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BULLETIN No. 130-72

HYDROLOGIC DATA: 1972

Volume I: NORTH COASTAL AREA

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NORMAN B. LIVERMORE, JR.
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STATE OF CALIFORNIA
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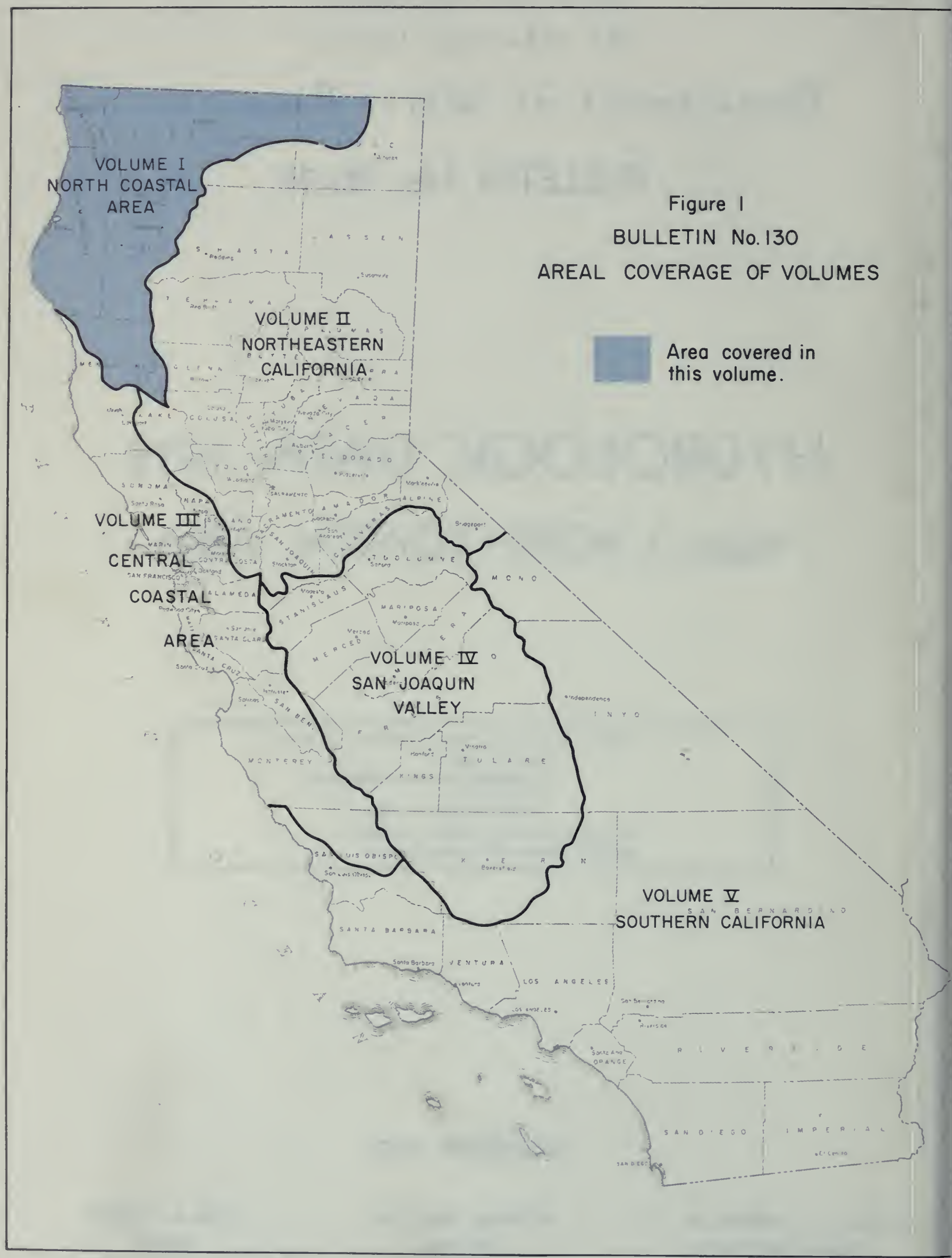

Figure 1
BULLETIN No. 130
AREAL COVERAGE OF VOLUMES

FOREWORD

The hydrologic data programs of the Department of Water Resources supplement the data collection activities of other agencies and help satisfy the needs for data on the quality and quantity of water in the State. Bulletin No. 130-72 presents accurate, comprehensive, and timely hydrologic data which provide a more complete knowledge of the factors affecting our environment and are prerequisites for effective planning, design, construction, and operation of water facilities.

The Bulletin No. 130 series is published annually in five volumes. Each volume presents hydrologic data for one of five reporting areas of the State. These areas are delineated on the map on the opposite page.

John R Teerink

John R. Teerink, Director
Department of Water Resources
The Resources Agency
State of California
September 7, 1973

METRIC CONVERSION TABLE

ENGLISH UNIT	EQUIVALENT METRIC UNIT	
Inch (in.)	2.54	Centimeters
Foot (ft.)	0.3048	Meter
Mile (mi.)	1.609	Kilometers
Acre	0.405	Hectare
Square mile (sq. mi.)	2.590	Square kilometer
U. S. gallon (gal.)	3.785	Liters
Acre-foot (acre-ft.)	1,233.5	Cubic meters
U. S. gallon per minute (gpm)	0.0631	Liter per second
Cubic feet per second (cfs)	1.7	Cubic meters per minute
Part per million (ppm)	Milligram per liter (mg/l)	
Part per billion (ppb)	Microgram per liter (ug/l)	
Part per trillion (ppt)	Nanogram per liter (ng/l)	
Equivalent per million (epm)	Milliequivalent per liter (me/l)	
Degrees Fahrenheit (^{o}F)	Degrees Celsius or Degrees Centigrade (^{o}C) = (^{o}F - 32°) 5/9	

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APPENDIX F: WASTE WATER DATA, which appeared in certain volumes of the Bulletin No. 130 series, has been discontinued. For information regarding waste water, the reader is referred to the recently reactivated Bulletin No. 68 series: "Inventory of Waste Water Production and Waste Water Reclamation Practices in California".

ABSTRACT

The report contains tables showing data on surface water flow, ground water levels, and surface and ground water quality in the North Coastal area during the 1971-72 water year. Figures show the location of climatological stations, surface water measurement stations, surface water sampling stations, and ground water basins. Although a map and index of climatological stations are included, precipitation and evaporation data have been dropped from the Bulletin No. 130 series.

ACKNOWLEDGMENTS

Valuable assistance and contributions were received from several public agencies and many private cooperators. The cooperation of the National Weather Service (formerly the U. S. Weather Bureau) and the U. S. Geological Survey was particularly helpful and is gratefully appreciated.

A special note of thanks is extended to the many loyal and dedicated weather observers whose unselfish efforts have contributed immeasurably to our knowledge of historical weather conditions in the North Coastal area.

State of California
The Resources Agency
DEPARTMENT OF WATER RESOURCES

RONALD REAGAN, Governor
NORMAN B. LIVERMORE, JR., Secretary for Resources
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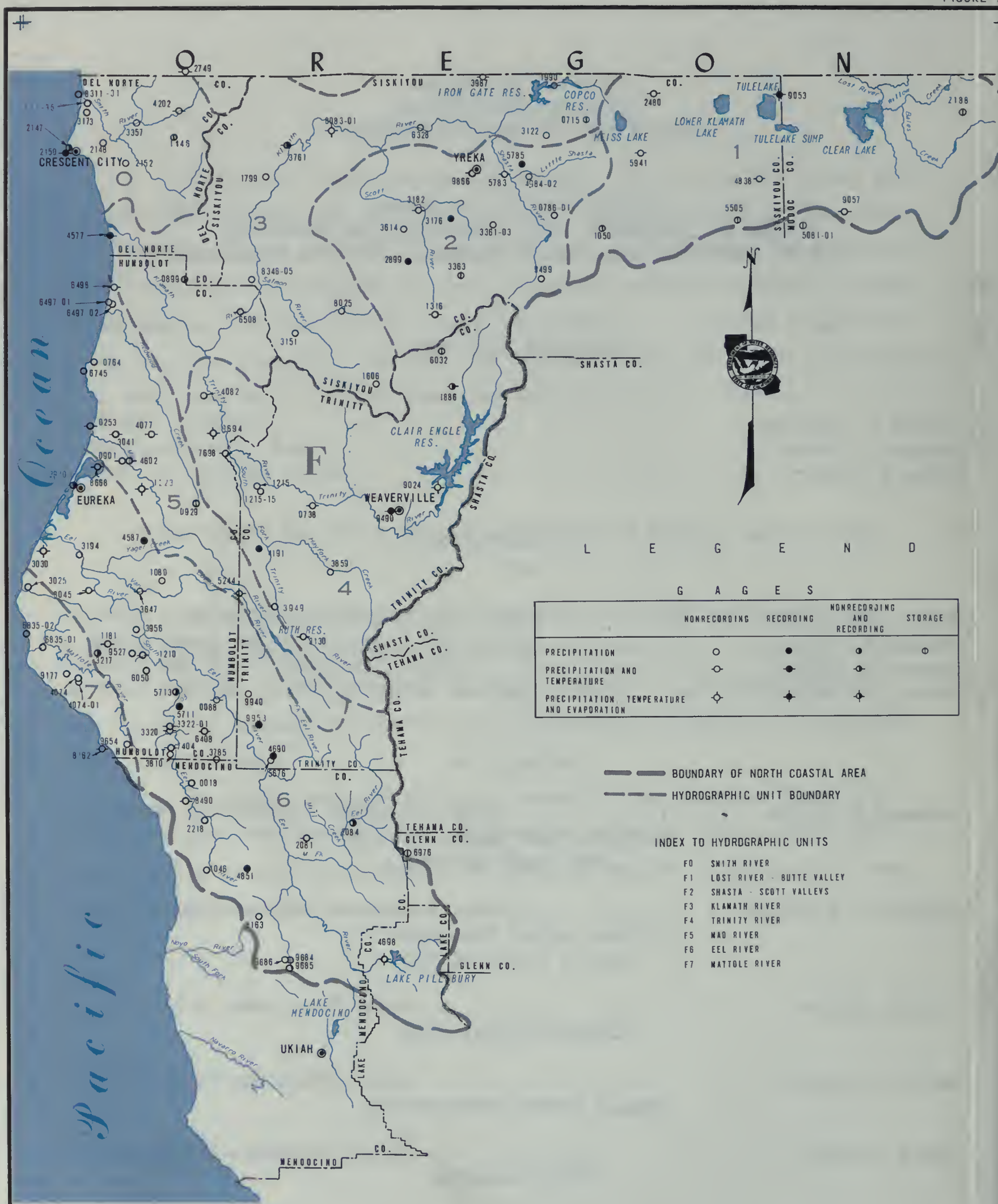


CLIMATOLOGICAL OBSERVATION STATIONS

APPENDIX A

CLIMATOLOGICAL DATA

TABLE A-1

PRECIPITATION IN NORTH COASTAL AREA DURING WATER YEAR 1972

Table A-1 summarizes monthly precipitation totals for selected stations for the 1972 water year, October 1, 1971, through September 30, 1972. The table shows each station's assigned number in accordance with the explanation given in the Introduction to this appendix. Location is shown by latitude and longitude in degrees to the third decimal.

Precipitation values are shown to the nearest hundredth (.01) of an inch. Where Fischer & Porter rain gages are used, a zero is shown in the second decimal place, even though these instruments record to only the nearest tenth (.1) of an inch. The following notations are used to qualify the values:

- \- No record or incomplete record
- B Record began
- E Wholly or partially estimated
- N Record ends
- T Trace, an amount too small to measure

Precipitation data collected by the National Weather Service and local observers and cooperators in the North Coastal area are available in greater detail in other reports. The National Weather Service publishers a report entitled "Climatological Data for California" and a companion volume, "Hourly Precipitation Data". Department of Water Resources Bulletin No. 165, "Climatological Stations in California, 1971, Indexed by County", includes data assembled by observers and cooperators and lists both active and historical precipitation measurement stations.

In addition, evaporation data and daily climatologic data, including temperatures, together with local conditions and qualifying

remarks, are available in the files of the Department of Water Resources.

The map and index of climatological stations in the North Coastal area have been included in this appendix to show the location of the stations and pertinent information concerning them.

The county codes (CO) used in Table A-1 are shown below:

County	Code
Del Norte	08
Glenn	11
Humboldt	12
Lake	17
Mendocino	23
Modoc	25
Siskiyou	47
Trinity	53

TABLE A-1

PRECIPITATION IN NORTH COASTAL AREA DURING WATER YEAR 1972

CO	STA NO	LAT	LONG	ELEV	STATION NAME	TOTAL	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
12	F60008800	40.183	123.600	435	ALDERPOINT	44.73	2.00	6.17	8.06	7.02	9.01	4.90	4.36	.64	.69	.00	.23	1.65
12	F50025300	40.972	124.090	217	ARCATA AIRPORT	55.73	1.23	8.63	8.65	10.67	8.17	10.13	3.36	1.66	1.34	.11	.12	1.66
53	F40073800	40.748	123.244	1270	BIG BAR RANGER STA	.00-	.00-	6.29	6.33	5.41	6.12	5.92	2.38	1.24	1.05	.00	.54	3.11
47	F20078601	41.592	122.328	2955	BIG SPRINGS 4E	11.48	.38	1.83	1.56	.95	.97	2.07	.92	1.14	.60	.00	.16	.90
23	F60104600	39.686	123.660	1480	BRANSCOMB 2 NW	73.97	1.34	10.98	12.51	15.28	14.27	7.83	5.46	1.02	.75	.00	.58	3.95
12	F60108000	40.516	123.816	2050	BRIDGEVILLE 4 NNW	.00-	2.33	13.53	15.09	9.70	9.99	11.52	5.22	1.49	.00	.00	.00	3.40
12	F60118100	40.350	124.108	410	BULL CREEK	.00-	1.80	16.83	10.01	8.72	11.58	7.44	6.39	.99	.00-	.00-	.28	2.36
12	F60121000	40.308	123.907	200	BURLINGTON STATE PARK	55.32	1.33	12.75	11.21	6.00	9.09	5.17	5.06	.69	.93	.00	.51	2.58
53	F40121500	40.796	123.479	2150	BURNT RANCH 1S	46.13	1.24	8.92	9.13	5.49	7.23	5.85	3.36	1.24	.86	.00	.34	2.47
12	F50123300	40.766	123.900	420	BUTLER VALLEY RANCH	65.09	2.02	11.63	13.54	10.35	7.69	11.13	4.26	1.34	1.21	.00	.17	1.75
47	F20131600	41.300	122.800	3136	CALLAHAN RANGER STA	20.65	.65	3.65	2.52	4.31	2.25	3.34	1.31	.91	.90	.02	.12	.67
47	F30160600	41.100	123.050	2980	CECILVILLE 5 SE	42.37	1.51	6.91	4.46	10.14	6.65	5.58	2.79	1.16	1.61	.00	.39	1.17
47	F30179900	41.708	123.448	975	CLEAR CREEK	65.95	1.61	11.82	9.96	11.72	11.75	9.02	6.00	1.26	.70	.00	.96	1.15
53	F40188600	41.083	122.700	2500	COFFEE CREEK RS	48.00	1.50	9.80	8.40	6.60	7.40	5.80	4.60	1.00	1.10	.00	.90	.90
47	F30199000	41.983	122.333	2700	COPCO DAM NO 1	23.24	1.70	3.50	2.84	4.71	2.35	3.69	1.34	.81	1.46	.00	.25	.59
23	F60208100	39.783	123.250	1385	COVELO	32.07	.56	4.21	7.25	4.46	6.74	3.34	2.38	.80	.56	.01	.26	1.50
23	F60208400	39.833	123.083	1514	COVELO EEL RIVER RS	34.02E	.40	4.15E	6.15	4.29	7.27	4.15	2.57	1.12	.33	.04	.20	3.35
08	F00214700	41.766	124.200	40	CRESCENT CITY 1 N	74.60	2.18	9.72	11.65	16.44	9.71	15.22	5.73	1.57	1.00	.08	.41	.89
08	F00214800	41.800	124.083	120	CRESCENT CITY 7 ENE	102.90	2.04	14.75	17.33	22.36	13.78	19.11	8.98	1.94	1.14	.00	.00	1.47
08	F00215000	41.766	124.200	50	CRESCENT CITY HMS	67.60E	1.56	9.18	11.35	15.99	8.70	10.71E	6.41	1.60	1.00	.00	.30	.80
08	F00215200	41.755	123.991	360	CRESCENT CITY 11 E	127.21	2.88	19.97	22.44	26.26	16.12	22.83	10.77	1.89	1.92	.00	.55	1.58
23	F60221800	39.833	123.633	1270	CUMMINGS	.00-	1.18	9.80	11.35	12.48	11.73	7.19	4.74	.90	.68	.00	.45	3.42
47	F10248000	41.955	121.908	4240	DORRIS INSPECTION STA	13.92	1.22	1.36	2.24	2.64	1.17	1.99	.96	.77	.91	.03	.04	.59
08	F00274900	42.000	123.716	1711	ELK VALLEY	.00-	1.99	16.51	12.98	18.95	14.67	15.10	.00-	1.84	1.22	.00	.58	1.51
47	F20289900	41.466	122.900	2912	ETNA	34.06	1.14	5.09	3.55	7.92	4.76	5.74	1.98	.64	1.56	.05	.65	.98
12	F60291000	40.800	124.166	43	EUREKA WB CITY	37.97	.92	6.30	6.38	7.96	5.93	5.08	2.27	1.11	.88	.01	.07	1.06
12	F70302500	40.491	124.339	1445	FERNDALE 8SSW	.00-	1.25	10.55	11.68	.00-	.00-	.00-	.00-	.00-	.00-	.00-	.00-	.00-
12	F60303000	40.598	124.276	10	FERNDALE 2 NW	38.82	.70	7.08	8.32	6.19	5.85	4.36	3.37	.72	.53	.02	.07	1.61
12	F50304100	40.943	124.018	285	FIELDBROOK 4 D RCH	71.85	1.90	12.45	11.60	15.40	8.75	12.50	4.45	1.85	1.35	.02	.10	1.48
47	F30312200	41.812	122.372	2960	FOOTHILL SCHOOL	17.28	1.40	2.08	2.18	3.44	1.78	2.74	1.10	.83	.85	.00	.20	.68
53	F40313000	40.383	123.333	2340	FOREST GLEN	.00-	1.08	8.36	9.42	5.88	10.94	6.89	5.21	1.41	1.14	.00	.00	3.04
47	F30315100	41.253	123.316	1270	FORKS OF SALMON	.00-	2.09	9.98	8.12	8.77	7.48	9.52	3.07	1.14	.00-	.00-	.00-	.00-
08	F00317300	41.866	124.150	46	FORT DICK	93.04	2.48	12.01	14.76	21.00	11.76	18.81	7.80	1.65	1.09	.14	.47	1.07
47	F20317600	41.583	122.716	3324	FORT JONES 6 ESE	20.80	.60	2.70	2.60	4.30	2.70	2.70	1.50	1.30	1.10	.00	.50	.80
47	F20318200	41.600	122.850	2720	FORT JONES RANGER ST	26.91	.66	3.97	2.77	7.30	3.12	2.64	1.20	.96	1.43	.00T	.39	2.47
12	F60319400	40.600	124.150	60	FORTUNA	48.10	.89	8.71	8.90	9.22	5.28	7.49	3.35	1.06	.54	.00	.12	2.54
12	F60321700	40.307	124.065	2500	FOX CAMP	.00-	2.52	20.45	17.00	11.35	13.00	11.25	6.50	3.25	.00-	.00-	.00-	3.50
12	F60332000	40.100	123.800	340	GARBERVILLE	45.79	.88	8.20	8.85	7.40	9.94	3.32	4.28	.73	.05	.00	.41	1.73
12	F60332201	40.100	123.794	540	GARBERVILLE HMS	49.24	1.21	7.65	8.25	8.49	9.97	4.74	4.54	.87	.90	.00	.41	2.21
08	F00335700	41.866	123.966	384	GASQUET RANGER STA	115.67	2.38	17.57	19.17	25.45	14.43	22.37	9.46	1.87	.83	.01	.57	1.56
47	F20361400	41.550	122.900	2818	GREENVIEW	20.22	.30	4.11	1.86	4.26	4.44	2.22	1.02	.70	.11	.00	.40	.80
47	F30376100	41.800	123.383	1090	HAPPY CAMP RANGER STA	58.37	1.35	10.71	8.84	10.71	9.76	8.99	4.78	1.08	.30	.04	.79	1.02
23	F60378500	39.990	123.612	1910	HARRIS 7 SSE	53.92	1.12	7.58	10.82	8.43	11.15	5.67	4.56	.69	.15	.00	.45	3.30
53	F40385900	40.550	123.166	2340	HAYFORK RANGER STA	29.94	.98	4.29	5.17	3.57	5.00	4.01	2.01	.79	.62	.00T	.86	2.64
47	F30398700	42.000	122.633	2900	HILTS	25.83	1.11	5.05	3.48	5.26	3.15	3.28	1.69	.88	1.04	.00	.43	.46
12	F70407400	40.238	124.150	380	HONEYDEW 2 WSW	89.20E	2.00E	21.49	16.19	10.73	14.74	9.90	8.84	1.34	.91	.00	.72	2.34
12	F40408200	41.050	123.666	350	HOOPA	61.97	2.29	11.95	10.37	10.47	9.61	9.66	3.88	1.17	.80	.00	.35	1.42
53	F40419100	40.616	123.466	1260	HYAMPOM	36.94E	.82	6.72	6.83	5.87	6.99	4.00E	1.91	.60	.50	.00	.10	2.60
08	F30457700	41.516	124.033	25	KLAMATH	100.01	2.35	14.65	15.90	22.00	11.85	21.25	7.42	1.70	1.19	.04	.17	1.49
12	F60458700	40.633	123.900	2356	KNEELAND 10 SSE	70.04E	2.36	11.58	13.95	11.70	9.00E	11.74	4.77	1.35	1.02	.00	.15	2.42
12	F50460200	40.866	123.958	150	KORBEL	62.25	1.65	8.13	10.31	12.35	10.35	10.71	4.11	1.69	1.09	.00	.25	1.61
47	F10483800	41.729	121.508	4770	LAVA BEDS NAT MON	12.18	.80	.76	2.43	1.28	1.17	.95	1.89	1.51	.36	.01	.56	.46
23	F60485100	39.700	123.483	1640	LAYTONVILLE	.00-	.00-	6.67	8.01	7.00	8.51	.00-	3.65	1.20E	.60	.00	.79	2.45
47	F20498402	41.717	122.383	2725	LITTLE SHASTA	13.56	1.30	1.31	1.80	2.30	1.63	1.88	.95	1.05	.65	.00	.25	.44
53	F50524400	40.450	123.533	2775	MAD RIVER RANGER STA	56.79	.72	10.43	10.34	8.53	8.26	8.03	4.44	.91	.65	.00	.41	4.07
12	F60571100	40.183	123.783	263	MIRANDA 4 SE	52.40E	1.40	8.30	8.40	8.20	10.20	5.10	5.70	.70E	.70E	.00	.20	3.50
12	F60571300	40.200	123.766	400	MIRANDA SPENGLER RCH	48.31	1.39	7.54	8.29	7.29	9.92	4.40	4.10	.70	.81	.00	.26	3.61
47	F20578300	41.728	122.527	2500	MONTAGUE	.00-	.99	1.79	1.79	2.09	1.39	1.96	.00-	.00-	.52	.00-	.38	.57
47	F10594100	41.783	122.000	4250	MOUNT HEBRON R S	13.34	.79	2.07	1.16	3.35	1.33	1.35	.70	1.59	.38	.02	.13	.47
12	F60605000	40.261	123.866	190	MYERS FLAT	55.97	1.53	11.66	10.48	7.16	9.25	5.38	5.60	.84	.97	.00	.33	2.77
47	F30632800	41.833	122.850	1963	OAKKNOLL RANGER STA	.00-	.97	5.81	4.29	6.54	3.64	4.30	1.71	.87	1.19	.00	.00-	.00-
12	F60640800	40.083	123.661	2225	OLD HARRIS	49.54	1.48	7.90	10.41	2.26	11.18	6.56	5.06	1.25	.70	.00	.58	2.16
12	F50649702	41.323	124.042	50	ORICK ARCATA REDWOOD	72.52	1.97	9.22	11.97	15.73	9.09	14.00	5.63	2.01	1.37	.00T	.20	1.33
12	F50649800	41.366	124.016	161	ORICK PRAIRIE CREEK	72.51	1.87	10.23	14.11	15.43	9.94	11.66	5.41	1.71	.92	.01	.18	1.04
12	F30650800	41.300	123.533	403	ORLEANS	55.77	1.84	10.59	8.94	7.74	9.84	10.42	3.03	1.44	1.04	.00	.34	.55
12	F50674500	41.137	124.150	250	PATRICKS PT STATE PARK	.00-	1.44	10.14	10.82	12.30	8.43	11.57	4.62	.00-	.00-	.00-	.00-	.00-
12	F70683501	40.324	124.279	175	PETROLIA	64.30	2.13	15.69	12.85	8.29	8.26	8.14	4.87	1.15	.62	.00	.35	1.95
12	F60740400	40.033	123.783	500	RICHARDSON GROVE	58.52	1.17	8.91	9.61	11.42	11.98	4.98	5.92	1.09	.80	.00	.66	1.98
47	F30802500	41.300	123.133	2169	SAWYERS BAR R S	52.75	1.77	9.09	6.39	11.20	7.17	9.92	3.13	1.16	1.44	.00T	.67	.81
12	F60804500	40.483	124.100	139	SCOTIA	47.20	1.19	10.29	11.21	6.33	5.53	5.54	3.83	.83	.73	.00T	.07	1.65
12	F70816200	40.033	124.066	55	SHELTER COVE	66.37	1.90	9.97	8.48	12.76	12.09	9.19	4.65	1.13	1.28	.05	.24	4.63
8	F00831135	41.933	124.173	100	SMITH RIVER	91.68	2.76	12.02	14.06	21.41	11.41	18.39	7.00	1.84	.96	.09	.56	1.18
23	F60849000	39.874	123.724	850	STANDISH HICKEY PARK	65.51	1.45	8.98	8.96	15.67	13.01	6.17	5.54	1.04	.96	.00	.53	3.20
12	F60866850	40.867	124.067	70	SUNNY BRAE	48.55	1.32	6.47	8.34	10.38	6.77	7.24	3.84	1.66	1.06	.11	.12	1.24
53	F40902400	40.800	122.766	2500	TRINITY DAM VISTA PT	35.86	1.34	5.47	5.60	6.79	5.59	3.98	2.44	1.33	.58	.00T	.37	2.37
47	F10905300	41.966	121.466	4035	TULELAKE	10.29	.81	.92	1.43	1.85	1.20	1.98	.51	.60	.21	.00	.07	.71
12	F70917700	40.250	124.183	255	UPPER MATTOLE	75.68	1.68	18.04	14.12	9.85	11.72	8.91	6.68	1.29	.82	.00	.42	2.15
53	F40949000	40.733	122.933	2050	WEAVERVILLE RANGER S	36.57	1.16	5.94	5.57	5.32	5.57	5.09	2.34	1.19	.31	.00	.40	3.68
47	F20949900	41.433	122.383	3593	WEED FD	17.95	1.34	2.77	2.89	1.88	1.18	2.37	2.21	1.80	1.06	.00	.05	.40
12	F70965400	40.021	123.936	1050	WHITEHORN	85.37	5.59	13.29	11.03	16.72	17.30	7.95	6.39	1.39	.94	.00	.82	3.95
23	F60968400	39.416	123.350	1350	WILLITS 1 NE	40.64	.86	6.17	8.31	7.22	6.83	3.69	3.17	.86	.55	.00	.47	2.51
23	F60968500	39.350	123.316	1925	WILLITS HOWARD RS	39.28E	.84	5.87E	8.22	6.75	6.54	3.59	3.51	.99	.56	.00	.51	1.90
53	F40969400	40.950	123.633	461	WILLOW CREEK 1 NW	61.46	1.16	12.15	11.50	9.85	9.12	10.05	4.17	.84	.80	.00	.21	1.61
47	F20986600	41.716	122.633	2631	YREKA	19.92	.79	2.77	2.29	4.23	1.85	3.21	1.35	.68	1.21	.01	.34	1.19
53	F60994000	40.188	123.481	2880	ZENIA 1 SSE	59.44	1.66	7.37	10.96	8.61	11.44	8.52	5.08	1.91	1.15	.00	.69	2.05

