**GAGE**--Sutron 8210 data collection platform with digital shaft encoder satellite monitoring equipment, mounted on a 24" corrugated metal pipe stilling well in a metal box. Outside staff gage located approximately 10 meters downstream.

**REMARKS**--Primary record is 15-minute data from the data collection platform. Continuous gage height records were kept from May 14 to September 30, 2002. Stilling well was installed in April 2002 and recording equipment was installed on May 13, 2002. The record is complete and reliable except for the following days: July 13 to 17. The record is good. The station began operation starting May 13, 2002. It was last operated for record purposes by the USGS from 1923 to 1947. Station maintained and record developed by Erin Light.

**RATING TABLE**--MICWLDC09 USED FROM 30-APR-2002 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

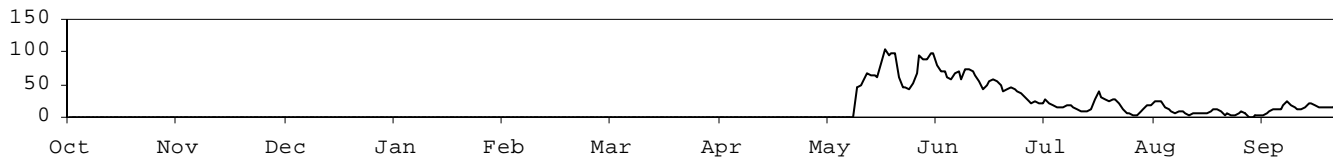
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	-	-	-	-	-	-	-	-	94	30	3.5	8.1
2	-	-	-	-	-	-	-	-	90	24	4.5	5.3
3	-	-	-	-	-	-	-	-	89	20	7.7	1.4
4	-	-	-	-	-	-	-	-	99	25	13	.85
5	-	-	-	-	-	-	-	-	98	22	18	2.3
6	-	-	-	-	-	-	-	-	80	22	19	3.3
7	-	-	-	-	-	-	-	-	71	27	23	3.5
8	-	-	-	-	-	-	-	-	70	20	25	6.4
9	-	-	-	-	-	-	-	-	62	18	24	9
10	-	-	-	-	-	-	-	-	57	16	15	12
11	-	-	-	-	-	-	-	-	67	15	11	12
12	-	-	-	-	-	-	-	-	69	16	8.3	12
13	-	-	-	-	-	-	-	-	59	19	7.2	17
14	-	-	-	-	-	-	-	47	72	17	9.7	23
15	-	-	-	-	-	-	-	50	72	14	8.3	19
16	-	-	-	-	-	-	-	54	70	11	5.1	16
17	-	-	-	-	-	-	-	68	63	9.5	4.5	13
18	-	-	-	-	-	-	-	65	54	10	5.2	13
19	-	-	-	-	-	-	-	63	44	9.2	5.7	16
20	-	-	-	-	-	-	-	60	49	12	5.8	21
21	-	-	-	-	-	-	-	82	56	27	5.8	20
22	-	-	-	-	-	-	-	105	58	40	6.2	17
23	-	-	-	-	-	-	-	95	54	31	10	16
24	-	-	-	-	-	-	-	97	48	27	13	15
25	-	-	-	-	-	-	-	97	41	25	11	14
26	-	-	-	-	-	-	-	61	42	27	8.7	14
27	-	-	-	-	-	-	-	46	45	27	4	16
28	-	-	-	-	-	-	-	45	43	21	4.8	21
29	-	-	-	-	---	-	-	43	41	11	2.1	24
30	-	-	-	-	---	-	-	53	36	5.4	3.3	27
31	-	---	-	-	---	-	---	67	---	5	6.2	---
TOTAL	-	-	-	-	-	-	-	1198	1893	603.1	298.6	398.15
MEAN	-	-	-	-	-	-	-	38.6	63	19.5	9.6	13.3
AC-FT	-	-	-	-	-	-	-	2380	3750	1200	592	790
MAX	-	-	-	-	-	-	-	105	99	40	25	27
MIN	-	-	-	-	-	-	-	-	36	5	2.1	.85

WTR YR 2002 TOTAL N/A

MAX DISCH: 115 CFS AT 06:15 ON May 22, 2002 GH 1.25 SHIFT 0.02 FT.

MAX GH: 1.25 FT. AT 06:15 ON May 22, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



NORTH PLATTE RIVER BASIN

06617500 ILLINOIS RIVER NEAR RAND

**LOCATION**--Lat. 40°27'45", Long. 106°10'30", (Rand Quadrangle, 1956), in SW1/4NE1/4 of Section 29, T6N, R78W in Jackson County, on right upstream bridge abutment on Jackson County Road 27.

**DRAINAGE AREA**--Approximately 70.6 sq. mi. (from topographic maps)

**PERIOD OF RECORD**--Established by the State Engineer's Office. Formerly published as Illinois Creek near Rand (1931-1940) at similar location. Hydrographic measurements taken in 1981 and 1985, but no records were kept. Records kept from 1987 to present. Records published in 1995.

**GAGE**--Sutron 8200A data collection platform with digital shaft encoder satellite telemetry. DCP housed in metal box several meters up bank from 12" metal stilling well and shaft encoder. Outside staff gage on upstream right abutment. Approximate elevation of gage is 8550 feet.

**REMARKS**--Primary record is hourly data from the data collection platform. Continuous gage height records were kept from April 30 to September 30, 2002. The record is good except for the periods July 16 to July 20 and July 24 to July 28, which are considered poor. Discharges were estimated for the following days: April 30 to May 2, July 16 to July 20, July 24 to July 28 and August 2 to August 10. The station is closed during the winter months. Station maintained and record developed by Erin Light.

**RATING TABLE**--ILLRANCO02 USED FROM 01-OCT-2001 TO 30-SEP-2002

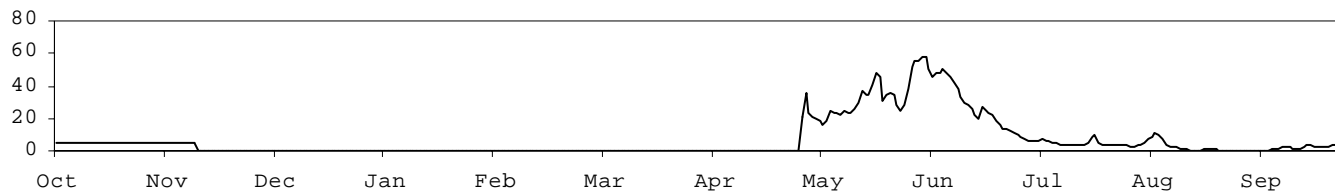
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	-	-	-	-	-	-	-	36	56	8.6	2.7	.07
2	-	-	-	-	-	-	-	24	55	7.4	2.8	.07
3	-	-	-	-	-	-	-	21	58	6.4	3.4	.02
4	-	-	-	-	-	-	-	20	58	6.1	3.8	.02
5	-	-	-	-	-	-	-	18	51	6.5	5.3	.02
6	-	-	-	-	-	-	-	16	45	6.6	7	.02
7	-	-	-	-	-	-	-	19	48	6.8	8.9	.02
8	-	-	-	-	-	-	-	25	48	6.1	11	.02
9	-	-	-	-	-	-	-	24	50	5.6	10	.25
10	-	-	-	-	-	-	-	23	48	5.2	7.9	1
11	-	-	-	-	-	-	-	22	45	4.8	3.8	1.1
12	-	-	-	-	-	-	-	25	42	4	2.8	1.6
13	-	-	-	-	-	-	-	24	38	3.4	2.6	2
14	-	-	-	-	-	-	-	24	33	3.4	1.9	2.7
15	-	-	-	-	-	-	-	26	29	3.4	1.6	2.3
16	-	-	-	-	-	-	-	30	28	3.3	1.3	1.8
17	-	-	-	-	-	-	-	37	26	3.1	.75	1.7
18	-	-	-	-	-	-	-	34	22	3.1	.21	1.8
19	-	-	-	-	-	-	-	35	20	3.1	.15	2.4
20	-	-	-	-	-	-	-	41	27	5.4	.18	3.2
21	-	-	-	-	-	-	-	48	25	9.1	.61	3.2
22	-	-	-	-	-	-	-	45	24	9.4	1.1	2.8
23	-	-	-	-	-	-	-	31	22	5.1	.86	2.4
24	-	-	-	-	-	-	-	34	19	4.1	.9	2
25	-	-	-	-	-	-	-	36	16	4.1	.89	1.9
26	-	-	-	-	-	-	-	35	14	4.1	.39	2.7
27	-	-	-	-	-	-	-	28	13	4.1	.17	3.4
28	-	-	-	-	-	-	-	25	12	4.1	.15	3.4
29	-	-	-	-	-	-	-	28	11	3.5	.15	3.4
30	-	-	-	-	-	-	21	38	10	3.4	.15	3.4
31	-	-	-	-	-	-	-	52	-	3.3	.08	-
TOTAL	-	-	-	-	-	-	21	924	993	156.6	83.54	50.71
MEAN	-	-	-	-	-	-	21	30	33	5.1	2.69	1.69
AC-FT	-	-	-	-	-	-	42	1830	1970	311	166	101
MAX	-	-	-	-	-	-	21	52	58	9.4	11	3.4
MIN	-	-	-	-	-	-	21	16	10	3.1	.08	.02

WTR YR 2002 TOTAL N/A

MAX DISCH: 65.1 CFS AT 07:00 ON Jun. 3, 2002 GH 1.57 FT. SHIFT 0.04 FT.  
MAX GH: 1.57 FT. AT 07:00 ON Jun. 3, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



SAN JUAN RIVER BASIN

DOLORES TUNNEL OUTLET NEAR DOLORES, CO

LOCATION.--Lat 37°28'00", long 108°32'30", in SW¼SE¼ sec. 18, T. 37 N., R.15 W., NMPM, Montezuma County.

DRAINAGE AREA.--N/A

GAGE.--Sutron 8200 DCP in a concrete shelter and well at a 15 foot Parshall flume.

REMARKS.--Records good. Record is complete. Station maintained by the Dolores Conservancy District and records developed by Scott D. Brinton.

RATING TABLE.--DOLTUNCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

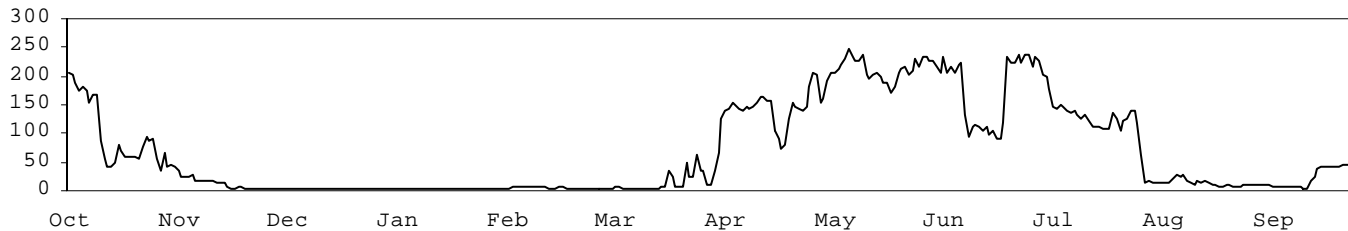
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	205	35	4.4	5.1	4.1	3.7	12	202	235	218	64	10
2	203	26	4.3	5.1	4.1	3.7	35	152	226	232	13	9.4
3	188	25	3.8	5.1	4.1	3.7	66	162	226	226	16	9.7
4	176	25	3.2	5.1	6.4	3.7	124	191	217	202	13	9.3
5	182	28	3.1	5.1	6.0	7.7	139	205	206	200	13	9.3
6	173	17	3.2	5.1	6.3	7.2	144	205	234	179	14	9.1
7	153	17	3.4	4.9	5.5	4.4	154	212	207	145	13	8.4
8	168	17	3.4	4.8	5.5	4.4	149	221	216	143	13	8.4
9	166	16	3.4	4.8	5.5	4.4	144	231	205	150	13	8.4
10	86	16	3.7	4.6	5.5	4.4	140	248	219	148	21	8.3
11	55	16	4.0	4.4	5.4	4.4	147	232	222	140	27	8.0
12	43	15	3.9	4.4	5.5	4.4	142	226	133	135	23	8.0
13	41	15	4.1	4.4	5.3	4.4	146	226	95	140	28	7.7
14	48	14	4.1	4.4	5.1	4.4	155	236	113	133	17	7.1
15	79	8.1	4.1	4.2	5.1	4.4	164	202	114	124	13	6.2
16	70	5.1	4.1	4.1	5.1	4.7	163	196	111	134	12	5.1
17	61	5.1	4.7	4.1	5.3	5.1	156	203	104	122	16	5.1
18	58	5.3	5.1	4.1	5.3	5.4	156	206	113	111	15	17
19	59	5.3	5.1	4.1	5.1	5.7	103	199	97	111	17	25
20	58	5.1	5.1	4.1	5.1	35	89	189	105	110	13	40
21	55	5.1	5.1	4.1	5.1	25	75	188	92	107	12	42
22	78	5.1	5.1	4.3	5.1	7.3	79	171	89	107	11	43
23	93	5.1	5.1	4.2	5.1	7.7	126	181	118	108	8.4	43
24	88	5.1	5.1	3.9	5.1	7.4	155	206	232	135	8.6	42
25	91	5.1	5.1	4.1	4.8	49	148	212	223	126	8.9	42
26	56	4.9	5.1	4.1	4.2	25	144	216	224	106	8.9	43
27	36	4.8	5.1	4.1	3.9	25	141	201	238	122	8.5	45
28	65	4.8	5.1	3.8	3.7	62	146	208	225	124	8.4	45
29	43	4.5	5.1	4.1	---	34	180	231	236	139	8.4	44
30	44	4.4	5.1	4.4	---	35	205	215	236	138	9.1	44
31	41	---	5.1	4.2	---	12	---	235	---	119	11	---
TOTAL	2962	364.9	136.3	137.3	142.3	414.6	3927	6408	5311	4434	477.2	652.5
MEAN	95.5	12.2	4.4	4.43	5.08	13.4	131	207	177	143	15.4	21.7
AC-FT	5880	724	270	272	282	822	7790	12710	10530	8790	947	1290
MAX	205	35	5.1	5.1	6.4	62	205	248	238	232	64	45
MIN	36	4.4	3.1	3.8	3.7	3.7	12	152	89	106	8.4	5.1

CAL YR	2001	TOTAL	49406.5	MEAN	135	MAX	361	MIN	3.1	AC-FT	98000
WTR YR	2002	TOTAL	25367.1	MEAN	69.5	MAX	248	MIN	3.1	AC-FT	50320

MAX DISCH: 255 CFS AT 22:00 ON May. 31, 2002 GH 2.44 FT. SHIFT 0.09 FT.  
MAX GH: 2.44 FT. AT 22:00 ON May. 31, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## SAN JUAN RIVER BASIN

LONE PINE CANAL BELOW GREAT CUT DIKE NEAR DOLORES, CO

LOCATION.--Lat 37°30'24", long 108°35'28", in NW¼SW¼ sec. 35, T.38 N., R.16 W., NMPM, Montezuma County.

DRAINAGE AREA.--N/A

GAGE.--Sutron 8200 DCP in a concrete shelter and well at a 12 foot Parshall flume.

REMARKS.--Records good. Record is complete. Station maintained by the Dolores Conservancy District and records developed by Scott D. Brinton.

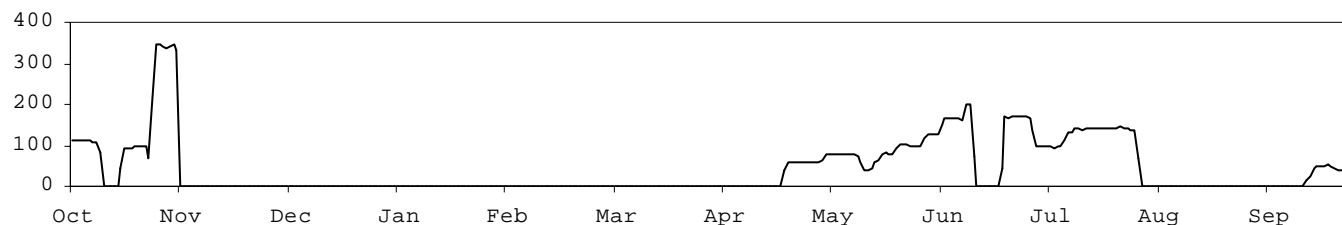
RATING TABLE.--MVIDIVCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	111	.00	.00	.00	.00	.00	.00	59	117	168	68	.00
2	111	.00	.00	.00	.00	.00	.00	59	129	137	.00	.00
3	110	.00	.00	.00	.00	.00	.00	65	128	99	.00	.00
4	110	.00	.00	.00	.00	.00	.00	80	128	98	.00	.00
5	110	.00	.00	.00	.00	.00	.00	79	126	98	.00	.00
6	110	.00	.00	.00	.00	.00	.00	79	152	99	.00	.00
7	109	.00	.00	.00	.00	.00	.00	78	168	97	.00	.00
8	109	.00	.00	.00	.00	.00	.00	78	168	95	.00	.00
9	85	.00	.00	.00	.00	.00	.00	78	168	99	.00	.00
10	.00	.00	.00	.00	.00	.00	.00	78	166	99	.00	1.6
11	.00	.00	.00	.00	.00	.00	.40	77	164	112	.00	.00
12	.00	.00	.00	.00	.00	.00	.00	77	163	131	.00	.00
13	.00	.00	.00	.00	.00	.00	.19	75	199	130	.00	.00
14	.00	.00	.00	.00	.00	.00	.00	57	198	140	.00	.00
15	43	.00	.00	.00	.00	.00	.00	39	72	140	.00	.00
16	94	.00	.00	.00	.00	.00	.00	39	.00	139	.00	.00
17	93	.00	.00	.00	.00	.00	.00	46	.00	141	.00	.00
18	95	.00	.00	.00	.00	.00	.00	57	.00	142	.00	14
19	97	.00	.00	.00	.00	.00	.00	61	.00	142	.00	25
20	97	.00	.00	.00	.00	.00	.00	76	.00	141	.00	45
21	97	.00	.00	.00	.00	.00	.00	81	.00	140	.00	49
22	98	.00	.00	.00	.00	.00	39	80	.00	140	.00	48
23	69	.00	.00	.00	.00	.00	60	79	44	140	.00	51
24	212	.00	.00	.00	.00	.00	60	91	169	141	.00	53
25	348	.00	.00	.00	.00	.00	60	101	167	141	.00	48
26	345	.00	.00	.00	.00	.00	60	102	169	143	.00	45
27	342	.00	.00	.00	.00	.00	60	101	170	144	.00	41
28	338	.00	.00	.00	.00	.00	60	100	171	143	.00	39
29	342	.00	.00	.00	---	.00	60	99	171	141	.00	46
30	348	.00	.00	.00	---	.00	60	98	169	139	.00	145
31	332	---	.00	.00	---	.00	---	98	---	138	.00	---
TOTAL	4355	.00	.00	.00	.00	.00	519.59	2367	3476	3997	68	650.6
MEAN	140	.00	.00	.00	.00	.00	17.3	76.4	116	129	2.19	21.7
AC-FT	8640	.00	.00	.00	.00	.00	1030	4690	6890	7930	135	1290
MAX	348	.00	.00	.00	.00	.00	60	102	199	168	68	145
MIN	.00	.00	.00	.00	.00	.00	.00	39	.00	95	.00	.00
CAL YR 2001	TOTAL	25423	MEAN	69.7	MAX	348	MIN	.00	AC-FT	50430		
WTR YR 2002	TOTAL	15433.19	MEAN	42.3	MAX	348	MIN	.00	AC-FT	30610		

MAX DISCH: 353 CFS AT 15:15 ON Oct. 24, 2001 GH 3.54 FT. SHIFT .00 FT.  
MAX GH: 3.54 FT. AT 15:15 ON Oct. 24, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



DOLORES RIVER BASIN

DOLORES RIVER BELOW MCPHEE RESERVOIR NEAR DOLORES, CO

LOCATION.--Lat 37°34'33", long 108°34'33", in SE¼SE¼ sec. 2, T.38 N., R.16 W., NMPM, Montezuma County.

