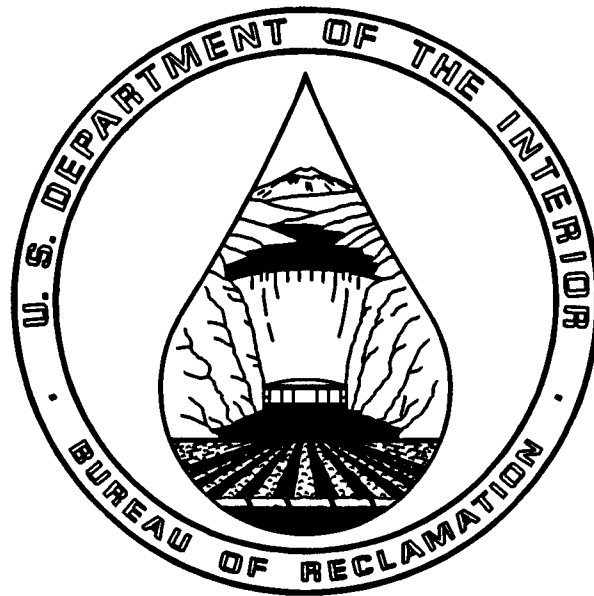


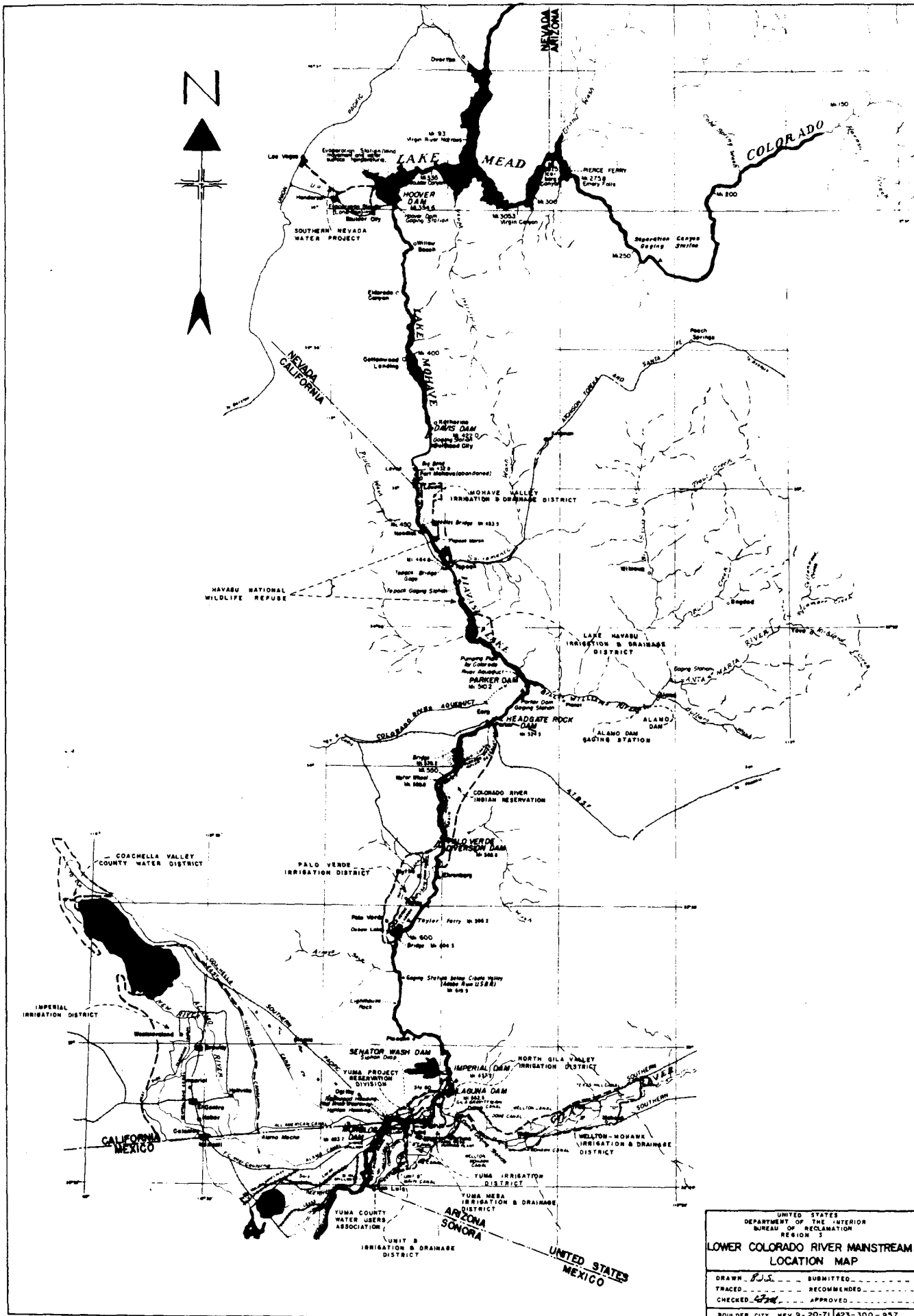
COMPILATION OF RECORDS IN
ACCORDANCE WITH ARTICLE V OF THE
DECREE OF THE SUPREME COURT OF
THE UNITED STATES IN
ARIZONA v. CALIFORNIA DATED MARCH 9, 1964