TABLE A-2

STORAGE GAGE PRECIPITATION DATA

Table A-2 lists storage gages for which the seasonal accumulation of precipitation is reported. These gages are located in the remote mountain regions where no observers are available to operate conventional rain gages. Storage precipitation gages are tanks with capacity for storing an entire year's rainfall, along with antifreeze, to melt frozen precipitation and oil to prevent evaporation losses. Once each year, in the summer or early fall, the precipitation that has accumulated since the last measurement is measured and then emptied out. With the addition of the proper amount of oil and antifreeze, the gage is ready to receive the next season's amount. Although logistics preclude conducting the measurement operation exactly at the end of the water year and exactly one year following the previous measurement, the gages fairly accurately depict the total precipitation for the water year because usually a very small amount of precipitation occurs during the summer.

TABLE A-2

STORAGE GAGE PRECIPITATION DATA
NORTH COASTAL AREA

Station	Measuring Agency	1971-72 Season Measurement Period		Precipitation in Inches
NORTH COASTAL AREA				
SMITH RIVER				
Camp Six Lookout	DWR	7-27-71	7-11-72	130.44
LOST RIVER-BUTTE VALLEY				
Bray 10 WSW	DWR	7-27-71	7-11-72	27.00
Crowder Flat	DWR	8-11-71	7-20-72	19.35
Long Bell Station	DWR	7-29-71	7-13-72	25.42
Medicine Lake	DWR	7-29-71	7-13-72	44.08
SHASTA-SCOTT VALLEYS				
Gazelle Lookout	DWR	7-20-71	7-12-72	21.27
KLAMATH RIVER				
Beswick 7S	DWR	7-27-71	7-11-72	48.58
Blue Creek Mountain	DWR	7-26-71	7-10-72	153.87
TRINITY RIVER				
Board Camp Mountain	DWR	7-26-71	7-10-72	123.17
Mumbo Basin	DWR	7-20-71	7-12-72	54.40
EEL RIVER				
Plaskett	DWR	6-13-71	7-25-72	59.70

DWR - Department of Water Resources

SURFACE WATER MEASUREMENT STATIONS

APPENDIX B

SURFACE WATER MEASUREMENTS

This appendix presents surface water data for the 1972 water year, the period from October 1, 1971 to September 30, 1972. The data consist of summary tables of monthly and annual unimpaired runoff from four major North Coastal streams and daily mean discharges at the Department's two North Coastal area gaging stations (see Figure B-1).

In addition to data collected and published by the Department of Water Resources in this appendix, the U. S. Geological Survey collects and publishes data from many additional gaging stations for the same report area. This work is done under a federal-state cooperative contract, or through cooperative arrangements with other local or government agencies. Major exportations from the North Coastal Area, made through the U. S. Bureau of Reclamation's Judge Francis Carr Powerplant and the Pacific Gas and Electric Company's Potter Valley Powerhouse, are shown in the USGS report listed below. The data published in the following reports together with this report present a comprehensive analysis of the water resources for the area:

1. "Water Resources Data for California
   Part I. Surface Water Records
   Volume 1: Colorado River Basin, Southern Great Basin, and Pacific Slope Basins excluding Central Valley"
   United States Department of the Interior, Geological Survey
   Prepared in cooperation with the California Department of Water Resources and with other agencies.
2. Bulletin 120, "Water Conditions in California", Fall Issue, Department of Water Resources.

Each of the two gaging stations has been assigned an identification number, the letter and first digit of which denote the hydrographic unit; the remaining digits further identify the stations.

<u>North Coastal Area</u>

F0 - Smith River	F4 - Trinity River
F1 - Lost River-Butte Valley	F5 - Mad River
F2 - Shasta-Scott Valleys	F6 - Eel River
F3 - Klamath River	F7 - Mattole River

TABLE B-1 ANNUAL UNIMPAIRED RUNOFF

Unimpaired runoff is defined as the flow that would occur naturally at a point in a stream if there were: (1) no upstream controls such as dams or reservoirs; (2) no artifical diversions or accretions; and (3) no change in ground water storage resulting from development.

TABLE B-1

ANNUAL UNIMPAIRED RUNOFF
In Percent of Average

Water Year	Klamath River, Copco to Orleans	Salmon River at Somesbar	Trinity River at Lewiston	Eel River at Scotia
Average Annual Runoff*	4515	1246	1227	5379
1920-21			146	145
1921-22			64	69
1922-23			56	51
1923-24			22	16
1924-25			122	133
1925-26			66	61
1926-27			149	146
1927-28	84	88	86	86
1928-29	56	48	43	35
1929-30	-	62	66	65
1930-31	39	38	33	30
1931-32	74	84	59	67
1932-33	79	81	65	68
1933-34	48	47	56	46
1934-35	80	91	79	94
1935-36	88	92	83	107
1936-37	72	79	81	66
1937-38	176	179	171	200
1938-39	57	61	47	50
1939-40	100	103	131	136
1940-41	99	102	208	153
1941-42	102	106	147	138
1942-43	131	139	90	106
1943-44	60	51	53	42
1944-45	81	91	85	89
1945-46	114	122	115	112
1946-47	57	62	60	49
1947-48	95	99	98	88
1948-49	71	77	89	77
1949-50	90	95	70	77
1950-51	140	144	131	133
1951-52	147	157	148	149
1952-53	143	145	131	133
1953-54	136	128	129	129
1954-55	59	47	60	60
1955-56	183	176	165	190
1956-57	96	95	88	81
1957-58	181	181	219	217
1958-59	75	80	85	77
1959-60	76	76	84	87
1960-61	100	97	99	100
1961-62	72	77	85	73
1962-63	130	137	130	132
1963-64	88	90	65	64
1964-65	158	150	140	175
1965-66	99	89	110	96
1966-67	115	101	135	123
1967-68	75	76	82	79
1968-69	133	133	143	161
1969-70	140	128	130	139
1970-71	188	197	136	148
1971-72**	140	153	95	83

* Average annual unimpaired runoff in thousands of acre-feet adjusted to the 50-year period October 1920 through September 1970 for the Eel and Trinity Rivers; the 43-year period October 1927 through September 1970 for the Salmon River; and, the 42-year period October 1927 through September 1929 and October 1930 through September 1970 for the Klamath River.

** Preliminary Data Subject to Revision.

TABLE B-2

MONTHLY UNIMPAIRED RUNOFF
In Percent of Average

Month		Klamath River, Copco to Orleans	Salmon River at Somesbar	Trinity River at Lewiston	Eel River at Scotia
October	Percent	84	96	25	22
1971	Average	88	22	21	55
November	Percent	124	130	60	46
1971	Average	219	56	51	284
December	Percent	77	115	51	69
1971	Average	496	130	99	939
January	Percent	193	202	114	71
1972	Average	666	168	110	1225
February	Percent	130	108	85	85
1972	Average	618	161	149	1176
March	Percent	330	397	215	137
1972	Average	598	161	157	795
April	Percent	89	97	80	89
1972	Average	639	183	217	550
May	Percent	85	89	80	56
1972	Average	598	195	241	237
June	Percent	75	93	74	60
1972	Average	341	110	123	79
July	Percent	89	94	57	83
1972	Average	127	36	36	22
August	Percent	64	122	69	94
1972	Average	68	15	13	10
September	Percent	98	117	-0-	159
1972	Average	57	11	9	7
1971-72		140	153	95	83
Water Year		6337	1912	1166	4456

Note: The percent values are preliminary data subject to revision. Average annual unimpaired runoff in thousands of acre-feet adjusted to the 50-year period October 1920 through September 1970 for the Eel and Trinity Rivers; the 43-year period October 1927 through September 1970 for the Salmon River; and the 42-year period consisting of October 1927 through September 1929 and October 1930 through September 1970 for the Klamath River.

TABLE B-3 DAILY MEAN DISCHARGE

The streamflow table is arranged in downstream order for each stream or stream system. Stations on a tributary entering between two main stem stations are listed between those stations, and in downstream order on that tributary. A stream gaging station is named after the stream and the nearest post office (e.g., Little Shasta River near Montague).

The discharges estimated for periods of no record or invalid record are shown with the letter "E". Also qualified by the letter "E" are discharges obtained from extended ratings which exceed 140 percent of the highest measured flow-rate on which the rating curve was based.

The discharge figures in this table have been rounded off as follows:

1. Daily flows - cubic feet per second

0.0	- 9.9	nearest	Tenth
10	- 999	"	Unit
1,000	- 9,999	"	Ten
10,000	- 99,999	"	Hundred
100,000	- 999,999	"	Thousand

2. Monthly means - cubic feet per second

0.0	- 99.9	nearest	Tenth
100	- 9,999	"	Unit
10,000	- 99,999	"	Ten
100,000	- 999,999	"	Hundred

3. Yearly totals - acre-feet

0.0	- 9,999	nearest	Unit
10,000	- 99,999	"	Ten
100,000	- 999,999	"	Hundred
1,000,000	- 9,999,999	"	Thousand

ABLE B- 3
AILY MEAN DISCHARGE
(IN CUBIC FEET PER SECOND)

WATER YEAR	STATION NO.	STATION NAME
1972	F21300	LITTLE SHASTA RIVER NEAR MONTAGUE

DAY	OCT.	NOV.	DEC.	JAN.	FEB.	MAR.	APR.	MAY	JUNE	JULY	AUG.	SEPT.	DAY
1	9.5	8.9	8.2	8.9	37	170	74	58	57	22	13	8.5	1
2	9.5	8.5	8.2	8.9	32	224	118	62 *	55 *	21	12	8.4	2
3	9.0	8.2	7.5	8.5	29	300	92	66	53	20	12	8.8	3
4	8.4	8.2	7.2	8.5	25	250	85	73	51	20	12	9.2	4
5	7.7	8.2	21	8.2	21	209	89	80	50	19	12	10	5
6	7.5	7.5	40	8.2	18	165	82	81	49	19	11	9.6	6
7	7.5 *	7.1	16 *	7.8	15 *	161	75	79	48	18	11	8.6	7
8	7.5	7.1	14	7.8	18	140	74	76	47	18	11	8.2	8
9	7.5	7.1 *	12	7.5	21	131	68	74	51	18	11 *	8.1	9
10	7.5	7.8	9.7	7.1	25	125	64	75	51	17	11	8.5	10
11	7.5	8.2	9.3	7.1	29	120	68	76	48	17	11	8.5	11
12	7.5	7.8	8.9	8.2	34	115	62	79	44	16	10	8.5	12
13	7.5	7.5	8.9	8.9	43	110	66	82	41	16	11	8.3 *	13
14	7.5	7.5	8.9	9.7	43	105	68	83	39	16	11	8.0	14
15	7.5	6.8	8.2	11	46	104 *	71	83	37	16	11	7.9	15
16	7.5	7.1	8.2	11	51	107	65	86	37	15	12	7.8	16
17	7.5	7.1	8.2	11	58	110	57	90	35	15	11	7.8	17
18	7.8	7.1	8.5	23	54	108	52	81	33	15	10	7.7	18
19	7.8	6.8	8.9	34	55	100	50	80	32	15	10	8.0	19
20	8.2	7.2	8.9	42	72	94	49	94	31	15	10	8.1	20
21	8.2	7.1	8.9	156	65	91	51	84	29	15	10	8.1	21
22	7.3	6.8	8.9	291	55	108	51	77	28	14	10	8.0	22
23	10	6.5	9.3	163	51	107	50	74	27	14	10	8.0	23
24	8.9	8.2	11	95	51	104	52	71	27	14	9.9	8.0	24
25	8.5	7.5	11	72	48	92	48	68	26	14	9.6	8.1 *	25
26	11	17	11	68	56	82	48	66	25	13	9.4	10	26
27	11	17	10	62	80	75	54	64	24	13	9.2	9.9	27
28	7.3	13	9.7	57	110	71	57	63	24	13	9.1	8.0	28
29	8.5	11	9.3	51	140	66	52	62	23	13	9.1	7.7	29
30	8.5	11	8.9	46		63	54	61	23	13	9.1	7.5	30
31	7.8		8.9	41		61		59		12	8.9		31
EAN	8.3	8.6	10.9	43.5	47.7	125	64.9	74.4	38.2	16.0	10.6	8.4	MEAN
AX.	11	17	40	291	140	300	118	94	57	22	13	10	MAX.
IN.	7.5	6.5	7.2	7.1	15	61	48	58	23	12	8.9	7.5	MIN.
C. FT.	508	509	670	2676	2741	7672	3860	4576	2271	984	649	499	AC. FT.

— ESTIMATED
— NO RECORD
— DISCHARGE MEASUREMENT OR OBSERVATION OF NO FLOW
— E AND *

WATER YEAR SUMMARY

MEAN DISCHARGE	MAXIMUM DISCHARGE	MAXIMUM GAGE HT.	MAXIMUM MO.	MAXIMUM DAY	MAXIMUM TIME	MINIMUM DISCHARGE	MINIMUM GAGE HT.	MINIMUM MO.	MINIMUM DAY	MINIMUM TIME	TOTAL ACRE FEET
38.0	342	3.66	1	22	0700	5.4	0.80	9	13	0915	27,600

LOCATION			MAXIMUM DISCHARGE OF RECORD			PERIOD OF RECORD		DATUM OF GAGE			
LATITUDE	LONGITUDE	1/4 SEC. T. & R. M.D.B.&M.	CFS	GAGE HT.	DATE	DISCHARGE	GAGE HEIGHT ONLY	PERIOD FROM	PERIOD TO	ZERO ON GAGE	REF. DATUM
41 45 11	122 17 58	NW15 45N 4W	5910 E	10.66	12/22/64	28-NOV 51 8 APR 52-APR 55 SEP 56-DATE	28-NOV 51 8 APR 52-APR 55 SEP 56-DATE	1956	1964	0.00	LOCAL

Station located S of Ball Mountain Road, 12 mi. NE of Montague, 16 mi. SW of Macdoel. Stage-discharge relationship affected by ice at times. Drainage area is 48.2 sq. mi.

8 - Irrigation season only.

BLE B-3(CONT.)
ILY MEAN DISCHARGE
IN CUBIC FEET PER SECOND)

WATER YEAR	STATION NO.	STATION NAME
1972	F42100	NORTH FORK TRINITY RIVER NEAR HELENA

Y	OCT.	NOV.	DEC.	JAN.	FEB.	MAR.	APR.	MAY	JUNE	JULY	AUG.	SEPT.	DAY
	47	44	363	171	436	2250	540	385	462	248	53	30	1
	44	45	321	174	403	8340	647	416	441	234	51	30	2
	50	43	286	182	393	8010	654	434 *	380	227	48	31	3
	56	42	247	179	384	3810	672	472	356	202	45	30	4
	50	42	322	172 *	372	2550	1030	505	398	170	43	34	5
	46 *	40	1060	169	372	1900	954	494	440	142	43	32	6
	43	39	612 *	170	378	1610 *	839	451	473	130	42 *	30	7
	40	39	459	165	378	1420	749	394	469	108	40	29	8
	38	49 *	537	159	375	1390	665	354	501	102	40	29	9
	36	164	521	153	365	1450	606	352	383	95	41	29	10
	35	164	437	149	359	1390	610 *	368	272	94	39	28 *	11
	34	180	401	178	359	1420	621	410	231	96	38	35	12
	32	254	330	260	365	1580	601	472	239	102	38	32	13
	31	153	312	237	390	1360	599	537	290	98	37	31 *	14
	32	110	288	218	396	1210	643	525	316	100	36	30	15
	33	94	262	211	409	1240	664	486	307	101	55	28	16
	33	86	250	208	400	1250	617	425 *	301	100 *	57	28	17
	33	79	253	334	390	1160	566	358	306	94	47	27	18
	36	74	252	593	310	959	521	319	299	85	43	27	19
	59	79	250	802	526	835	489	419	308 *	77	48	27	20
	46	87	251	3140	484	760	474	396	308	70	46	26	21
	41	85	330	8550	499	911	461	335	269	66	42	26	22
	58	82	320	4810	499	816 *	456	316	249	63	40	26	23
	53	121	333	2050	582	840	459	335	188	63	38	26	24
	46	121	346	1380	568	886	426	359	169	64 *	36	27	25
	45	837	306	1000	675	783	410	403	167	62	34	94	26
	60	709	261	756	1290	702	423	459	191	61	32	211	27
	48	699	228	633	4670	641	455	505	232	58	32	75	28
	43	641	208	561	3480	593	411	525	263	57	31	55	29
	47	475	188	516		560	381	521	267	59	31	46	30
	47		175	478		539		499		54	30		31
IN	43.3	189	345	928	707	1715	588	427	316	106	41.2	40.3	MEAN
X.	60	837	1060	8550	4670	8340	1030	537	501	248	57	211	MAX.
N.	31	39	175	149	310	539	381	316	167	54	30	26	MIN.
T.	2662	11260	21240	57040	40680	105500	34990	26240	18790	6510	2531	2398	AC.FT.

E - ESTIMATED
NR - NO RECORD
* - DISCHARGE MEASUREMENT OR OBSERVATION OF NO FLOW
\# - E AND *

WATER YEAR SUMMARY

MEAN DISCHARGE	MAXIMUM DISCHARGE	MAXIMUM GAGE HT.	MAXIMUM MO.	MAXIMUM DAY	MAXIMUM TIME	MINIMUM DISCHARGE	MINIMUM GAGE HT.	MINIMUM MO.	MINIMUM DAY	MINIMUM TIME	TOTAL ACRE FEET
454	12900	19.45	3	2	2400	26.0	5.62	9	23	1230	333,400

LOCATION			MAXIMUM DISCHARGE OF RECORD			PERIOD OF RECORD		DATUM OF GAGE			
LATITUDE	LONGITUDE	1/4 SEC. T. & R. M.D.B.&M.	CFS	GAGE HT.	DATE	DISCHARGE	GAGE HEIGHT ONLY	PERIOD FROM	PERIOD TO	ZERO ON GAGE	REF. DATUM
40 46 55	123 07 40	SW21 34N 11W	35800	27.93	12/22/64	JAN 57-DATE	JAN 57-DATE	1957		0.00	LOCAL

Station located 1.0 mi. above mouth, 0.6 mi. N of Helena. Stage-discharge relationship affected by ice at times. Drainage area is 151 sq. mi.