DRAINAGE AREA.--550 mi².

GAGE.--Graphic water-stage recorder and a Sutron 8200 DCP on separate floats in a concrete shelter and well. Control is an 15-ft. Parshall flume set in a flat concrete structure that acts as a weir at high flows. Datum of gauge is 6,630 ft above National Geodetic Vertical Datum of 1929, from topographic map.

REMARKS.--Records good. Record is complete. Diversions for irrigation of up to 47,000 acres upstream of gage in the Dolores River basin and diversions for irrigation of up to 4700 acres in the San Juan River Basin. Flow regulated by McPhee Reservoir, capacity 381,000 acre-feet. Station maintained and records developed by Scott D. Brinton.

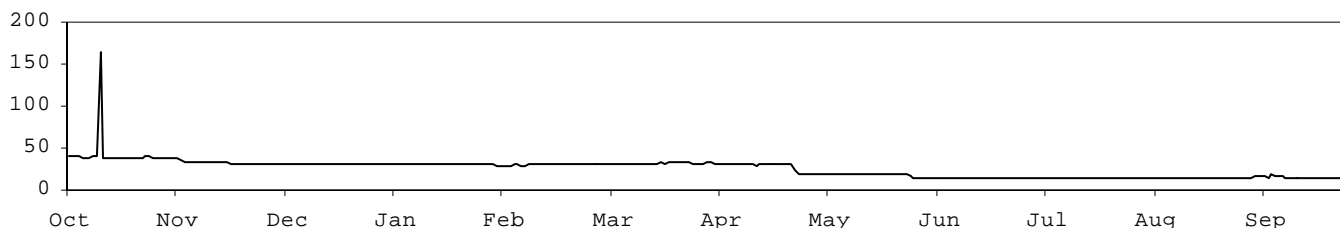
RATING TABLE.--DOLBMCCO03 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	40	37	31	31	29	30	34	19	15	14	14	15
2	40	35	30	31	29	30	34	19	15	14	14	15
3	40	33	31	31	29	30	30	18	15	14	14	15
4	40	33	30	31	29	30	30	18	14	14	14	16
5	39	33	30	31	30	30	30	18	14	14	14	16
6	39	33	31	31	30	30	30	18	15	14	14	16
7	39	33	31	31	29	30	30	18	14	14	14	16
8	40	33	31	31	29	30	30	18	14	14	15	15
9	40	34	31	31	30	30	30	18	14	14	15	18
10	165	34	31	30	30	30	30	18	14	14	15	16
11	38	33	31	30	30	30	30	18	14	14	15	16
12	38	34	31	30	30	30	30	18	14	15	15	16
13	38	34	31	30	30	31	30	19	14	15	15	15
14	38	34	31	30	30	30	30	19	14	15	14	15
15	38	33	31	30	30	30	29	19	14	15	15	15
16	38	31	31	30	30	30	30	19	14	15	15	15
17	38	31	31	30	30	30	30	19	14	15	15	15
18	38	31	31	30	30	32	30	19	14	15	15	15
19	38	31	31	30	30	33	30	19	14	14	15	14
20	38	31	31	30	30	32	30	19	14	14	14	14
21	38	31	31	30	30	33	30	19	14	14	14	14
22	39	30	31	30	30	33	30	19	14	15	14	14
23	40	30	31	30	30	33	30	19	14	14	14	14
24	40	30	31	30	30	33	30	19	14	15	14	14
25	38	30	31	30	30	33	30	19	14	15	15	14
26	37	30	31	30	30	33	24	19	14	15	15	14
27	37	31	31	30	30	33	18	19	14	14	15	14
28	37	31	31	30	30	32	18	19	14	14	15	14
29	37	32	31	30	---	31	18	16	14	14	15	15
30	37	31	31	30	---	31	18	15	14	14	15	15
31	37	---	31	29	---	31	---	15	---	14	15	---
TOTAL	1319	967	958	938	834	964	853	568	424	445	452	450
MEAN	42.5	32.2	30.9	30.3	29.8	31.1	28.4	18.3	14.1	14.4	14.6	15
AC-FT	2620	1920	1900	1860	1650	1910	1690	1130	841	883	897	893
MAX	165	37	31	31	30	33	34	19	15	15	15	18
MIN	37	30	30	29	29	30	18	15	14	14	14	14
CAL YR 2001	TOTAL	17645	MEAN	48.3	MAX	165	MIN	30	AC-FT	35000		
WTR YR 2002	TOTAL	9172	MEAN	25.1	MAX	165	MIN	14	AC-FT	18190		

MAX DISCH: 418 CFS AT 09:00 ON Oct. 10, 2001 GH 3.55 FT. SHIFT -0.07 FT.  
MAX GH: 3.55 FT. AT 09:00 ON Oct. 10, 2001

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.





SAN JUAN RIVER BASIN

BLANCO DIVERSION NEAR PAGOSA SPRINGS, CO

LOCATION.--Lat 37°12'13", long 106°48'35", in NW¼NE¼ sec. 11, T.34 N., R.1 E., NMPM, Archuleta County.

DRAINAGE AREA.--N/A

GAGE.--Graphic water-stage recorder with a Sutron 8200 DCP on separate floats in a concrete shelter and well at a 12 foot Parshall flume.

REMARKS.--Records good. Record is complete. Station maintained by the U.S.B.R. and records developed by Scott D. Brinton.

RATING TABLE.--BLADIVCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

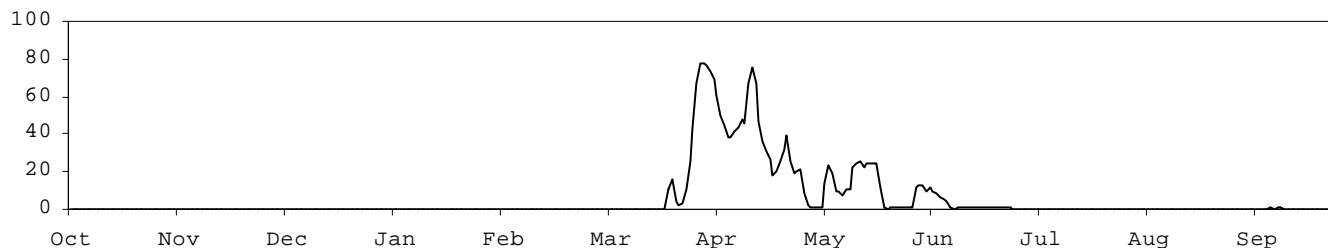
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.00	.00	.00	.00	.00	.00	78	2.5	12	.02	.00	.00
2	.00	.00	.00	.00	.00	.00	77	1.4	13	.00	.00	.00
3	.00	.00	.00	.00	.00	.00	73	1.3	13	.00	.00	.00
4	.00	.00	.00	.00	.00	.00	69	1.2	9.3	.00	.00	.00
5	.00	.00	.00	.00	.00	.00	61	1.2	12	.00	.00	.00
6	.00	.00	.00	.00	.00	.00	50	14	9.7	.00	.00	.00
7	.00	.00	.00	.00	.00	.00	45	23	8.1	.04	.00	.00
8	.00	.00	.00	.00	.00	.00	38	19	6.6	.17	.00	.00
9	.00	.00	.00	.00	.00	.00	38	9.2	5.2	.00	.00	.00
10	.00	.00	.00	.00	.00	.00	41	9.1	3.9	.00	.00	.00
11	.00	.00	.00	.00	.00	.00	44	7.4	.85	.00	.00	1.1
12	.00	.00	.00	.00	.00	.00	48	11	.30	.00	.00	.52
13	.00	.00	.00	.00	.00	.00	46	11	.98	.00	.00	.79
14	.00	.00	.00	.00	.00	.00	67	22	1.1	.00	.00	.68
15	.00	.00	.00	.00	.00	.00	76	24	1.4	.00	.00	.00
16	.00	.00	.00	.00	.00	.00	67	26	1.4	.00	.00	.00
17	.00	.00	.00	.00	.00	.00	47	22	1.4	.00	.00	.00
18	.00	.00	.00	.00	.00	.00	36	24	1.4	.00	.00	.00
19	.00	.00	.00	.00	.00	.00	31	25	1.3	.00	.00	.00
20	.00	.00	.00	.00	.00	.00	27	24	1.4	.00	.00	.00
21	.00	.00	.00	.00	.00	.00	18	24	1.4	.00	.00	.00
22	.00	.00	.00	.00	.00	11	20	12	1.4	.00	.00	.00
23	.00	.00	.00	.00	.00	16	26	1.2	1.3	.00	.00	.00
24	.00	.00	.00	.00	.00	4.2	32	.38	1.3	.00	.00	.00
25	.00	.00	.00	.00	.00	2.4	39	1.3	1.3	.00	.00	.00
26	.00	.00	.00	.00	.00	2.9	26	1.5	1.2	.00	.00	.00
27	.00	.00	.00	.00	.00	11	19	1.4	1.2	.00	.00	.00
28	.00	.00	.00	.00	.00	26	20	1.4	.98	.00	.00	.00
29	.00	.00	.00	.00	---	43	21	1.5	.00	.00	.00	.00
30	.00	.00	.00	.00	---	67	8.9	1.4	.00	.00	.00	.00
31	.00	---	.00	.00	---	78	---	1.4	---	.00	.00	---
TOTAL	.00	.00	.00	.00	.00	261.5	1288.9	325.78	114.41	.23	.00	3.09
MEAN	.00	.00	.00	.00	.00	8.44	43	10.5	3.81	.007	.00	.10
AC-FT	.00	.00	.00	.00	.00	519	2560	646	227	.50	.00	6.1
MAX	.00	.00	.00	.00	.00	78	78	26	13	.17	.00	1.1
MIN	.00	.00	.00	.00	.00	.00	8.9	.38	.00	.00	.00	.00

CAL YR	2001	TOTAL	24053.28	MEAN	65.9	MAX	459	MIN	.00	AC-FT	47710
WTR YR	2002	TOTAL	1993.91	MEAN	5.46	MAX	78	MIN	.00	AC-FT	3950

MAX DISCH: 145 CFS AT 19:30 ON Mar. 30, 2002 GH 1.98 FT. SHIFT .00FT.  
MAX GH: 1.98 FT. AT 19:30 ON Mar. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



SAN JUAN RIVER BASIN

09343300 RIO BLANCO BELOW BLANCO DIVERSION DAM, NEAR PAGOSA SPRINGS, CO

**LOCATION.**--Lat 37°12'13", long 106°48'42", in NW¼ sec. 11, T.34 N., R.1 E., NMPM, Archuleta County, Hydrologic Unit 14080101, on left bank 250 ft downstream from Blanco Diversion Dam, 1.1 mi downstream from Leche Creek, and 12 mi southeast of Pagosa Springs.

**DRAINAGE AREA AND PERIOD OF RECORD.**--69.1 mi<sup>2</sup>. March 1971 to current year.

**GAGE.**--Graphic water-stage recorder with a Sutron 8200 DCP on separate floats in a concrete shelter and well. Control is an 4-ft. Parshall flume set in a flat wide concrete structure that acts as a weir at high flows. The Parshall flume is equipped with a supplemental outside gage. The DCP is the primary record. Datum of gage is 7,858.04 ft above National Geodetic Vertical Datum of 1929 (levels by U. S. Bureau of Reclamation).

**REMARKS.**--Records good except for estimated daily discharges, which are poor, and periods of flow above 65 cfs which are fair. Record is complete. It is reliable except for the following periods: Stage-discharge relationship affected by ice Nov. 21-25 and 27-29; Dec. 4, 6-15, and 17-20, 2001; Jan. 2-3, 7-15, and 17-20; Feb. 1-2, and 18-28; March 2-6, 8-10, and 19-20, 2002. Indefinite stage-discharge relationship due to ice in the flume altering the flow pattern at the inlets Jan. 26-27, 2002. Flows controlled by diversion dam upstream of gage for the Blanco Diversion Tunnel into the Azotea Tunnel, as part of the U.S.B.R. San Juan-Chama project. Station maintained and record developed by Scott D. Brinton.

**RATING TABLE.**--RIOBLACO06 USED FROM 01-OCT-2001 TO 30-SEP-2002

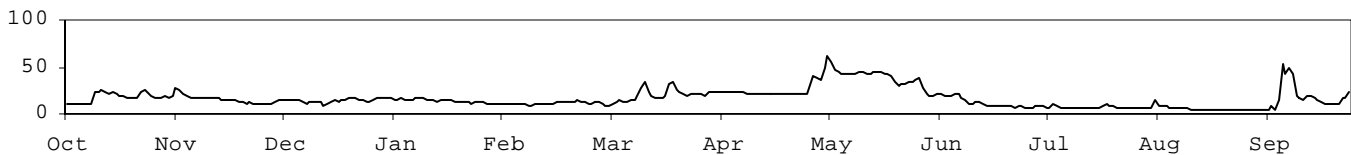
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	11	27	15	16	e10	13	23	40	27	6.6	5.6	3.7
2	10	25	15	e14	e10	e10	24	38	21	6.6	5.9	3.6
3	10	22	15	e14	11	e8.0	23	36	20	8.5	7.1	3.8
4	9.6	19	e14	16	11	e8.0	23	48	19	8.0	7.2	3.9
5	9.7	18	15	15	11	e10	24	61	22	7.7	7.0	3.8
6	9.6	18	e14	15	10	e12	24	55	21	6.8	14	3.7
7	10	17	e12	e14	11	15	24	46	20	7.3	8.7	4.0
8	11	18	e10	e16	11	e12	24	45	20	10	8.1	7.9
9	24	18	e12	e18	9.0	e12	24	43	20	7.6	7.5	5.2
10	24	18	e12	e16	9.2	e14	24	43	21	6.9	6.9	14
11	25	17	e12	e14	9.6	15	23	42	21	6.7	6.4	54
12	23	16	e12	e14	11	20	21	43	17	6.5	6.0	43
13	22	16	e8.0	e14	11	28	21	43	15	6.2	5.8	48
14	23	15	e10	e12	11	33	21	44	11	6.5	5.7	42
15	21	15	e12	e14	11	23	21	44	10	6.4	5.5	20
16	20	15	14	15	11	20	21	42	12	6.6	5.1	16
17	19	15	e12	e14	12	17	21	42	12	6.7	4.8	14
18	18	14	e14	e14	e12	17	21	44	9.6	6.1	4.7	19
19	17	13	e14	e12	e12	e16	21	45	8.5	5.6	4.6	20
20	17	12	e16	e12	e12	e20	21	44	8.9	5.9	4.6	16
21	16	e11	17	13	e12	32	21	43	8.8	6.3	4.8	14
22	23	e12	16	13	e12	33	21	42	8.9	8.5	4.7	12
23	25	e11	14	13	e14	25	21	41	8.5	11	4.5	11
24	24	e10	14	11	e12	24	21	33	7.8	9.5	4.3	11
25	20	e11	12	12	e12	22	22	30	7.6	8.0	4.1	11
26	18	11	e12	13	e10	20	22	32	7.6	7.2	4.0	10
27	18	e10	e14	13	e10	21	22	31	7.2	6.9	3.8	10
28	18	e10	16	11	e12	22	22	33	9.4	6.6	3.7	18
29	19	e12	17	11	---	21	22	35	8.7	5.8	3.8	17
30	17	14	18	11	---	21	33	37	6.8	5.7	3.9	24
31	20	---	17	11	---	20	---	39	---	5.8	3.7	---
TOTAL	551.9	460	425	421	309.8	584	676	1284	417.3	220.5	176.5	483.6
MEAN	17.8	15.3	13.7	13.6	11.1	18.8	22.5	41.4	13.9	7.11	5.69	16.1
AC-FT	1090	912	843	835	614	1160	1340	2550	828	437	350	959
MAX	25	27	18	18	14	33	33	61	27	11	14	54
MIN	9.6	10	8.0	11	9.0	8.0	21	30	6.8	5.6	3.7	3.6

CAL YR 2001 TOTAL 10170.9 MEAN 27.9 MAX 396 MIN 8.0 AC-FT 20170  
 WTR YR 2002 TOTAL 6009.6 MEAN 16.5 MAX 61 MIN 3.6 AC-FT 11920  
 MAX DISCH: 152 CFS AT 11:15 ON Sep. 11, 2002 GH 3.28 FT. SHIFT -0.04 FT.  
 MAX GH: 3.28 FT. AT 11:15 ON Sep. 11, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.

e-Estimated



## SAN JUAN RIVER BASIN

RIO BLANCO AT MOUTH NEAR TRUJILLO, CO

**LOCATION.**--Lat 37°07'40", long 107°02'03", in SW¼SE¼ sec. 2, T.33 N., R.2 W., NMPM, Archuleta County.

**DRAINAGE AREA.**--170 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder and a Sutron 8210 DCP on separate floats in a 42 inch CMP shelter and well. Datum of gauge is 6640 ft above National Geodetic Vertical Datum of 1929, from topographic map.

**REMARKS.**--Records fair except for estimated daily discharges, which are poor. Record complete. It is reliable except for the following periods: Stage-discharge relationship affected by ice Nov. 25-30; Dec. 1-31, 2001; Jan. 1-31; Feb. 1-28; Mar. 1-23, 2002. Indefinite stage-discharge relationship July 30-31; Aug. 1-2, 16-31; Sep. 1-11, 2002. Station maintained by Val Valentine and records developed by Scott D. Brinton.

