California Regional Water Quality Control Board

Central Valley Region, Sacramento Office
Agricultural Regulatory and Planning Unit

Loads of Salt, Boron, and Selenium in the Grassland Watershed and Lower San Joaquin River
October 1985 to September 1995 -- Raw Data Supplemental Appendix

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Data Retrieval Result

Flow (cfs) Water Year 1995 - San Joaquin River near Patterson / DWR data
This site is approximately 6 miles downstream of Crows Landing

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	421	574	503	569	4,210	940	15,000	10,900	12,100	3,600	2,120	1,450
2	435	597	512	575	3,590	928	14,600	11,500	12,000	4,070	2,350	1,400
3	451	585	531	609	3,010	919	14,200	12,200	11,800	4,760	2,800	1,400
4	391	584	528	633	2,460	939	14,000	12,700	11,500	5,500	3,300	1,460
5	430	552	525	682	2,030	1,010	13,600	12,900	11,100	6,370	3,270	1,440
6	476	532	539	752	1,830	1,050	13,400	13,000	10,400	7,140	2,660	1,490
7	483	516	546	859	1,650	1,020	13,700	13,200	9,880	7,770	2,080	1,460
8	431	510	551	1,020	1,510	1,040	13,600	13,400	9,700	8,170	1,830	1,460
9	373	503	545	1,220	1,400	1,050	13,200	13,600	9,480	8,560	1,830	1,520
10	440	507	546	1,540	1,320	1,780	12,900	13,900	9,060	8,990	1,820	1,640
11	461	498	541	1,960	1,250	4,220	12,600	13,900	8,480	9,540	1,790	1,770
12	494	517	552	2,370	1,200	5,880	12,200	13,900	7,830	10,300	1,730	1,780
13	489	535	559	2,300	1,180	6,910	11,900	13,900	7,370	11,000	1,780	1,770
14	493	537	556	2,090	1,200	7,630	11,700	13,800	7,030	11,500	1,770	1,830
15	730	525	559	2,220	1,170	10,900	11,300	14,000	6,810	11,800	1,740	1,870
16	1,000	522	555	2,700	1,140	15,900	11,000	14,300	6,700	11,900	1,800	1,910
17	1,090	518	547	3,140	1,160	17,900	10,800	14,400	6,680	11,300	1,790	1,970
18	1,010	513	539	3,210	1,130	17,400	10,500	14,500	6,740	9,890	1,750	1,980
19	908	514	541	2,990	1,060	16,300	10,200	14,500	6,920	8,310	1,720	1,930
20	816	500	530	2,490	1,030	15,100	10,000	14,400	6,920	6,980	1,730	1,900
21	808	500	531	2,010	999	14,000	9,900	14,300	6,770	6,230	1,730	1,960
22	758	495	525	1,760	982	12,900	9,720	14,300	6,690	6,270	1,750	2,060
23	743	490	515	1,660	977	12,700	9,730	14,300	6,430	6,290	1,730	2,150
24	738	482	516	1,870	956	12,400	9,970	14,200	5,610	5,740	1,680	2,240
25	645	487	531	2,710	938	12,200	10,300	13,800	4,520	4,700	1,660	2,070
26	614	500	530	3,080	925	12,800	10,500	13,600	3,680	3,740	1,620	1,790
27	612	501	539	3,750	927	14,300	10,600	13,600	3,230	3,240	1,570	1,620
28	597	506	548	4,450	943	15,300	10,500	13,500	3,310	2,830	1,590	1,490
29	567	501	549	5,210		15,500	10,500	13,300	3,370	2,460	1,490	1,510
30	562	501	553	5,180		15,200	10,600	12,900	3,410	2,240	1,470	1,570
31	570		555	4,800		15,000		12,400		2,180	1,450	

TOTAL	19,036	15,602	16,697	70,409	42,177	281,116	352,720	419,100	225,520	213,370	59,400	51,890
MEAN	614	520	539	2,271	1,506	9,068	11,757	13,519	7,517	6,883	1,916	1,730
MAX	1,090	597	559	5,210	4,210	17,900	15,000	14,500	12,100	11,900	3,300	2,240
MIN	373	482	503	569	925	919	9,720	10,900	3,230	2,180	1,450	1,400
AC-FT	37,748	30,939	33,110	139,621	83,637	557,453	699,444	831,075	447,206	423,113	117,790	102,898

San Joaquin River at Crows Landing
Electrical Conductivity Composite SigmaTM Samples (µmhos/cm) - Water Year 1995