GROUND WATER BASINS, WATER LEVEL MEASUREMENTS

APPENDIX C

GROUND WATER MEASUREMENTS

This appendix contains ground water level measurements from 54 wells for the period October 1, 1971 through September 30, 1972. It also contains a table which summarizes the measurements. Wells in the network are continuously reviewed and, when conditions dictate, replacement wells are located and measured.

There are nine ground water basins in the North Coastal Region for which data are reported.

Two numbering systems are used by the Department to facilitate the processing of water level measurement data. The two systems are the Region and Basin Designation and the State Well Numbering System as described below.

The regions are those of the California Regional Water Quality Control Boards whose geographic areas are defined in Section 13200 of the Water Code. That portion of Northern California covered by this report is included in the North Coast Region. A decimal system of the form 0-00.00 has been selected according to geographic regions, ground water basins, and subbasins or subareas as follows:

1 - 01 00

Region (North Coast Region)
Ground Water Basin (Smith River Basin)
Subbasin or Subarea (Subbasins or subareas have not been defined in the North Coast Region)

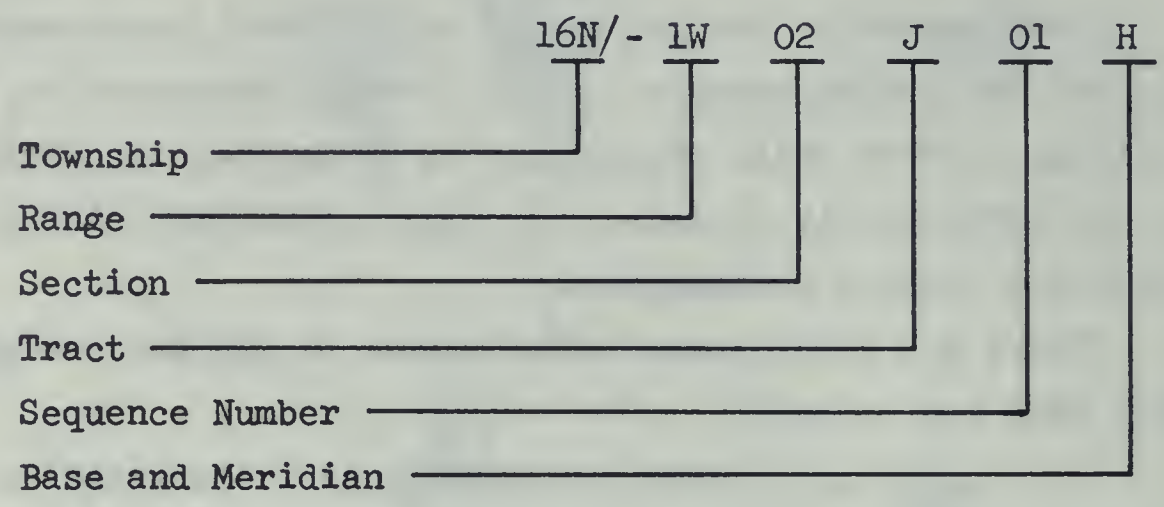
The State Well Numbering System is based on township, range, and section subdivisions of the Public Land Survey.

A section is divided into 40-acre tracts as follows:

D	C	B	A
E	F	G	H
M	L	K	J
N	P	Q	R

Sequence numbers in a tract are generally assigned in chronological order.

The number of a well, assigned in accordance with this system, is referred to as the State Well Number, as illustrated below:



This number identifies and locates the well. In the example, the well is in Township 16 North, Range 1 West, Tract J of Section 2, located in the Humboldt Base and Meridian.

TABLE C-1

AVERAGE CHANGE OF GROUND WATER LEVELS
AND SUMMARY OF WELL MEASUREMENTS REPORTED
NORTH COASTAL AREA

Ground Water Basin		Average Change Spring 1971 to Spring 1972 in feet	Measuring Agency	Number of Wells Reported	
Name	Number			Fall 1971	Spring 1972
NORTH COASTAL REGION					
Smith River Plain	1-01.00	+0.8	DWR	6	6
Butte Valley	1-03.00	-0.5	DWR	15	15
Shasta Valley	1-04.00	-1.0	DWR	8	8
Scott River Valley	1-05.00	-1.6	DWR	5	5
Mad River Valley	1-08.00	+0.2	DWR	2	2
Eel River Valley	1-10.00	+2.5	DWR	4	4
Round Valley	1-11.00	-1.4	DWR	5	5
Laytonville Valley	1-12.00	-1.6	DWR	4	4
Little Lake Valley	1-13.00	+1.0	DWR	5	5

DWR - Department of Water Resources

SURFACE WATER SAMPLING STATIONS

TABLE C-2

GROUND WATER LEVELS AT WELLS

NORTH COASTAL AREA

STATE WELL NUMBER	GROUND SURFACE ELEVATION IN FEET	DATE	GROUND SURFACE TO WATER SURFACE IN FEET	WATER SURFACE ELEVATION IN FEET	AGENCY SUPPLYING DATA
SMITH RIVER PLAIN 1-01.00					
16N/01W-02J01 H	127.0	10-13-71	20.0	107.0	5050
		4-04-72	15.9	111.1	5050
16N/01W-17K01 H	48.0	10-13-71	21.2	26.8	5050
		4-04-72	9.1	38.9	5050
17N/01W-02P01 H	31.0	10-13-71	21.1	9.9	5050
		4-04-72	16.0	15.0	5050
17N/01W-03E01 H	14.0	10-13-71	13.0	1.0	5050
		4-04-72	9.9	4.1	5050
17N/01W-15M02 H	21.0	10-13-71	15.4	5.6	5050
		4-04-72	6.3	14.7	5050
18N/01W-26P01 H	38.0	10-13-71	15.5	22.5	5050
		4-04-72	6.2	31.8	5050
		9-30-72	(6)		
			169.6/12 = 14		
BUTTE VALLEY 1-03.00					
45N/01W-06A01 M	4258.0	10-28-71	24.7	4233.3	5050
		12-16-71	28.6	4229.4	5050
		2-18-72	27.8	4230.2	5050
		3-21-72	26.8	4231.2	5050
		4-27-72	26.5	4231.5	5050
45N/02W-11P01 M	4275.0	3-21-72	39.2	4235.8	5050
		4-26-72	39.5	4235.5	5050
46N/01E-06N01 M	4242.0	10-28-71	22.3	4219.7	5050
		12-16-71	20.8	4221.2	5050
		2-18-72	20.1	4221.9	5050
		3-21-72	19.5	4222.5	5050
		4-27-72	19.1	4222.9	5050
46N/01W-17B01 M	4246.0	10-28-71	40.9	4205.1	5050
		12-16-71	36.5	4209.5	5050
		2-18-72	33.1	4212.9	5050
		3-21-72	30.0	4216.0	5050
		4-27-72	30.1	4215.9	5050
46N/01W-18Q01 M	4247.0	10-28-71	19.5	4227.5	5050
		12-16-71	18.2	4228.8	5050
		2-18-72	17.4	4229.6	5050
		3-30-72	16.3	4230.7	5050
		4-27-72	16.0	4231.0	5050
46N/02W-25R02 M	4256.0	10-28-71	28.4	4227.6	5050
		12-16-71	26.5	4229.5	5050
		2-18-72	25.8	4230.2	5050
		3-21-72	25.2	4230.8	5050
		4-27-72	23.8	4232.2	5050
46N/02W-26Q01 M	4254.0	10-29-71	14.6	4239.4	5001
		12-16-71	12.9	4241.1	5050
		2-18-72	11.8	4242.2	5050
		3-30-72	9.0	4245.0	5050
		4-13-72	9.5	4244.5	5050
47N/01E-06A02 M	4244.5	10-28-71	32.5	4212.0	5050
		3-30-72	28.7	4215.8	5050
47N/01E-20D01 M	4240.0	10-29-71	24.9	4215.1	5001
		3-30-72	21.6	4218.4	5050
47N/01W-04D01 M	4241.5	10-29-71	6.2	4235.3	5001
		5-08-72	3.4	4238.1	5001
47N/01W-04D02 M	4241.5	10-29-71	6.7	4234.8	5001
		5-08-72	4.3	4237.2	5001
47N/01W-19L01 M	4238.0	10-28-71	4.5	4233.5	5050
		3-30-72	3.6	4234.4	5050
47N/01W-27B01 M	4233.0	10-28-71	8.1	4224.9	5050
		3-21-72	5.9	4227.1	5050
47N/01W-34Q01 M	4237.0	10-29-71	17.2	4219.8	5001
		3-30-72	15.1	4221.9	5050
48N/01W-26N01 M	4244.0	10-28-71	19.5	4224.5	5050
		3-30-72	(2)		5050
			674.5/30 = 22		
SHASTA VALLEY 1-04.00					
42N/05W-20J01 M	2882.0	10-26-71	4.3	2877.7	5050
		3-20-72	5.1	2876.9	5050
42N/06W-10J01 M	2835.0	10-26-71	11.8	2823.2	5050
		3-20-72	6.9	2828.1	5050
43N/05W-11A01 M	2740.0	10-28-71	125.8	2614.2	5050
		3-21-72	126.6	2613.4	5050
43N/06W-15F03 M	2663.0	10-26-71	9.1	2653.9	5050
		3-20-72	5.5	2657.5	5050
43N/06W-22A01 M	2665.0	10-26-71	15.2	2649.8	5050
		3-20-72	5.9	2659.1	5050
44N/05W-34H01 M	2637.0	10-27-71	26.3	2610.7	5050
		3-21-72	31.5	2605.5	5050
44N/06W-10F01 M	2537.0	10-26-71	16.6	2520.4	5050
		3-21-72	26.3	2510.7	5050
45N/06W-19E01 M	2538.0	10-26-71	20.4	2517.6	5050
		3-21-72	17.9	2520.1	5050

STATE WELL NUMBER	GROUND SURFACE ELEVATION IN FEET	DATE	GROUND SURFACE TO WATER SURFACE IN FEET	WATER SURFACE ELEVATION IN FEET	AGENCY SUPPLYING DATA
SCOTT RIVER VALLEY 1-05.00					
42N/09W-02A02 M	2746.0	10-26-71	10.3	2735.7	5050
		3-21-72	6.8	2739.2	5050
42N/09W-27N01 M	2930.0	10-26-71	5.2	2924.8	5050
		3-21-72	2.4	2927.6	5050
43N/09W-23F01 M	2728.0	10-26-71	5.9	2722.1	5050
		3-21-72	2.3	2725.7	5050
43N/09W-24F01 M	2735.0	10-26-71	6.9	2728.1	5050
		3-21-72	6.6	2728.4	5050
43N/09W-28P01 M	2711.0	10-26-71	24.3	2686.7	5050
		3-21-72	6.2	2704.8	5050
			769/10 = 8'		
MAD RIVER VALLEY 1-08.00					
06N/01E-06H01 H	151.0	10-13-71	12.2	138.8	5050
		4-04-72	2.4	148.6	5050
06N/01E-29P01 H	25.0	10-13-71	9.2	15.8	5050
		4-04-72	5.8	19.2	5050
EEL RIVER VALLEY 1-10.00					
02N/01W-08B01 H	34.0	10-12-71	22.0	12.0	5050
		4-05-72	14.0	20.0	5050
03N/01W-18D01 H	15.0	10-12-71	5.2	9.8	5050
		4-05-72	2.0	13.0	5050
03N/01W-34J01 H	53.0	10-12-71	34.8	18.2	5050
		4-05-72	31.5	21.5	5050
03N/02W-26R01 H	12.0	10-12-71	10.4	1.6	5050
		4-05-72	5.9	6.1	5050
ROUND VALLEY 1-11.00					
22N/12W-04B01 M	1351.0	10-14-71	14.7	1336.3	5050
		4-05-72	6.4	1344.6	5050
22N/12W-06L03 M	1370.0	10-14-71	1.2	1368.8	5050
		4-05-72	-11.2	1381.2	5050
22N/13W-12R01 M	1400.0	10-14-71	26.3	1373.7	5050
		4-05-72	7.7	1392.3	5050
23N/13W-36C03 M	1410.0	10-14-71	28.5	1381.5	5050
		4-05-72	9.2	1400.8	5050
23N/13W-36Q01 M	1403.0	10-14-71	19.8	1383.2	5050
		4-05-72	1.5	1401.5	5050
LAYTONVILLE VALLEY 1-12.00					
21N/14W-30M01 M	1688.0	10-14-71	16.5	1671.5	5050
		4-05-72	4.7	1683.3	5050
21N/15W-01L02 M	1682.0	10-14-71	21.5	1660.5	5050
		4-05-72	10.2	1671.8	5050
21N/15W-12M02 M	1630.0	10-14-71	17.7	1612.3	5050
		4-05-72	5.1	1624.9	5050
21N/15W-24A01 M	1653.0	10-14-71	12.5	1640.5	5050
		4-05-72	2.5	1650.5	5050
LITTLE LAKE VALLEY 1-13.00					
18N/13W-08L01 M	1340.0	10-14-71	8.5	1331.5	5050
		4-06-72	0.6	1339.4	5050
18N/13W-17J01 M	1370.0	10-14-71	25.2	1344.8	5050
		4-06-72	12.4	1357.6	5050
18N/13W-18E01 M	1365.0	10-14-71	28.4	1336.6	5050
		4-06-72	24.2	1340.8	5050
19N/13W-32F01 M	1347.0	10-14-71	14.6	1332.4	5050
		4-06-72	5.8	1341.2	5050
19N/13W-32L02 M	1350.0	10-14-71	13.1	1336.9	5050
		4-06-72	7.8	1342.2	5050

455.2/16 = 28

FIGURE D-1

SURFACE WATER SAMPLING STATIONS

APPENDIX D

SURFACE WATER QUALITY

This appendix presents surface water quality data collected during the period from October 1, 1971, through September 30, 1972. The data were collected from 26 stream stations in the North Coastal area.

At the time of field sampling, dissolved oxygen, pH, and temperature measurements are made and gage height and time are noted. Comments on local conditions are noted in field books which are available in the files of the Department of Water Resources. The mineral constituents were determined in accordance with methods described in "Standard Methods for the Examination of Water and Waste Water", prepared and published jointly by the American Public Health Association, American Water Works Association, and Water Pollution Control Federation, 13th Edition, 1971. In some cases, the methods used were those presented in the U. S. Geological Survey Water-Supply Paper 1454, "Methods for Collection and Analysis of Water Samples", 1960. The analysis for trace elements is in accordance with the U. S. Geological Survey Water-Supply Paper 1540-B, "Concentration Method for the Spectro-Chemical Determination of Minor Elements in Water".

Each station in this appendix has been assigned a station number. The numbering system is described in Appendix B, "Surface Water Measurements". For reference purposes, the original station number is given in parentheses following each station name.

TABLE D-I

SAMPLING STATION DATA AND INDEX

North Coastal Area

Station *	Station Number	Location **	Beginning of Record	Frequency of Sampling	Analyses on Page
Bear River at Capetown (7b)	F75100.00	01N/03W-13 H	MAY 1964	Semiannually	
Black Butte River near Covelo (5h)	F63200.00	23N/11W-28 M	NOV. 1964	Monthly	
Eel River above Outlet Creek (5d)	F61329.50	21N/13W-32 M	APR. 1958	Monthly	
Eel River at Scotia (6)	F61100.00	01N/01E-05 H	APR. 1951	Monthly	
Eel River at South Fork (5)	F61154.50	01S/02E-26 H	APR. 1951	Monthly	
Eel River, Middle Fork, at Dos Rios (5c)	F63009.01	21N/13W-06 M	APR. 1958	Monthly	
Eel River, South Fork, near Miranda (7)	F64100.00	03S/04E-30 H	APR. 1951	Monthly	
Klamath River above Hamburg Reservoir Site (1c)	F31470.00	46N/10W-14 M	DEC. 1958	Bimonthly	
Klamath River at Orleans (2c)	F31220.01	11N/06E-31 H	JAN. 1964	Monthly	
Klamath River below Iron Gate Dam (1f)	F31599.01	47N/05W-20 M	DEC. 1961	Monthly	
Klamath River below Trinity River	F31200.01	10N/04E-31 M	AUG. 1972	Annually	
Klamath River near Klamath (3)	F31100.00	13N/02E-19 H	APR. 1951	Monthly	
Klamath River near Seiad Valley (2b)	F31430.00	46N/12W-03 M	DEC. 1958	Monthly	
Mad River near Arcata (6a)	F51100.00	06N/01E-15 H	NOV. 1958	Bimonthly	
Mattole River near Petrolia (7a)	F71100.00	02S/02W-11 H	JAN. 1959	Semiannually	
Mill Creek near Covelo (5e)	F63050.00	22N/12W-22 M	FEB. 1965	Monthly	
Outlet Creek near Longvale (5b)	F61350.00	20N/14W-01 M	May 1958	Monthly	
Redwood Creek at Orick (3b)	F55100.00	10N/01E-04 H	NOV. 1958	Monthly	
Salmon River at Somesbar (2a)	F34100.00	11N/06E-03 H	NOV. 1958	Semiannually	
Scott River near Fort Jones (1b)	F25250.00	44N/10W-28 M	DEC. 1958	Bimonthly	
Shasta River near Yreka (1a)	F21050.00	46N/07W-24 M	DEC. 1958	Bimonthly	
Smith River near Crescent City (3a)	F01300.00	16N/01E-10 H	APR. 1951	Monthly	
Trinity River at Hoopa (4)	F41080.00	08N/04E-25 H	APR. 1951	Monthly	
Trinity River at Lewiston (4a)	F41640.00	33N/08W-17 M	APR. 1951	Bimonthly	
Trinity River near Burnt Ranch (4b)	F41376.00	05N/07E-19 H	APR. 1958	Bimonthly	
Van Duzen River near Bridgeville (5a)	F65279.00	01N/02E-12 H	APR. 1958	Monthly	

* Numbers in parentheses following the station names are the original station numbers, retained for reference purposes.

** H = Humboldt Base and Meridian
M = Mount Diablo Base and Meridian

TABLE D-2 MINERAL ANALYSES OF SURFACE WATER

Lab and Sampler Agency Codes

5000 - U. S. Geological Survey

5050 - Department of Water Resources

Abbreviations

TIME	- Pacific Standard Time on a 24-hour clock.
G.H.	- Instantaneous gage height in feet above an established datum.
Q	- Instantaneous discharge measured in cubic feet per second (cfs). "E" indicates the value has been estimated.
DEPTH	- Depth at which sample was collected.
DO	- Dissolved oxygen content in milligrams per liter.
SAT	- Percent of normal dissolved oxygen saturation
TEMP	- Water temperature in degrees Fahrenheit (F) and Celsius (C).
PH	- Measure of acidity or alkalinity of water.
EC	- Electrical conductance in micromhos at 25° C.
TDS	- Gravimetric determination of total dissolved solids at 180° C.
SUM	- Total dissolved solids by summation of analyzed constituents.
TH	- Total hardness.
NCH	- Noncarbonate hardness - any excess of total hardness over total alkalinity.
TURB	- Jackson Turbidity Units measured with a Hellege Turbidmeter (E) or a Hach Nephelometer (A).
SAR	- Sodium adsorption ratio.
PERCENT REACTANCE VALUE	- Determined by dividing the sum of the cations or anions in milliequivalents per liter into each constituent in milliequivalents per liter arriving at a percentage. For a partial analysis, an approximate value is determined by multiplying the electrical conductance by 0.01 and using that as the cation or anion sum.