**RATING TABLE.**--RIOMOUCO03 USED FROM 01-OCT-2001 TO 30-SEP-2002

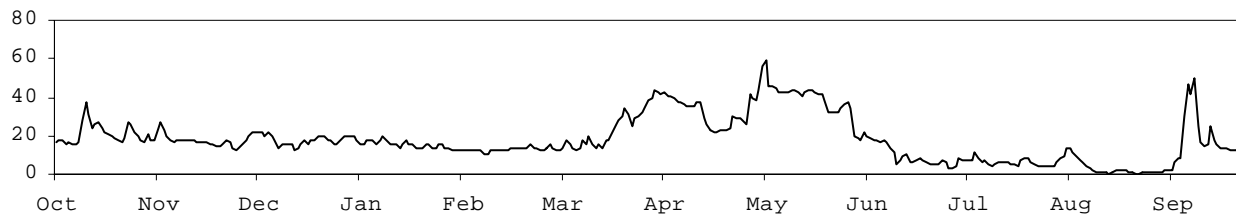
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	17	24	e22	e18	e12	e16	40	42	34	2.9	e4.0	e1.0
2	18	27	e22	e16	e12	e14	44	40	20	3.3	e4.0	e.80
3	18	23	e22	e16	e12	e12	43	38	19	4.5	6.7	e1.0
4	16	20	e20	e18	e12	e12	42	44	18	8.1	8.6	e1.4
5	17	18	e22	e18	e12	e14	43	56	22	7.4	9.8	e1.6
6	16	17	e20	e18	e12	e18	41	59	20	7.1	14	e1.6
7	16	18	e18	e16	e12	e16	41	46	19	7.2	13	e1.6
8	17	18	e14	e18	e12	e14	39	46	18	7.0	11	e6.0
9	28	18	e16	e20	e10	e12	37	45	18	11	9.0	e8.0
10	37	18	e16	e18	e10	e14	37	43	17	8.0	7.4	e8.0
11	31	18	e16	e16	e12	e18	36	43	18	6.4	6.0	e30
12	24	18	e16	e16	e12	e16	35	43	17	7.4	4.1	47
13	26	17	e12	e16	e12	e20	35	43	13	5.5	2.9	42
14	27	17	e14	e14	e12	e16	35	44	11	3.9	1.8	50
15	24	17	e16	e16	e12	e14	37	44	5.4	5.6	1.4	25
16	22	17	e18	e18	e12	e16	37	43	6.9	6.1	e1.2	17
17	21	16	e16	e16	e14	e14	29	41	9.3	6.2	e1.0	15
18	20	16	e18	e16	e14	e18	26	43	10	6.5	e.60	16
19	19	15	e18	e14	e14	e18	23	44	6.7	5.8	e.40	25
20	18	15	e20	e14	e14	e22	22	44	6.5	5.5	e1.0	18
21	17	16	e20	e14	e14	e26	22	43	7.2	5.5	e2.0	16
22	19	18	e20	e16	e14	e28	23	42	8.0	4.0	e2.2	14
23	27	17	e18	e16	e16	e30	23	42	6.8	7.5	e2.0	13
24	26	13	e18	e14	e14	34	23	38	6.4	8.5	e1.8	13
25	22	e12	e16	e14	e14	31	24	32	5.0	8.2	e1.2	12
26	20	e14	e16	e16	e12	25	30	32	4.7	6.5	e.80	12
27	18	e16	e18	e16	e12	29	29	32	5.3	4.9	e.40	12
28	17	e18	e20	e14	e14	30	29	32	5.0	4.6	e.30	16
29	21	e20	e20	e14	---	32	28	34	7.6	4.4	e.60	21
30	18	e22	e20	e12	---	34	26	36	6.2	e4.5	e1.0	26
31	18	---	e20	e12	---	38	---	37	---	e4.5	e1.0	---
TOTAL	655	533	562	490	354	651	979	1291	371	188.5	121.2	471.0
MEAN	21.1	17.8	18.1	15.8	12.6	21	32.6	41.6	12.4	6.08	3.91	15.7
AC-FT	1300	1060	1110	972	702	1290	1940	2560	736	374	240	934
MAX	37	27	22	20	16	38	44	59	34	11	14	50
MIN	16	12	12	12	10	12	22	32	4.7	2.9	.30	.80
CAL YR 2001	TOTAL	20744	MEAN	56.8	MAX	680	MIN	10	AC-FT	41150		
WTR YR 2002	TOTAL	6666.7	MEAN	18.3	MAX	59	MIN	0.3	AC-FT	13220		

MAX DISCH: 123 CFS AT 17:30 ON Sep. 11, 2002 GH 2.21 FT. SHIFT -0.19 FT.

MAX GH: 2.84 FT. AT 19:30 ON Feb. 7, 2002 (Ice Affected GH)

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



SAN JUAN RIVER BASIN

09344000 NAVAJO RIVER AT BANDED PEAK RANCH, NEAR CHROMO, CO

**LOCATION.**--Lat 37°05'07", long 106°41'20", in SE¼NW¼ sec. 24, T.33 N., R.2 E., NMPM, Archuleta County, Hydrologic Unit 14080101, on right bank at downstream side of private bridge on Banded Peak Ranch, 0.5 mi downstream from Cutthroat Creek, 2.8 mi downstream from East Fork of the Navajo River, and 11.2 mi northeast of Chromo, Co.

**DRAINAGE AREA.**--69.8 mi<sup>2</sup>.

**GAGE.**--Graphic water stage-recorder and a Sutron DCP in a 48-inch wood shelter and well. Also equipped with an air temperature sensor. The DCP record is the primary record. Datum of gage is 7,939.3 ft above National Geodetic Vertical Datum of 1929 (river-profile survey). Also equipped with an air temperature sensor.

**REMARKS.**--Records fair except for estimated daily discharges, which are poor. Record is complete. It is reliable except for the following periods: Stage-discharge relationship affected by ice Nov. 21, 24 and 27-30; Dec. 1, 5-10, 13-20, 23-26 and 28-29, 2001; Jan. 1-8, 11-15, 18-22, 24-27 and 31; Feb. 1-16, 20, 22-23 and 25-28; Mar. 2-6, 8-10, 17 and 20, 2002. Station maintained and records developed by Scott D. Brinton.

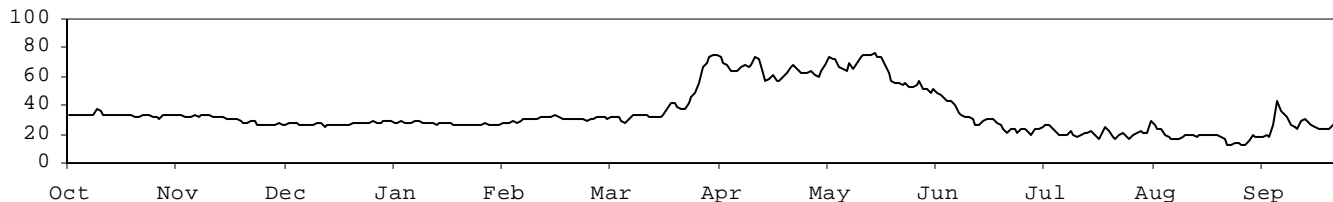
**RATING TABLE.**--NAVBANCO23 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	34	34	e27	e29	e26	32	69	64	57	24	19	13
2	34	33	27	e28	e28	e32	73	61	52	21	21	13
3	34	32	28	e28	e28	e32	75	60	51	20	22	15
4	34	32	28	e29	e28	e31	75	64	48	24	21	19
5	33	32	e28	e28	e29	e32	74	68	52	23	21	18
6	33	33	e27	e28	e28	e32	70	74	48	25	29	18
7	33	32	e27	e28	e29	32	68	72	47	27	26	18
8	34	33	e26	e29	e30	e29	64	72	44	26	24	20
9	38	34	e27	29	e30	e28	64	66	43	24	23	18
10	36	33	e27	28	e31	e30	64	65	43	21	20	27
11	34	32	28	e28	e31	33	66	64	40	19	18	43
12	34	32	28	e28	e31	33	68	69	35	19	16	36
13	34	32	e25	e28	e32	34	66	65	33	20	16	35
14	34	32	e26	e27	e32	34	68	70	32	22	16	32
15	33	31	e27	e28	e32	33	73	73	32	20	18	27
16	33	31	e26	28	e32	32	72	75	30	18	19	25
17	33	31	e27	28	33	e32	62	75	27	20	19	24
18	33	31	e27	e28	32	32	57	75	26	21	19	29
19	33	29	e27	e26	31	32	59	77	29	21	18	30
20	32	28	e27	e27	e30	e34	61	74	31	22	19	28
21	32	e28	28	e27	31	37	57	73	30	20	20	26
22	34	29	28	e27	e30	42	57	68	31	17	19	25
23	34	29	e28	27	e30	42	60	63	28	19	19	24
24	33	e26	e28	e26	31	39	62	57	26	25	19	24
25	32	26	e28	e27	e30	38	66	55	24	22	19	24
26	32	26	e28	e27	e29	38	68	56	21	18	18	24
27	31	e26	29	e27	e30	42	65	54	23	16	16	26
28	33	e26	e28	28	e30	46	62	55	24	19	12	29
29	33	e27	e28	27	---	49	63	53	21	21	13	29
30	33	e28	29	27	---	56	62	53	24	18	14	31
31	34	---	29	e27	---	66	---	54	---	16	14	---
TOTAL	1037	908	851	857	844	1134	1970	2024	1052	648	587	750
MEAN	33.5	30.3	27.5	27.6	30.1	36.6	65.7	65.3	35.1	20.9	18.9	25
AC-FT	2060	1800	1690	1700	1670	2250	3910	4010	2090	1290	1160	1490
MAX	38	34	29	29	33	66	75	77	57	27	29	43
MIN	31	26	25	26	26	28	57	53	21	16	12	13
CAL YR 2001	TOTAL	38356	MEAN	105	MAX	627	MIN	18	AC-FT	76080		
WTR YR 2002	TOTAL	12662	MEAN	34.7	MAX	77	MIN	12	AC-FT	25120		

MAX DISCH: 90 CFS AT 23:45 ON May 17, 2002 GH 2.27 FT. SHIFT 0.13 FT.  
MAX GH: 2.62 FT. AT 09:00 ON Mar. 9, 2002 (Ice Affected)

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.  
e-Estimated



SAN JUAN RIVER BASIN

OSO DIVERSION NEAR CHROMO, CO

LOCATION.--Lat 37°01'49", long 106°44'14", in NE¼NE¼ sec. 9, T.32 N., R.2 E., NMPM, Archuleta County.

DRAINAGE AREA.--N/A

GAGE.--Graphic water-stage recorder and a Sutron 8200 DCP on separate floats in a concrete shelter and well at a 15 foot Parshall flume.

REMARKS.--Records good. Record is complete. Station maintained by the U.S.B.R. and record developed by Scott D. Brinton.

RATING TABLE.--OSODIVCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

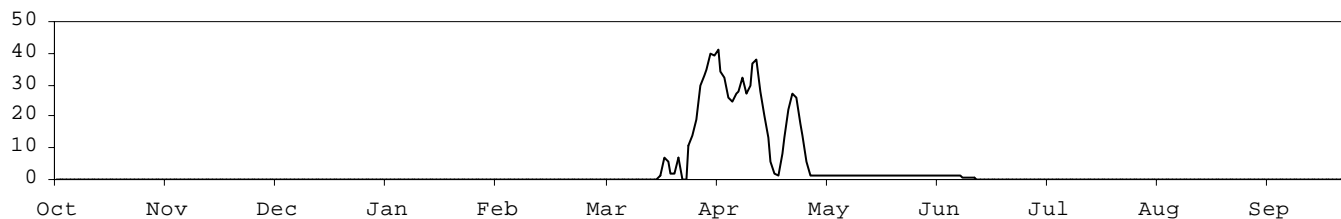
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.00	.00	.00	.00	.00	.00	33	1.2	1.0	.00	.00	.00
2	.00	.00	.00	.00	.00	.00	35	1.5	1.0	.00	.00	.00
3	.00	.00	.00	.00	.00	.00	40	1.4	1.0	.00	.00	.00
4	.00	.00	.00	.00	.00	.00	39	1.4	1.0	.00	.00	.00
5	.00	.00	.00	.00	.00	.00	41	1.4	1.0	.00	.00	.00
6	.00	.00	.00	.00	.00	.00	34	1.4	1.0	.00	.00	.00
7	.00	.00	.00	.00	.00	.00	32	1.3	1.0	.00	.00	.00
8	.00	.00	.00	.00	.00	.00	26	1.4	1.0	.00	.00	.00
9	.00	.00	.00	.00	.00	.00	25	1.4	1.0	.00	.00	.00
10	.00	.00	.00	.00	.00	.00	27	1.2	1.0	.00	.00	.00
11	.00	.00	.00	.00	.00	.00	28	1.2	1.0	.00	.00	.00
12	.00	.00	.00	.00	.00	.00	32	1.2	1.0	.00	.00	.00
13	.00	.00	.00	.00	.00	.00	27	1.2	.93	.00	.00	.00
14	.00	.00	.00	.00	.00	.00	30	1.2	.82	.00	.00	.00
15	.00	.00	.00	.00	.00	.00	37	1.2	.72	.00	.00	.00
16	.00	.00	.00	.00	.00	.00	38	1.2	.64	.00	.00	.00
17	.00	.00	.00	.00	.00	.00	28	1.2	.19	.00	.00	.00
18	.00	.00	.00	.00	.00	.00	20	1.2	.00	.00	.00	.00
19	.00	.00	.00	.00	.00	.00	13	1.2	.00	.00	.00	.00
20	.00	.00	.00	.00	.00	1.4	5.5	1.2	.00	.00	.00	.00
21	.00	.00	.00	.00	.00	6.7	1.9	1.2	.00	.00	.00	.00
22	.00	.00	.00	.00	.00	5.6	1.0	1.2	.00	.00	.00	.00
23	.00	.00	.00	.00	.00	1.6	8.5	1.2	.00	.00	.00	.00
24	.00	.00	.00	.00	.00	1.6	13	1.2	.00	.00	.00	.00
25	.00	.00	.00	.00	.00	6.7	22	1.2	.00	.00	.00	.00
26	.00	.00	.00	.00	.00	.22	27	1.2	.00	.00	.00	.00
27	.00	.00	.00	.00	.00	.29	26	1.1	.00	.00	.00	.00
28	.00	.00	.00	.00	.00	11	18	1.0	.00	.00	.00	.00
29	.00	.00	.00	.00	---	14	14	1.0	.00	.00	.00	.00
30	.00	.00	.00	.00	---	19	5.9	1.0	.00	.00	.00	.00
31	.00	---	.00	.00	---	30	---	1.0	---	.00	.00	---
TOTAL	.00	.00	.00	.00	.00	98.11	727.8	37.9	15.30	.00	.00	.00
MEAN	.00	.00	.00	.00	.00	3.16	24.3	1.22	.51	.00	.00	.00
AC-FT	.00	.00	.00	.00	.00	195	1440	75	30	.00	.00	.00
MAX	.00	.00	.00	.00	.00	30	41	1.5	1.0	.00	.00	.00
MIN	.00	.00	.00	.00	.00	.00	1.0	1.0	.00	.00	.00	.00

CAL YR 2001 TOTAL 27023.88 MEAN 74.0 MAX 513 MIN .00 AC-FT 53600  
WTR YR 2002 TOTAL 879.11 MEAN 2.41 MAX 41 MIN .00 AC-FT 1740

MAX DISCH: 139 CFS AT 22:45 ON Apr. 23, 2002 GH 1.73 FT. SHIFT .00 FT.  
MAX GH: 1.73 FT. AT 22:45 ON Apr. 23, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



SAN JUAN RIVER BASIN

09344400 NAVAJO RIVER BELOW OSO DIVERSION DAM, NEAR CHROMO, CO

**LOCATION.**--Lat 37°01'49", long 106°44'14", in NE¼NW¼ sec. 9, T.32 N., R.2 E., NMPM, Archuleta County, Hydrologic Unit 14080101, on left bank 600 ft downstream from Oso Diversion Dam, 5.8 mi east of Chromo, and 6.1 mi upstream from Little Navajo River.

**DRAINAGE AREA AND PERIOD OF RECORD.**--100.5 mi<sup>2</sup>. March 1971 to current year.

**GAGE.**--Graphic water-stage recorder with a Sutron 8200 DCP on separate floats in a concrete shelter and well. Control is an 8-ft. Parshall flume set in a flat wide concrete structure that acts as a weir at high flows. The Parshall flume is equipped with a supplemental outside gage. The DCP is the primary record. Datum of gage is 7,665.30 ft above mean sea level.

**REMARKS.**--Records good, except for estimated flows, which are poor, and periods of flow above 140 cfs, which are fair. Record is complete. The record is reliable except for the following periods: Stage-discharge relationship affected by ice Nov. 26-29; Dec. 2-31, 2001; Jan. 1-10 and 13-27; Feb. 1-16 and 27-28; Mar. 2-5, 2002. Station maintained by the U.S.B.R. and records developed by Scott D. Brinton.

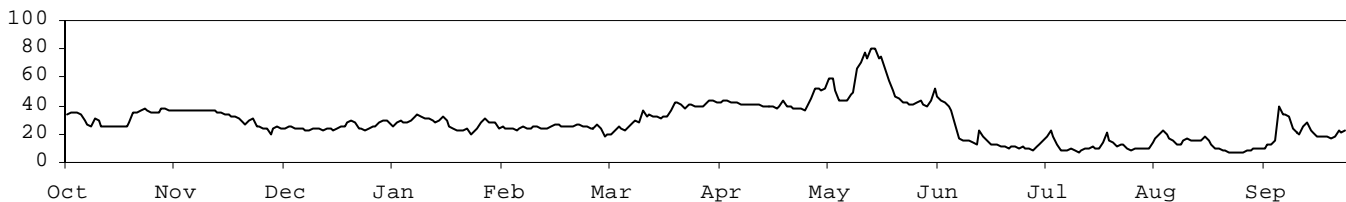
**RATING TABLE.**--NAVOSOCO03 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	34	37	24	e28	e24	27	42	45	44	10	9.8	7.1
2	35	37	e24	e26	e26	e24	44	52	41	9.6	10	8.1
3	35	36	e26	e28	e24	e18	43	52	39	8.7	10	8.8
4	35	36	e26	e30	e24	e20	42	51	44	11	9.4	10
5	34	36	e24	e28	e24	e20	42	52	52	12	9.3	9.6
6	29	36	e24	e28	e22	22	43	59	46	15	14	9.6
7	27	36	e24	e30	e24	26	43	59	44	18	17	9.9
8	26	37	e22	e32	e26	24	42	51	42	22	20	12
9	31	37	e22	e34	e24	22	42	44	39	18	23	12
10	29	36	e24	e32	e24	26	42	44	36	12	20	16
11	26	36	e24	31	e26	28	41	43	27	8.3	17	40
12	26	36	e24	31	e26	30	41	48	17	8.5	15	34
13	26	35	e22	e30	e24	28	41	49	15	8.3	13	34
14	26	35	e24	e28	e24	37	41	66	15	9.5	12	32
15	25	34	e24	e30	e24	33	41	71	15	9.0	15	24
16	25	34	e22	e32	e26	34	41	77	14	7.7	17	21
17	25	33	e24	e30	27	33	40	73	13	8.6	16	20
18	25	33	e26	e26	27	32	39	80	22	9.5	16	26
19	28	31	e26	e24	26	31	39	80	18	9.6	16	28
20	35	28	e28	e22	26	32	40	73	15	11	16	23
21	35	27	e30	e22	26	33	38	75	13	10	19	21
22	37	30	e28	e22	25	36	39	66	13	10	16	19
23	38	31	e24	e24	27	42	43	58	12	14	13	19
24	37	26	e24	e20	27	42	39	51	11	21	9.5	18
25	35	26	e22	e22	26	41	39	46	11	16	9.2	18
26	35	e24	e24	e24	25	38	38	45	10	14	9.0	17
27	35	e24	e26	e28	e24	41	38	42	11	11	8.6	18
28	38	e20	e26	31	e24	41	38	42	11	12	6.6	22
29	38	e24	e28	28	---	39	37	41	9.3	12	7.2	21
30	36	26	e30	28	---	40	39	41	11	9.9	7.3	23
31	37	---	e30	28	---	40	---	42	---	8.4	7.1	---
TOTAL	983	957	776	857	702	980	1217	1718	710.3	364.6	408	581.1
MEAN	31.7	31.9	25	27.6	25.1	31.6	40.6	55.4	23.7	11.8	13.2	19.4
AC-FT	1950	1900	1540	1700	1390	1940	2410	3410	1410	723	809	1150
MAX	38	37	30	34	27	42	44	80	52	22	23	40
MIN	25	20	22	20	22	18	37	41	9.3	7.7	6.6	7.1
CAL YR 2001	TOTAL	17745	MEAN	48.6	MAX	294	MIN	20	AC-FT	35200		
WTR YR 2002	TOTAL	10254	MEAN	28.1	MAX	80	MIN	6.6	AC-FT	20340		

MAX DISCH: 94 CFS AT 01:45 ON May 19, 2002 GH 1.98 FT. SHIFT -0.03 FT.  
MAX GH: 2.63 FT. AT 15:00 ON Feb. 11, 2002 (ICE AFFECTED GH)

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.  
e-Estimated



## SAN JUAN RIVER BASIN

## LITTLE OSO DIVERSION NEAR CHROMO, CO

**LOCATION.**--Lat 37°04'32", long 106°48'38", in SW¼SE¼ sec. 23, T.33 N., R.1 E., NMPM, Archuleta County.

**DRAINAGE AREA.**--N/A. March 1971 to current year.

**GAGE.**--Graphic water-stage recorder with Sutron 8200 DCP on separate floats in a concrete shelter at a 6 foot Parshall flume. The DCP is the primary record.