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1									152	437	859	852
2									147	249	646	894
3									149	274	451	917
4									155	144	341	840
5									191	180	345	835
6								163	196	185	591	812
7								158	188	203	745	785
8								160	203	335	885	877
9								160	267	100	915	775
10								160	258		826	686
11								165	273		851	587
12								152	269		964	599
13								153	220		997	556
14								156	249	140	925	547
15								154	267	131	898	518
16								157	273	135	782	484
17								163	275	152	780	472
18								166	266	191	778	466
19								161	278	240	807	467
20								158	270	275	789	428
21								153	266	267	836	382
22								147	265	220	735	
23								145	294	220	676	318
24								146	384	265	707	327
25								142	513	340	750	399
26								143	621	470	791	519
27								152	674	550	876	582
28								152	563	689	851	643
29								150	568	770	847	599
30								167	579	830	867	584
31								158		854	863	

San Joaquin River at Crows Landing
Boron Composite SigmaTM Samples (mg/L) - Water Year 1995

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1					0.4	1.7			0.10	0.26	0.55	0.55
2					0.6	1.6			0.10	0.14	0.39	0.59
3					0.7				0.10	0.12	0.28	0.60
4					0.8	1.5			0.10	0.08	0.21	0.55
5					0.9	1.4			0.12	0.09	0.24	0.54
6					1.1	1.3		0.08	0.12	0.10	0.42	0.53
7					1.2	1.3		0.08	0.12	0.12	0.54	0.53

8					1.2	1.3		0.09	0.13		0.59	0.61
9					1.3			0.09	0.19		0.58	0.53
10					1.4	1.1		0.10	0.18		0.53	0.48
11					1.4	0.51		0.09	0.21		0.27	0.42
12					1.5	0.27		0.09	0.21		0.32	0.43
13					1.4	0.18		0.09	0.15		0.33	0.39
14					1.5			0.09	0.17	0.08	0.32	0.38
15					1.6			0.09	0.20	0.08	0.33	0.34
16					1.5			0.09	0.17	0.08	0.28	0.29
17								0.10	0.19	0.10	0.55	0.28
18					1.6			0.10	0.17	0.14	0.54	0.27
19					1.7			0.11	0.16	0.17	0.55	0.28
20					1.6			0.10	0.17	0.20	0.51	0.27
21					1.6			0.09	0.19	0.18	0.52	0.21
22					1.7			0.09	0.17	0.14	0.46	0.00
23								0.09	0.19	0.16	0.43	0.00
24				0.89				0.09	0.26	0.20	0.47	0.00
25				0.63	1.6			0.08	0.36	0.26	0.50	0.00
26				0.52	1.4			0.08	0.41	0.35	0.52	0.00
27				0.20	1.5			0.08	0.44	0.41	0.58	0.00
28				0.19	1.5			0.08	0.38	0.50	0.58	0.00
29				0.21				0.09	0.36	0.54	0.57	0.00
30				0.26				0.10	0.34	0.56	0.60	0.00
31				0.32				0.10		0.56	0.58	

San Joaquin River at Crows Landing
Selenium Composite SigmaTM Samples (µg/L) - Water Year 1995

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1					2.1	12			0.6	1.8	4.0	4.1
2					2.9	12			0.6	1.1	3.0	4.4
3					3.6				0.7	0.8	2.2	4.6
4					3.7	12			0.6	0.9	1.6	4.4
5					4.4	10			0.8	0.7	2.0	5.0
6					5.7	8.5		0.5	1.0	0.9	3.2	4.8
7					5.9	8.7		0.6	0.8	1.1	4.0	4.6
8					6.3	10		0.6	0.9		4.3	4.4
9					6.7			0.5	1.3		4.7	4.1
10					7.7			0.5	1.3		4.3	3.7
11					8.3			0.5	1.4		4.3	3.3
12					8.6			0.5	1.6		4.8	3.2
13					8.4			0.5	1.1		4.9	3.1
14					9.2			0.5	1.7	0.7	4.8	3.0
15					9.4			0.6	1.4	0.8	4.5	3.0
16								0.5	1.5	0.6	3.8	2.7
17					11			0.5	1.2	0.9	4.0	2.7
18					11			0.6	1.1	1.1	3.8	2.5
19					11			0.6	1.1	1.4	4.1	2.7
20					10			0.4	1.2	1.7	3.6	2.2
21					11			0.4	1.2	1.5	3.6	1.8
22					12			0.4	1.2	1.2	3.5	
23								0.4	1.3	1.4	3.1	1.4
24				3.8				0.6	1.7	1.6	3.6	1.5
25				3.0	13			0.4	2.2	2.0	3.6	1.7

26	2.2	7.2	0.6	2.7	2.6	3.8	2.0
27	0.8	13	0.6	2.8	2.8	4.3	2.2
28	0.8	13	0.6	2.5	3.4	4.5	2.1
29	1.0		0.5	2.4	3.8	4.5	1.9
30	1.1		0.7	2.4	4.1	4.6	2.3
31	1.3		0.7		3.7	4.4	