Mineral Constituents

B	- Boron	K	- Potassium
CA	- Calcium	MG	- Magnesium
CL	- Chloride	NA	- Sodium
CO_3	- Carbonate	NO_3	- Nitrate
F	- Fluoride	SiO_2	- Silica
HCO_3	- Bicarbonate	SO_4	- Sulfate

TABLE D-2

MINERAL ANALYSES OF SURFACE WATER

DATE TIME	SAMPLER LAB	G.H. Q DEPTH	DO SAT	TEMP	FIELD LABORATORY PH	EC	MINERAL CONSTITUENTS IN MILLIGRAMS PER LITER / MILLIEQUIVALENTS PER LITER / PERCENT REACTANCE VALUE CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F SIO2	TDS SUM	TH NCH	TURB SAM
F0 1300.00 SMITH RIVER NEAR CRESCENT CITY																				
10/19/71	5050	7.08	11.3	53.8F	7.7	132	--	--	--	--	--	--	--	--	--	--	--			1A
1510		548	105	12.1C													--			
11/09/71	5050	8.18	12.3	51.8F	7.3	122	--	--	2.2	--	0	66	--	2.7	--	.00	--		58	3E
1630	5050	1110	112	11.0C	7.6	119			.10		.00	1.08		.08			--			
12/13/71	5050	13.96	13.3	45 F	7.3	85	--	--	--	--	--	--	--	--	--	--	--			14A
1610		7730	110	7 C													--			
01/11/72	5050	10.34	12.8	45 F	7.3	107	--	--	--	--	--	--	--	--	--	--	--			3A
0900		2490	105	7 C													--			
02/07/72	5050	13.65	12.4	46.0F	7.2	89	--	--	1.4	--	0	52	--	1.6	--	.00	--		44	6E
1700	5050	5510	104	7.8C	7.5	88			.06		.00	.85		.05			--			
03/07/72	5050	15.77	12.6	46.4F	7.3	79	--	--	1.7	--	0	46	--	3.2	--	.00	--		38	66A
0800	5050	9400	106	8.0C	7.6	80			.07		.00	.75		.09			--			
04/11/72	5050	13.52	12.3	46 F	7.4	82	--	--	--	--	--	--	--	--	--	--	--			15A
0810		5310	104	8 C													--			
05/02/72	5050	11.16	12.0	49.1F	7.3	90	--	--	2.0	--	0	51	--	3.5	--	.10	--		44	1A
0645	5050	2380	105	9.5C	7.4	93			.09		.00	.84		.10			--			
06/06/72	5050	14.23	9.6	61 F	8.1	107	--	--	--	--	--	--	--	--	--	--	--			3A
0715		864	97	16 C													--			
07/11/72	5050	14.82	9.7	68 F	8.1	136	--	--	--	--	--	--	--	--	--	--	--			0A
1430		450	106	20 C													--			
08/01/72	5050	8.29	9.9	70 F	8.1	144	--	--	--	--	--	--	--	--	--	--	--			0A
1430		316	111	21 C													--			
09/12/72	5050	14.34	10.0	66 F	8.1	152	--	--	--	--	--	--	--	--	--	--	--			0A
1530		212	107	19 C													--			
F2 1050.00 SHASTA RIVER NEAR YREKA																				
11/16/71	5050	3.48	13.1	43.7F	8.4	440	--	--	33	--	8.0	257	--	21	--	.50	--		188	3E
1305	5050	230	114	6.5C	8.5	471			1.44		.27	4.21		.59			--			
01/04/72	5050	3.41	13.6	34.7F	8.1	459	--	--	--	--	--	--	--	--	--	--	--			6A
1215		200	103	1.5C													--			
03/06/72	5050	4.70	10.3	50.0F	8.0	376	11	30	22	2.2	0	243	8.2	10	1.8	.30	--	202	174	43A
1200	5050	852	97	10.0C	8.3	410	.55	2.47	.96	.06	.00	3.98	.17	.28	.03		--	205	0	0.8
							14	61	24	1		89	4	6	1					
05/17/72	5050	3.23	9.6	55.8F	8.1	581	--	--	--	--	--	--	--	--	--	--	--			3A
0730		108	98	13.2C													--			
06/16/72	5050	3.10	9.5	66.9F	8.4	595	34	40	48	3.4	13	339	24	24	.4	.60	--	351	250	1A
0925	5050	20	110	19.4C	8.5	597	1.70	3.29	2.09	.09	.43	5.56	.50	.68	.01		--	354	0	1.3
							24	46	29	1	6	77	7	9						
07/18/72	5050	2.57	7.4	84 F	8.4	600	--	--	--	--	--	--	--	--	--	--	--			4A
1630		16	102	29 C													--			
09/08/72	5050	2.79	8.9	61 F	8.0	639	--	--	--	--	--	--	--	--	--	--	--			0A
0745		20	96	16 C													--			
F2 5250.00 SCOTT RIVER NEAR FORT JONES																				
11/16/71	5050	5.62	12.0	47.3F	7.5	228	--	--	4.0	--	0	144	--	3.1	--	.10	--		124	2E
1600	5050	256	112	8.5C	8.0	243			.17		.00	2.36		.09			--			
01/04/72	5050	5.52	13.1	38.3F	7.3	205	--	--	--	--	--	--	--	--	--	--	--			2A
1530		217	107	3.5C													--			
03/06/72	5050	10.50	10.5	46.6F	7.4	142	--	--	2.7	--	0	81	--	.4	--	.00	--		70	50A
1515	5050	3520	97	8.1C	7.5	141			.12		.00	1.33		.01			--			
05/17/72	5050		9.9	50.9F	7.3	114	--	--	1.9	--	0	66	--	1.7	--	.00	--		56	3A
1100	5050	1350	97	10.5C	7.8	115			.08		.00	1.08		.05			--			
06/16/72	5050	6.70	9.4	60.8F	7.5	168	14	9.7	2.8	1.0	0	90	1.3	1.6	.7	.00	--	90	75	2A
1000	5050	785	104	16.0C	7.8	156	.70	.80	.12	.03	.00	1.48	.03	.05	.01		--	75	1	0.1
							42	48	7	2		94	2	3	1					
07/19/72	5050	5.10	10.3	61.7F	7.6		--	--	5.0	--	0	156	--	4.7	--	.00	--		132	0A
0935	5050	102	115	16.5C	7.6	274			.22		.00	2.56		.13			--			
09/08/72	5050	4.91	10.6	63 F	7.8	269	--	--	--	--	--	--	--	--	--	--	--			0A
1110		69	119	17 C													--			

TABLE D-2(cont.)
MINERAL ANALYSES OF SURFACE WATER

DATE TIME	SAMPLER LAB	G.H. Q DEPTH	DO SAT	TEMP	FIELD LABORATORY PH	EC	CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F SIO2	TDS SUM	TH NCH	TURB SAR
							MINERAL CONSTITUENTS IN					MILLIGRAMS PER LITER / MILLIEQUIVALENTS PER LITER / PERCENT REACTANCE VALUE					MILLIGRAMS PER LITER			
F3	1100.00			KLAMATH RIVER NEAR KLAMATH																
10/19/71	5050		10.7	55.4F	7.7	203	19	8.8	11	1.7	0	110	15	4.6	1.3	.07	.1	138	84	7E
1400	5000	6500	101	13.0C	8.0	209	.95	.72	.48	.04	.00	1.80	.31	.13	.02		22.0	138	0	0.5
							43	33	22	2		80	14	6	1					
11/10/71	5050		11.3	48.2F	7.3		15	6.2	9.1	1.4	0	80	12	4.0	2.0	.03	.0	109	63	40E
0745	5000	15300	98	9.0C	7.2	158	.75	.51	.40	.04	.00	1.31	.25	.11	.03		19.0	108	0	0.5
							44	30	24	2		77	15	6	2					
11/11/71	5050	7.74	11.1	50.9F	7.3	137	--	--	--	--	--	--	--	--	--	--	--			25E
1400	5050	10600	99	10.5C		146											--			
12/14/71	5050		12.6	43.7F	7.3		13	6.4	6.1	1.4	0	73	11	4.4	1.2	.03	.1	97	59	40E
0815	5000	24500	102	6.5C	7.6	145	.65	.53	.27	.04	.00	1.20	.23	.12	.02		17.0	96	0	0.3
							44	36	18	3		76	15	8	1					
01/10/72	5050	7.50	12.7	43.7F	7.4	181	17	7.6	7.3	1.6	0	96	12	3.3	1.7	.05	.1	118	74	10E
1545	5000	11800	103	6.5C	7.6	174	.85	.63	.32	.04	.00	1.57	.25	.09	.03		20.0	118	0	0.4
							46	34	17	2		81	13	5	2					
02/07/72	5050	10.74	12.0	44.6F	7.6	137	15	6.4	4.9	1.0	0	81	7.3	2.6	1.2	.03	.1	97	64	50E
1530	5000	20300	99	7.0C	7.7	150	.75	.53	.21	.03	.00	1.33	.15	.07	.02		18.0	96	0	0.3
							49	35	14	2		85	10	4	1					
03/07/72	5050		11.1	48.2F	7.4		13	5.5	4.0	1.3	0	75	6.7	1.2	.4	.03	.1	89	55	200A
0930	5000	90900	96	9.0C	7.7	126	.65	.45	.17	.03	.00	1.23	.14	.03	.01		20.0	89	0	0.2
							50	35	13	2		87	10	2	1					
04/10/72	5050	11.11	9.2	58.1F	7.2	205	22	11	4.3	1.1	0	115	11	2.4	.0	.04	.1	127	100	9A
1500	5000	24200	90	14.5C	7.3	205	1.10	.90	.19	.03	.00	1.88	.23	.07	.00		18.0	126	6	0.2
							50	41	9	1		86	11	3						
05/02/72	5050		10.8	55.4F	7.6	140	14	5.8	4.9	.9	0	76	8.2	2.0	.7	.04	.0	89	59	20A
0830	5000	16900	102	13.0C	7.0	140	.70	.48	.21	.02	.00	1.25	.17	.06	.01		15.0	89	0	0.3
							50	34	15	1		84	11	4	1					
06/06/72	5050	7.87	8.9	64.0F	7.6	125	14	5.4	3.0	1.0	0	73	6.9	2.1	.0	.04	.0	81	57	10A
0845	5000	10600	93	17.8C	8.1	130	.70	.44	.13	.03	.00	1.20	.14	.06	.00		13.0	81	0	0.2
							54	34	10	2		86	10	4						
07/12/72	5050	7.75	8.3	66.2F	8.0	165	19	7.6	5.5	1.2	0	95	10	4.0	.0	.05	.1	108	79	1A
0715	5000	3800	89	19.0C	7.7	175	.95	.63	.24	.03	.00	1.56	.21	.11	.00		14.0	108	1	0.3
							51	34	13	2		83	11	6						
08/02/72	5050		7.9	68.9F	7.9	192	23	8.2	7.1	1.5	0	106	11	3.3	.0	.01	.1	119	89	3A
0730	5000	2580	87	20.5C	8.0	200	1.15	.67	.31	.04	.00	1.74	.23	.09	.00		13.0	119	4	0.3
							53	31	14	2		84	11	4						
08/04/72	5050	5.25	8.1	58.6F	8.1	200	--	--	6.7	--	0	99	--	3.9	--	.00	--		82	2A
0730	5050		80	14.8C	7.8	196			.29		.00	1.62		.11			--			
09/12/72	5050		9.9	66.2F	8.1	196	20	8.8	10	1.9	0	111	12	4.3	.0	.01	.2		86	4A
1345	5000	4080	106	19.0C	7.8	212	1.00	.72	.44	.05	.00	1.82	.25	.12	.00		17.0	129	0	0.5
							45	33	20	2		83	11	5						
F3	1200.01			KLAMATH RIVER BELOW TRINITY RIVER																
08/04/72	5050		8.9	72.0F	7.9	202	--	--	7.9	--	0	100	--	3.3	--	.00	--		75	1A
0900	5050	2800	102	22.2C	7.7	197			.34		.00	1.64		.09			--			
F3	1220.01			KLAMATH RIVER AT ORLEANS																
10/19/71	5050	4.39	10.8	55.0F	7.7	195	--	--	14	--	0	107	--	5.4	--	.00	--		78	25E
1035	5050	4200	103	12.8C	8.0	208			.61		.00	1.75		.15			--			
11/09/71	5050	4.75	12.3	46.4F	7.6	192	15	7.6	14	1.9	0	95	13	3.3	3.8	.10	--	147	69	
1300	5050	4400	105	8.0C	7.6	200	.75	.63	.61	.05	.00	1.56	.27	.09	.06		--	105	0	0.7
							37	31	30	2		79	14	5	3					
11/10/71	5050	9.30	12.8	46.9F	7.4	123	--	--	--	--	--	--	--	--	--	--	--			40E
1615	5050	12500	110	8.3C		135											--			
12/13/71	5050	8.46	13.8	40.1F	7.4	169	--	--	10	--	0	78	--	2.4	--	.10	--		61	25E
1145	5050	10500	108	4.5C	7.5	168			.44		.00	1.28		.07			--			
01/10/72	5050	6.10	13.6	39.2F	7.5	190	--	--	--	--	--	--	--	--	--	--	--			5A
1150		6150	105	4.0C													--			
02/07/72	5050	18.00	13.2	43 F	7.4	150	--	--	--	--	--	--	--	--	--	--	--			26A
1230		9500	107	6 C													--			
03/06/72	5050	16.62	12.5	46.4F	7.6	126	--	--	6.0	--	0	67	--	1.9	--	.00	--		56	140A
1145	5050	47000	106	8.0C	7.6	129			.26		.00	1.10		.05			--			
04/10/72	5050	9.33	12.0	47.3F	7.4	123	--	--	4.6	--	0	66	--	.4	--	.00	--		57	19A
1115	5050	12500	103	8.5C	7.7	129			.20		.00	1.08		.01			--			
05/01/72	5050	7.91	11.6	52.7F	7.6	140	--	--	6.8	--	0	71	--	3.4	--	.10	--		56	3A
1100	5050	10100	107	11.5C	7.9	140			.30		.00	1.16		.10			--			
06/05/72	5050	5.96	9.8	62.2F	7.6	112	--	--	4.4	--	0	60	--	.4	--	.00	--		49	4A
1030	5050	7300	102	16.8C	7.5	118			.19		.00	.98		.01			--			
07/11/72	5050	2.39	9.1	70 F	7.9	166	--	--	--	--	--	--	--	--	--	--	--			0A
1045		2500	103	21 C													--			

TABLE D-2(cont.)

MINERAL ANALYSES OF SURFACE WATER

DATE TIME	SAMPLER LAB	G.H. Q DEPTH	DO SAT	TEMP	FIELD LABORATORY PH	EC	CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F SIO2	TDS SUM	TH NCH	TURB SAR
							MINERAL CONSTITUENTS IN				MILLIGRAMS PER LITER / MILLIEQUIVALENTS PER LITER / PERCENT REACTANCE VALUE					MILLIGRAMS PER LITER				
F3	1220.01			KLAMATH RIVER AT ORLEANS										CONTINUED						
08/01/72	5050	1.75	9.2	70.7F	8.1	180	--	--	--	--	--	--	--	--	--	--	--			2A
1045		1720	105	21.5C													--			
08/04/72	5050	2.20	9.5	73.0F	8.0	192	--	--	9.6	--	0	95	--	3.0	--	.10	--		71	1A
0950	5050	2200	111	22.8C	7.8	189			.42		.00	1.56		.08			--			
09/12/72	5050	2.14	10.5	62.6F	8.0	289	--	--	13	--	0	104	--	5.5	--	.10	--		74	2A
1100	5050	2000	109	17.0C	7.6	201			.57		.00	1.70		.16			--			
F3	1430.00			KLAMATH RIVER NEAR SEIAD VALLEY																
10/12/71	5050		10.2	59.0F	7.9	206	--	--	15	--	0	112	--	5.5	3.1	.00	--		80	20E
1145	5050	3300	105	15.0C	8.0	216			.65		.00	1.84		.16	.05		--			
												90		8	2					
11/16/71	5050		12.6	43.7F	7.5	202	--	--	17	--	0	97	--	4.1	3.6	.10	--		74	5E
1445	5050	3840	107	6.5C	7.6	212			.74		.00	1.59		.12	.06		--			
												90		7	3					
12/06/71	5050		11.6	42.8F	7.3	207	--	--	16	--	0	94	--	4.1	6.0	.10	--		70	15E
1130	5050	6820	97	6.0C	7.4	210			.70		.00	1.54		.12	.10		--			
												88		7	6					
01/04/72	5050		14.0	34.7F	7.5	213	--	--	--	--	--	--	--	--	--	--	--			5A
1415		4110	104	1.5C													--			
02/02/72	5050		13.4	36.5F	7.4	181	--	--	--	--	--	--	--	--	--	--	--			20A
1120		5800	102	2.5C													--			
03/06/72	5050		11.5	45.0F	7.6	159	--	--	9.7	--	0	83	--	2.9	2.1	.00	--		66	68A
1335	5050	24400	99	7.2C	7.4	162			.42		.00	1.36		.08	.03		--			
												93		5	2					
04/05/72	5050		10.6	50.9F	7.6	156	--	--	8.8	--	0	80	--	1.9	--	.10	--		63	14A
1145	5050	8310	99	10.5C	7.6	162			.38		.00	1.31		.05			--			
05/17/72	5050		10.2	55 F	7.9	171	--	--	--	--	--	--	--	--	--	--	--			4A
0930		5500	101	13 C													--			
06/16/72	5050		8.9	63.5F	7.9	200	15	9.6	10	1.9	0	103	6.9	4.0	.3	.00	--	110	77	1A
0830	5050	2420	97	17.5C	7.9	189	.75	.79	.44	.05	.00	1.69	.14	.11	.00		--	98	0	0.5
							37	39	22	2		87	7	6						
07/19/72	5050		7.8	70 F	7.9	193	--	--	--	--	--	--	--	--	--	--	--			2A
0825		1080	91	21 C													--			
08/09/72	5050		9.3	74.3F	8.1		--	--	14	--	0	105	--	5.1	--	.20	--		71	1A
1120	5050	1310	113	23.5C	7.6	204			.61		.00	1.72		.14			--			
09/08/72	5050		9.5	65.3F	7.9	201	--	--	17	--	0	104	--	7.1	--	.10	--		73	1A
0945	5050	1600	105	18.5C	7.8	213			.74		.00	1.70		.20			--			
F3	1470.00			KLAMATH RIVER ABOVE HAMBURG RESERVOIR SITE																
11/16/71	5050		12.3	43.7F	7.6	201	--	--	18	--	0	93	--	5.8	3.8	.10	--		67	7E
1400	5050	3300	105	6.5C	7.6	212			.78		.00	1.52		.16	.06		--			
												87		9	3					
01/04/72	5050		13.6	34.7F	7.5	218	--	--	--	--	--	--	--	--	--	--	--			8A
1300		3420	102	1.5C													--			
03/06/72	5050		11.7	45.0F	7.6	169	7.4	11	12	1.8	0	84	12	1.2	2.7	.00	--	128	63	85A
1245	5050	14800	102	7.2C	7.9	178	.37	.90	.52	.05	.00	1.38	.25	.03	.04		--	89	0	0.7
							20	49	28	3		81	15	2	2					
05/17/72	5050		9.8	56.3F	7.8	207	--	--	--	--	--	--	--	--	--	--	--			4A
0815		2780	99	13.5C													--			
06/16/72	5050		8.3	65.3F	8.0	235	15	10	17	2.7	0	112	13	5.9	.4	.10	--	139	81	2A
0750	5050	800	93	18.5C	8.1	220	.75	.82	.74	.07	.00	1.84	.27	.17	.01		--	119	0	0.8
							32	34	31	3		80	12	7						
07/19/72	5050		7.9	68.0F	8.0		--	--	18	--	0	99	--	5.5	.0	.10	--		66	1A
0735	5050	750	91	20.0C	7.5	205			.78		.00	1.62		.16	.00		--			
												91		9						
09/08/72	5050		8.3	65.3F	8.1	196	--	--	18	--	0	103	--	5.9	--	.10	--		68	1A
0835	5050	1350	93	18.5C	7.9	206			.78		.00	1.69		.17			--			
F3	1599.01			KLAMATH RIVER BELOW IRON GATE DAM																
10/12/71	5050		7.6	57.2F	7.2	185	--	--	15	--	0	93	--	3.6	3.9	.00	--		63	20E
1000	5050	2830	79	14.0C	7.9	188			.65		.00	1.52		.10	.06		--			
												90		6	4					
11/16/71	5050		10.8	42.8F	7.2	177	--	--	17	--	0	78	--	3.6	4.6	.10	--		58	8E
1215	5050	3110	93	6.0C	7.3	190			.74		.00	1.28		.10	.07		--			
												88		7	5					
12/06/71	5050		11.5	41 F	7.2	200	--	--	--	--	--	--	--	--	--	--	--			5A
1200		4400	96	5 C													--			
01/04/72	5050		13.1	34.7F	7.4	199	--	--	--	--	--	--	--	--	--	--	--			6A
1130		3220	100	1.5C													--			

TABLE D-2(cont.)

MINERAL ANALYSES OF SURFACE WATER

DATE TIME	SAMPLER LAB	G.H. Q DEPTH	DO SAT	TEMP	FIELD LABORATORY PH	EC	MINERAL CONSTITUENTS IN MILLIGRAMS PER LITER / MILLIEQUIVALENTS PER LITER / PERCENT REACTANCE VALUE: CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F SIO2	TDS SUM	TH NCH	TURB SAR
F3 1599.01				KLAMATH RIVER BELOW IRON GATE DAM														CONTINUED		
02/02/72	5050		11.6	36.5F	7.3	148	--	--	13	--	0	72	--	1.5	3.9	.10	--		47	24A
0935	5050	3420	91	2.5C	7.2	152			.57		.00	1.18		.04	.06		--			
												92		3	5					
03/06/72	5050		12.7	42.8F	7.3	152	--	--	13	--	0	68	--	3.3	3.1	.00	--		55	36A
1130	5050	14000	109	6.0C	7.1	150			.57		.00	1.11		.09	.05		--			
												89		7	4					
04/05/72	5050		11.3	48 F	8.3	143	--	--	--	--	--	--	--	--	--	--	--			8A
1010		4550	105	9 C													--			
05/17/72	5050		9.6	57.2F	8.0	192	--	--	18	--	0	82	--	4.5	1.0	.10	--		54	4A
0645	5050	2670	100	14.0C	7.6	183			.78		.00	1.34		.13	.02		--			
												90		9	1					
06/16/72	5050	2.50	9.5	68.0F	8.4	164	11	6.2	17	2.8	0	82	14	3.9	.5	.10	--	119	53	2A
0755	5050	800	112	20.0C	8.0	176	.55	.51	.74	.07	.00	1.34	.29	.11	.01		--	96	0	1.0
							29	27	40	4		77	17	6	1					
07/18/72	5050		9.8	73.4F	8.3		--	--	16	--	0	84	--	4.3	.4	.10	--		54	1A
1530	5050	722	122	23.0C	7.5	181			.70		.00	1.38		.12	.01		--			
												91		8	1					
08/09/72	5050		9.4	70.7F	8.1	166	--	--	--	--	--	--	--	--	--	--	--			1A
0950		1030	114	21.5C													--			
09/08/72	5050		7.1	64.4F	7.8	174	--	--	17	--	0	89	--	5.1	--	.10	--		57	1A
0700	5050	1340	80	18.0C	7.6	187			.74		.00	1.46		.14			--			
F3 4100.00				SALMON RIVER AT SOMESBAR																
10/19/71	5050	3.40	11.4	52.9F	7.4	136	--	--	3.2	--	0	74	--	2.8	--	.00	--		63	3E
1145	5050	270	106	11.6C	7.9	139			.14		.00	1.21		.08			--			
11/10/71	5050					90	--	--	--	--	--	--	--	--	--	--	--			64A
1710		2040															--			
12/06/71	5050			43 F		81	--	--	--	--	--	--	--	--	--	--	--			34A
2025		4200		6 C													--			
06/05/72	5050	6.60	9.9	59.0F	7.3	57	--	--	1.9	--	0	30	--	.0	--	.00	--		30	2A
1200	5050	2340	99	15.0C	7.3	61			.08		.00	.49		.00			--			
08/04/72	5050	3.77	9.2	71.5F	7.9	142	--	--	3.4	--	0	70	--	4.0	--	.00	--		63	0A
1035	5050	350	106	21.9C	7.6	132			.15		.00	1.15		.11			--			
F4 1080.00				TRINITY RIVER AT HOOPA																
10/19/71	5050	14.24	10.0	54 F	7.7	198	--	--	--	--	--	--	--	--	--	--	--			1A
0930		704	93	12 C													--			
11/09/71	5050	14.37	11.6	57.2F	7.6	175	22	8.5	4.6	.8	0	100	6.4	5.2	.1	.00	--	119	90	4E
1145	5050	782	113	14.0C	8.0	198	1.10	.70	.20	.02	.00	1.64	.13	.15	.00		--	97	8	0.2
							54	35	10	1		85	7	8						
11/10/71	5050	16.49	11.7	48.9F	7.6	183	--	--	--	--	--	--	--	--	--	--	--			35E
1300	5050	2550	103	9.4C		184											--			
12/13/71	5050	17.48	12.7	41.0F	7.5	160	--	--	3.4	--	0	78	--	2.0	.2	.00	--		72	55E
1045	5050	4230	100	5.0C	7.7	154			.15		.00	1.28		.06	.00		--			
												96		4						
01/10/72	5050	16.10	12.8	40.6F	7.5	188	--	--	--	--	--	--	--	--	--	--	--			7A
1100		2220	100	4.8C													--			
02/07/72	5050	17.86	12.3	44.1F	7.5	152	--	--	2.6	--	0	87	--	1.9	.1	.00	--		74	21A
1145	5050	4910	101	6.7C	7.8	157			.11		.00	1.43		.05	.00		--			
												97		3						
03/06/72	5050	25.99	11.7	47.8F	7.5	129	--	--	2.2	--	0	72	--	2.4	.1	.00	--		63	170A
1030	5050	31000	101	8.8C	7.6	130			.10		.00	1.18		.07	.00		--			
												94		6						
04/10/72	5050	18.56	11.5	48 F	7.7	136	--	--	--	--	--	--	--	--	--	--	--			23A
1015		5570	100	9 C													--			
05/01/72	5050	17.55	11.0	51.8F	7.6	152	--	--	2.9	--	0	82	--	3.1	--	.10	--		72	8A
0955	5050	3440	100	11.0C	7.9	152			.13		.00	1.34		.09			--			
06/05/72	5050	16.36	9.6	63 F	7.7	132	--	--	--	--	--	--	--	--	--	--	--			4A
0915		2540	100	17 C													--			
07/11/72	5050	14.62	9.1	67.1F	8.0	167	--	--	--	--	--	--	--	--	--	--	--			1A
0915		980	99	19.5C													--			
08/04/72	5050	13.97	8.8	71.0F	7.8	208	--	--	4.1	--	0	101	--	4.2	--	.00	--		92	1A
0815	5050	560	100	21.6C	7.8	202			.18		.00	1.66		.12			--			
09/12/72	5050	13.81	9.7	62.6F	7.9	194	--	--	4.8	--	0	106	--	6.1	--	.00	--		96	0A
1000	5050	515	101	17.0C	7.7	209			.21		.00	1.74		.17			--			

TABLE D-2(cont.)