**REMARKS.**--Records good. Record complete. Station maintained by the U.S.B.R. and record developed by Scott D. Brinton.

**RATING TABLE.**--LOSODVCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

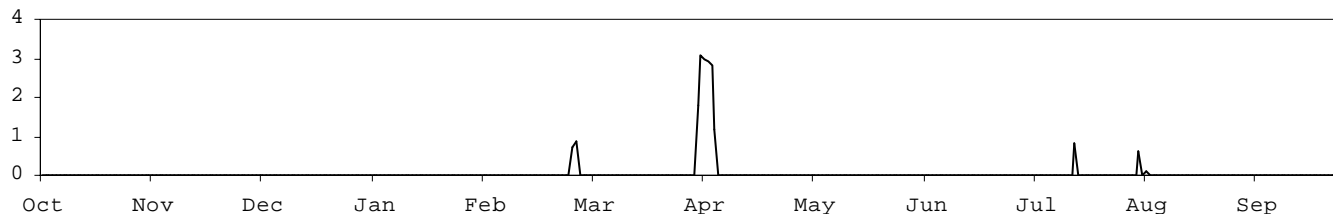
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
2	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
3	.00	.00	.00	.00	.00	.00	1.8	.00	.00	.00	.00	.00
4	.00	.00	.00	.00	.00	.00	3.1	.00	.00	.00	.00	.00
5	.00	.00	.00	.00	.00	.00	3.0	.00	.00	.00	.61	.00
6	.00	.00	.00	.00	.00	.00	2.9	.00	.00	.00	.00	.00
7	.00	.00	.00	.00	.00	.00	2.8	.00	.00	.00	.11	.00
8	.00	.00	.00	.00	.00	.00	1.2	.00	.00	.00	.00	.00
9	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
10	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
11	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
12	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
13	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
14	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
15	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
16	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
17	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
18	.00	.00	.00	.00	.00	.00	.00	.00	.00	.80	.00	.00
19	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
20	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
21	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
22	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
23	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
24	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
25	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
26	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
27	.00	.00	.00	.00	.71	.00	.00	.00	.00	.00	.00	.00
28	.00	.00	.00	.00	.88	.00	.00	.00	.00	.00	.00	.00
29	.00	.00	.00	.00	---	.00	.00	.00	.00	.00	.00	.00
30	.00	.00	.00	.00	---	.00	.00	.00	.00	.00	.00	.00
31	.00	---	.00	.00	---	.00	---	.00	---	.00	.00	---
TOTAL	.00	.00	.00	.00	1.59	.00	14.8	.00	.00	.80	.72	.00
MEAN	.00	.00	.00	.00	.057	.00	.49	.00	.00	.026	.023	.00
AC-FT	.00	.00	.00	.00	3.2	.00	29	.00	.00	1.6	1.4	.00
MAX	.00	.00	.00	.00	.88	.00	3.1	.00	.00	.80	.61	.00
MIN	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00

CAL YR	2001	TOTAL	1965.56	MEAN	5.39	MAX	63	MIN	.00	AC-FT	3900
WTR YR	2002	TOTAL	17.91	MEAN	.049	MAX	3.1	MIN	.00	AC-FT	36

MAX DISCH: 11.8 CFS AT 11:45 ON Aug. 5, 2002 GH 0.64 FT. SHIFT .00 FT.  
MAX GH: 0.64 FT. AT 11:45 ON Aug. 5, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



SAN JUAN RIVER BASIN

09345200 LITTLE NAVAJO RIVER BELOW LITTLE OSO DIVERSION DAM NEAR CHROMO, CO

**LOCATION.**--Lat 37°04'32", long 106°48'38", in SW¼SE¼ sec. 23, T.33 N., R.1 E., NMPM, Archuleta County, on right bank downstream from Little Oso Diversion Dam.

**DRAINAGE AREA AND PERIOD OF RECORD.**--N/A, December 5, 1996 to current year.

**GAGE.**--Graphic water stage-recorder and a Sutron 8200 DCP on separate floats in a wooden shelter and concrete well. Supplemental outside staff gage. Control is a 5-foot Parshall flume set in concrete. The DCP is the primary record.

**REMARKS.**--Records fair, except for estimated daily discharges, which are poor. Record is complete. It is reliable except for the following periods: Stage-discharge relationship affected by ice Nov. 28-30; Dec. 1-31, 2001; Jan. 1-31; Feb. 1-26; March 1-7, 15-16, 22-23 and 26-29, 2002. Flows controlled by diversion dam upstream of gage for the Little Oso Diversion Tunnel into the Azotea Tunnel, as part of the U.S.B.R. San Juan-Chama project. Station maintained by Sherry Schutz and Val Valentine and records developed by Scott D. Brinton.

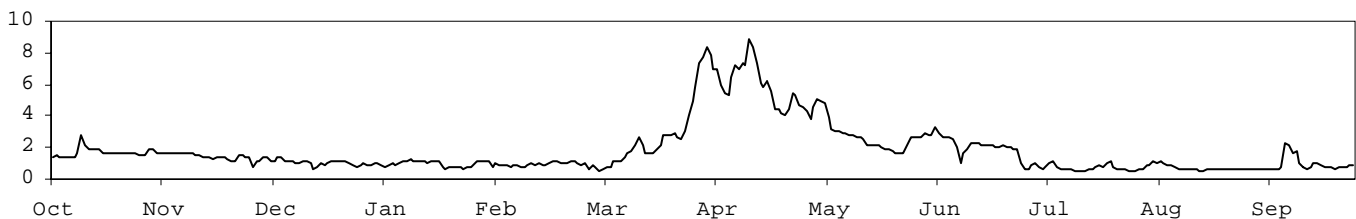
**RATING TABLE.**--LITOSOCO1 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1.4	1.7	e1.2	e.90	e.80	e.90	7.7	3.8	2.7	.68	.60	.60
2	1.5	1.6	e1.2	e.80	e1.0	e.80	8.4	4.6	2.9	.85	.60	.60
3	1.4	1.6	e1.4	e.90	e.90	e.50	7.9	5.1	2.8	.97	.85	.60
4	1.4	1.6	e1.4	e1.0	e.90	e.60	7.0	5.0	2.8	.78	.87	.60
5	1.4	1.6	e1.2	e.90	e.90	e.70	7.0	4.8	3.3	.69	1.1	.60
6	1.4	1.6	e1.2	e1.0	e.80	e.80	6.0	3.9	2.9	.73	.96	.60
7	1.4	1.6	e1.2	e1.1	e.90	e1.1	5.5	3.2	2.7	.97	1.1	.60
8	1.6	1.6	e1.0	e1.2	e.90	1.1	5.3	3.1	2.7	1.1	.98	.60
9	2.8	1.6	e1.0	e1.3	e.80	1.2	6.5	3.1	2.6	.78	.93	.60
10	2.2	1.5	e1.2	e1.2	e.80	1.4	7.2	2.9	2.5	.67	.88	.81
11	1.9	1.5	e1.2	e1.2	e.90	1.6	7.0	2.9	2.0	.60	.78	2.3
12	1.9	1.4	e1.0	e1.2	e1.0	1.8	7.4	2.8	.99	.60	.67	2.2
13	1.9	1.4	e.60	e1.2	e.90	2.2	7.2	2.8	1.6	.57	.63	1.6
14	1.9	1.4	e.80	e1.0	e1.0	2.7	8.8	2.6	1.9	.49	.60	1.8
15	1.7	1.3	e1.0	e1.1	e.90	e2.2	8.3	2.6	2.3	.52	.60	.96
16	1.7	1.4	e.90	e1.2	e.90	e1.6	7.3	2.5	2.3	.56	.58	.79
17	1.7	1.4	e1.0	e1.1	e1.0	1.7	6.1	2.2	2.3	.56	.57	.69
18	1.7	1.4	e1.1	e.80	e1.1	1.6	5.8	2.1	2.2	.58	.56	.73
19	1.6	1.3	e1.1	e.60	e1.1	1.9	6.2	2.1	2.1	.60	.54	.96
20	1.6	1.2	e1.2	e.70	e1.0	2.2	5.6	2.1	2.1	.80	.58	.97
21	1.6	1.2	e1.2	e.70	e1.0	2.8	4.4	2.0	2.1	.83	.60	.87
22	1.7	1.5	e1.1	e.80	e1.0	e2.8	4.4	1.9	2.0	.78	.67	.78
23	1.7	1.5	e1.0	e.70	e1.1	e2.8	4.2	1.9	2.0	.99	.69	.78
24	1.6	1.4	e.90	e.60	e1.1	2.9	4.0	1.8	2.1	1.2	.69	.75
25	1.5	1.4	e.80	e.70	e1.0	2.6	4.4	1.7	2.0	.79	.69	.69
26	1.5	.78	e.90	e.80	e.90	e2.5	5.5	1.6	2.0	.67	.69	.71
27	1.5	1.2	e1.0	e1.0	.95	e3.0	5.3	1.6	1.9	.60	.64	.73
28	1.9	e1.2	e.90	e1.1	.58	e4.0	4.7	2.2	1.9	.60	.60	.82
29	1.9	e1.4	e.90	e1.2	---	e5.0	4.6	2.7	.96	.56	.60	.88
30	1.7	e1.4	e1.0	e1.2	---	5.8	4.3	2.6	.59	.49	.60	.88
31	1.7	---	e1.0	e1.1	---	7.3	---	2.6	---	.53	.60	---
TOTAL	52.4	42.68	32.60	30.30	26.13	70.10	184	86.8	65.24	22.14	22.05	27.10
MEAN	1.69	1.42	1.05	.98	.93	2.26	6.13	2.8	2.17	.71	.71	.90
AC-FT	104	85	65	60	52	139	365	172	129	44	44	54
MAX	2.8	1.7	1.4	1.3	1.1	7.3	8.8	5.1	3.3	1.2	1.1	2.3
MIN	1.4	.78	.60	.60	.58	.50	4.0	1.6	.59	.49	.54	.60
CAL YR 2001	TOTAL	2512.03	MEAN	6.88	MAX	49	MIN	.43	AC-FT	4980		
WTR YR 2002	TOTAL	661.54	MEAN	1.81	MAX	8.8	MIN	.49	AC-FT	1310		

MAX DISCH: 20 CFS AT 09:30 ON Apr. 30, 2002 GH 0.98 FT. SHIFT 0.02 FT.  
MAX GH: 0.98 FT. AT 09:30 ON Apr. 30, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.  
e-Estimated





## SAN JUAN RIVER BASIN

09362750 FLORIDA RIVER ABOVE LEMON RESERVOIR NEAR DURANGO, CO

**LOCATION.**--Lat 37°25'40", long 107°40'39", in SW¼NE¼ sec. 31, T.37 N., R.7 W., NMPM, La Plata County.

**DRAINAGE AREA.**--51.3 mi<sup>2</sup>.

**GAGE.**--Graphic water-stage recorder with a Sutron 8200 DCP with a shaft encoder on a separate float in a 42" corrugated metal shelter and well. Datum of gauge is 8,160 ft above National Geodetic Vertical Datum of 1929, from topographic map.

**REMARKS.**--Records good, except for estimated daily discharges, which are poor. Record is complete. It is reliable except for the following periods: Stage-discharge relationship affected by ice Nov. 29; Dec. 13, 16-17, 19-20, 22-26, 28, 2001; Jan. 1-3, 5-6, 11, 14-15, 17-22, 24, 31; Feb. 1-13, 15-16, 19, 21-23, 27-28; Mar. 2-6, 9-10, 2002. Stage-discharge relationship affected by ramp flume construction Mar. 18, 27-31 and Apr. 1-2, 2002. Diversions for irrigation of up to 80 acres upstream of gage. Station maintained and records developed by Scott D. Brinton.

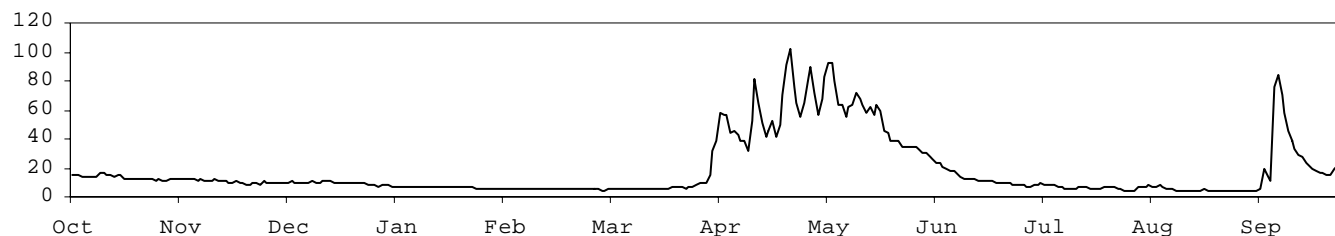
**RATING TABLE.**--FLOALECO04 USED FROM 01-OCT-2001 TO 31-MAR-2002  
FLOALECO05 USED FROM 01-APR-2002 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	15	12	10	e7.5	e5.0	5.3	e10	90	33	7.7	4.8	4.2
2	15	12	10	e7.0	e5.5	e4.5	e15	72	30	7.4	4.8	4.0
3	15	12	11	e7.0	e5.0	e4.5	32	57	30	7.4	7.3	4.0
4	14	12	10	7.3	e5.5	e5.0	39	67	27	8.4	7.3	4.1
5	14	12	10	e7.0	e5.0	e5.0	58	83	26	8.3	7.2	4.2
6	14	11	9.8	e7.0	e5.0	e5.0	56	92	24	9.0	7.7	4.1
7	14	12	10	7.2	e5.5	5.0	56	92	23	8.1	6.5	5.0
8	14	11	10	7.0	e5.5	4.9	44	80	21	7.7	7.2	19
9	16	11	11	7.0	e5.5	e5.0	45	64	20	7.9	7.8	14
10	16	11	10	7.0	e5.0	e5.0	43	64	18	8.0	6.3	11
11	15	12	10	e7.0	e5.0	4.9	39	55	18	7.1	5.4	76
12	15	11	11	7.0	e5.5	5.2	38	62	17	6.6	5.2	84
13	14	11	e11	7.0	e5.5	5.4	32	63	14	5.8	4.9	71
14	15	11	11	e7.0	5.3	5.6	53	72	13	5.5	4.4	58
15	15	10	10	e7.0	e5.0	5.4	81	68	13	5.7	4.3	45
16	13	10	e10	7.2	e5.0	5.7	65	63	12	5.9	4.1	38
17	13	11	e10	e7.0	5.2	5.6	51	58	12	6.6	3.9	33
18	13	10	10	e7.0	5.1	e5.2	42	62	11	6.5	3.8	29
19	13	9.1	e10	e6.5	e5.0	5.5	46	57	11	6.7	3.9	27
20	13	8.8	e10	e6.5	5.1	5.4	53	63	11	5.9	4.0	24
21	13	8.5	9.8	e6.5	e5.0	5.9	41	59	11	5.6	4.7	22
22	13	9.9	e9.5	e6.5	e5.0	6.4	50	46	11	5.5	5.1	19
23	13	9.3	e9.0	6.8	e5.0	6.7	71	44	10	6.1	4.7	18
24	12	8.7	e9.0	e6.5	5.5	6.5	91	39	9.8	6.9	4.4	17
25	11	11	e8.5	6.2	5.5	6.3	102	39	9.1	6.9	4.0	16
26	12	9.3	e8.0	5.9	5.7	6.1	76	38	9.0	7.4	3.8	15
27	11	9.8	7.8	5.8	e5.5	e6.5	65	34	9.0	6.3	3.7	15
28	11	9.4	e7.5	5.6	e5.5	e7.0	55	34	8.8	5.6	3.7	19
29	12	e9.5	7.8	5.5	---	e8.0	65	34	8.5	5.0	4.0	21
30	12	10	7.7	5.5	---	e9.0	81	34	7.8	4.8	4.8	24
31	12	---	7.7	e5.0	---	e9.0	---	34	---	4.7	4.5	---
TOTAL	418	315.3	297.1	206	146.9	180.5	1595	1819	478	207	158.2	744.6
MEAN	13.5	10.5	9.58	6.65	5.25	5.82	53.2	58.7	15.9	6.68	5.1	24.8
AC-FT	829	625	589	409	291	358	3160	3610	948	411	314	1480
MAX	16	12	11	7.5	5.7	9.0	102	92	33	9.0	7.8	84
MIN	11	8.5	7.5	5.0	5.0	4.5	10	34	7.8	4.7	3.7	4.0
CAL YR 2001	TOTAL	31294.3	MEAN	85.7	MAX	665	MIN	6.0	AC-FT	62070		
WTR YR 2002	TOTAL	6565.6	MEAN	18.0	MAX	102	MIN	3.7	AC-FT	13020		

MAX DISCH: 171 CFS AT 10:30 ON Sep. 11, 2002 GH 2.45 FT. SHIFT 0.00 FT.  
MAX GH: 2.45 FT. AT 10:30 ON Sep. 11, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.  
e-Estimated



SAN JUAN RIVER BASIN

FLORIDA RIVER BELOW LEMON RESERVOIR NEAR DURANGO, CO

LOCATION.--Lat 37°22'50", long 107°39'43", in NE¼NW¼ sec. 20, T.36 N., R.7 W., NMPM, La Plata County.

DRAINAGE AREA.--69.1 mi<sup>2</sup>.

GAGE.--Water-stage recorder with a Sutron 8200 DCP with a shaft encoder on a separate float in a 42" corrugated metal shelter and well and a concrete control. The DCP record is the primary record. Datum of gauge is 7,960 ft above National Geodetic Vertical Datum of 1929, from topographic map.

REMARKS.--Records good. Record complete. Diversions for irrigation of up to 80 acres upstream of gage. Flow regulated by Lemon Reservoir, capacity 40,100 acre-feet. Station maintained and records developed by Scott D. Brinton.