MINERAL ANALYSES OF SURFACE WATER

DATE TIME	SAMPLER LAB	G.H. Q DEPTH	DO SAT	TEMP	FIELD PH	LABORATORY EC	CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F SIO2	TDS SUM	TH NCH	TURB SAR
							MINERAL CONSTITUENTS IN MILLIGRAMS PER LITER / MILLIEQUIVALENTS PER LITER / PERCENT REACTANCE VALUE									MILLIGRAMS PER LITER				
F4	1376.00			TRINITY RIVER NEAR BURNT RANCH																
11/09/71	5050		12.2	45.5F	7.4	141	--	--	--	--	--	--	--	--	--	--	--			0A
1045		436	105	7.5C													--			
01/10/72	5050		12.1	37.4F	7.5	166	--	--	--	--	--	--	--	--	--	--	--			0A
1115		685	92	3.0C													--			
03/06/72	5050		11.5	46.4F	7.4	118	--	--	2.2	--	0	66	--	.3	.1	.00	--		56	44A
0945	5050	6780	100	8.0C	7.4	118			.10		.00	1.08		.01	.00		--			
												99		1						
05/01/72	5050		11.0	51.8F	7.5	133	--	--	3.4	--	0	75	--	3.3	.0	.40	--		64	1A
0845	5050	468	103	11.0C	8.0	144			.15		.00	1.23		.09	.00		--			
												93		7						
07/11/72	5050		8.9	68 F	7.7	129	--	--	--	--	--	--	--	--	--	--	--			1A
0825		468	100	20 C													--			
09/12/72	5050		9.4	60.8F	7.8	145	--	--	4.9	--	0	79	--	8.6	--	.00	--		70	0A
0900	5050	310	98	16.0C	7.6	157			.21		.00	1.29		.25			--			
F4	1640.00			TRINITY RIVER AT LEWISTON																
11/09/71	5050	3.39	11.0	45 F	7.1	82	--	--	--	--	--	--	--	--	--	--	--			0A
0925		248	96	7 C													--			
01/10/72	5050	2.99	11.9	40.1F	7.1	96	--	--	--	--	--	--	--	--	--	--	--			1A
0845		156	97	4.5C													--			
03/06/72	5050	3.02	11.1	45.5F	7.1	88	--	--	--	--	--	--	--	--	--	--	--			2A
0820		153	98	7.5C													--			
05/01/72	5050	3.01	10.4	46.4F	7.2	84	--	--	2.2	--	0	48	--	2.4	--	.10	--		39	0A
0715	5050	154	93	8.0C	7.7	87			.10		.00	.79		.07			--			
07/11/72	5050	3.00	10.3	48.2F	7.2		--	--	2.2	--	0	46	--	1.4	.1	.00	--		37	1A
0705	5050	980	.94	9.0C	7.5	82			.10		.00	.75		.04	.00		--			
												95		5						
09/12/72	5050	3.21	10.4	48 F	7.9	81	--	--	--	--	--	--	--	--	--	--	--			1A
0715		203	95	9 C													--			
F5	1100.00			MAD RIVER NEAR ARCATA																
11/10/71	5050	7.89	11.0	50.9F	7.2	133	--	--	4.8	--	0	56	--	3.7	--	.20	--		60	840E
0925	5050	2970	98	10.5C	7.1	140			.21		.00	.92		.10			--			
01/10/72	5050	5.49	11.9	44.6F	7.4	143	--	--	3.5	--	0	67	--	2.3	--	.10	--		61	110E
1400	5050	454	98	7.0C	7.4	139			.15		.00	1.10		.06			--			
03/06/72	5050	9.62	11.1	50.9F	7.5	98	15	2.0	2.7	.6	0	52	4.8	1.3	.4	.00	--	52	45	390A
1415	5050	5520	99	10.5C	7.7	103	.75	.16	.12	.02	.00	.85	.10	.04	.01		--	52	3	0.2
							71	15	11	2		85	10	4	1					
05/01/72	5050	5.20	10.4	59.9F	7.6	139	--	--	4.2	--	0	70	--	2.8	--	.10	--		63	66A
1400	5050	580	104	15.5C	7.6	140			.18		.00	1.15		.08			--			
07/12/72	5050	3.45	9.1	66 F	7.8	207	--	--	--	--	--	--	--	--	--	--	--			0A
0930		40	98	19 C													--			
09/13/72	5050	3.12	9.4	61 F	7.8	200	--	--	--	--	--	--	--	--	--	--	--			0A
0900		36	95	16 C													--			
F5	5100.00			REDWOOD CREEK AT ORICK																
10/20/71	5050	5.51	10.2	53.2F	7.2	162	--	--	--	--	--	--	--	--	--	--	--			7A
0800		103	94	11.8C													--			
11/09/71	5050	5.60	11.1	52 F	7.2	139	--	--	--	--	--	--	--	--	--	--	--			6A
1500		130	100	11 C													--			
12/13/71	5050	9.37	12.5	44.6F	7.3	81	--	--	3.0	--	0	30	--	2.9	--	.10	--		29	120E
1440	5050	3730	103	7.0C	7.3	74			.13		.00	.49		.08			--			
01/10/72	5050	6.57	11.9	45.1F	7.1	104	--	--	--	--	--	--	--	--	--	--	--			14A
1500		626	98	7.3C													--			
02/08/72	5050	7.38	11.8	46.0F	7.0	89	--	--	2.5	--	0	39	--	2.6	--	.00	--		40	65E
0930	5050	1150	99	7.8C	7.2	89			.11		.00	.64		.07			--			
03/06/72	5050	8.99	11.0	51.8F	7.2	72	--	--	3.0	--	0	32	--	3.0	--	.00	--		32	420A
1515	5050	3900	99	11.0C	7.1	76			.13		.00	.52		.08			--			
04/10/72	5050	7.20	11.1	54 F	7.2	136	--	--	--	--	--	--	--	--	--	--	--			23A
1445		1250	103	12 C													--			
05/01/72	5050	6.30	10.3	59.0F	7.3	115	--	--	3.7	--	0	47	--	4.2	--	.00	--		48	32A
1515	5050	530	102	15.0C	7.4	113			.16		.00	.77		.12			--			

TABLE D-2(cont.)

MINERAL ANALYSES OF SURFACE WATER

DATE TIME	SAMPLER LAB	G.H. Q DEPTH	DO SAT	TEMP	FIELD PH	LABORATORY EC	CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F SIO2	TDS SUM	TH NCH	TURB SAR
							MINERAL CONSTITUENTS IN					MILLIEQUIVALENTS PER LITER PERCENT REACTANCE VALUE				MILLIGRAMS PER LITER				
F5	5100.00				REDWOOD CREEK AT ORICK												CONTINUED			
06/05/72	5050	5.45	10.0	67.1F	7.6	143	--	--	--	--	--	--	--	--	--	--	--			4A
1430		175	108	19.5C													--			
07/11/72	5050	5.07	8.8	69.8F	7.4		--	--	4.9	--	0	76	--	7.2	--	.00	--		73	1A
1230	5050	70	98	21.0C	7.7	180			.21		.00	1.25		.20			--			
08/01/72	5050	4.92	9.7	64 F	7.4	170	--	--	--	--	--	--	--	--	--	--	--			1A
1250		47	102	18 C													--			
09/12/72	5050	4.68	9.4	66.2F	7.4	281	29	3.2	4.8	.8	0	85	16	6.4	.1	.00	--	117	85	26A
1300	5050	22	101	19.0C	7.5	194	1.45	.26	.21	.02	.00	1.39	.33	.18	.00		--	102	16	0.2
							75	13	11	1		73	17	9						
F6	1100.00				EEL RIVER AT SCOTIA															
10/20/71	5050		15.0	61.7F	8.1	282	37	12	10	1.0	0	157	29	7.9	.0	.01	.1	183	140	1E
1115	5000	200	153	16.5C	8.2	314	1.85	.99	.44	.03	.00	2.57	.60	.22	.00		8.4	183	14	0.4
							56	30	13	1		76	18	6						
11/10/71	5050		10.7	54.5F	7.4		28	8.1	7.8	1.3	0	103	36	8.2	1.1	.07	.1	150	100	200E
1300	5000	2570	100	12.5C	7.4	239	1.40	.67	.34	.03	.00	1.69	.75	.23	.02		8.3	150	19	0.3
							57	27	14	1		63	28	9	1					
12/14/71	5050		12.2	44.6F	7.3		15	5.1	5.5	1.3	0	65	13	5.2	1.0	.07	.1	89	58	90E
1345	5000	9910	100	7.0C	7.6	140	.75	.42	.24	.03	.00	1.07	.27	.15	.02		11.0	89	5	0.3
							52	29	17	2		71	18	10	1					
01/11/72	5050	11.01	12.3	44.6F	7.7	280	27	13	7.8	2.1	0	128	26	7.6	.7	.08	.0	160	120	4E
1300	5000	2380	101	7.0C	7.9	275	1.35	1.07	.34	.05	.00	2.10	.54	.21	.01		12.0	159	16	0.3
							48	38	12	2		73	19	7						
02/08/72	5050	13.80	11.0	52.2F	8.1	176	21	6.6	5.2	.9	0	89	15	3.7	.3	.07	.1	109	80	10E
1530	5000	9130	100	11.2C	7.6	184	1.05	.54	.23	.02	.00	1.46	.31	.10	.00		12.0	109	7	0.3
							57	29	13	1		78	17	5						
03/07/72	5050		10.7	53.6F	7.5		16	4.6	4.2	.9	0	78	7.8	2.0	.6	.06	.1	90	59	100A
1315	5000	20000	99	12.0C	7.8	135	.80	.38	.18	.02	.00	1.28	.16	.06	.01		15.0	90	0	0.2
							58	28	13	1		85	11	4	1					
04/11/72	5050	12.85	10.7	53.6F	7.4	152	18	6.0	5.1	.8	0	84	9.7	2.3	.0	.06	.2		70	20A
1215	5000	5300	99	12.0C	7.6	158	.90	.49	.22	.02	.00	1.38	.20	.06	.00		11.0	94	1	0.3
							55	30	13	1		84	12	4						
05/02/72	5050		10.5	62.6F	7.9	186	22	6.3	5.8	.8	0	105	12	2.1	.0	.07	.0	112	81	3A
1245	5000	2900	108	17.0C	6.9	185	1.10	.52	.25	.02	.00	1.72	.25	.06	.00		11.0	112	0	0.3
							58	28	13	1		85	12	3						
06/06/72	5050	10.70	9.6	68.0F	8.0	201	28	7.5	5.4	1.0	1.0	116	15	3.9	.0	.01	.0	126	100	1A
1300	5000	1250	105	20.0C	8.4	224	1.40	.62	.23	.03	.03	1.90	.31	.11	.00		6.3	125	5	0.2
							61	27	10	1	1	81	13	5						
07/12/72	5050	9.71	9.6	73.4F	8.1	281	35	9.9	8.1	1.4	0	151	20	7.0	.1	.01	.1	165	130	1A
1130	5000	315	111	23.0C	7.2	277	1.75	.81	.35	.04	.00	2.47	.42	.20	.00		9.3	165	5	0.3
							59	27	12	1		80	14	6						
08/02/72	5050		12.3	73.4F	8.2	280	34	10	9.1	1.4	14	124	20	5.7	.0	.01	.2	165	130	2A
1200	5000	177	142	23.0C	8.5	286	1.70	.82	.40	.04	.47	2.03	.42	.16	.00		8.6	164	1	0.4
							57	28	14	1	15	66	14	5						
09/13/72	5050		11.6	69.8F	8.2	283	37	12	9.8	1.6	0	169	21	6.8	.0	.01	.2		140	1A
1345	5000	103	129	21.0C	8.1	306	1.85	.99	.43	.04	.00	2.77	.44	.19	.00		8.1	179	4	0.4
							56	30	13	1		81	13	6						
F6	1154.50				EEL RIVER AT SOUTH FORK															
10/20/71	5050		10.3	57 F	7.7	302	--	--	--	--	--	--	--	--	--	--	--			0A
1215		66	100	14 C													--			
11/10/71	5050		11.0	55 F	7.5	268	--	--	--	--	--	--	--	--	--	--	--			34A
1400		130	104	13 C													--			
12/14/71	5050		12.6	43 F	7.4	143	--	--	--	--	--	--	--	--	--	--	--			60A
1415		3550	101	6 C													--			
01/11/72	5050		12.9	43 F	7.5	201	--	--	--	--	--	--	--	--	--	--	--			4A
1400		1010	104	6 C													--			
02/08/72	5050		11.8	49.8F	7.4	137	--	--	--	--	--	--	--	--	--	--	--			45A
1630		5200	104	9.9C													--			
03/07/72	5050		10.0	59 F	7.6	137	--	--	--	--	--	--	--	--	--	--	--			149A
1430		11000	99	15 C													--			
04/11/72	5050		10.9	54 F	7.7	148	--	--	--	--	--	--	--	--	--	--	--			20A
1330		3200	101	12 C													--			
05/02/72	5050		10.0	62.6F	7.8	185	--	--	5.2	--	0	92	--	2.9	--	.20	--		82	3A
1415	5050	1560	103	17.0C	7.9	181			.23		.00	1.51		.08			--			
06/06/72	5050		9.4	70.7F	8.1	196	--	--	5.6	--	0	103	--	2.1	--	.10	--		77	1A
1345	5050	400	106	21.5C	8.0	212			.24		.00	1.69		.06			--			
07/12/72	5050		8.5	72 F	7.9	279	--	--	--	--	--	--	--	--	--	--	--			2A
1215		94	97	22 C													--			

TABLE D-2(cont.)

MINERAL ANALYSES OF SURFACE WATER

DATE TIME	SAMPLER LAB	G.H. G DEPTH	DO SAT	TEMP	FIELD PH	LABORATORY EC	CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F SIO2	TDS SUM	TH NCH	TURB SAR
							MINERAL CONSTITUENTS IN					MILLIGRAMS PER LITER / MILLIEQUIVALENTS PER LITER / PERCENT REACTANCE VALUE				MILLIGRAMS PER LITER				
F6	1154.50			EEL RIVER AT SOUTH FORK																
																				CONTINUED
08/02/72	5050		8.5	71.6F	7.6		--	--	7.0	--	0	146	--	6.3	--	.20	--		130	0A
1300	5050	50	97	22.0C	7.8	295			.30		.00	2.39		.18			--			
09/13/72	5050		9.3	70.7F	7.8	291	--	--	7.6	--	0	151	--	6.4	--	.20	--		145	0A
1430	5050	29	105	21.5C	7.9	308			.33		.00	2.47		.18			--			
F6	1329.50			EEL RIVER ABOVE OUTLET CREEK NEAR DOS RIOS																
10/21/71	5050	2.56	10.3	54.0F	7.9	249	--	--	--	--	--	--	--	--	--	--	--			0A
0900		12	99	12.2C													--			
11/11/71	5050	2.68	10.7	50.9F	7.8	236	--	--	7.2	--	0	123	--	4.6	.1	.30	--		114	2E
0830	5050	24	99	10.5C	8.0	245			.31		.00	2.02		.13	.00		--			
												94		6						
12/15/71	5050	3.54	13.0	39.2F	7.4	158	--	--	6.6	--	0	69	--	2.7	1.1	.30	--		64	50E
1015	5050	315	102	4.0C	7.5	154			.29		.00	1.13		.08	.02		--			
												92		7	2					
01/12/72	5050	2.90	12.8	40.1F	7.5	205	--	--	6.4	--	0	91	--	3.6	.1	.20	--		83	3E
0900	5050	79	102	4.5C	7.7	192			.28		.00	1.49		.10	.00		--			
												94		6						
02/09/72	5050	4.78	11.9	42.8F	7.4	137	--	--	5.6	--	0	74	--	1.9	.1	.20	--		62	10A
1030	5050	942	98	6.0C	7.6	143			.24		.00	1.21		.05	.00		--			
												96		4						
03/08/72	5050	5.56	10.5	50.4F	7.4	129	--	--	--	--	--	--	--	--	--	--	--			16A
0845		1760	96	10.2C													--			
04/12/72	5050	5.54	11.2	48 F	7.6	133	--	--	--	--	--	--	--	--	--	--	--			80A
0915		1750	100	9 C													--			
05/03/72	5050	2.90	9.9	60.8F	7.8	189	--	--	6.0	--	0	98	--	3.0	.0	.20	--		86	1A
0745	5050	113	103	16.0C	7.9	191			.26		.00	1.61		.08	.00		--			
												95		5						
06/07/72	5050	2.53	8.6	72.5F	7.9	210	--	--	--	--	--	--	--	--	--	--	--			0A
0830		36	102	22.5C													--			
07/13/72	5050	2.33	7.7	72 F	8.0	251	--	--	--	--	--	--	--	--	--	--	--			0A
0745		8.5	90	22 C													--			
08/03/72	5050	2.29	7.9	73 F	8.0	256	--	--	--	--	--	--	--	--	--	--	--			0A
0745		5.7	94	23 C													--			
09/14/72	5050		8.5	64.4F	8.0	233	--	--	11	--	0	109	--	--	--	.50	--		101	0A
0800	5050	3.5	92	16.0C	7.8	253			.48		.00	1.79					--			
F6	1350.00			OUTLET CREEK NEAR LONGVALE																
10/21/71	5050	1.23	9.9	52.2F	7.7	315	--	--	19	--	0	153	--	30	--	3.10	--		141	2E
0820	5050	5.1	93	11.2C	8.2	345			.83		.00	2.51		.85			--			
11/11/71	5050	1.25	10.5	50 F	7.7	336	--	--	--	--	--	--	--	--	--	--	--			0A
0800		5.9	96	10 C													--			
12/15/71	5050	3.13	12.8	39 F	7.2	97	--	--	--	--	--	--	--	--	--	--	--			16A
0930		422	101	4 C													--			
01/12/72	5050	1.88	12.6	40.1F	7.4	167	--	--	7.5	--	0	76	--	6.4	--	.50	--		64	2E
0835	5050	66	100	4.5C	7.4	163			.33		.00	1.25		.18			--			
02/09/72	5050	4.78	11.9	42.8F	7.4	108	--	--	--	--	--	--	--	--	--	--	--			6A
1030		315	99	6.0C													--			
03/08/72	5050	3.26	10.3	52.7F	7.3	110	--	--	--	--	--	--	--	--	--	--	--			7A
0810		419	97	11.5C													--			
04/12/72	5050	5.09	11.0	48 F	7.4	94	--	--	--	--	--	--	--	--	--	--	--			39A
0840		1450	98	9 C													--			
05/03/72	5050	2.08	9.6	59.9F	7.6	169	--	--	7.5	--	0	87	--	5.6	--	.40	--		72	0A
0715	5050	70	99	15.5C	7.7	169			.33		.00	1.43		.16			--			
06/07/72	5050	1.55	7.3	71.6F	7.8	204	--	--	11	--	0	111	--	8.2	--	.80	--		93	0A
0800	5050	16	86	22.0C	7.9	228			.48		.00	1.82		.23			--			
07/13/72	5050	1.18	6.0	73 F	7.8	254	--	--	--	--	--	--	--	--	--	--	--			5A
0710		2.5	72	23 C													--			
08/03/72	5050	1.12	6.8	72 F	8.2	273	--	--	--	--	--	--	--	--	--	--	--			1A
0720		1.8	80	22 C													--			
09/14/72	5050	1.05	7.7	59.9F	8.2	280	--	--	17	--	0	137	--	27	--	2.60	--		121	1A
0730	5050	1.1	79	15.5C	7.9	308			.74		.00	2.25		.76			--			

TABLE D-2(cont.)

MINERAL ANALYSES OF SURFACE WATER

DATE TIME	SAMPLER LAB	G.H. O DEPTH	DO SAT	TEMP	FIELD PH	LABORATORY EC	CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F SIO2	TDS SUM	TH NCH	TURB SAR
							MINERAL CONSTITUENTS IN				MILLIGRAMS PER LITER / MILLIEQUIVALENTS PER LITER / PERCENT REACTANCE VALUE					MILLIGRAMS PER LITER				
F6	3009.01				EEL RIVER MIDDLE FORK AT DOS RIOS															
10/21/71	5050	8.14	10.6	56.8F	8.0	326	--	--	11	--	1.0	122	--	17	.0	.10	--		160	2E
0945	5050	31	105	13.8C	8.4	354			.48		.03	2.00		.48	.00		--			
11/11/71	5050	8.20	10.6	50.9F	7.9	353	--	--	--	--	--	--	--	--	--	--	--			0A
0930		38	98	10.5C													--			
12/15/71	5050	9.52	13.0	38.3F	7.5	176	--	--	4.6	--	0	78	--	1.8	.6	.10	--		78	45E
1100	5050	615	100	3.5C	7.6	176			.20		.00	1.28		.05	.01		--			
												96		4	1					
01/12/72	5050	9.36	13.2	38.3F	7.5	184	--	--	--	--	--	--	--	--	--	--	--			3A
0945		450	102	3.5C													--			
02/09/72	5050	9.98	12.9	41.2F	7.4	142	--	--	3.2	--	0	75	--	.9	--	.10	--		67	40E
1115	5050	1500	104	5.1C	7.6	148			.14		.00	1.23		.03			--			
03/08/72	5050	11.67	11.7	46.4F	7.6	111	--	--	2.8	--	0	62	--	.8	.0	.00	--		54	100A
0930	5050	3500	101	8.0C	7.7	115			.12		.00	1.02		.02	.00		--			
												98		2						
04/12/72	5050	11.42	12.0	46 F	7.6	141	--	--	--	--	--	--	--	--	--	--	--			140A
1015		2950	104	8 C													--			
05/03/72	5050	9.92	10.5	55.0F	7.8	150	--	--	3.8	--	0	77	--	2.8	--	.10	--		70	6A
0830	5050	930	102	12.8C	7.8	152			.17		.00	1.26		.08			--			
06/07/72	5050	8.77	9.0	68.9F	7.9	174	--	--	--	--	--	--	--	--	--	--	--			1A
0915		251	102	20.5C													--			
07/13/72	5050	8.06	8.1	73 F	7.9	266	--	--	--	--	--	--	--	--	--	--	--			2A
0815		48	97	23 C													--			
08/03/72	5050	7.87	8.6	70.7F	8.0	300	--	--	--	--	--	--	--	--	--	--	--			0A
0830		30	100	21.5C													--			
09/14/72	5050	7.71	9.1	63 F	7.8	292	--	--	--	--	--	--	--	--	--	--	--			0A
0845		13	96	17 C													--			
F6	3050.00				MILL CREEK NEAR COVELO															
12/15/71	5050		12.6	39.2F	7.3	168	--	--	6.6	--	0	78	--	3.5	.9	.10	--		75	25E
1145	5050	25	100	4.0C	7.6	178			.29		.00	1.28		.10	.01		--			
												92		7	1					
01/12/72	5050	8.20	12.2	41.0F	7.4	248	--	--	7.0	--	0	121	--	4.4	.6	.00	--		110	2E
1020	5050	6.5	99	5.0C	7.8	244			.30		.00	1.98		.12	.01		--			
												94		6						
02/09/72	5050		12.0	43.2F	7.3	169	--	--	6.0	--	0	88	--	2.5	.6	.10	--		86	7A
1215	5050	200	101	6.2C	7.6	173			.26		.00	1.44		.07	.01		--			
												95		5	1					
03/08/72	5050	9.40	10.4	50 F	7.4	182	--	--	--	--	--	--	--	--	--	--	--			11A
1030		250	96	10 C													--			
04/12/72	5050		11.0	46.4F	7.4	174	--	--	5.4	--	0	94	--	.6	--	.10	--		82	100A
1100	5050	300	97	8.0C	7.5	178			.23		.00	1.54		.02			--			
05/03/72	5050	8.50	9.9	61 F	7.4	273	--	--	--	--	--	--	--	--	--	--	--			0A
0945		10	104	16 C													--			
06/07/72	5050	8.12	8.0	73 F	7.6	368	--	--	--	--	--	--	--	--	--	--	--			2A
1015		5.5	97	23 C													--			
F6	3200.00				BLACK BUTTE RIVER NEAR COVELO															
10/21/71	5050	13.32	10.6	59.4F	8.1	295	51	7.0	5.2	1.0	0	120	63	2.8	.0	.10	--	171	156	1E
1115	5050	8.8	110	15.2C	8.3	330	2.54	.58	.23	.03	.00	1.97	1.31	.08	.00		--	189	58	0.2
							75	17	7	1		59	39	2						
11/11/71	5050	13.44	11.2	50.9F	7.9	300	--	--	--	--	--	--	--	--	--	--	--			0A
1105		18	105	10.5C													--			
12/15/71	5050	13.63	13.0	38.3F	7.5	199	--	--	--	--	--	--	--	--	--	--	--			12A
1315		69	102	3.5C													--			
01/12/72	5050	13.64	12.6	38.3F	7.5	206	--	--	4.2	--	0	86	--	.9	.1	.00	--		89	3E
1100	5050	71	99	3.5C	7.7	198			.18		.00	1.41		.03	.00		--			
												98		2						
02/09/72	5050	14.23	12.0	43.7F	7.5	200	--	--	--	--	--	--	--	--	--	--	--			16E
1330		241	102	6.5C													--			
03/08/72	5050	20.11	11.2	47.3F	7.4	112	--	--	2.7	--	0	59	--	.4	.0	.00	--		53	80A
1145	5050	745	100	8.5C	7.6	108			.12		.00	.97		.01	.00		--			
												99		1						
04/12/72	5050	14.37	12.3	43.7F	7.4	135	--	--	3.2	--	0	65	--	.0	--	.00	--		66	120A
1215	5050	472	105	6.5C	7.6	141			.14		.00	1.07		.00			--			

TABLE D-2(cont.)

MINERAL ANALYSES OF SURFACE WATER

DATE TIME	SAMPLER LAB	G.H. Q DEPTH	DO SAT	TEMP	FIELD LABORATORY PH	EC	MINERAL CONSTITUENTS IN MILLIGRAMS PER LITER / MILLIEQUIVALENTS PER LITER / PERCENT REACTANCE VALUE CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F SIO2	TDS SUM	TH NCH	TURB SAR
F6 3200.00				BLACK BUTTE RIVER NEAR COVELO										CONTINUED						
05/03/72	5050	13.35	10.4	54.5F	7.7	162	--	--	--	--	--	--	--	--	--	--	--			1A
1045		218	102	12.5C													--			
06/07/72	5050	12.56	8.5	70.7F	7.9	200	--	--	--	--	--	--	--	--	--	--	--			2A
1130		52	100	21.5C													--			
07/13/72	5050		8.3	73 F	8.0	265	--	--	--	--	--	--	--	--	--	--	--			0A
0945		10	101	23 C													--			
08/03/72	5050	13.24	8.3	72 F	8.0	289	--	--	--	--	--	--	--	--	--	--	--			0A
0945		7.5	99	22 C													--			
09/14/72	5050	13.43	9.0	63.5F	8.0	283	--	--	6.7	--	0	117	--	3.4	--	.00	--		152	0A
0950	5050	4.0	98	17.5C	7.9	313			.29		.00	1.92		.10			--			
F6 4100.00				EEL RIVER SOUTH FORK NEAR MIRANDA																
10/20/71	5050	4.39	11.9	59.9F	8.0	257	--	--	--	--	--	--	--	--	--	--	--			1A
1300		93	120	15.5C													--			
11/10/71	5050	4.60	11.0	55.4F	7.7	226	--	--	--	--	--	--	--	--	--	--	--			41A
1445		180	105	13.0C													--			
12/14/71	5050	6.98	12.1	45.5F	7.3	129	--	--	--	--	--	--	--	--	--	--	--			50A
1500		2350	101	7.5C													--			
01/11/72	5050	5.21	12.6	42.8F	7.3	166	--	--	--	--	--	--	--	--	--	--	--			3A
1430		537	102	6.0C													--			
02/08/72	5050	7.19	11.5	48.6F	7.3	121	--	--	--	--	--	--	--	--	--	--	--			19A
1715		2350	100	9.2C													--			
03/07/72	5050	7.61	11.6	55 F	7.4	119	--	--	--	--	--	--	--	--	--	--	--			66A
1515		3400	110	13 C													--			
04/11/72	5050	6.29	11.2	54 F	7.6	134	--	--	--	--	--	--	--	--	--	--	--			29A
1415		1570	104	12 C													--			
05/02/72	5050	5.19	10.2	63 F	7.9	157	--	--	--	--	--	--	--	--	--	--	--			1A
1500		710	106	17 C													--			
06/06/72	5050	4.19	10.9	75.2F	8.2	176	--	--	8.0	--	2.0	93	--	3.7	.0	.10	--		83	0A
1415	5050	260	129	24.0C	8.4	194			.35		.07	1.52		.10	.00		--			
07/12/72	5050	3.73	10.5	75.2F	8.2		--	--	8.7	--	0	116	--	7.6	--	.10	--		92	0A
1300	5050	114	125	24.0C	7.9	227			.38		.00	1.90		.21			--			
08/02/72	5050	3.63	12.3	73 F	8.2	202	--	--	--	--	--	--	--	--	--	--	--			0A
1330		77	143	23 C													--			
09/13/72	5050		14.2	71.6F	8.3	205	--	--	9.7	--	0	112	--	8.9	--	.20	--		93	0A
1500	5050	46	162	22.0C	8.1	225			.42		.00	1.84		.25			--			
F6 5279.00				VAN DUZEN RIVER NEAR BRIDGEVILLE																
10/20/71	5050	4.98	11.3	57 F	8.0	253	--	--	--	--	--	--	--	--	--	--	--			0A
1030		28	110	14 C													--			
11/10/71	5050	6.76	11.0	50.9F	7.3	149	--	--	4.8	--	0	57	--	4.3	--	.10	--		65	260E
1150	5050	1160	99	10.5C	7.2	150			.21		.00	.93		.12			--			
12/14/71	5050	7.22	12.4	42.8F	7.3	129	--	--	4.2	--	0	57	--	1.7	--	.10	--		53	200E
1230	5050	1700	100	6.0C	7.5	125			.18		.00	.93		.05			--			
01/11/72	5050	5.55	12.6	41.9F	7.3	149	--	--	--	--	--	--	--	--	--	--	--			4A
1215		348	101	5.5C													--			
02/08/72	5050		12.1	44.6F	7.3	109	--	--	2.7	--	0	58	--	.8	--	.00	--		50	30E
1445	5050	1000	101	7.0C	7.4	112			.12		.00	.95		.02			--			
03/07/72	5050	7.44	11.0	48.6F	7.4	106	--	--	3.0	--	0	56	--	.9	--	.00	--		48	62A
1230	5050	1670	97	9.2C	7.6	107			.13		.00	.92		.03			--			
04/11/72	5050	6.62	11.7	48 F	7.4	114	--	--	--	--	--	--	--	--	--	--	--			17A
1115		970	102	9 C													--			
05/02/72	5050	5.77	10.4	59.0F	7.7	136	--	--	3.9	--	0	73	--	1.9	--	.10	--		63	2A
1130	5050	380	104	15.0C	7.7	139			.17		.00	1.20		.05			--			
06/06/72	5050	5.06	9.1	68 F	8.0	174	--	--	--	--	--	--	--	--	--	--	--			0A
1200		98	101	20 C													--			

TABLE D-2(cont.)
MINERAL ANALYSES OF SURFACE WATER

DATE TIME	SAMPLER LAB	G.H. Q DEPTH	DO SAT	TEMP	FIELD PH	LABORATORY EC	CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F SIO2	TDS SUM	TH NCH	TURB SAR
							MINERAL CONSTITUENTS IN					MILLIGRAMS PER LITER MILLIEQUIVALENTS PER LITER PERCENT REACTANCE VALUE					MILLIGRAMS PER LITER			
F6	5279.00				VAN DUZEN RIVER NEAR BRIDGEVILLE									CONTINUED						
07/12/72	5050	4.61	9.3	66 F	7.9	217	--	--	--	--	--	--	--	--	--	--	--			0A
1050		31	101	19 C													--			
06/02/72	5050	4.40	9.0	65.3F	7.9	276	--	--	--	--	--	--	--	--	--	--	--			0A
1120		16	97	18.5C													--			
09/13/72	5050	4.26	9.7	66 F	7.8	261	--	--	--	--	--	--	--	--	--	--	--			0A
1300		9.5	105	19 C													--			
F7	1100.00				MAITOLE RIVER NEAR PETROLIA															
02/08/72	5050	5.51	11.5	49.6F	7.3	123	15	3.3	5.2	.4	0	56	9.7	4.1	.5	.10	--	94	51	40E
1240	5050	1660	101	9.8C	7.6	127	.75	.27	.23	.01	.00	.92	.20	.12	.01		--	66	5	0.3
							60	21	18	1		74	16	10	1					
09/13/72	5050	3.13	11.5	68.0F	8.1	247	37	6.1	7.9	1.0	0	124	26	5.2	.2	.10	--	152	117	1A
1100	5050	28	126	20.0C	8.0	264	1.85	.50	.34	.03	.00	2.03	.54	.15	.00		--	144	16	0.3
							68	18	13	1		75	20	6						
F7	5100.00				BEAR RIVER AT CAPETOWN															
02/08/72	5050		11.5	48.0F	7.3	153	20	3.4	5.4	.6	0	60	19	6.3	.3	.10	--	98	64	35E
1130	5050	180	99	8.9C	7.6	158	1.00	.28	.23	.02	.00	.98	.40	.18	.00		--	85	15	0.3
							65	18	15	1		63	26	12						
09/13/72	5050		10.4	64.4F	8.0	281	45	5.8	10	1.2	0	135	34	7.6	.0	.10	--	186	136	1A
1030	5050	8.5	109	18.0C	7.8	310	2.25	.48	.44	.03	.00	2.21	.71	.21	.00		--	170	26	0.4
							70	15	14	1		71	23	7						

TABLE D-3

MINOR ELEMENT ANALYSIS OF SURFACE WATER

CONSTITUENTS IN MILLIGRAMS PER LITER

DATE TIME	SAMP LAB	DEPTH	DISCH EC	TEMP PH	ARSENIC	BARIUM CADMIUM	CHROM (ALL) CHROM (HEX)	COPPER IRON	LEAD MANGANESE	MERCURY SELENIUM	SILVER ZINC
		F0	1300.00	SMITH RIVER NEAR CRESCENT CITY							
5/02/72	5050		2380.0	9.5C		--	--	0.00 T	0.00 T	--	--
0645	5050		90	7.3	--	0.00 T	--	0.47 T	0.01 T	--	0.01 T
		F2	1050.00	SHASTA RIVER NEAR YREKA							
6/16/72	5050		20 E	19.4C		--	--	0.00 T	0.00 T	--	--
0925	5050		595	8.4	--	0.00 T	--	0.42 T	0.04 T	--	0.00 T
		F2	5250.00	SCOTT RIVER NEAR FORT JONES							
6/16/72	5050		785 E	16.0C		--	--	0.00 T	0.00 T	--	--
1000	5050		168	7.5	--	0.00 T	--	0.46 T	0.01 T	--	0.00 T
		F3	1100.00	KLAMATH RIVER NEAR KLAMATH							
5/02/72	5000		16900	13.0C		--	--	0.01 T	0.00 T	--	--
0830	5050		140	7.6	--	0.00 T	--	2.9 T	0.04 T	--	0.01 T
5/02/72	5050		16900	13.0C		--	0.0007 T	0.0007 T	0.0007 T	--	--
0831	5000		140	7.6	--	0.0007 T	--	0.011 T	0.0007 T	--	0.0028 T
8/04/72	5050			14.8C		--	--	0.06 T	0.01 T	--	--
0730	5050		200	8.1	--	0.00 T	--	2.90 T	0.26 T	--	0.18 T
		F3	1200.01	KLAMATH RIVER BELOW TRINITT RIVER							
8/04/72	5050			72.0F		--	--	0.04 T	0.05 T	--	--
0900	5050		202	7.9	--	0.00 T	--	2.50 T	0.30 T	--	0.16 T
		F3	1220.01	KLAMATH RIVER AT ORLEANS							
5/01/72	5050		10100	11.5C		--	--	0.00 T	0.01 T	--	--
1100	5050		140	7.6	--	0.00 T	--	1.2 T	0.03 T	--	0.01 T
5/01/72	5050		10100	11.5C		--	0.0007 T	0.0007 T	0.0007 T	--	--
1101	5000		140	7.6	--	0.0007 T	--	0.022 T	0.0007 T	--	0.0028 T
8/04/72	5050			73.0F		--	--	0.00 T	0.00 T	--	--
0950	5050		192	8.0	--	0.00 T	--	1.80 T	0.25 T	--	0.08 T
		F3	1430.00	KLAMATH RIVER NEAR SEIAD VALLEY							
5/17/72	5050		5500	13 C		--	0.0007 T	0.0007 T	0.0007 T	--	--
0930	5000		171	7.9	--	0.0007 T	--	0.0220 T	0.0007 T	--	0.0029 T
6/16/72	5050		2420	17.5C		--	--	0.01 D	0.01 D	--	--
0830	5050		200	7.9	0.00 D	0.00 D	--	0.02 D	0.00 D	0.00 D	0.01 D
6/16/72	5050		2420	17.5C		--	--	0.01 T	0.01 T	--	--
0831	5050		200	7.9	--	0.00 T	--	0.59 T	0.03 T	--	0.01 T
		F3	1470.00	KLAMATH RIVER ABOVE HAMBURG RESERVOIR SITE							
6/16/72	5050		800 E	18.5C		--	--	0.00 T	0.00 T	--	--
0750	5050		235	8.0	--	0.00 T	--	0.89 T	0.03 T	--	0.00 T
		F3	1599.01	KLAMATH RIVER BELOW IRON GATE DAM							
2/02/72	5050		3420	2.5C		--	0.0007 T	0.0007 T	0.0007 T	--	--
0935	5000		148	7.3	--	0.0007 T	--	0.2500 T	0.0007 T	--	0.0029 T
6/16/72	5050		800 E	20.0C		--	--	0.01 D	0.00 D	--	--
0755	5050		164	8.4	0.00 D	0.00 D	--	0.07 D	0.00 D	0.00 D	0.00 T
6/16/72	5050		800 E	20.0C		--	--	0.01 T	0.00 T	--	--
0756	5050		164	8.4	--	0.00 T	--	0.39 T	0.02 T	--	--
		F4	1080.00	TRINITY RIVER AT HOOPA							
2/07/72	5050		4910.0	6.7C		--	0.0007 T	0.0007 T	0.0007 T	--	--
1145	5000		152	7.5	--	0.0007 T	--	19.00 T	0.0007 T	--	0.0029 T
5/01/72	5050		3440.0	11.0C		--	--	0.00 T	0.00 T	--	--
0955	5050		152	7.6	--	0.00 T	--	1.10 T	0.03 T	--	0.02 T
8/04/72	5050			71.0F		--	--	0.04 T	0.01 T	--	--
0815	5050		208	7.8	--	0.00 T	--	0.78 T	0.10 T	--	0.10 T
		F4	1640.00	TRINITY RIVER AT LEWISTON							
5/01/72	5050		154	8.0C		--	--	0.00 T	0.01 T	--	--
0715	5050		84	7.2	--	0.00 T	--	0.23 T	0.01 T	--	0.01 T
		F5	1100.00	MAD RIVER NEAR ARCATA							
3/06/72	5050		5520.0	10.5C		--	0.0007 T	0.0007 T	0.0017 T	--	--
1415	5000		98	7.5	--	0.0007 T	--	0.0430 T	0.0007 T	--	0.0460 T
5/01/72	5050		580.0	15.5C		--	--	0.01 T	0.00 T	--	--
1400	5050		139	7.6	--	0.00 T	--	8.40 T	0.16 T	--	0.03 T
		F5	5100.00	REDWOOD CREEK AT ORICK							
5/01/72	5050		530.0	15.0C		--	--	0.01 T	0.00 T	--	--
1515	5050		115	7.3	--	0.00 T	--	7.70 T	0.09 T	--	0.02 T
		F6	1100.00	EEL RIVER AT SCOTIA							
11/10/71	5050		2570.0	12.5C		--	0.0007 T	0.0007 T	0.0007 T	--	--
1300	5000			7.4	--	0.0007 T	--	0.0490 T	0.0007 T	--	0.0029 T
1/11/72	5050		2380	7.0C		--	0.0017 T	0.0017 T	0.0017 T	--	--
1300	5000		280	7.7	--	0.0017 T	--	0.0087 T	0.0017 T	--	0.0065 T
5/02/72	5050		2900.0	17.0C		--	--	0.00 T	0.01 T	--	--
1245	5050		186	7.9	--	0.00 T	--	0.45 T	0.01 T	--	0.01 T

TABLE D-3(continued)

MINOR ELEMENT ANALYSIS OF SURFACE WATER

CONSTITUENTS IN MILLIGRAMS PER LITER

DATE TIME	SAMP LAB	DEPTH	DISCH EC	TEMP PH	ARSENIC	BARIUM CADMIUM	CHROM (ALL) CHROM (HEX)	COPPER IRON	LEAD MANGANESE	MERCURY SELENIUM	SILVER ZINC
		F6	1154.50	EEL RIVER AT SOUTH FORK							
5/02/72	5050		1560.0	17.0C		--	--	0.01 T	0.01 T	--	--
1415	5050		185	7.8	--	0.00 T	--	0.75 T	0.01 T	--	0.02 T
		F6	1329.50	EEL RIVER ABOVE OUTLET CREEK NEAR DOS RIOS							
11/11/71	5050		24.0	10.5C		--	0.0007 T	0.0007 T	0.0007 T	--	--
0830	5000		236	7.8	--	0.0007 T	--	0.0130 T	0.0007 T	--	0.0029 T
3/08/72	5050		1760	10.2C		--	0.0007 T	0.0007 T	0.0007 T	--	--
0845	5000		129	7.4	--	0.0007 T	--	0.0120 T	0.0007 T	--	0.0029 T
		F6	3009.01	EEL RIVER MIDDLE FORK AT DOS RIOS							
5/03/72	5050		930	12.8C		--	--	0.00 T	0.01 T	--	--
0830	5050		150	7.8	--	0.00 T	--	1.1 T	0.02 T	--	0.01 T
5/03/72	5050		930	12.8C		--	0.0007 T	0.0007 T	0.0040 T	--	--
0831	5000		150	7.8	--	0.0007 T	--	0.017 T	0.0007 T	--	0.0028 T
		F6	5279.00	VAN DUZEN RIVER NEAR BRIDGEVILLE							
5/02/72	5050		380.0	15.0C		--	--	0.00 T	0.01 T	--	--
1130	5050		136	7.7	--	0.00 T	--	0.57 T	0.01 T	--	0.01 T

TABLE D-3(continued)