RATING TABLE.--FLOBLECO02 USED FROM 01-OCT-2001 TO 30-SEP-2002

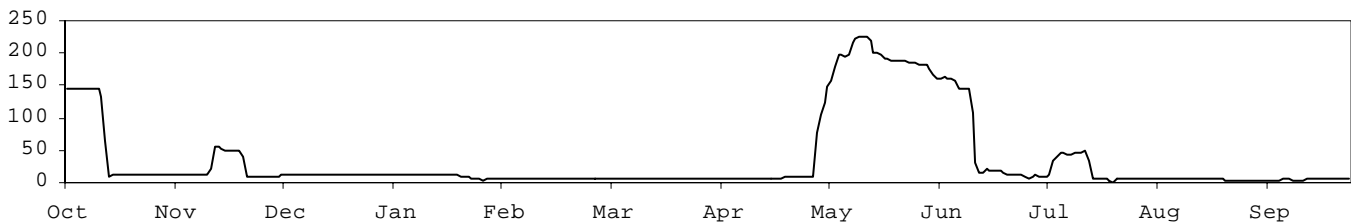
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	146	11	11	11	6.3	6.6	6.6	9.0	182	6.3	7.0	4.4
2	146	11	11	11	6.3	6.6	6.6	77	182	8.7	7.0	4.4
3	146	11	11	11	6.3	6.6	6.6	105	177	11	7.0	4.4
4	146	11	11	11	6.3	6.6	6.6	125	166	10	7.0	4.5
5	146	11	11	11	6.3	6.6	6.6	148	162	9.3	7.0	4.4
6	144	11	11	11	6.3	6.7	6.6	156	159	9.1	7.0	4.4
7	144	11	11	11	6.3	6.8	6.6	178	164	12	7.0	4.5
8	144	11	11	11	6.3	7.0	6.6	197	162	35	7.0	4.4
9	144	11	11	11	6.3	7.0	6.6	196	161	41	7.0	4.4
10	144	11	11	11	6.3	6.8	6.6	195	157	45	7.0	4.5
11	132	21	11	11	6.3	6.6	6.4	199	146	45	7.0	4.7
12	66	57	11	11	6.3	6.6	6.6	216	146	43	7.0	4.7
13	10	57	11	11	6.3	6.6	6.6	221	146	42	6.6	4.7
14	11	52	11	11	6.3	6.6	6.6	226	144	47	5.7	4.4
15	11	49	11	11	6.3	6.6	6.3	224	109	47	5.2	4.4
16	11	49	11	11	6.4	6.6	6.3	224	31	47	5.9	4.5
17	11	49	11	11	6.5	6.6	6.3	219	16	48	4.8	4.6
18	11	49	11	11	6.6	6.6	6.3	201	14	33	4.8	4.8
19	11	50	11	11	6.6	6.6	6.3	201	22	7.4	4.8	4.8
20	11	41	11	11	6.6	6.6	6.3	196	18	7.4	4.9	4.8
21	11	10	11	9.3	6.6	6.6	6.3	192	18	7.4	5.4	4.8
22	11	10	11	8.0	6.6	6.8	6.7	191	18	7.5	5.2	4.8
23	11	10	11	8.3	6.6	6.7	8.3	189	18	7.5	5.2	4.8
24	11	10	11	7.2	6.6	6.6	8.3	189	16	3.3	5.2	4.8
25	11	10	11	6.3	6.6	6.6	8.3	187	12	.65	5.2	4.8
26	11	10	11	5.4	6.6	6.6	8.3	187	12	7.0	4.5	4.8
27	11	10	11	4.6	6.6	6.6	8.3	187	12	7.4	4.3	4.8
28	11	10	11	4.8	6.6	6.6	8.3	186	12	7.4	4.2	4.8
29	11	10	11	4.8	---	6.6	8.3	184	12	7.3	4.1	4.8
30	11	10	11	5.6	---	6.6	8.4	184	8.6	7.2	4.4	4.8
31	11	---	11	6.3	---	6.6	---	182	---	7.0	4.4	---
TOTAL	1856	684	341	290.6	180	206.2	209.5	5571	2602.6	623.85	178.8	138.7
MEAN	59.9	22.8	11	9.37	6.43	6.65	6.98	180	86.8	20.1	5.77	4.62
AC-FT	3680	1360	676	576	357	409	416	11050	5160	1240	355	275
MAX	146	57	11	11	6.6	7.0	8.4	226	182	48	7.0	4.8
MIN	10	10	11	4.6	6.3	6.6	6.3	9.0	8.6	.65	4.1	4.4

CAL YR	2001	TOTAL	33260.9	MEAN	91.1	MAX	553	MIN	8.3	AC-FT	65970
WTR YR	2002	TOTAL	12882.25	MEAN	35.3	MAX	226	MIN	.65	AC-FT	25550

MAX DISCH: 227 CFS AT 13:45 ON May. 13, 2002 GH 3.20 FT. SHIFT -0.02 FT.  
MAX GH: 3.20 FT. AT 13:45 ON May. 13, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



SAN JUAN RIVER BASIN

09357500 ANIMAS RIVER AT HOWARDSVILLE, CO

LOCATION.--Lat 37°49'59", long 107°35'56", in SE¼SE¼ sec. 2, T.41 N., R.7 W., NMPM, San Juan County.

DRAINAGE AREA.--55.9 mi<sup>2</sup>.

GAGE.--Graphic water-stage recorder and Sutron 8004 DCP and shaft encoder on a separate float in a 36"x36" wooden shelter and well. The DCP record is the primary record. Datum of gage is 9,616.98 ft above National Geodetic Vertical Datum of 1929. Prior to Aug. 18, 1939, at datum 1.00 ft. higher.

REMARKS.--Records good except for estimated daily discharges, which are poor. Record complete. It is reliable except for the following periods: Stage-discharge relationship affected by ice Nov. 27-29; Dec. 1, 5-14, 16-17, 19-20, 22-26, 28-29 and 31, 2001; Jan. 1-3, 5-12, 14-15, 17-21 and 23-31; Feb. 1-17, 20-23 and 25-28; Mar. 2-12, 14-17, 19-21 and 25-26, 2002. Station maintained and records developed by Scott D. Brinton.

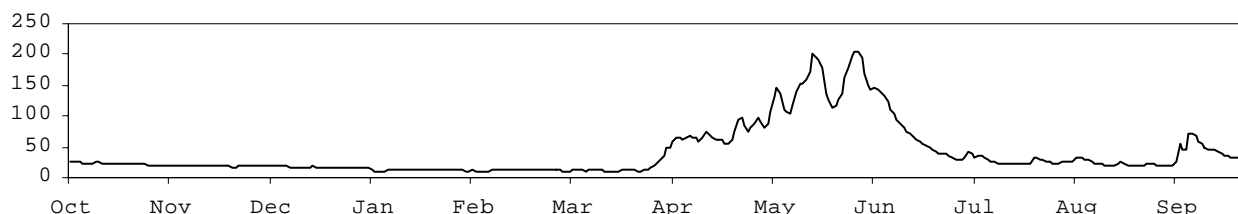
RATING TABLE.--ANIHOWCO08 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	25	20	e18	e15	e10	e13	29	99	203	30	23	21
2	25	20	18	e12	e12	e10	36	91	194	29	23	20
3	25	20	18	e10	e11	e9.0	48	81	168	30	26	20
4	25	20	18	9.3	e11	e10	50	89	148	32	25	21
5	24	20	e18	e10	e11	e12	60	108	144	41	27	20
6	23	20	e18	e11	e11	e13	66	129	147	38	27	19
7	23	19	e18	e12	e11	e14	66	145	144	32	33	27
8	24	20	e17	e13	e12	e12	63	135	140	35	34	56
9	26	19	e17	e14	e12	e10	65	110	134	37	33	46
10	25	19	e17	e14	e12	e12	68	107	123	32	30	45
11	23	19	e17	e13	e13	e12	66	105	111	29	28	71
12	24	19	e17	e13	e12	e12	65	118	103	27	25	70
13	23	19	e16	13	e13	13	60	138	94	25	24	68
14	23	19	e17	e13	e14	e12	64	154	87	24	23	60
15	23	18	18	e13	e13	e11	75	154	80	23	22	54
16	23	19	e17	13	e13	e11	73	158	75	23	21	49
17	23	19	e17	e12	e13	e11	66	173	70	22	20	47
18	23	19	17	e12	13	11	61	202	66	23	20	46
19	22	18	e16	e12	13	e11	61	194	62	24	19	45
20	22	17	e16	e12	e13	e12	63	190	58	24	23	42
21	22	17	16	e12	e13	e12	54	179	54	23	25	39
22	23	18	e16	12	e13	13	54	136	53	22	23	36
23	23	18	e16	e12	e13	13	62	126	50	23	21	35
24	22	18	e15	e12	13	12	76	113	46	23	20	33
25	21	19	e15	e12	e13	e10	94	116	43	31	19	31
26	20	18	e15	e13	e13	e11	97	128	40	32	19	33
27	20	e18	15	e14	e12	12	85	137	40	29	18	35
28	21	e18	e15	e13	e12	14	74	161	38	28	18	36
29	20	e18	e15	e13	---	17	80	178	35	26	23	44
30	20	18	16	e12	---	20	89	197	32	25	24	48
31	21	---	e15	e11	---	23	---	204	---	24	22	---
TOTAL	707	563	514	382.3	345	388	1970	4355	2782	866	738	1217
MEAN	22.8	18.8	16.6	12.3	12.3	12.5	65.7	140	92.7	27.9	23.8	40.6
AC-FT	1400	1120	1020	758	684	770	3910	8640	5520	1720	1460	2410
MAX	26	20	18	15	14	23	97	204	203	41	34	71
MIN	20	17	15	9.3	10	9.0	29	81	32	22	18	19
CAL YR 2001	TOTAL	35017	MEAN	95.9	MAX	619	MIN	13	AC-FT	69460		
WTR YR 2002	TOTAL	14827.3	MEAN	40.6	MAX	204	MIN	9.0	AC-FT	29410		

MAX DISCH: 265 CFS AT 20:45 ON May. 17, 2002 GH 2.20 FT. SHIFT -0.02 FT.  
MAX GH: 2.20 FT. AT 20:45 ON May. 17, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.  
e-Estimated



SAN JUAN RIVER BASIN

LA PLATA AND CHERRY CREEK DITCH NEAR HESPERUS, CO

LOCATION.--Lat 37°19'26", long 108°03'41", in SE¼NW¼ sec. 3, T.35 N., R.11 W., NMPM, La Plata County.

DRAINAGE AREA.--N/A

GAGE.--Sutron 8200 DCP in a wooden shelter and metal well at a 5 foot Parshall flume.

REMARKS.--Records good. Station maintained by Matthew A. Schmitt. Records developed by Scott D. Brinton.

RATING TABLE.--LPCDITCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

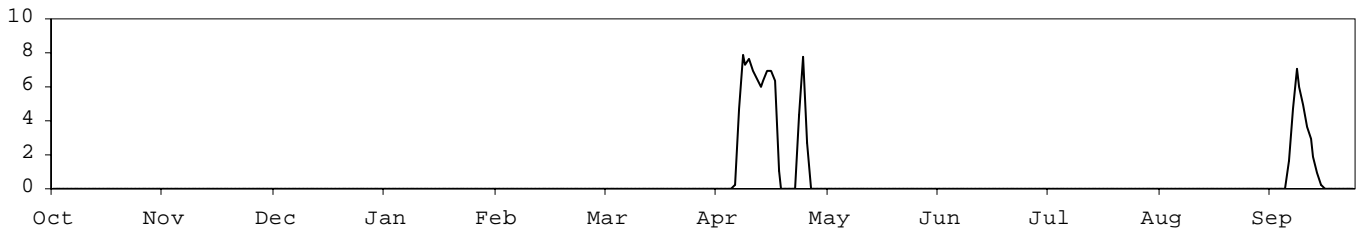
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
2	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
3	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
4	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
5	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
6	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
7	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
8	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
9	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
10	.00	.00	.00	.00	.00	.00	.27	.00	.00	.00	.00	.00
11	.00	.00	.00	.00	.00	.00	4.7	.00	.00	.00	.00	.00
12	.00	.00	.00	.00	.00	.00	7.9	.00	.00	.00	.00	1.7
13	.00	.00	.00	.00	.00	.00	7.3	.00	.00	.00	.00	4.7
14	.00	.00	.00	.00	.00	.00	7.6	.00	.00	.00	.00	7.1
15	.00	.00	.00	.00	.00	.00	7.0	.00	.00	.00	.00	6.0
16	.00	.00	.00	.00	.00	.00	6.5	.00	.00	.00	.00	5.0
17	.00	.00	.00	.00	.00	.00	6.0	.00	.00	.00	.00	3.6
18	.00	.00	.00	.00	.00	.00	6.4	.00	.00	.00	.00	2.9
19	.00	.00	.00	.00	.00	.00	7.0	.00	.00	.00	.00	1.9
20	.00	.00	.00	.00	.00	.00	7.0	.00	.00	.00	.00	.98
21	.00	.00	.00	.00	.00	.00	6.4	.00	.00	.00	.00	.22
22	.00	.00	.00	.00	.00	.00	1.1	.00	.00	.00	.00	.00
23	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
24	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
25	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
26	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
27	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
28	.00	.00	.00	.00	.00	.00	4.3	.00	.00	.00	.00	.00
29	.00	.00	.00	.00	---	.00	7.8	.00	.00	.00	.00	.00
30	.00	.00	.00	.00	---	.00	2.7	.00	.00	.00	.00	.00
31	.00	---	.00	.00	---	.00	---	.00	---	.00	.00	---
TOTAL	.00	.00	.00	.00	.00	.00	89.97	.00	.00	.00	.00	34.10
MEAN	.00	.00	.00	.00	.00	.00	3	.00	.00	.00	.00	1.14
AC-FT	.00	.00	.00	.00	.00	.00	178	.00	.00	.00	.00	68
MAX	.00	.00	.00	.00	.00	.00	7.9	.00	.00	.00	.00	7.1
MIN	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	0

CAL YR 2001 TOTAL 1043.68 MEAN 2.86 MAX 33 MIN .00 AC-FT 2070  
WTR YR 2002 TOTAL 124.07 MEAN .34 MAX 7.9 MIN .00 AC-FT 246

MAX DISCH: 9.85 CFS AT 04:45 ON Apr. 12, 2002 GH 0.64 FT. SHIFT.00 FT.  
MAX GH: 0.64 FT. AT 04:45 ON Apr. 12, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## SAN JUAN RIVER BASIN

## PINE RIDGE DITCH NEAR HESPERUS, CO

LOCATION.--Lat 37°17'31", long 108°02'07", in SW¼NE¼ sec. 14, T.35 N., R.11 W., NMPM, La Plata County.

DRAINAGE AREA.--N/A

GAGE.--Graphic water-stage recorder and a Sutron 8200 DCP on separate floats in a metal shelter and concrete well at a 3 foot Parshall flume.

REMARKS.--No water run during WY-2002. Station maintained by Matthew A. Schmitt. Records developed by Scott D. Brinton.

RATING TABLE.--PINDITCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
2	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
3	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
4	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
5	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
6	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
7	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
8	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
9	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
10	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
11	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
12	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
13	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
14	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
15	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
16	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
17	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
18	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
19	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
20	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
21	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
22	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
23	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
24	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
25	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
26	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
27	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
28	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
29	.00	.00	.00	.00	---	.00	.00	.00	.00	.00	.00	.00
30	.00	.00	.00	.00	---	.00	.00	.00	.00	.00	.00	.00
31	.00	---	.00	.00	---	.00	---	.00	---	.00	.00	---
TOTAL	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
MEAN	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
AC-FT	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
MAX	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
MIN	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
CAL YR 2001	TOTAL	.00	MEAN	.00	MAX	.00	MIN	.00	AC-FT	0		
WTR YR 2002	TOTAL	.00	MEAN	.00	MAX	.00	MIN	.00	AC-FT	0		

MAX DISCH: .00 CFS AT 00:00 ON GH FT. SHIFT .00 FT.  
MAX GH: .00 FT. AT 00:00 ON

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.

## SAN JUAN RIVER BASIN

09365500 LA PLATA RIVER AT HESPERUS, CO

**LOCATION.**--Lat 37°17'23", long 108°02'24", in NE¼SW¼ sec. 14, T.35 N., R.11 W., NMPM La Plata County, Hydrologic Unit 14080105, on right bank at Hesperus 700 ft downstream from U.S. Highway 160.

**DRAINAGE AREA AND PERIOD OF RECORD.**--37 mi<sup>2</sup>, approximately. Periodic data June 1904 to Nov. 1910. Continuous from June 1917 to current year, with some periods of monthly data only.

**GAGE.**--Water-stage recorder and Sutron 8200 DCP on separate floats and an air temperature sensor, in a 64"x64" concrete block shelter and a 42" concrete well. Datum of gage is 8,104.71 ft above National Geodetic Vertical Datum of 1929. DCP is the primary record. Also equipped with an air temperature sensor.

**REMARKS.**--Records good, except for estimated daily discharges, which are poor. Record is complete. It is reliable except for the following periods: July 3 and Aug. 25-29, 2002, when trash on the control resulted in indefinite stage-discharge relationship. Station maintained and record developed by Scott D. Brinton.

**RATING TABLE.**--LAPHESCO34 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

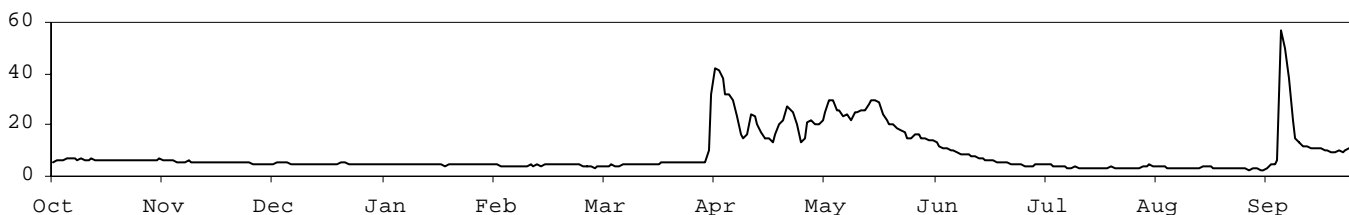
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	5.6	6.5	5.0	e4.6	e4.4	4.0	5.5	21	16	4.1	3.0	2.8
2	6.0	6.4	5.0	e4.4	e4.6	e3.4	5.8	22	15	4.0	3.4	2.7
3	5.9	6.0	5.3	e4.6	e4.4	e3.6	9.8	20	15	e4.2	3.9	2.8
4	6.4	6.0	5.3	e4.8	e4.0	e3.6	32	20	14	4.4	4.0	2.9
5	6.7	5.8	5.3	e4.6	e3.8	e3.8	42	22	14	4.5	4.5	2.7
6	6.7	5.7	5.1	e4.8	e4.0	e4.0	41	25	13	4.5	4.1	2.7
7	6.8	5.7	4.8	e4.8	e4.0	4.3	38	30	12	4.7	4.2	3.4
8	6.5	5.9	e4.6	e4.8	e4.2	4.1	32	30	11	4.3	3.9	4.6
9	6.9	5.8	e4.8	4.8	e4.0	e4.0	32	26	11	4.2	3.6	4.7
10	6.4	5.8	5.0	4.8	e4.0	e4.4	30	26	10	3.9	3.3	6.2
11	6.5	5.8	5.0	e4.8	e4.0	e4.6	23	23	10	3.9	3.1	57
12	6.8	5.8	e4.8	e4.8	e4.4	e4.8	16	24	9.4	3.6	2.9	50
13	6.3	5.8	e4.4	e4.8	e4.2	4.9	15	22	8.8	3.3	2.8	38
14	6.3	5.5	e4.8	e4.8	e4.4	4.9	16	25	8.5	3.3	2.8	22
15	6.2	5.4	e5.0	e4.6	e4.2	e4.4	24	25	8.2	3.7	2.8	15
16	6.0	5.3	e4.8	4.6	e4.4	e4.4	23	26	7.8	3.5	3.2	13
17	6.0	5.3	e4.6	e4.6	e4.6	4.7	20	26	7.5	3.3	3.0	12
18	6.0	5.3	e5.0	e4.4	e4.4	4.6	17	28	7.0	3.3	3.1	12
19	6.0	5.3	e4.8	e4.2	e4.4	e4.6	15	30	6.8	3.3	3.2	11
20	6.0	5.3	e4.8	e4.4	e4.6	4.9	15	30	6.4	3.3	3.6	11
21	6.0	5.3	5.3	e4.4	e4.4	5.1	13	29	6.0	3.1	3.9	11
22	6.3	5.4	e5.2	e4.6	e4.4	5.2	16	24	5.9	3.3	3.6	11
23	5.9	5.4	e4.8	4.6	e4.4	5.3	20	22	5.8	3.5	3.5	10
24	6.3	5.3	e4.8	e4.4	e4.6	5.3	22	20	5.4	3.5	3.3	10
25	6.4	5.4	e4.8	e4.4	e4.6	5.4	27	20	5.2	3.6	e3.2	9.6
26	6.4	e5.0	e4.8	e4.6	e4.4	5.3	26	19	5.1	3.3	e3.2	9.5
27	6.4	e4.8	5.0	e4.6	e4.2	5.4	25	18	5.0	3.2	e3.0	9.9
28	6.4	5.0	e4.8	4.6	e4.0	5.5	20	17	4.8	3.3	e3.2	9.7
29	6.4	5.0	e5.0	e4.6	---	5.5	13	15	4.5	3.1	e3.2	10
30	6.4	5.0	5.0	e4.6	---	5.5	15	15	4.3	2.9	3.4	11
31	6.8	---	e4.8	e4.6	---	5.5	---	16	---	2.9	3.0	---
TOTAL	195.7	166.0	152.5	143.0	120.0	145.0	649.1	716	263.4	113.0	104.9	378.2
MEAN	6.31	5.53	4.92	4.61	4.29	4.68	21.6	23.1	8.78	3.65	3.38	12.6
AC-FT	388	329	302	284	238	288	1290	1420	522	224	208	750
MAX	6.9	6.5	5.3	4.8	4.6	5.5	42	30	16	4.7	4.5	57
MIN	5.6	4.8	4.4	4.2	3.8	3.4	5.5	15	4.3	2.9	2.8	2.7
CAL YR 2001	TOTAL	13755.2	MEAN	37.7	MAX	325	MIN	4.4	AC-FT	27280		
WTR YR 2002	TOTAL	3146.8	MEAN	8.62	MAX	57	MIN	2.7	AC-FT	6240		

MAX DISCH: 98 CFS AT 11:30 ON Sep. 11, 2002 GH 4.14 FT. SHIFT 0.00 FT.