SUPPLEMENTAL MINOR ELEMENT ANALYSIS OF SURFACE WATER

CONSTITUENTS IN MILLIGRAMS PER LITER

DATE TIME	SAMP LAB	DEPTH	DISCH EC	TEMP PH	ALUMINUM	ANTIMONY BERYLLIUM	BISMUTH COBALT	GALLIUM GERMANIUM	LITHIUM MOLYBDENUM	NICKEL STRONTIUM	TITANIUM VANADIUM
		F3	1100.00	KLAMATH RIVER NEAR KLAMATH							
5/02/72	5050		16900.0	13.0C		--	0.0002 T	0.0029 T	--	0.0014 T	0.0003 T
0830	5000		140	7.6	0.0150 T	0.0003 T	0.0007 T	0.0002 T	0.0002 T	--	0.0043 T
		F3	1220.01	KLAMATH RIVER AT ORLEANS							
5/01/72	5050		10100.0	11.5C		--	0.0002 T	0.0029 T	--	0.0002 T	0.0003 T
1100	5000		140	7.6	0.0007 T	0.0003 T	0.0007 T	0.0002 T	0.0002 T	--	0.0054 T
		F3	1430.00	KLAMATH RIVER NEAR SEIAD VALLEY							
5/17/72	5050		5500	13 C		--	0.0002 T	0.0029 T	--	0.0210 T	0.0002 T
0930	5000		171	7.9	0.0220 T	0.0003 T	0.0007 T	0.0002 T	0.0002 T	--	0.0071 T
		F3	1599.01	KLAMATH RIVER BELOW IRON GATE DAM							
2/02/72	5050		3420	2.5C		--	0.0002 T	0.0029 T	--	0.0024 T	0.0240 T
0935	5000		148	7.3	0.8500 T	0.0003 T	0.0007 T	0.0002 T	0.0002 T	--	0.0034 T
		F4	1080.00	TRINITY RIVER AT HOOPA							
2/07/72	5050		4910.0	6.7C		--	0.0002 T	0.0029 T	--	0.0013 T	0.0003 T
1145	5000		152	7.5	0.0150 T	0.0003 T	0.0007 T	0.0002 T	0.0002 T	--	0.0017 T
		F5	1100.00	MAD RIVER NEAR ARCATA							
3/06/72	5050		5520.0	10.5C		--	0.0130 T	0.0029 T	--	0.0009 T	0.0003 T
1415	5000		98	7.5	0.0340 T	0.0003 T	0.0007 T	0.0002 T	0.0002 T	--	0.0013 T
		F6	1100.00	EEL RIVER AT SCOTIA							
11/10/71	5050		2570	12.5C		--	0.0002 T	0.0029 T	--	0.0016 T	0.0003 T
1300	5000			7.4	0.1600 T	0.0003 T	0.0007 T	0.0002 T	0.0002 T	--	0.0005 T
1/11/72	5050		2380.0	7.0C		--	0.0004 T	0.0065 T	--	0.0004 T	0.0007 T
1300	5000		280	7.7	0.0017 T	0.0007 T	0.0017 T	0.0004 T	0.0004 T	--	0.0004 T
		F6	1329.50	EEL RIVER ABOVE OUTLET CREEK NEAR DOS RIOS							
11/11/71	5050		24	10.5C		--	0.0002 T	0.0029 T	--	0.0002 T	0.0003 T
0830	5000		236	7.8	0.0007 T	0.0003 T	0.0007 T	0.0002 T	0.0002 T	--	0.0004 T
3/08/72	5050		1760	10.2C		--	0.0002 T	0.0029 T	--	0.0002 T	0.0003 T
0845	5000		129	7.4	0.0180 T	0.0003 T	0.0007 T	0.0002 T	0.0002 T	--	0.0010 T
		F6	3009.01	EEL RIVER MIDDLE FORK AT DOS RIOS							
5/03/72	5050		930.0	12.8C		--	0.0002 T	0.0029 T	--	0.0002 T	0.0003 T
0830	5000		150	7.8	0.0007 T	0.0003 T	0.0007 T	0.0002 T	0.0002 T	--	0.0002 T

TABLE D-4

PESTICIDES IN SURFACE WATER AND SEDIMENT

Station Number	Station	Date Time	Pesticides in Water (nanograms per liter)	Pesticides in Sediment (micrograms per liter of dry weight)	Samp. & Lab.
F 2 1050.00	Sta. 1-a Shasta River near Yreka	6-16-70 0925	Unknown as DDT 10 Diazinon 15 Nialate (Ethion) 60		5050
F 2 5250.00	Sta. 1-b Scott River near Fort Jones	6-16-72 1000	No Chlorinated Pesticides Detected Diazinon 15 Nialate (Ethion) 25		5050
F 3 1470.00	Sta. 1-c Klamath River near Hamburg Reservoir Site	6-16-72 0750	No Chlorinated Pesticides Detected Diazinon 15		5050
F 3 1599.01	Sta. 1-f Klamath River below Iron Gate Dam	9-22-71 0700	Unknown as DDT 10 Fenthion 45		5050
		6-16-72 0755	Unknown as DDT 15 Dieldrin 10 ppDDD 5 Diazinon 10		
F 3 1430.00	Sta. 2-b Klamath River near Seiad Valley	9-22-71 0800	Unknown as DDT 10 Fenthion 25		5050
		6-16-72 0830	Unknown as DDT 20 Dieldrin 40 ppDDD 200 ppDDT 25 Diazinon 10		
F 3 1220.01	Sta. 2-c Klamath River near Orleans	11-10-71 1615	Simazine/Atrazine 30 No Organic Phosphorus Pesticides Detected		5050
		5-1-72 1100	Unknown as DDT 40 Unknown as DDT 35 DCPA (Dacthal) 40 Dieldrin 25 Unknown as Parathion 30		
		8-4-72 0950	Unknown as DDT 20 No Organic Phosphorus Pesticides Detected		
F 3 1100.00	Sta. 3 Klamath River near Klamath	11-11-71 1400	Simazine/Atrazine 15 No Organic Phosphorus Pesticides Detected		5050
		2-7-72	No Chlorinated Pesticides Detected No Organic Phosphorus Pesticides Detected		
		5-2-72 0830	Unknown as DDT 30 Unknown as DDT 25 DCPA (Dacthal) 30 Dieldrin 10 Diazinon 5 Unknown as Parathion 5 Unknown as Parathion 35		
		8-2-72 0730	Unknown as DDT 10 Dieldrin 10 No Organic Phosphorus Pesticides Detected		
F 0 1300.00	Sta. 3-a Smith River near Crescent City	2-7-72 1700	Complex Mixture of Chlorinated Compounds as DDT 10 No Organic Phosphorus Pesticides Detected		5050
		5-2-72 0645	Unknown as DDT 15 Unknown as DDT 10 DCPA (Dacthal) 15 Dieldrin 25 Diazinon 10		
F 5 5100.00	Sta. 3-b Redwood Creek at Orick	2-8-72 0930	Complex Mixture of Chlorinated Compounds as DDT 10 No Organic Phosphorus Pesticides Detected		5050
		5-1-72 1515	Unknown as DDT 10 DCPA (Dacthal) 45 Dieldrin 35 No Organic Phosphorus Pesticides Detected		

TABLE D-4 (Continued)

PESTICIDES IN SURFACE WATER AND SEDIMENT

Station Number	Station	Date Time	Pesticides in Water (nanograms per liter)	Pesticides in Sediment (micrograms per liter of dry weight)	Samp. & Lab.
F 4 1080.00	Sta. 4 Trinity River at Hoopa	11-11-71 1300	Simazine/Atrazine 10 No Organic Phosphorus Pesticides Detected		5050
		5-1-72 0955	Dieldrin 35 No Organic Phosphorus Pesticides Detected		
		8-4-72	Unknown as DDT 30 No Organic Phosphorus Pesticides Detected		
F 4 1640.00	Sta. 4-a Trinity River at Lewiston	5-1-72 0715	Unknown as DDT 35 Unknown as DDT 35 Unknown as DDT 15 DCPA (Dacthal) 45 Dieldrin 80 Diazinon 5 Unknown as Parathion 20 Unknown as Parathion 75		5050
F 6 1154.50	Sta. 5 Eel River at South Fork	5-2-72 1415	Unknown as DDT 30 Unknown as DDT 30 Unknown as DDT 15 DCPA (Dacthal) 40 Dieldrin 30 Unknown as Parathion 5 Unknown as Parathion 20 Unknown as Parathion 90		5050
F 6 5279.00	Sta. 5-a Van Duzen River near Bridgeville	2-8-72 1445	Complex Mixture of Chlorinated Compounds as DDT 10 No Organic Phosphorus Pesticides Detected		5050
		5-2-72 1130	Unknown as DDT 25 Unknown as DDT 20 DCPA (Dacthal) 20 Dieldrin 10 Unknown as Parathion 10		
F 6 3009.01	Sta. 5-c Eel River, Middle Fork, at Dos Rios	2-9-72 1115	Complex Mixture of Chlorinated Compounds as DDT 5 No Organic Phosphorus Pesticides Detected		5050
		5-3-72 0830	BHC 5 Unknown as DDT 15 DCPA (Dacthal) 15 Dieldrin 25 Unknown as Parathion 2 Unknown as Parathion 5 Unknown as Parathion 65		
F 6 1100.00	Sta. 6 Eel River at Scotia	2-8-72 1530	No Chlorinated Pesticides Detected No Organic Phosphorus Pesticides Detected		5050
		5-2-72 1245	Unknown as DDT 25 DCPA (Dacthal) 30 Dieldrin 45 Unknown as Parathion 5 Unknown as Parathion 20 Unknown as Parathion 240		
F 5 1100.00	Sta. 6-a Mad River near Arcata	5-1-72 1400	Unknown as DDT 30 Unknown as DDT 35 DCPA (Dacthal) 35 Dieldrin 15 Diazinon 10 Unknown as Parathion 10 Unknown as Parathion 65		5050
F 7 1100.00	Sta. 7-a Mattole River near Petrolia	2-8-72 1240	No Chlorinated Pesticides Detected No Organic Phosphorus Pesticides Detected		5050
F 7 5100.00	Sta. 7-b Bear River at Capetown	2-8-72 1130	No Chlorinated Pesticides Detected No Organic Phosphorus Pesticides Detected		5050

TABLE D-5 NUTRIENT ANALYSIS OF SURFACE WATER

Lab and Sampler Agency Codes

5000 - U. S. Geological Survey

5050 - Department of Water Resources

Abbreviations

TIME - Pacific Standard Time on a 24-hour clock.

G.H. - Instantaneous gage height in feet above an established datum.

Q - Instantaneous discharge measured in cubic feet per second (cfs). "E" indicates the value has been estimated.

TEMP - Water temperature in degrees Fahrenheit (F) or Celsius (C).

TURB - Jackson Turbidity Units measured with a Hellege Turbidmeter (E) or a Hach Nephelometer (A).

PH - Measure of acidity or alkalinity of water.

EC - Electrical conductance in micromhos at 25° C.

HCO_3 - Bicarbonate

CO_3 - Carbonate

Nitrogen Series as N

NO_2 - Unfiltered nitrite

NH_3 - Unfiltered ammonia

NO_3 - Unfiltered nitrate

ORG N - Organic nitrogen

DIS ORG N - Dissolved organic nitrogen

NH_3 + ORG N - Ammonia plus organic nitrogen

Phosphorus Series as P

DIS A.H.PO_4 - Dissolved acid hydrolyzable phosphate

D O-PO_4 - Dissolved orthophosphate

T O-PO_4 - Total orthophosphate

D TOT P - Dissolved total phosphorus

TOT P - Total phosphorus

TABLE D-5
NUTRIENT ANALYSIS OF SURFACE WATER

DATE TIME	SAMP LAB	G.H. O	TEMP TURB	FIELD CO2 ALK.	FIELD LABORATORY PH	FIELD LABORATORY EC	LAB HCO3 CO3	NUTRIENT CONSTITUENTS IN MILLIGRAMS PER LITER NO2 NH3	NO3 ORG N	DIS ORG N	NH3 + ORG N	DIS. A.H.PO4	D O-PO4 T O-PO4	D TOT P TOT P
	F0	1300.00		SMITH RIVER NEAR CRESCENT CITY										
2/07/72	5050	13.65	7.8C		7.2	89		--	0.03				0.00	--
1700	5050	5510.0						--	--	--	0.0	--	--	0.02
5/02/72	5050	11.16	9.5C		7.3	90		--	0.00				0.01	--
0645	5050	2380.0						--	--	--	0.1	--	--	0.01
	F2	1050.00		SHASTA RIVER NEAR YREKA										
6/16/72	5050	3.10	19.4C		8.4	595		--	0.10				0.29	--
0925	5050	20 E						--	--	--	0.6	--	--	0.29
	F2	5250.00		SCOTT RIVER NEAR FORT JONES										
6/16/72	5050	6.70	16.0C		7.5	168		--	0.16				0.02	--
1000	5050	785 F						--	--	--	0.1	--	--	0.02
	F3	1100.00		KLAMATH RIVER NEAR KLAMATH										
11/11/71	5050	7.74	10.5C		7.3	137		--	0.23				0.04	--
1400	5050	10600 E						0.00	0.3	--	0.3	--	--	0.13
2/07/72	5050	10.74	7.0C		7.6	137		--	0.23				0.03	--
1530	5050	20300.0						--	--	--	0.2	--	--	0.11
5/02/72	5050		13.0C		7.6	140		--	0.05				0.02	--
0830	5050	16900.0						--	--	--	0.2	--	--	0.06
8/04/72	5050	5.25	14.8C		8.1	200		--	0.00				0.02	--
0730	5050							--	--	--	0.2	--	--	0.04
	F3	1200.01		KLAMATH RIVER BELOW TRINITY RIVER										
8/04/72	5050		72.0F		7.9	202		--	0.00				0.03	--
0900	5050							--	--	--	0.3	--	--	0.06
	F3	1220.01		KLAMATH RIVER AT ORLEANS										
11/10/71	5050	9.30	47.0F		7.4	123		--	0.29				0.14	--
1615	5050	12500 E						0.00	0.5	--	--	--	--	0.17
5/01/72	5050	7.91	11.5C		7.6	140		--	0.10				0.02	--
1100	5050	10100.0						--	--	--	0.2	--	--	0.05
8/04/72	5050	2.20	73.0F		8.0	192		--	0.02				0.03	--
0950	5050							--	--	--	0.4	--	--	0.07
	F3	1430.00		KLAMATH RIVER NEAR SEIAD VALLEY										
10/12/71	5050		15.0C		7.9	206		--	0.70				0.13	--
1145	5050	3300						--	--	--	--	--	--	--
11/16/71	5050		6.5C		7.5	202		--	0.81				0.10	--
1445	5050	3840						--	--	--	--	--	--	--
12/06/71	5050		6.0C		7.3	207		--	1.35				0.08	--
1130	5050	6820						--	--	--	--	--	--	--
3/06/72	5050		7.2C		7.6	159		--	0.47				0.05	--
1335	5050	24400						--	--	--	--	--	--	--
6/16/72	5050		17.5C		7.9	200		--	0.06				0.03	--
0830	5050	2420						--	--	--	0.3	--	--	0.06
	F3	1470.00		KLAMATH RIVER ABOVE HAMBURG RESERVOIR SITE										
11/16/71	5050		6.5C		7.6	201		--	0.86				0.11	--
1400	5050	3300 E						--	--	--	--	--	--	--
3/06/72	5050		7.2C		7.6	169		--	0.61				0.01	--
1245	5050	14800 E						--	--	--	--	--	--	--
6/16/72	5050		18.5C		8.0	235		--	0.09				0.09	--
0750	5050	800 E						--	--	--	0.4	--	--	0.11
7/19/72	5050		20.0C		8.0			--	0.00				0.09	--
0735	5050	750 E						--	--	--	--	--	--	--
	F3	1599.01		KLAMATH RIVER BELOW IRON GATE DAM										
10/12/71	5050		14.0C		7.2	185		--	0.88				0.16	--
1000	5050							--	--	--	--	--	--	--
11/16/71	5050		6.0C		7.2	177		--	1.04				0.10	--
1215	5050	3110						--	--	--	--	--	--	--
2/02/72	5050		2.5C		7.3	148		--	0.88				0.19	--
0935	5000	3420						--	--	--	--	--	--	--
3/06/72	5050		6.0C		7.3	152		--	0.70				0.19	--
1130	5050	14000						--	--	--	--	--	--	--
5/17/72	5050		14.0C		8.0	192		--	0.22				0.08	--
0645	5050	2670						--	--	--	--	--	--	--
6/16/72	5050	2.50	20.0C		8.4	164		--	0.11				0.11	--
0755	5050	800 E						--	--	--	0.6	--	--	0.12
7/18/72	5050		23.0C		8.3			--	0.09				0.10	--
1530	5050	722						--	--	--	--	--	--	--
9/08/72	5050		18.0C		7.8	174		--	0.29				0.18	--
0700	5050							--	--	--	--	--	--	--

TABLE D-5(cont.)
NUTRIENT ANALYSIS OF SURFACE WATER

DATE TIME	SAMP LAB	G.H. Q	TEMP TURB	FIELD CO2 ALK.	FIELD LABORATORY PH	EC	LAB HCO3 CO3	NUTRIENT CONSTITUENTS IN MILLIGRAMS PER LITER NO2 NH3	NO3 ORG N	DIS ORG N	NH3 + ORG N	DIS. A.H.PO4	D O-PO4 T O-PO4	D TOT P TOT P
	F3	4100.00		SALMON RIVER AT SOMESBAR										
8/04/72	5050	3.77	71.5F		7.9	142		--	0.02				0.01	--
1035	5050							--	--	--	0.1	--	--	0.01
	F4	1080.00		TRINITY RIVER AT HOOPA										
11/09/71	5050	14.37	14.0C		7.6	175		--	0.02				0.00	--
1145	5050	782.0						--	--	--	--	--	--	--
11/10/71	5050	16.49	49.0F		7.6	183		--	0.03				0.02	--
1300	5050	2550 E						0.00	0.3	--	--	--	--	0.15
12/13/71	5050	17.48	5.0C		7.5	160		--	0.05				0.00	--
1045	5050	4230.0						--	--	--	--	--	--	--
2/07/72	5050	17.86	6.7C		7.5	152		--	0.20				0.02	--
1145	5000	4910.0						--	--	--	--	--	--	--
3/06/72	5050	25.99	8.8C		7.5	129		--	0.02				0.03	--
1030	5050	31000.0						--	--	--	--	--	--	--
5/01/72	5050	17.55	11.0C		7.6	152		--	0.00				0.02	--
0955	5050	3440.0						--	--	--	0.1	--	--	0.04
8/04/72	5050	13.97	71.0F		7.8	208		--	0.00				0.01	--
0815	5050							--	--	--	0.1	--	--	0.02
9/12/72	5050		17.0C		7.9	194		--	0.00				0.00	--
1000	5050							--	--	--	--	--	--	--
	F4	1376.00		TRINITY RIVER NEAR BURNT RANCH										
3/06/72	5050		8.0C		7.4	118		--	0.02				0.00	--
0945	5050	6780.0						--	--	--	--	--	--	--
5/01/72	5050		11.0C		7.5	133		--	0.00				0.04	--
0845	5050	468.0						--	--	--	--	--	--	--
	F4	1640.00		TRINITY RIVER AT LEWISTON										
5/01/72	5050	3.01	8.0C		7.2	84		--	0.00				0.00	--
0715	5050	154						--	--	--	0.1	--	--	0.01
7/11/72	5050	3.00	9.0C		7.2			--	0.02				0.00	--
0705	5050	153						--	--	--	--	--	--	--
	F5	1100.00		MAD RIVER NEAR ARCATA										
5/01/72	5050	5.20	15.5C		7.6	139		--	0.06				0.01	--
1400	5050	580.0						--	--	--	0.2	--	--	0.14
	F5	5100.00		REDWOOD CREEK AT ORICK										
2/08/72	5050	7.38	7.8C		7.0	89		--	0.03				0.02	--
0930	5050	1150.0						--	--	--	0.2	--	--	0.16
5/01/72	5050	6.30	15.0C		7.3	115		--	0.02				0.01	--
1515	5050	530.0						--	--	--	0.1	--	--	0.09
	F6	1100.00		EEL RIVER AT SCOTIA										
2/08/72	5050	13.8	11.2C		8.1	176		--	0.06				0.02	--
1530	5000	9130.0						--	--	--	0.2	--	--	0.10
5/02/72	5050		17.0C		7.9	186		--	0.00				0.02	--
1245	5000	2900.0						--	--	--	0.1	--	--	0.02
	F6	1154.50		EEL RIVER AT SOUTH FORK										
5/02/72	5050		17.0C		7.8	185		--	0.00				0.01	--
1415	5050	1560.0						--	--	--	0.1	--	--	0.02
	F6	1329.50		EEL RIVER ABOVE OUTLET CREEK NEAR DOS RIOS										
11/11/71	5050	2.68	10.5C		7.8	236		--	0.02				0.00	--
0830	5000	24.0						--	--	--	--	--	--	--
12/15/71	5050	3.54	4.0C		7.4	158		--	0.25				0.00	--
1015	5050	315.0						--	--	--	--	--	--	--
1/12/72	5050	2.90	4.5C		7.5	205		--	0.02				0.00	--
0900	5050	79.0						--	--	--	--	--	--	--
2/09/72	5050	4.78	6.0C		7.4	137		--	0.02				0.02	--
1030	5050	942.0						--	--	--	--	--	--	--
5/03/72	5050	2.90	16.0C		7.8	189		--	0.00				0.00	--
0745	5050	113.0						--	--	--	--	--	--	--
9/14/72	5050		18.0C		8.0	233		--	0.02				0.04	--
0800	5050							--	--	--	--	--	--	--
	F6	3009.01		EEL RIVER MIDDLE FORK AT DOS RIOS										
10/21/71	5050	8.14	13.8C		8.0	326		--	0.00				0.00	--
0945	5050	31.0						--	--	--	--	--	--	--
12/15/71	5050	9.52	3.5C		7.5	176		--	0.14				0.00	--
1100	5050	615.0						--	--	--	--	--	--	--
2/09/72	5050	9.98	5.1C		7.4	142		--	0.04				0.02	--
1115	5050	1500.0						--	--	--	0.1	--	--	0.05
3/08/72	5050	11.67	8.0C		7.6	111		--	0.00				0.03	--
0930	5050	3500.0						--	--	--	--	--	--	--
5/03/72	5050	9.92	12.8C		7.8	150		--	0.00				0.01	--
0830	5050	930.0						--	--	--	0.1	--	--	0.02

TABLE D-5(cont.)
NUTRIENT ANALYSIS OF SURFACE WATER

DATE TIME	SAMP LAB	G.H. Q	TEMP TUPH	FIELD CO2 ALK.	FIELD LABORATORY PH	FIELD LABORATORY EC	LAB HCO3 CO3	NUTRIENT CONSTITUENTS IN MILLIGRAMS PER LITER NO2 NH3	NO3 ORG N	DIS ORG N	NH3 + ORG N	DIS. A.M.PO4	D O-PO4 T O-PO4	D TOT P TOT P
	F6	3050.00		MILL CREEK NEAR COVELO										
12/15/71	5050		4.0C		7.3	168		--	0.20				0.01	--
1145	5050							--	--	--	--	--	--	--
1/12/72	5050	8.20	5.0C		7.4	248		--	0.14				0.02	--
1020	5050	6 E						--	--	--	--	--	--	--
2/09/72	5050		6.2C		7.3	169		--	0.14				0.02	--
1215	5050							--	--	--	--	--	--	--
	F6	3200.00		BLACK BUTTE RIVER NEAR COVELO										
10/21/71	5050	13.32	15.2C		8.1	295		--	0.00				0.00	--
1115	5050	8.8						--	--	--	--	--	--	--
1/12/72	5050	13.64	3.5C		7.5	206		--	0.02				0.00	--
1100	5050	71						--	--	--	--	--	--	--
3/08/72	5050	20.11	8.5C		7.4	112		--	0.00				0.00	--
1145	5050	745.0						--	--	--	--	--	--	--
	F6	4100.00		EEL RIVER SOUTH FORK NEAR MIRANDA										
6/06/72	5050	4.19	24.0C		8.2	176		--	0.00				0.02	--
1415	5050	260						--	--	--	--	--	--	--
9/13/72	5050		22.0C		8.3	205		--	0.00				0.00	--
1500	5050							--	--	--	--	--	--	--
	F6	5279.00		VAN DUZEN RIVER NEAR BRIDGEVILLE										
2/08/72	5050		7.0C		7.3	109		--	0.08				0.01	--
1445	5050	1000.0						--	--	--	0.1	--	--	0.04
5/02/72	5050	5.77	15.0C		7.7	136		--	0.00				0.01	--
1130	5050	380.0						--	--	--	0.2	--	--	0.01
	F7	5100.00		BEAR RIVER AT CAPETOWN										
2/08/72	5050		8.9C		7.3	153		--	0.07				0.02	--
1130	5050	180 E						--	--	--	0.1	--	--	0.06

GROUND WATER BASINS, WATER QUALITY SAMPLES

APPENDIX E

GROUND WATER QUALITY

This appendix presents ground water quality data collected during the period from October 1, 1971, through September 30, 1972. The data were collected from a number of major ground water sources in the North Coastal area in cooperation with local agencies. During the 1972 water year, 72 wells were sampled in 12 ground water basins.

At the time of field sampling, pH, specific conductance, and temperature measurements are made. The results are compared with measurements made in previous years. If a substantial change is noted, the samples are submitted to the laboratory for further analyses.

Laboratory analyses of ground waters were performed in accordance with "Standard Methods for the Examination of Water and Waste Water", 13th Edition, 1971.

The Region and Basin and State Well Numbering Systems are described in Appendix C, "Ground Water Measurements".

TABLE E-1 MINERAL ANALYSES OF GROUND WATER

An explanation of column headings follows:

The LAB and SAMPLER agency code is as follows:

5050 - California Department of Water Resources

TIME - Pacific Standard Time on a 24-hour clock.

TEMP - Water temperature in degrees Fahrenheit or degrees Celsius. The computer prints out both.

PH LAB & FIELD - Measure of acidity or alkalinity of water.

EC LAB - The electrical conductance in micromhos at 25° Celsius.

EC FIELD - The electrical conductance in micromhos at time of field sampling.

TDS - Gravimetric determination of total dissolved solids at 180° Celsius.

SUM - Total dissolved solids determined by addition of analyzed constituents.

TH - Total hardness.

NCH - Noncarbonate hardness.

SAR - Sodium adsorption ratio.

PERCENT REACTANCE VALUE - Determined by dividing the sum of the cations or anions in milliequivalents per liter into each constituent in milliequivalents per liter arriving at a percentage. For a partial analysis, an approximate value is determined by multiplying the electrical conductance by 0.01 and using that as the cation or anion sum.

The MINERAL CONSTITUENTS are as follows:

B	- Boron	K	- Potassium
CA	- Calcium	MG	- Magnesium
CL	- Chloride	NA	- Sodium
CO_3	- Carbonate	NO_3	- Nitrate
F	- Fluoride	SIO_2	- Silica
HCO_3	- Bicarbonate	SO_4	- Sulfate

TABLE E-1
MINERAL ANALYSES OF GROUND WATER

DATE TIME	SAMPLER LAB		TEMP	FIELD PH	LABORATORY EC	MINERAL CONSTITUENTS IN MILLIGRAMS PER LITER / MILLIEQUIVALENTS PER LITER / PERCENT REACTANCE VALUE: CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F	SIO2	TDS SUM	TH NCH	SAR
	1		NORTH COASTAL REGION																	
	1-01		SMITH RIVER PLAIN																	
	16N/01W-02Q01	H																		
09/25/72	5050		58.0F		190	--	--	--	--	--	--	--	--	--	--	--				
1445	5050		14.4C													--				
	16N/01W-20H01	H																		
09/25/72	5050		58.0F	6.1	170	--	--	--	--	--	--	--	--	--	--	--				
1410			14.4C													--				
	16N/02W-13E01	H																		
09/26/72	5050		58.0F	5.9	382	14	12	35	.8	0	73	14	58	1.3	.00	--	214	85		
1040	5050		14.4C	7.7	356	.70	.99	1.52	.02	.00	1.20	.29	1.64	.02		--	171	25	1.7	
						22	31	47	1		38	9	52	1						
	17N/01W-03E01	H																		
09/25/72	5050		56.0F	7.0	325	--	--	--	--	--	--	--	--	--	--	--				
0935			13.3C													--				
	17N/01W-14C02	H																		
09/25/72	5050		59.0F	6.4	185	--	--	--	--	--	--	--	--	--	--	--				
1510			15.0C													--				
	18N/01W-05K01	H																		
09/26/72	5050		56.0F	5.9	182	--	--	--	--	--	--	--	--	--	--	--				
0840			13.3C													--				
	18N/01W-17R04	H																		
09/26/72	5050		58.0F	6.8	320	16	20	14	.4	0	131	5.1	24	.2	.00	--	190	122		
0820	5050		14.4C	7.5	298	.80	1.64	.61	.01	.00	2.15	.11	.68	.00		--	144	15	0.6	
						26	54	20			73	4	23							
	18N/01W-26H01	H																		
09/26/72	5050		62.0F	6.1	120	--	--	4.5	--	0	52	--	6.8	--	--	--		45		
0755	5050		16.7C	7.1	111			.20		.00	.85		.19			--				
	18N/01W-34M02	H																		
09/26/72	5050		57.0F	6.8	355	--	--	--	--	--	--	--	--	--	--	--				
0920			13.9C													--				
	1-02		KLAMATH RIVER BASIN																	
	46N/02E-15F01	M																		
08/30/72	5050		60.0F	7.2	165	--	--	--	--	--	--	--	--	--	--	--				
1145			15.5C													--				
	47N/02E-20C01	M																		
08/30/72	5050		58.0F	6.8	2180	--	--	--	--	--	--	--	--	--	--	--				
1110	5050		14.4C													--				
	1-03		BUTTE VALLEY																	
	45N/01E-09C02	M																		
08/30/72	5050		57.0F	7.6	190	--	--	--	--	--	--	--	--	--	--	--				
1220			13.9C													--				
	47N/01E-32A01	M																		
08/31/72	5050		70.0F	7.8	215	--	--	--	--	--	--	--	--	--	--	--				
1005			21.1C													--				
	48N/01E-30F01	M																		
09/30/72	5050		56.0F	7.6	390	--	--	25	--	0	211	--	5.6	--	--	--		140		
0845	5050		13.3C	8.0	381			1.09		.00	3.46		.16			--				
	46N/01W-06P01	M																		
08/30/72	5050		52.0F	7.2	680	40	37	45	7.6	0	377	22	11	3.3	.00	--	375	252		
1445	5050		11.1C	8.0	627	2.00	3.04	1.96	.19	.00	6.18	.46	.31	.05		--	351	0	1.2	
						28	42	27	3		88	7	4	1						
	46N/01W-17L01	M																		
08/31/72	5050		54.0F	7.5	480	--	--	--	--	--	--	--	--	--	--	--				
0845	5050		12.2C													--				
	46N/02W-16A02	M																		
08/30/72	5050		51.0F	7.8	180	--	--	--	--	--	--	--	--	--	--	--				
1420			10.5C													--				
	46N/02W-25R02	M																		
08/30/72	5050		55.0F	7.1	340	21	21	13	5.3	0	142	37	2.1	11.0	.00	--	232	138		
1330	5050		12.8C	7.8	337	1.05	1.73	.57	.14	.00	2.33	.77	.06	.18		--	180	23	0.5	
						30	50	16	4		70	23	2	5						
	47N/01W-23H02	M																		
08/31/72	5050		68.0F	7.4	395	8.6	13	45	7.2	0	165	.0	21	18.0	.10	--	234	75		
1045	5050		20.0C	7.9	360	.43	1.07	1.96	.18	.00	2.70	.00	.59	.29		--	194	0	2.3	
						12	29	54	5		75		16	8						

TABLE E-1(cont.)
MINERAL ANALYSES OF GROUND WATER

DATE TIME	SAMPLER LAB		TEMP	FIELD LABORATORY PH	EC	MINERAL CONSTITUENTS IN MILLIGRAMS PER LITER / MILLIEQUIVALENTS PER LITER / PERCENT REACTANCE VALUE CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F SIO2	TDS SUM	TH NCH	SAR
	1	NORTH COASTAL REGION																	
	1-03	BUTTE VALLEY																	
	47N/02W-21H03	M																	
08/31/72	5050		56.0F	7.2	110	--	--	--	--	--	--	--	--	--	--	--			
0815			13.3C													--			
	48N/01W-23J01	M																	
08/30/72	5050		61.0F	7.6	420	--	--	--	--	--	--	--	--	--	--	--			
0800			16.1C													--			
	1-04	SHASTA VALLEY																	
	42N/05W-20J01	M																	
08/28/72	5050		62.0F	6.8	420	19	26	29	4.0	0	250	.0	9.8	.2	.20	--	274	156	
1000	5050		16.7C	8.0	413	.95	2.14	1.26	.10	.00	4.10	.00	.28	.00		--	211	0	1.0
						21	48	28	2		94		6						
	42N/06W-10J01	M																	
08/28/72	5050		60.0F	7.4	575	--	--	--	--	--	--	--	--	--	--	--			
1030			15.5C													--			
	43N/05W-02C01	M																	
08/28/72	5050		54.0F	6.8	265	--	--	--	--	--	--	--	--	--	--	--			
1250	5050		12.2C													--			
	44N/05W-32C02	M																	
08/28/72	5050		62.0F	7.2	1490	--	--	--	--	--	--	--	175	--	1.90	--		469	
1210	5050		16.7C		1360								4.94			--			
	44N/05W-32C03	M																	
08/28/72	5050		64.0F	7.2	1100	--	--	--	--	--	--	--	--	--	--	--			
1215			17.8C													--			
	44N/06W-22K01	M																	
08/28/72	5050		66.0F	7.0	490	--	--	--	--	--	--	--	--	--	--	--			
1140			18.9C													--			
	45N/05W-06E01	M																	
08/28/72	5050		61.0F	8.0	940	--	--	--	--	--	--	--	--	--	--	--			
1430			16.1C													--			
	45N/06W-19E01	M																	
08/28/72	5050		66.0F	7.5	365	--	--	--	--	--	--	--	--	--	--	--			
1330			18.9C													--			
	1-05	SCOTT RIVER VALLEY																	
	42N/09W-27K01	M																	
08/29/72	5050		61.0F	6.0	60	--	--	--	--	--	--	--	--	--	--	--			
0925			16.1C													--			
	43N/09W-02G01	M																	
08/29/72	5050		60.0F	7.1	535	--	--	--	--	--	--	--	--	--	--	--			
0805	5050		15.5C													--			
	43N/09W-08F01	M																	
08/29/72	5050		66.0F	6.2	125	--	--	--	--	--	--	--	--	--	--	--			
1100			18.9C													--			
	43N/09W-24F02	M																	
08/29/72	5050		57.0F	7.1	465	--	--	--	--	--	--	--	4.6	--	.00	--			244
0845	5050		13.9C		456								.13			--			
	43N/09W-29G02	M																	
08/29/72	5050		64.0F	6.0	62	--	--	--	--	--	--	--	1.8	--	--	--			24
1025	5050		17.8C		58								.05			--			
	43N/10W-11E01	M																	
08/29/72	5050		58.0F	6.4	88	--	--	--	--	--	--	--	--	--	--	--			
1140			14.4C													--			
	44N/09W-34R01	M																	
08/29/72	5050		69.0F	6.8	320	--	--	--	--	--	--	--	--	--	--	--			
0825			20.5C													--			
	1-06	HAYFORK VALLEY																	
	31N/12W-12L01	M																	
09/22/72	5050		60.0F	6.5	218	--	--	--	--	--	--	--	2.9	.4	--	--			94
1005	5050		15.5C		204								.08	.01		--			
	31N/12W-15Q01	M																	
09/22/72	5050		61.0F	7.0	283	--	--	--	--	--	--	--	--	--	--	--			
1050			16.1C													--			

TABLE E-1(cont.)
MINERAL ANALYSES OF GROUND WATER

DATE TIME	SAMPLER LAB	TEMP	FIELD PH	LABORATORY EC	CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F	SIO2	TDS SUM	TH NCH	SAR
					MINERAL CONSTITUENTS IN MILLIGRAMS PER LITER / MILLIEQUIVALENTS PER LITER / PERCENT REACTANCE VALUE									MILLIGRAMS PER LITER					
	1		NORTH COASTAL REGION																
	1-06		HAYFORK VALLEY																
	31N/12W-15K01	H																	
09/22/72	5050	60.0F	7.1	252	--	--	--	--	--	--	--	--	--	--	--				
1140		15.5C													--				
	1-08		MAD RIVER VALLEY																
	05N/01E-04H04	H																	
09/28/72	5050	58.0F	7.6	480	--	--	--	--	0	199	--	44	--	--	--			157	
1030	5050	14.4C	7.8	478					.00	3.26		1.24			--				
	06N/01E-07M01	H																	
09/26/72	5050	58.0F	6.3	600	42	31	18	2.6	0	274	9.4	25	1.2	.10	--		266	234	
1530	5050	14.4C	7.5	529	2.10	2.55	.78	.07	.00	4.49	.20	.71	.02		--		264	8	0.5
					38	46	14	1		83	4	13							
	06N/01E-08H01	H																	
09/26/72	5050	57.0F	5.8	185	--	--	--	--	--	--	--	15	23.0	--	--			42	
1350	5050	13.9C		176								.42	.37		--				
	06N/01E-19Q01	H																	
09/27/72	5050	56.0F	6.6	385	--	--	--	--	--	--	--	--	--	--	--				
1645		13.3C													--				
	06N/01E-30N01	H																	
09/27/72	5050	56.0F	7.2	430	48	18	9.2	1.2	0	232	.0	12	1.0	.10	--		222	194	
1610	5050	13.3C	7.8	402	2.40	1.48	.40	.03	.00	3.80	.00	.34	.02		--		204	4	0.3
					56	34	9	1		91		8							
	06N/01E-32F01	H																	
09/28/72	5050	72.0F	7.4	760	--	--	--	--	--	--	--	--	--	--	--				
1101		22.2C													--				
	06N/01W-01H01	H																	
09/26/72	5050	57.0F	6.1	208	--	--	--	--	--	--	--	--	--	--	--				
1300		13.9C													--				
	1-09		EUREKA PLAIN																
	05N/01E-18Q01	H																	
09/28/72	5050	62.0F	7.2	860	--	--	--	--	--	--	--	--	--	--	--				
0945	5050	16.7C													--				
	05N/01E-20Q01	H																	
09/28/72	5050	55.0F	6.1	300	--	--	--	--	--	--	--	32	--	--	--			92	
1010	5050	12.8C		284								.90			--				
	04N/01W-08P01	H																	
09/27/72	5050	55.0F	7.4	155	--	--	--	--	--	--	--	--	--	--	--				
1350		12.8C													--				
	04N/01W-16H01	H																	
09/27/72	5050	58.0F	7.4	530	--	--	--	--	--	--	--	--	--	--	--				
1430		14.4C													--				
	04N/01W-17B01	H																	
09/28/72	5050	54.0F	7.1	170	--	--	--	--	--	--	--	--	--	--	--				
0910		12.2C													--				
	05N/01W-29Q01	H																	
09/27/72	5050	59.0F	6.2	290	--	--	--	--	--	--	--	--	--	--	--				
1530		15.0C													--				
	1-10		EEL RIVER VALLEY																
	02N/01W-04D01	H																	
09/27/72	5050	57.0F	6.8	580	--	--	--	--	--	--	--	9.8	16.0	--	--			276	
1230	5050	13.9C		566								.28	.26		--				
	02N/01W-07F01	H																	
09/27/72	5050	55.0F	6.9	462	--	--	--	--	--	--	--	--	--	--	--				
1205		12.8C													--				
	02N/01W-12D04	H																	
09/27/72	5050	58.0F	7.5	170	--	--	--	--	--	--	--	--	--	--	--				
1315		14.4C													--				
	03N/01W-05K01	H																	
09/27/72	5050	57.0F	6.2	150	--	--	--	--	--	--	--	--	--	--	--				
0800		13.9C													--				
	03N/01W-18A01	H																	
09/27/72	5050	57.0F	7.1	445	--	--	--	--	--	--	--	--	--	--	--				
0830	5050	13.9C													--				

TABLE E-1(cont.)

MINERAL ANALYSES OF GROUND WATER

DATE TIME	SAMPLER LAB		TEMP	FIELD PH	LABORATORY EC	CA	MG	NA	K	CO3	HCO3	SO4	CL	NO3	B	F SIO2	TDS SUM	TH NCH	SAR
						MINERAL CONSTITUENTS IN MILLIGRAMS PER LITER					MILLIGRAMS PER LITER MILLIEQUIVALENTS PER LITER PERCENT REACTANCE VALUE				MILLIGRAMS PER LITER				
	1		NORTH COASTAL REGION																
	1-10		EEL RIVER VALLEY																
	03N/01W-30N01	M																	
09/27/72	5050		58.0F	6.4	610	67	31	11	2.0	0	316	31	15	8.0	.10	--	310	294	
0945	5050		14.4C	7.7	594	3.34	2.55	.48	.05	.00	5.18	.65	.42	.13		--	320	36	0.3
						52	40	7	1		81	10	7	2					
	03N/02W-32Q01	H																	
09/27/72	5050		56.0F	7.0	1380	32	40	173	3.9	0	227	28	295	.0	.10	--	726	244	
1045	5050		13.3C	8.2	1300	1.60	3.29	7.53	.10	.00	3.72	.58	8.32	.00		--	684	59	4.8
						13	26	60	1		29	5	66						
	03N/02W-35M01	H																	
09/27/72	5050		55.0F	7.0	750	--	--	--	--	--	--	--	--	--	--	--			
1015			12.8C													--			
	1-11		ROUND VALLEY																
	22N/12W-06L02	M																	
09/13/72	5050		60.0F	7.4	435	--	--	--	--	--	--	--	4.7	--	--	--		206	
1500	5050		15.5C		416								.13			--			
	22N/12W-19F01	M																	
09/13/72	5050		59.5F	7.2	540	--	--	--	--	--	--	--	9.3	--	.00	--		272	
1335	5050		15.3C		532								.26			--			
	22N/13W-01J03	M																	
09/13/72	5050		62.0F	7.3	235	--	--	--	--	--	--	--	--	--	--	--			
1435			16.7C													--			
	22N/13W-13A01	M																	
09/13/72	5050		65.0F	7.2	235	--	--	--	--	--	--	--	--	--	--	--			
1430	5050		18.3C													--			
	23N/12W-31N01	M																	
09/13/72	5050		59.0F	7.4	270	--	--	--	--	--	--	--	3.7	--	.00	--		117	
1330	5050		15.0C		254								.10			--			
	23N/12W-33L03	M																	
09/13/72	5050		66.0F	7.3	650	--	--	--	--	--	--	--	7.8	3.8	--	--		299	
1600	5050		18.9C		628								.22	.06		--			
	23N/13W-25P01	M																	
09/13/72	5050		61.0F	7.4	265	--	--	--	--	--	--	--	3.8	--	--	--		120	
1540	5050		16.1C		246								.11			--			
	23N/13W-36P03	M																	
09/13/72	5050		60.5F	7.0	275	--	--	--	--	--	--	--	6.3	--	--	--		131	
1615	5050		15.8C		261								.18			--			
	1-12		LAYTONVILLE VALLEY																
	21N/15W-01L02	M																	
09/14/72	5050		61.0F	7.4	450	--	--	--	--	--	--	--	--	--	--	--			
0725			16.1C													--			
	21N/15W-12M02	M																	
09/14/72	5050		56.0F	6.0	80	--	--	--	--	--	--	--	--	--	--	--			
0745			13.3C													--			
	1-13		LITTLE LAKE VALLEY																
	18N/13W-08L01	M																	
09/14/72	5050		57.0F	6.4	210	--	--	--	--	--	--	--	5.6	--	--	--		82	
0930	5050		13.9C		198								.16			--			
	18N/13W-20H03	M																	
09/14/72	5050		56.0F	6.4	217	--	--	--	--	--	--	--	--	--	--	--			
0900	5050		13.3C													--			

TABLE E-2
MINOR ELEMENT ANALYSIS OF GROUND WATER

CONSTITUENTS IN MILLIGRAMS PER LITER

DATE TIME	SAMP LAB	DEPTH	DISCH EC	TEMP PH	ARSENIC	BARIUM CADMIUM	CHROM (HEX) CHROM (ALL)	COPPER IRON	LEAD MANGANESE	MERCURY SELENIUM	SILVER ZINC
		1		NORTH COASTAL REGION							
		1-01		SMITH RIVER PLAIN							
		16N/01W-02D01		M							
9/25/72	5050			58.0F		--	--	0.01 D	0.01 D	--	--
1445	5050		190		0.00 D	0.00 D	--	0.02 D	0.15 D	0.00 D	0.05 D
		1-02		KLAMATH RIVER BASIN							
		47N/02E-20C01		M							
8/30/72	5050			58.0F		--	--	0.02 D	0.00 D	--	--
1110	5050		2180	6.8	0.00 D	0.00 D	--	0.01 D	0.45 D	0.00 D	1.1 D
		1-03		BUTTE VALLEY							
		46N/01W-17L01		M							
8/31/72	5050			54.0F		--	--	0.02 D	0.01 D	--	--
0845	5050		480	7.5	0.00 D	0.00 D	--	0.03 D	0.04 D	0.00 D	0.02 D
		48N/01W-28J01		M							
8/30/72	5050			61.0F		--	--	0.00 D	0.01 D	--	--
0800	5050		420	7.6	0.00 D	0.00 D	--	0.02 D	0.00 D	0.00 D	0.00 D
		1-04		SHASTA VALLEY							
		43N/05W-02C01		M							
8/28/72	5050			54.0F		--	--	0.00 D	0.01 D	--	--
1250	5050		265	6.8	0.00 D	0.00 D	--	0.01 D	0.00 D	0.00 D	0.00 D
		1-05		SCOTT RIVER VALLEY							
		43N/09W-02G01		M							
8/29/72	5050			60.0F		--	--	0.01 D	0.00 D	--	--
0805	5050		535	7.1	0.00 D	0.00 D	--	0.02 D	0.01 D	0.00 D	0.03 D
		1-09		EUREKA PLAIN							
		05N/01E-18D01		M							
9/28/72	5050			62.0F		--	--	0.02 D	0.00 D	--	--
0945	5050		860	7.2	0.00 D	0.00 D	--	0.01 D	0.00 D	0.00 D	0.08 D
		1-10		EEL RIVER VALLEY							
		03N/01W-18A01		M							
9/27/72	5050			57.0F		--	--	0.00 D	0.01 D	--	--
0830	5050		445	7.1	0.00 D	0.00 D	--	0.01 D	0.00 D	0.00 D	0.00 D
		1-11		ROUND VALLEY							
		22N/13W-13A01		M							
9/13/72	5050			65.0F		--	--	0.00 D	0.01 D	--	--
1430	5050		235	7.2	0.00 D	0.00 D	--	0.01 D	0.00 D	0.00 D	0.08 D
		1-13		LITTLE LAKE VALLEY							
		18N/13W-20H03		M							
9/14/72	5050			56.0F		--	--	0.00 D	0.00 D	--	--
0900	5050		217	6.4	0.00 D	0.00 D	--	0.01 D	0.00 D	0.00 D	0.02 D

END OF 294-M1

Appendix F, "Waste Water Data", which appeared in certain volumes of the Bulletin No. 130 series, has been discontinued. For information regarding waste water, the reader is referred to the recently reactivated Bulletin No. 68 series: "Inventory of Waste Water Production and Waste Water Reclamation Practices in California".