MAX GH: 4.67 FT. AT 03:00 ON Feb. 20, 2002 (BACKWATER FROM ICE)

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.

e-Estimated



SAN JUAN RIVER BASIN

CHERRY CREEK AT THE MOUTH NEAR RED MESA, CO

LOCATION.--Lat 37°07'03", long 108°11'53", in NW¼SW¼ sec. 7, T.33 N., R.12 W., NMPM, La Plata County.

DRAINAGE AREA.--66 mi².

GAGE.--Graphic water-stage recorder and a Sutron 8200 DCP on separate floats in a concrete shelter and well. Datum of gauge is 6,450 ft above National Geodetic Vertical Datum of 1929, from topographic map.

REMARKS.--Records poor. Record is complete. It is reliable except for the following periods: Stage-discharge relationship affected by ice Dec. 4-7, 11-12, 2001; Jan. 2-11, 2002. Station maintained by Matthew A. Schmitt and records developed Scott D. Brinton.

RATING TABLE.--CHEREDCO2 USED FROM 01-OCT-2001 TO 30-SEP-2002

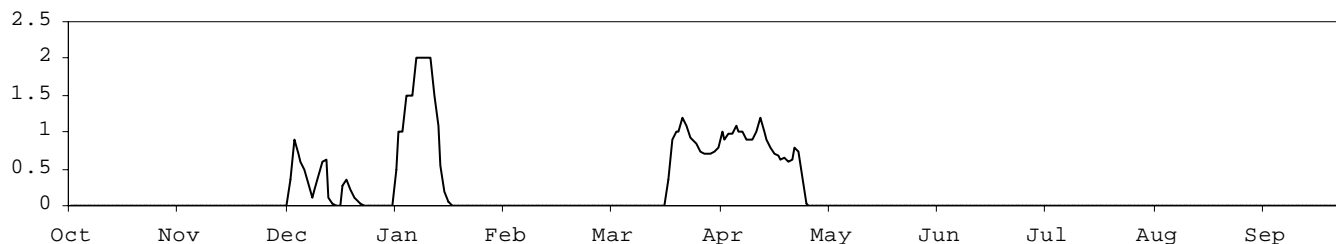
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.00	.00	.00	.00	.00	.00	.70	.00	.00	.00	.00	.00
2	.00	.00	.00	e.50	.00	.00	.70	.00	.00	.00	.00	.00
3	.00	.00	.36	e1.0	.00	.00	.73	.00	.00	.00	.00	.00
4	.00	.00	e.90	e1.0	.00	.00	.80	.00	.00	.00	.00	.00
5	.00	.00	e.70	e1.5	.00	.00	1.0	.00	.00	.00	.00	.00
6	.00	.00	e.60	e1.5	.00	.00	.90	.00	.00	.00	.00	.00
7	.00	.00	e.50	e1.5	.00	.00	.97	.00	.00	.00	.00	.00
8	.00	.00	.30	e2.0	.00	.00	.98	.00	.00	.00	.00	.00
9	.00	.00	.11	e2.0	.00	.00	1.1	.00	.00	.00	.00	.00
10	.00	.00	.22	e2.0	.00	.00	1.0	.00	.00	.00	.00	.00
11	.00	.00	e.40	e2.0	.00	.00	1.0	.00	.00	.00	.00	.00
12	.00	.00	e.60	2.0	.00	.00	.90	.00	.00	.00	.00	.00
13	.00	.00	.62	1.5	.00	.00	.90	.00	.00	.00	.00	.00
14	.00	.00	.11	1.1	.00	.00	.90	.00	.00	.00	.00	.00
15	.00	.00	.03	.54	.00	.00	1.0	.00	.00	.00	.00	.00
16	.00	.00	.01	.18	.00	.00	1.2	.00	.00	.00	.00	.00
17	.00	.00	.00	.06	.00	.00	1.0	.00	.00	.00	.00	.00
18	.00	.00	.26	.01	.00	.00	.90	.00	.00	.00	.00	.00
19	.00	.00	.34	.00	.00	.00	.80	.00	.00	.00	.00	.00
20	.00	.00	.21	.00	.00	.00	.70	.00	.00	.00	.00	.00
21	.00	.00	.12	.00	.00	.34	.67	.00	.00	.00	.00	.00
22	.00	.00	.07	.00	.00	.91	.63	.00	.00	.00	.00	.00
23	.00	.00	.03	.00	.00	1.0	.65	.00	.00	.00	.00	.00
24	.00	.00	.01	.00	.00	1.0	.60	.00	.00	.00	.00	.00
25	.00	.00	.00	.00	.00	1.2	.62	.00	.00	.00	.00	.00
26	.00	.00	.00	.00	.00	1.1	.79	.00	.00	.00	.00	.00
27	.00	.00	.00	.00	.00	.92	.73	.00	.00	.00	.00	.00
28	.00	.00	.00	.00	.00	.90	.38	.00	.00	.00	.00	.00
29	.00	.00	.00	.00	---	.83	.03	.00	.00	.00	.00	.00
30	.00	.00	.00	.00	---	.74	.00	.00	.00	.00	.00	.00
31	.00	---	.00	.00	---	.70	---	.00	---	.00	.00	---
TOTAL	.00	.00	6.50	20.39	.00	9.64	23.28	.00	.00	.00	.00	.00
MEAN	.00	.00	.21	.66	.00	.31	.78	.00	.00	.00	.00	.00
AC-FT	.00	.00	13	40	.00	19	46	.00	.00	.00	.00	.00
MAX	.00	.00	.90	2.0	.00	1.2	1.2	.00	.00	.00	.00	.00
MIN	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00

CAL YR	2001	TOTAL	2425.29	MEAN	6.6	MAX	78	MIN	.00	AC-FT	4810
WTR YR	2002	TOTAL	59.81	MEAN	0.16	MAX	2.0	MIN	.00	AC-FT	119

MAX DISCH: UNDETERMINED  
MAX GH: 1.39 FT. AT 11:00 ON Jan. 2, 2002 (ICE AFFECTED GH)

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.  
e-Estimated



SAN JUAN RIVER BASIN

LONG HOLLOW AT THE MOUTH NEAR RED MESA, CO

LOCATION.--Lat 37°03'02", long 108°10'23", in SE¼SW¼ sec. 32, T.33 N., R.12 W., NMPM, La Plata County.

DRAINAGE AREA.--46.5 mi<sup>2</sup>.

GAGE.--Graphic water-stage recorder with a Sutron 8200 DCP on separate floats in a 3' by 3' wooden shelter and well. The control is a three foot Parshall flume equipped with a staff gauge. Datum of gauge is 6,190 ft above National Geodetic Vertical Datum of 1929, from topographic map.

REMARKS.--Records fair except for estimated daily discharges, which are poor. Record complete. It is reliable except for the following periods: Stage-discharge relationship affected by ice Dec. 7-10, 13-14, 16-20, 23-26 and 28, 2001; Jan. 2-3, 5-6, 14 and 18-31; Feb. 1-9; Mar. 2-5, 2002. Diversion for irrigation of up to 85 acres upstream of gage. Station maintained by Matthew A. Schmitt and records developed Scott D. Brinton.

RATING TABLE.--LONREDCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

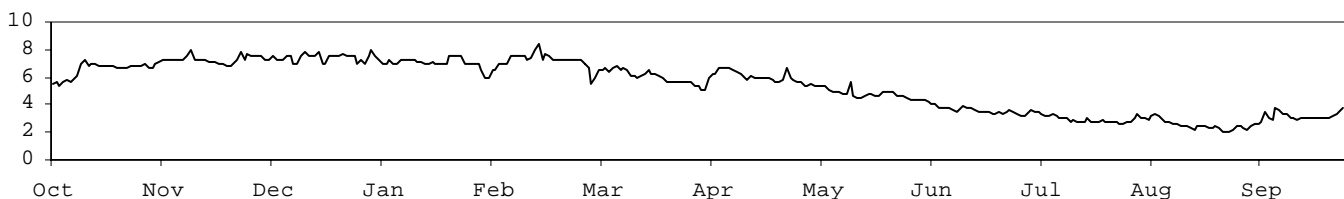
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	5.5	7.3	7.3	7.2	e6.0	6.7	5.3	5.4	4.4	3.2	2.7	2.4
2	5.6	7.2	7.5	e7.0	e6.5	e5.5	5.1	5.4	4.4	3.2	3.0	2.3
3	5.3	7.2	7.3	e7.0	e6.5	e6.0	5.1	5.5	4.3	3.4	3.3	2.2
4	5.7	7.2	7.3	7.2	e7.0	e6.5	5.9	5.4	4.3	3.6	3.1	2.5
5	5.8	7.2	7.2	e7.0	e7.0	e6.5	6.2	5.4	4.2	3.5	3.0	2.6
6	5.7	7.2	7.5	e7.0	e7.0	6.7	6.3	5.3	4.1	3.5	2.9	2.6
7	5.9	7.2	e7.5	7.2	e7.5	6.4	6.6	5.3	4.0	3.4	3.2	2.8
8	6.1	7.5	e7.0	7.3	e7.5	6.7	6.6	5.1	3.8	3.2	3.3	3.5
9	6.9	8.0	e7.0	7.3	e7.5	6.8	6.6	5.0	3.7	3.2	3.2	3.1
10	7.3	7.3	e7.5	7.3	7.5	6.5	6.6	4.9	3.7	3.3	2.9	2.9
11	6.8	7.3	7.8	7.2	7.6	6.6	6.5	4.9	3.7	3.2	2.8	3.8
12	6.9	7.3	7.5	7.1	7.3	6.5	6.4	4.8	3.6	3.0	2.7	3.6
13	7.0	7.3	e7.5	7.1	7.4	6.1	6.3	4.8	3.5	3.0	2.6	3.4
14	6.8	7.1	e7.5	e7.0	7.9	6.1	5.9	5.7	3.8	3.0	2.6	3.3
15	6.8	7.1	7.8	7.0	8.4	6.0	5.8	4.6	3.9	2.8	2.5	3.1
16	6.8	7.1	e7.0	7.1	7.3	6.1	6.1	4.5	3.7	2.9	2.5	3.0
17	6.8	6.9	e7.0	6.9	7.7	6.3	6.0	4.5	3.7	2.8	2.4	2.9
18	6.8	6.9	e7.5	e7.0	7.6	6.5	6.0	4.7	3.6	2.7	2.3	3.0
19	6.7	6.8	e7.5	e7.0	7.2	6.3	5.9	4.8	3.5	2.8	2.2	3.1
20	6.6	6.8	e7.5	e7.0	7.3	6.2	5.9	4.8	3.5	3.0	2.4	3.1
21	6.7	6.9	7.6	e7.5	7.3	6.1	5.9	4.6	3.5	2.8	2.5	3.1
22	6.7	7.2	7.7	e7.5	7.3	5.9	5.8	4.7	3.5	2.7	2.4	3.1
23	6.8	7.8	e7.5	e7.5	7.3	5.7	5.7	4.9	3.4	2.8	2.3	3.1
24	6.8	7.2	e7.5	e7.5	7.3	5.6	5.7	4.9	3.4	2.9	2.3	3.1
25	6.8	7.7	e7.5	e7.0	7.2	5.7	5.8	4.9	3.5	2.8	2.4	3.1
26	6.8	7.6	e7.0	e7.0	7.2	5.7	6.6	4.9	3.4	2.8	2.3	3.1
27	6.9	7.5	7.2	e7.0	7.2	5.7	6.0	4.7	3.5	2.7	2.1	3.2
28	6.7	7.5	e7.0	e7.0	7.0	5.6	5.8	4.6	3.6	2.7	2.0	3.3
29	6.7	7.5	7.5	e7.0	---	5.7	5.7	4.6	3.5	2.6	2.0	3.5
30	6.9	7.3	7.9	e6.5	---	5.7	5.6	4.5	3.3	2.6	2.2	3.7
31	7.1	---	7.5	e6.0	---	5.3	---	4.4	---	2.7	2.4	---
TOTAL	202.7	218.1	229.6	219.4	203.5	189.7	179.7	152.5	112.0	92.8	80.5	91.5
MEAN	6.54	7.27	7.41	7.08	7.27	6.12	5.99	4.92	3.73	2.99	2.60	3.05
AC-FT	402	433	455	435	404	376	356	302	222	184	160	181
MAX	7.3	8.0	7.9	7.5	8.4	6.8	6.6	5.7	4.4	3.6	3.3	3.8
MIN	5.3	6.8	7.0	6.0	6.0	5.3	5.1	4.4	3.3	2.6	2.0	2.2

CAL YR	2001	TOTAL	2925.2	MEAN	8.0	MAX	21	MIN	5.1	AC-FT	5800
WTR YR	2002	TOTAL	1972.0	MEAN	5.4	MAX	8.4	MIN	2.0	AC-FT	3910

MAX DISCH: 17.0 CFS AT 20:30 ON Dec. 7, 2001 GH 1.01 FT. SHIFT 0.03 FT.  
MAX GH: 1.21 FT. AT 04:45 ON Feb. 5, 2002 (Ice Affected)

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.  
e-Estimated





## SAN JUAN RIVER BASIN

## PIONEER DITCH AT THE COLORADO-NEW MEXICO STATELINE

LOCATION.--Lat 36°59'58", long 108°11'09", in NW¼SE¼ sec. 10, T.32 N., R.13 W., NMPM, La Plata County.

DRAINAGE AREA.--N/A

GAGE.--Water-stage recorder with Sutron 8200 DCP in a shelter and well at a 1 foot Parshall flume.

REMARKS.--Records good. Record complete. Station maintained by Matthew A. Schmitt. Records developed by Scott D. Brinton.

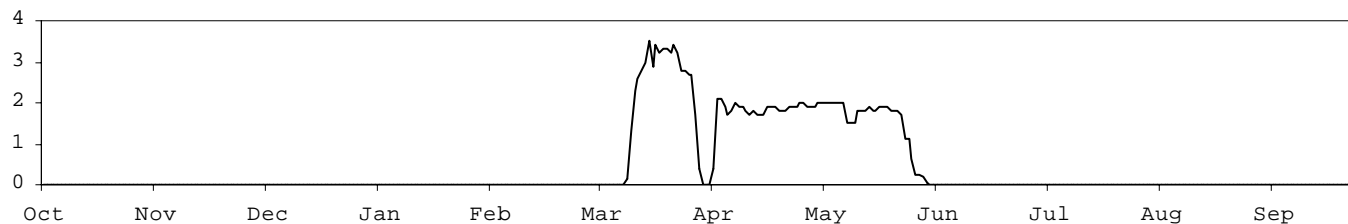
RATING TABLE.--PIODITCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.00	.00	.00	.00	.00	.00	.37	1.9	.22	.00	.00	.00
2	.00	.00	.00	.00	.00	.00	.00	1.9	.20	.00	.00	.00
3	.00	.00	.00	.00	.00	.00	.00	1.9	.07	.00	.00	.00
4	.00	.00	.00	.00	.00	.00	.00	2.0	.00	.00	.00	.00
5	.00	.00	.00	.00	.00	.00	.40	2.0	.00	.00	.00	.00
6	.00	.00	.00	.00	.00	.00	2.1	2.0	.00	.00	.00	.00
7	.00	.00	.00	.00	.00	.00	2.1	2.0	.00	.00	.00	.00
8	.00	.00	.00	.00	.00	.00	1.9	2.0	.00	.00	.00	.00
9	.00	.00	.00	.00	.00	.00	1.7	2.0	.00	.00	.00	.00
10	.00	.00	.00	.00	.00	.00	1.8	2.0	.00	.00	.00	.00
11	.00	.00	.00	.00	.00	.00	2.0	2.0	.00	.00	.00	.00
12	.00	.00	.00	.00	.00	.17	1.9	1.5	.00	.00	.00	.00
13	.00	.00	.00	.00	.00	1.3	1.9	1.5	.00	.00	.00	.00
14	.00	.00	.00	.00	.00	2.3	1.8	1.5	.00	.00	.00	.00
15	.00	.00	.00	.00	.00	2.6	1.7	1.8	.00	.00	.00	.00
16	.00	.00	.00	.00	.00	2.8	1.8	1.8	.00	.00	.00	.00
17	.00	.00	.00	.00	.00	3.0	1.7	1.8	.00	.00	.00	.00
18	.00	.00	.00	.00	.00	3.5	1.7	1.9	.00	.00	.00	.00
19	.00	.00	.00	.00	.00	2.9	1.7	1.8	.00	.00	.00	.00
20	.00	.00	.00	.00	.00	3.4	1.9	1.8	.00	.00	.00	.00
21	.00	.00	.00	.00	.00	3.2	1.9	1.9	.00	.00	.00	.00
22	.00	.00	.00	.00	.00	3.3	1.9	1.9	.00	.00	.00	.00
23	.00	.00	.00	.00	.00	3.3	1.8	1.9	.00	.00	.00	.00
24	.00	.00	.00	.00	.00	3.2	1.8	1.8	.00	.00	.00	.00
25	.00	.00	.00	.00	.00	3.4	1.8	1.8	.00	.00	.00	.00
26	.00	.00	.00	.00	.00	3.2	1.9	1.8	.00	.00	.00	.00
27	.00	.00	.00	.00	.00	2.8	1.9	1.7	.00	.00	.00	.00
28	.00	.00	.00	.00	.00	2.8	1.9	1.1	.00	.00	.00	.00
29	.00	.00	.00	.00	---	2.7	2.0	1.1	.00	.00	.00	.00
30	.00	.00	.00	.00	---	2.7	2.0	.65	.00	.00	.00	.00
31	.00	---	.00	.00	---	1.7	---	.23	---	.00	.00	---
TOTAL	.00	.00	.00	.00	.00	54.27	47.37	52.98	.49	.00	.00	.00
MEAN	.00	.00	.00	.00	.00	1.75	1.58	1.71	.016	.00	.00	.00
AC-FT	.00	.00	.00	.00	.00	108	94	105	1.0	.00	.00	.00
MAX	.00	.00	.00	.00	.00	3.5	2.1	2.0	.22	.00	.00	.00
MIN	.00	.00	.00	.00	.00	.00	.00	.23	.00	.00	.00	.00
CAL YR 2001	TOTAL	315.24	MEAN	.86	MAX	5.1	MIN	.00	AC-FT	625		
WTR YR 2002	TOTAL	155.11	MEAN	.42	MAX	3.5	MIN	.00	AC-FT	308		

MAX DISCH: 3.76 CFS AT 11:45 ON Mar. 17, 2002 GH 0.96 FT. SHIFT .00 FT.  
MAX GH: 0.96 FT. AT 11:45 ON Mar. 17, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



SAN JUAN RIVER BASIN

ENTERPRISE DITCH AT THE COLORADO-NEW MEXICO STATELINE

LOCATION.--Lat 37°00'50", long 108°11'18", in SW¼SE¼ sec. 3, T.32 N., R.13 W., NMPM, La Plata County.

DRAINAGE AREA.--N/A

GAGE.--Water-stage recorder with Sutron 8200 DCP in a shelter and well at a 2 foot Parshall flume.

REMARKS.--Records good. Record complete. Station maintained by Matthew A. Schmitt.  
Records developed by Scott D. Brinton.

RATING TABLE.--ENTDITCO01 USED FROM 01-OCT-2001 TO 30-SEP-2002

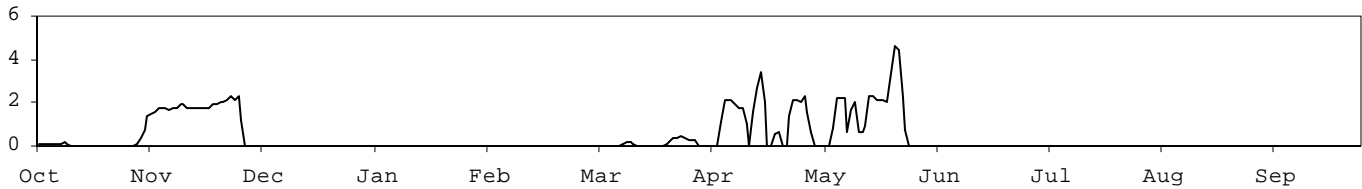
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.08	1.5	.00	.00	.00	.00	.00	1.6	.00	.00	.00	.00
2	.08	1.6	.00	.00	.00	.00	.00	.67	.00	.00	.00	.00
3	.08	1.8	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
4	.08	1.8	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
5	.08	1.8	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
6	.08	1.7	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
7	.06	1.8	.00	.00	.00	.00	1.1	.00	.00	.00	.00	.00
8	.17	1.8	.00	.00	.00	.00	2.1	.85	.00	.00	.00	.00
9	.09	1.9	.00	.00	.00	.00	2.1	2.2	.00	.00	.00	.00
10	.00	1.9	.00	.00	.00	.00	2.1	2.2	.00	.00	.00	.00
11	.00	1.8	.00	.00	.00	.11	1.9	2.2	.00	.00	.00	.00
12	.00	1.8	.00	.00	.00	.23	1.8	.63	.00	.00	.00	.00
13	.00	1.8	.00	.00	.00	.15	1.8	1.7	.00	.00	.00	.00
14	.00	1.8	.00	.00	.00	.07	.99	2.0	.00	.00	.00	.00
15	.00	1.8	.00	.00	.00	.03	.00	.62	.00	.00	.00	.00
16	.00	1.8	.00	.00	.00	.01	1.6	.65	.00	.00	.00	.00
17	.00	1.8	.00	.00	.00	.04	2.7	.96	.00	.00	.00	.00
18	.00	1.9	.00	.00	.00	.00	3.4	2.3	.00	.00	.00	.00
19	.00	1.9	.00	.00	.00	.04	2.0	2.3	.00	.00	.00	.00
20	.00	2.0	.00	.00	.00	.00	.00	2.1	.00	.00	.00	.00
21	.00	2.0	.00	.00	.00	.00	.00	2.1	.00	.00	.00	.00
22	.00	2.1	.00	.00	.00	.00	.54	2.1	.00	.00	.00	.00
23	.00	2.3	.00	.00	.00	.12	.62	2.0	.00	.00	.00	.00
24	.00	2.1	.00	.00	.00	.22	.00	3.3	.00	.00	.00	.00
25	.00	2.3	.00	.00	.00	.37	.00	4.6	.00	.00	.00	.00
26	.00	1.2	.00	.00	.00	.41	1.4	4.4	.00	.00	.00	.00
27	.00	.00	.00	.00	.00	.47	2.1	2.3	.00	.00	.00	.00
28	.09	.00	.00	.00	.00	.34	2.1	.73	.00	.00	.00	.00
29	.38	.00	.00	.00	---	.30	2.0	.01	.00	.00	.00	.00
30	.76	.00	.00	.00	---	.28	2.3	.00	.00	.00	.00	.00
31	1.4	---	.00	.00	---	.26	---	.00	---	.00	.00	---
TOTAL	3.43	48.00	.00	.00	.00	3.45	34.65	44.52	.00	.00	.00	.00
MEAN	.11	1.6	.00	.00	.00	.11	1.15	1.44	.00	.00	.00	.00
AC-FT	6.8	95	.00	.00	.00	6.8	69	88	.00	.00	.00	.00
MAX	1.4	2.3	.00	.00	.00	.47	3.4	4.6	.00	.00	.00	.00
MIN	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00

CAL YR	2001	TOTAL	383.61	MEAN	1.1	MAX	5.4	MIN	.00	AC-FT	761
WTR YR	2002	TOTAL	134.05	MEAN	.37	MAX	4.6	MIN	.00	AC-FT	266

MAX DISCH: 4.81 CFS AT 07:45 ON May. 25, 2002 GH 0.75 FT. SHIFT -0.03 FT.  
MAX GH: 0.75 FT. AT 07:45 ON May. 25, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.



## SAN JUAN RIVER BASIN

09366500 LA PLATA RIVER AT COLORADO-NEW MEXICO STATE LINE

**LOCATION.**--Lat 36°59'59", long 108°11'17", in NW¼SE¼ sec. 10, T.32 N., R.13 W., NMPM, La Plata County, CO, Hydrologic Unit 14080105, on right bank at Colorado-New Mexico State line, 0.5 mi downstream of Johnny Pond Arroyo, and 4.9 mi north of La Plata, NM.

**DRAINAGE AREA AND PERIOD OF RECORD.**--331 mi<sup>2</sup>. Jan. 1920 to current year. Monthly data only for some periods.

**GAGE.**--Water-stage recorder and Sutron 8200 DCP on separate floats in a 42" concrete well and 64"x64" cement block shelter. The DCP is the primary record. Datum of gage is 5,975.15 ft above National Geodetic Vertical Datum of 1929. Also equipped with an air temperature sensor.

**REMARKS.**--Records good except for estimated daily discharges, which are poor. Record complete. It is reliable except for the following periods: Stage-discharge relationship affected by ice Nov. 27 and 29; Dec. 10-31, 2001; Jan. 1-11, 15 and 18-31; Feb. 1-13; Mar. 2-5, 2002. Station maintained and record developed by Scott D Brinton.

**RATING TABLE.**--LAPMEXCO31 USED FROM 01-OCT-2001 TO 30-SEP-2002

DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

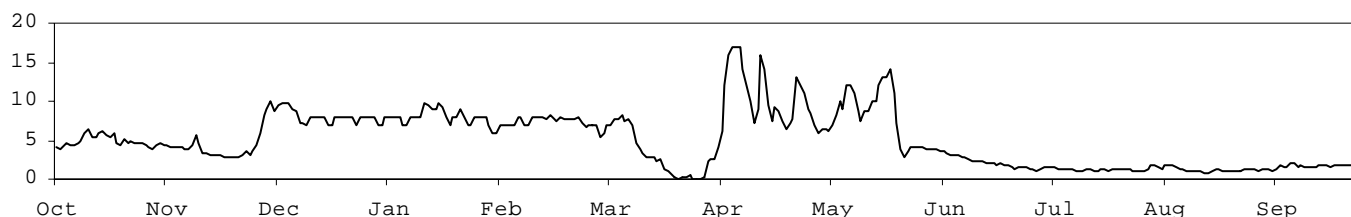
DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	4.1	4.3	8.8	e8.0	e6.0	7.0	2.4	6.9	3.9	1.2	1.0	1.2
2	3.9	4.1	9.4	e8.0	e7.0	e5.5	2.6	5.9	3.8	1.1	1.3	1.1
3	4.1	4.1	9.8	e8.0	e7.0	e6.0	2.5	6.5	3.8	1.3	1.8	1.2
4	4.6	4.2	9.8	e8.0	e7.0	e7.0	4.0	6.5	3.8	1.5	1.7	1.2
5	4.4	4.2	9.8	e8.0	e7.0	e7.0	6.2	6.2	3.7	1.5	1.6	1.2
6	4.4	3.9	9.0	e7.0	e7.0	7.8	12	6.9	3.5	1.6	1.4	1.1
7	4.6	3.8	8.8	e7.0	e8.0	7.6	16	8.2	3.3	1.6	1.7	1.3
8	5.0	4.4	7.2	e8.0	e8.0	8.1	17	10	3.1	1.4	1.8	1.7
9	5.9	5.6	7.2	e8.0	e7.0	7.5	17	9.1	3.1	1.3	1.8	1.6
10	6.4	4.5	e7.0	e8.0	e7.0	7.7	17	12	3.0	1.4	1.5	1.6
11	5.3	3.4	e8.0	e8.0	e8.0	7.0	14	12	2.9	1.3	1.4	2.1
12	5.4	3.3	e8.0	9.8	e8.0	4.7	12	11	2.8	1.2	1.2	2.0
13	6.0	3.1	e8.0	9.6	e8.0	3.8	9.9	8.8	2.6	1.0	1.1	1.6
14	6.1	3.1	e8.0	9.0	8.0	3.3	7.2	7.4	2.3	.94	1.1	1.7
15	5.6	3.0	e8.0	e9.0	7.8	2.9	8.9	8.8	2.3	1.1	1.0	1.6
16	5.4	3.0	e7.0	9.7	8.1	2.9	16	8.8	2.2	1.2	.97	1.5
17	6.0	2.9	e7.0	9.3	7.6	2.9	14	10	2.2	1.2	.99	1.5
18	4.5	2.7	e8.0	e8.0	7.5	2.4	9.4	10	2.0	1.1	.77	1.5
19	4.4	2.7	e8.0	e7.0	8.0	2.5	7.5	12	2.0	1.0	.72	1.8
20	5.2	2.7	e8.0	e8.0	7.8	1.3	9.2	13	2.0	1.3	.95	1.8
21	4.7	2.7	e8.0	e8.0	7.6	1.1	8.7	13	1.9	1.3	1.3	1.7
22	4.8	3.0	e8.0	e9.0	7.6	.63	7.5	14	2.0	1.1	1.2	1.6
23	4.7	3.5	e8.0	e8.0	7.8	.14	6.5	11	1.8	1.3	1.1	1.7
24	4.6	3.2	e7.0	e7.0	7.9	.04	7.3	7.3	1.8	1.4	1.1	1.7
25	4.6	3.5	e8.0	e7.0	7.3	.19	7.6	3.8	1.6	1.4	1.1	1.7
26	4.4	4.4	e8.0	e8.0	6.6	.29	13	2.7	1.4	1.3	1.1	1.7
27	4.2	e6.0	e8.0	e8.0	6.9	.49	12	3.5	1.5	1.2	1.1	1.8
28	3.8	8.3	e8.0	e8.0	6.9	.12	11	4.1	1.6	1.2	1.1	1.9
29	4.3	e9.0	e8.0	e8.0	---	.00	9.0	4.2	1.5	1.1	1.2	2.2
30	4.5	10	e7.0	e7.0	---	.01	8.5	4.1	1.3	1.0	1.4	2.3
31	4.4	---	e7.0	e6.0	---	.32	---	4.2	---	1.0	1.3	---
TOTAL	150.3	126.6	249.8	249.4	208.4	108.23	295.9	251.9	74.7	38.54	38.8	48.6
MEAN	4.85	4.22	8.06	8.05	7.44	3.49	9.86	8.13	2.49	1.24	1.25	1.62
AC-FT	298	251	495	495	413	215	587	500	148	76	77	96
MAX	6.4	10	9.8	9.8	8.1	8.1	17	14	3.9	1.6	1.8	2.3
MIN	3.8	2.7	7.0	6.0	6.0	.00	2.4	2.7	1.3	.94	.72	1.1
CAL YR	2001	TOTAL	7913.7	MEAN	21.7	MAX	156	MIN	2.3	AC-FT	15700	
WTR YR	2002	TOTAL	1841.17	MEAN	5.04	MAX	17	MIN	.00	AC-FT	3650	

MAX DISCH: UNDETERMINED

MAX GH: 5.02 FT. AT 11:15 ON Feb. 13, 2002 (BACKWATER FROM ICE)

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.

e-Estimated



SAN JUAN RIVER BASIN

09370000 MANCOS RIVER NEAR MANCOS, CO

LOCATION.--Lat 37°21'13", long 108°15'41", in NE¼NE¼ sec. 27, T.36 N., R.13 W., NMPM, Montezuma County.

DRAINAGE AREA.--72.6 mi².

GAGE.--Graphic water-stage recorder and a Sutron 8200 DCP on separate floats in a 42" concrete well and 64"x64" cement block shelter. The DCP is the primary record. Datum of gauge is 7,190 ft above National Geodetic Vertical Datum of 1929, from topographic map.

REMARKS.--Records fair, except for estimated daily discharges, which are poor. Record is complete. It is reliable except for the following periods: Stage-discharge relationship affected by ice; Nov. 20-30; Dec. 1-23 and 29-31, 2001; Jan. 1-5, 11-14 and 17-31; Feb. 1-28; March 1-13, 15-21 and 26, 2002. Station maintained and records developed by Scott D. Brinton.

RATING TABLE.--MANMANCO08 USED FROM 01-OCT-2001 TO 30-SEP-2002

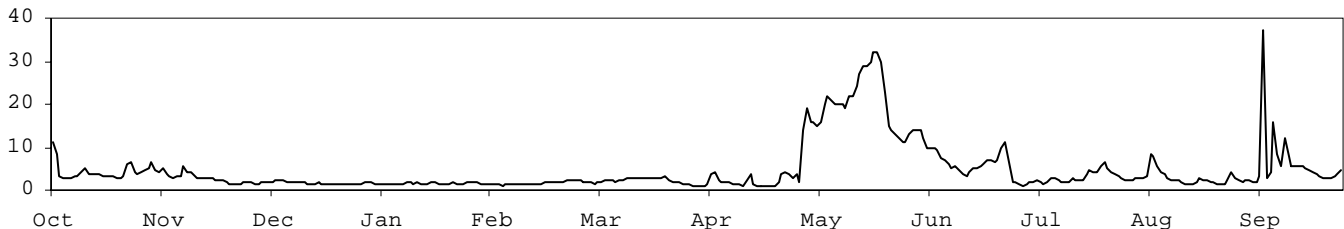
DISCHARGE, IN CFS, WATER YEAR OCTOBER 2001 TO SEPTEMBER 2002  
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	11	5.0	e2.0	e1.4	e1.2	e2.0	1.1	14	14	1.4	2.3	2.5
2	8.4	3.8	e2.0	e1.2	e1.4	e1.8	1.1	19	14	1.1	2.3	2.0
3	3.3	3.2	e2.2	e1.4	e1.4	e1.6	1.1	16	14	1.2	2.8	2.1
4	3.0	3.0	e2.2	e1.4	e1.2	e1.8	1.2	16	12	1.8	3.0	2.2
5	3.0	3.2	e2.2	e1.4	e1.0	e2.0	3.5	15	10	2.0	2.8	2.0
6	2.9	3.2	e2.0	1.5	e1.2	e2.2	4.2	16	10	2.3	3.4	2.0
7	3.4	5.6	e1.8	1.4	e1.2	e2.4	2.1	20	9.8	2.0	8.5	3.2
8	3.2	4.2	e1.8	1.5	e1.4	e2.2	1.7	22	9.5	1.5	8.0	37
9	4.2	4.0	e1.8	1.9	e1.2	e2.0	1.7	21	7.5	1.8	5.4	2.6
10	5.3	3.1	e2.0	1.8	e1.2	e2.2	1.7	20	7.1	2.8	4.4	4.4
11	3.9	2.9	e2.0	e1.6	e1.2	e2.4	1.6	20	6.2	2.7	3.6	16
12	3.9	2.6	e1.6	e1.8	e1.4	e2.6	1.4	20	5.3	2.4	2.9	8.3
13	3.5	2.7	e1.4	e1.6	e1.4	e3.0	1.3	19	5.4	1.9	2.4	5.5
14	3.5	2.6	e1.6	e1.6	e1.6	3.0	1.1	22	4.6	1.7	2.3	12
15	3.2	2.6	e1.8	1.6	e1.4	e2.8	2.5	22	3.5	1.8	2.1	8.1
16	3.2	2.5	e1.6	1.9	e1.6	e2.8	3.5	24	3.4	2.9	1.7	5.6
17	3.1	2.5	e1.4	e1.8	e2.0	e2.6	1.5	27	4.1	2.4	1.4	5.4
18	3.1	2.5	e1.6	e1.6	e1.8	e2.6	1.1	29	4.9	2.3	1.4	5.4
19	2.8	2.0	e1.4	e1.6	e1.8	e2.8	1.1	29	5.3	2.4	1.4	5.5
20	2.8	e1.6	e1.4	e1.6	e2.0	e2.8	1.1	30	5.4	3.6	1.7	5.2
21	3.4	e1.4	e1.6	e1.6	e1.8	e3.0	1.1	32	5.9	4.6	2.6	4.6
22	6.0	e1.4	e1.4	e1.8	e2.0	2.8	1.1	32	6.8	4.3	2.4	4.0
23	6.3	e1.6	1.3	e1.6	e2.2	3.1	.96	30	6.8	4.4	2.2	3.6
24	4.3	e1.8	1.6	e1.4	e2.4	2.3	1.7	23	6.7	5.4	1.9	3.2
25	3.7	e1.8	1.3	e1.6	e2.2	2.0	3.9	15	6.9	6.4	1.7	3.0
26	4.3	e1.8	1.4	e1.8	e2.2	e1.8	4.0	14	9.9	5.3	1.6	3.0
27	4.5	e1.6	1.6	e1.8	e2.2	e1.8	3.6	13	11	4.4	1.4	3.0
28	5.0	e1.6	1.9	e2.0	e2.0	1.4	3.0	12	6.6	3.7	1.4	3.4
29	6.3	e1.8	e1.8	e1.8	---	1.4	3.5	11	1.8	3.1	2.2	3.9
30	4.7	e2.0	e1.8	e1.6	---	1.3	1.9	11	1.7	2.9	4.1	4.6
31	4.0	---	e1.6	e1.4	---	1.1	---	13	---	2.4	2.9	---
TOTAL	133.2	79.6	53.1	50	45.6	69.6	60.36	627	220.1	88.9	88.2	173.3
MEAN	4.30	2.65	1.71	1.61	1.63	2.25	2.01	20.2	7.34	2.87	2.85	5.78
AC-FT	264	158	105	99	90	138	120	1240	437	176	175	344
MAX	11	5.6	2.2	2.0	2.4	3.1	4.2	32	14	6.4	8.5	37
MIN	2.8	1.4	1.3	1.2	1.0	1.1	.96	11	1.7	1.1	1.4	2.0

CAL YR	2001	TOTAL	8618.6	MEAN	23.6	MAX	165	MIN	1.2	AC-FT	17090
WTR YR	2002	TOTAL	1688.96	MEAN	4.63	MAX	37	MIN	.96	AC-FT	3350

MAX DISCH: 89.7 CFS AT 11:30 ON Sep. 8, 2002 GH 4.28 FT. SHIFT -0.05 FT.  
MAX GH: 4.28 FT. AT 11:30 ON Sep. 8, 2002

FOR MORE COMPLETE OR DETAILED INFORMATION SEE DAILY OR MONTHLY RECORD.  
e-Estimated



## INDEX

**A**

ABC LATERAL NEAR MONTROSE .....	181
ALAMOSA CREEK ABOVE TERRACE RESERVOIR .....	149
ALAMOSA CREEK BELOW TERRACE RESERVOIR .....	150
ALVA B. ADAMS TUNNEL AT EAST PORTAL .....	62
ANIMAS RIVER AT HOWARDSVILLE .....	205
ARKANSAS RIVER ABOVE PUEBLO .....	86
ARKANSAS RIVER AT CANON CITY .....	84
ARKANSAS RIVER AT CATLIN DAM, NEAR FOWLER .....	92
ARKANSAS RIVER AT CATLIN DAM, NEAR FOWLER, CO (COMBINED) .....	94
ARKANSAS RIVER AT GRANITE .....	76
ARKANSAS RIVER AT LA JUNTA .....	97
ARKANSAS RIVER AT NEPESTA ROAD BRIDGE NEAR NEPESTA, CO .....	91
ARKANSAS RIVER AT PORTLAND .....	85
ARKANSAS RIVER AT SALIDA .....	81
ARKANSAS RIVER below X-Y DITCH DAM nr CARLTON, CO .....	110
ARKANSAS RIVER NEAR NEPESTA .....	90
ARKANSAS RIVER near ROCKY FORD, CO .....	95
ARKANSAS RIVER NEAR WELLSVILLE .....	82
AURORA HOMESTAKE PIPELINE ABOVE ELEVENMILE RESERVOIR .....	55

**B**

BEAR CREEK AT MORRISON .....	11
BEAR CREEK AT MOUTH, AT SHERIDAN .....	12
BERTHOUD PASS DITCH AT BERTHOUD PASS .....	60
BIG SPRING CREEK at MEDANO RANCH .....	146
BIG THOMPSON RIVER AT MOUTH NEAR LA SALLE .....	44
BIG THOMPSON RIVER AT MOUTH OF CANYON, NEAR DRAKE .....	36
BIG THOMPSON RIVER(above Lake Estes) AT ESTES PARK .....	30
BIG THOMPSON RIVER(below Lake Estes) NEAR ESTES PARK .....	32
BLANCO DIVERSION NEAR PAGOSA SPRINGS, CO .....	195
BLUE RIVER AT HIGHWAY 9 BRIDGE BELOW BRECKENRIDGE .....	185
BOB CREEK DITCH NEAR GLENDEVEY, CO .....	68
BOREAS PASS DITCH AT BOREAS PASS .....	57
BOULDER CREEK FEEDER CANAL NEAR LYONS .....	41
BOULDER CREEK NEAR ORODELL .....	22
BOUSTEAD TUNNEL AT EAST PORTAL NEAR LEADVILLE .....	116
BUCKHORN CREEK NEAR MASONVILLE .....	37
BUSK-IVANHOE TUNNEL AT EAST PORTAL NEAR MALTA .....	117

**C**

CACHE LA POUFRE RIVER AT MOUTH OF CANYON, NEAR FORT COLLINS .....	45
CACHE LA POUFRE RIVER NEAR GREELEY .....	46
CAMERON PASS DITCH AT CAMERON PASS .....	64
CARNERO CREEK NEAR LA GARITA .....	147
CATLIN CANAL, NEAR FOWLER .....	93
CHALK CREEK AT NATHROP .....	80
CHARLES HANSEN FEEDER CANAL BELOW BIG THOMPSON SIPHON NEAR DRAKE .....	38
CHARLES HANSEN FEEDER CANAL POWER PLANT TO BIG THOMPSON RIVER .....	40
CHARLES HANSEN FEEDER CANAL WASTEWAY TO BIG THOMPSON NEAR DRAKE .....	39
CHERRY CREEK AT THE MOUTH NEAR RED MESA .....	209
CLEAR CREEK ABOVE CLEAR CREEK RESERVOIR .....	77
CLEAR CREEK AT DERBY .....	15
CLEAR CREEK BELOW CLEAR CREEK RESERVOIR, NEAR GRANITE, CO .....	78
CLOSED BASIN PROJECT CANAL NEAR ALAMOSA .....	130
COAL CREEK NEAR PLAINVIEW .....	26
COLUMBINE DITCH NEAR FREEMONT PASS .....	111
CONEJOS RIVER BELOW PLATORO RESERVOIR .....	160
CONEJOS RIVER NEAR LASAUSES, CO (COMBINED) .....	167
CONEJOS RIVER NEAR LASAUSES, MAIN (NORTH) CHANNEL, CO .....	165
CONEJOS RIVER NEAR LASAUSES, SECONDARY (SOUTH) CHANNEL .....	166
CONEJOS RIVER NEAR MOGOTE .....	161
COTTON CREEK near MINERAL HOT SPRINGS .....	134
COTTONWOOD CREEK AT BUENA VISTA .....	79
COTTONWOOD CREEK near CRESTONE .....	143
CROOKED ARROYO NEAR SWINK .....	96
CUCHARAS RIVER AT BOYD RANCH NEAR LA VETA .....	88
CULEBRA CREEK AT SAN LUIS .....	168

**D**

DEADMAN CREEK near CRESTONE .....	144
DEADMAN DITCH NEAR DEADMAN PARK .....	69
DILLE TUNNEL (EAST PORTAL) NEAR DRAKE .....	35
DOLORES RIVER BELOW MCPHEE RESERVOIR NEAR DOLORES .....	194
DOLORES TUNNEL OUTLET NEAR DOLORES, CO .....	192
DON LA FONT DITCH NO.2 AT PIEDRA PASS .....	174
DON LA FONT DITCH NO.1 AT PIEDRA PASS .....	173
DON LA FONT DITCH, COMBINED, AT PIEDRA PASS .....	175

**E**

EAST PORTAL HOOSIER PASS TUNNEL NEAR ALMA .....	56
EAST PORTAL MOFFAT TUNNEL NEAR ROLLINSVILLE .....	61
ENTERPRISE DITCH AT THE COLORADO-NEW MEXICO STATELINE .....	212
EWING DITCH AT TENNESSEE PASS .....	112

**F**

FISH CREEK NEAR ESTES PARK .....	31
FLORIDA RIVER ABOVE LEMON RESERVOIR NEAR DURANGO .....	203
FLORIDA RIVER BELOW LEMON RESERVOIR NEAR DURANGO .....	204

**G**

GARNER CREEK near VILLA GROVE .....	132
GOOSE CREEK AT WAGONWHEEL GAP .....	123
GRAND RIVER DITCH AT LA POUDRE PASS .....	63
GRAPE CREEK NEAR WESTCLIFFE .....	83

**H**

HAROLD D. ROBERTS TUNNEL NEAR GRANT .....	58
HIGHLAND CANAL below HIGHLAND DAM near LAS ANIMAS, CO (WY2001) .....	105
HIGHLAND CANAL below HIGHLAND DAM near LAS ANIMAS, CO (WY2002) .....	108
HOMESTAKE TUNNEL NEAR GOLD PARK .....	115
HORSE CREEK at HIGHWAY 194 nr LAS ANIMAS, CO .....	98, 99
HUERFANO RIVER AT MANZANARES CROSSING NEAR REDWING .....	87

**I**

ILLINOIS RIVER NEAR RAND .....	191
--------------------------------	-----

**K**

KERBER CREEK NEAR VILLA GROVE, CO .....	131
---	-----

**L**

LA GARITA CREEK NEAR LA GARITA .....	148
LA JARA CREEK AT GALLEGOS RANCH, NEAR CAPULIN .....	151
LA PLATA AND CHERRY CREEK DITCH NEAR HESPERUS, CO .....	206
LA PLATA RIVER AT COLORADO-NEW MEXICO STATE LINE .....	213
LA PLATA RIVER AT HESPERUS .....	208
LAKE CREEK ABOVE TWIN LAKES RESERVOIR .....	74
LAKE CREEK BELOW TWIN LAKES .....	75
LAKE FORK CREEK BELOW SUGAR LOAF DAM NEAR LEADVILLE .....	73
LARAMIE-POUDRE TUNNEL NEAR CHAMBERS LAKE .....	67
LARKSPUR DITCH NEAR MARSHALL PASS .....	119
LEFTHAND DIVERSION AT SO. ST. VRAIN CREEK NEAR WARD .....	19
LITTLE NAVAJO RIVER BELOW LITTLE OSO DIVERSION DAM NEAR CHROMO, CO .....	202
LITTLE OSO DIVERSION NEAR CHROMO, CO .....	201
LITTLE SPRING CREEK AT MEDANO RANCH NEAR MOSCA, CO .....	145
LITTLE THOMPSON RIVER @ CANYON MOUTH NEAR BERTHOUD .....	43
LONE PINE CANAL BELOW GREAT CUT DIKE NEAR DOLORES, CO .....	193
LONG HOLLOW AT THE MOUTH NEAR RED MESA .....	210
LOS PINOS RIVER NEAR ORTIZ .....	163

**M**

MAJOR CREEK near VILLA GROVE .....	133
MANCOS RIVER NEAR MANCOS .....	214
MICHIGAN DITCH AT CAMERON PASS .....	65
MICHIGAN RIVER near MEADOW CREEK RESERVOIR .....	189
MICHIGAN RIVER near WALDEN, CO .....	190
MIDDLE BOULDER CREEK AT NEDERLAND .....	21
MIDDLE ST. VRAIN CREEK NR. PEACEFUL VALLEY, CO .....	17
MUDDY CREEK ABOVE PAONIA RESERVOIR .....	179
MUDDY CREEK BELOW PAONIA RESERVOIR .....	180

**N**

NAVAJO RIVER AT BANDED PEAK RANCH, NEAR CHROMO .....	198
NAVAJO RIVER BELOW OSO DIVERSION DAM, NEAR CHROMO .....	200
NINEMILE CANAL BELOW NINEMILE DAM NEAR HIGBEE .....	102
NORTH CLEAR CREEK BELOW CONTINENTAL RESERVOIR .....	121
NORTH CRESTONE CREEK NEAR CRESTONE .....	139
NORTH FORK BIG THOMPSON RIVER AT DRAKE .....	34
NORTH FORK SOUTH PLATTE RIVER BELOW GENEVA CREEK, AT GRANT .....	6
NORTON DRAIN NEAR LA SAUSES .....	153

**O**

OLYMPUS TUNNEL (ESTES FOOTHILLS CANAL) AT LAKE ESTES .....	33
OSO DIVERSION NEAR CHROMO, CO .....	199
OXFORD FARMERS DITCH NEAR NEPESTA, CO .....	89

**P**

PINE RIDGE DITCH NEAR HESPERUS, CO .....	207
PINE RIVER WEMINUCHE PASS DITCH AT WEMINUCHE PASS .....	177
PINOS CREEK NEAR DEL NORTE .....	126
PIONEER DITCH AT COLORADO-NEBRASKA STATE LINE .....	72
PIONEER DITCH AT HEADGATE NEAR LAIRD .....	71
PIONEER DITCH AT THE COLORADO-NEW MEXICO STATELINE .....	211
PURGATOIRE RIVER AT NINEMILE DAM, NEAR HIGBEE .....	101
PURGATOIRE RIVER AT NINEMILE DAM, NEAR HIGBEE, CO (COMBINED) .....	103
PURGATOIRE RIVER below HIGHLAND DAM near LAS ANIMAS, CO (COMBINED)(WY2001) .....	106
PURGATOIRE RIVER below HIGHLAND DAM near LAS ANIMAS, CO (COMBINED)(WY2002) .....	109
PURGATOIRE RIVER below HIGHLAND DAM near LAS ANIMAS, CO (WY2001) .....	104
PURGATOIRE RIVER below HIGHLAND DAM near LAS ANIMAS, CO (WY2002) .....	107
PURGATORIE RIVER AT TRINIDAD, CO .....	100

**R**

REDLANDS CANAL NEAR GRAND JUNCTION .....	183
RIO BLANCO AT MOUTH NEAR TRUJILLO .....	197
RIO BLANCO BELOW BLANCO DIVERSION DAM, NEAR PAGOSA SPRINGS .....	196
RIO GRANDE ABOVE MOUTH OF TRINCHERA CREEK, NEAR LASAUSES .....	154
RIO GRANDE AT ALAMOSA .....	129
RIO GRANDE AT RIO GRANDE-ALAMOSA COUNTY LINE, CO .....	128
RIO GRANDE AT THIRTYMILE BRIDGE, NEAR CREEDE .....	120
RIO GRANDE NEAR DEL NORTE .....	125
RIO GRANDE NEAR LOBATOS .....	169
RIO GRANDE NEAR MONTE VISTA .....	127
RIO GRANDE RIVER at WAGONWHEEL GAP, CO. ....	122
RITO ALTO CREEK near CRESTONE .....	136
ROARING FORK RIVER BELOW MAROON CREEK NEAR ASPEN .....	186
ROCKY FORK CREEK NEAR MEREDITH .....	187

**S**

SAGUACHE CREEK NEAR SAGUACHE .....	138
SAN ANTONIO RIVER AT MOUTH, NEAR MANASSA .....	164
SAN ANTONIO RIVER AT ORTIZ .....	162
SAN ISABEL CREEK near CRESTONE .....	137
SANGRE DE CRISTO CREEK NEAR FORT GARLAND .....	157
SKYLINE DITCH NEAR CHAMBERS LAKE .....	66
SOUTH BOULDER CREEK BELOW GROSS RESERVOIR NEAR COAL CREEK .....	23
SOUTH BOULDER CREEK DIVERSION NEAR ELDORADO SPRINGS .....	24
SOUTH BOULDER CREEK NEAR ELDORADO SPRINGS .....	25
SOUTH CANAL NEAR MONTROSE .....	182
SOUTH CHANNEL NORTON DRAIN DITCH NEAR LA SAUSES .....	152
SOUTH CRESTONE CREEK near CRESTONE .....	140
SOUTH FORK RIO GRANDE AT SOUTH FORK .....	124
SOUTH FORK SOUTH PLATTE RIVER BELOW ANTERO RESERVOIR .....	1
SOUTH PLATTE RIVER ABOVE ELEVENMILE CANYON RESERVOIR, NEAR HARTS .....	3
SOUTH PLATTE RIVER ABOVE SPINNEY MOUNTAIN RESERVOIR .....	2
SOUTH PLATTE RIVER AT BALZAC .....	49
SOUTH PLATTE RIVER AT DENVER .....	13
SOUTH PLATTE RIVER AT HENDERSON .....	16
SOUTH PLATTE RIVER AT JULESBURG .....	53
SOUTH PLATTE RIVER AT JULESBURG, CO. CHANNEL NO 1 .....	51
SOUTH PLATTE RIVER AT JULESBURG, CO. CHANNEL NO 2 .....	50
SOUTH PLATTE RIVER AT JULESBURG, CO. CHANNEL NO 4 .....	52
SOUTH PLATTE RIVER AT SOUTH PLATTE .....	7
SOUTH PLATTE RIVER AT WATERTON .....	9
SOUTH PLATTE RIVER BELOW CHATFIELD RESERVOIR .....	10
SOUTH PLATTE RIVER BELOW CHEESMAN LAKE .....	5
SOUTH PLATTE RIVER BELOW STRONTIA SPRINGS RESERVOIR .....	8
SOUTH PLATTE RIVER NEAR KERSEY .....	47
SOUTH PLATTE RIVER NEAR WELDONA .....	48
SOUTH PLATTE RIVER(below Elevenmile Reservoir) NEAR LAKE GEORGE .....	4
SOUTH ST. VRAIN CREEK NEAR WARD .....	18
SPANISH CREEK near CRESTONE .....	142
ST. VRAIN CREEK AT LYONS .....	20
ST. VRAIN CREEK AT MOUTH, NEAR PLATTEVILLE .....	27
ST. VRAIN SUPPLY CANAL NEAR LYONS .....	42
STRAIGHT CREEK TUNNEL AT EAST PORTAL EISENHOWER TUNNEL .....	14

**T**

TABOR DITCH AT SPRING CREEK PASS .....	171
TARBELL DITCH NEAR COCHETOPA PASS .....	170
TRANSMOUNTAIN DIVERSIONS INTO THE SOUTH PLATTE BASIN IN COLORADO .....	54
TREASURE PASS DITCH AT WOLF CREEK PASS .....	172
TRINCHERA CREEK ABOVE MOUNTAIN HOME RESERVOIR .....	156
TRINCHERA CREEK ABOVE TURNERS RANCH, NEAR FORT GARLAND .....	155
TRINCHERA CREEK BELOW SMITH RESERVOIR, NEAR BLANCA .....	159
TWIN LAKES TUNNEL AT EAST PORTAL NEAR TWIN LAKES .....	118

**U**

UNCOMPAHGRE RIVER NEAR OLATHE .....	184
UTE CREEK NEAR FORT GARLAND .....	158

**V**

VIDLER TUNNEL NEAR ARGENTINE PASS .....	59
---	----

**W**

WALTON CREEK NEAR STEAMBOAT SPRINGS, CO .....	188
WEMINUCHE PASS DITCH AT WEMINUCHE PASS .....	178
WILD CHERRY CREEK near CRESTONE .....	135
WILLIAMS CREEK-SQUAW PASS DITCH AT SQUAW PASS .....	176
WILLOW CREEK near CRESTONE .....	141
WILSON SUPPLY DITCH NEAR EATON RESERVOIR .....	70
WIND RIVER BY-PASS NEAR ESTES PARK, CO. ....	29
WIND RIVER NEAR ESTES PARK .....	28
WURTZ DITCH EXTENSION NEAR LEADVILLE .....	114
WURTZ DITCH NEAR TENNESSEE PASS .....	113