CALENDAR YEAR 1993



Bureau of Reclamation

Lower Colorado Region
Boulder City, Nevada



UNITED STATES DEPARTMENT OF THE INTERIOR BUREAU OF RECLAMATION REGION 3	
LOWER COLORADO RIVER MAINSTREAM LOCATION MAP	
DRAWN <i>R.S.</i>	SUBMITTED
TRACED <i>R.S.</i>	RECOMMENDED
CHECKED <i>R.S.</i>	APPROVED
BOULDER CITY, NEV. 9-20-71 423-300-957	

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S U M M A R Y
WATER SUPPLY, CONSUMPTIVE USE, DELIVERY TO MEXICO, AND SYTEM LOSS
CALENDAR YEAR 1993

FINAL RECORDS	(THOUSAND ACRE-FEET)												
	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
WATER USE SUMMARY													
ARIZONA	5.7	20.6	161.5	263.0	262.9	293.7	337.7	260.5	167.3	143.8	110.2	219.7	2246.7
CALIFORNIA	129.8	181.7	421.0	555.2	543.7	521.0	549.0	509.7	433.4	412.8	276.2	301.4	4835.0
NEVADA	7.6	7.9	11.7	15.6	21.7	21.7	25.4	23.8	20.8	20.8	14.3	13.1	204.4
STATES TOTAL	143.2	210.2	594.2	833.8	828.3	836.5	912.1	793.9	621.5	577.4	400.6	534.2	7286.1
MEXICO IN SATISFACTION OF TREATY													
MEXICO BYPASS PURSUANT TO MINUTE 242	265.6	595.1	1339.9	937.8	563.7	317.0	216.1	176.9	179.5	213.0	224.7	163.5	5192.8
	7.1	10.0	14.2	10.8	8.7	1.8	3.0	3.0	1.2	1.3	0.2	0.1	61.4
USE TOTAL	415.9	815.3	1948.3	1782.5	1400.8	1155.3	1131.2	973.8	802.3	791.7	625.5	697.9	12540.3
END OF MONTH ACTIVE CONTENTS:													
LAKE POWELL	13104	12994	13412	14159	16805	19337	19526	19074	18825	18790	18694	18402	
LAKE MEAD	20627	21515	21981	21922	21521	21258	21111	21277	21379	21228	21283	21324	
LAKE MOHAVE	1735	1709	1691	1547	1717	1663	1632	1509	1375	1444	1509	1612	
LAKE HAVASU	570	599	572	595	611	600	586	594	579	549	540	551	
LOWER BASIN TOTAL STORAGE	22932	23823	24244	24064	23849	23521	23328	23379	23333	23221	23332	23486	

ARTICLE V OF THE DECREE OF THE SUPREME COURT
OF THE UNITED STATES
IN ARIZONA v. CALIFORNIA DATED MARCH 9, 1964

Article V

V. The United States shall prepare and maintain, or provide for the preparation and maintenance of, and shall make available, annually and at such shorter intervals as the Secretary of the Interior shall deem necessary or advisable, for inspection by interested persons at all reasonable times and at a reasonable place or places, complete, detailed and accurate records of:

(A) Releases of water through regulatory structures controlled by the United States;

(B) Diversions of water from the mainstream, return flow of such water to the stream as is available for consumptive use in the United States or in satisfaction of the Mexican treaty obligation, and consumptive use of such water. These quantities shall be stated separately as to each diverter from the mainstream, each point of diversion, and each of the States of Arizona, California and Nevada;

(C) Releases of mainstream water pursuant to orders therefor but not diverted by the party ordering the same, and the quantity of such water delivered to Mexico in satisfaction of the Mexican Treaty or diverted by others in satisfaction of rights decreed herein. These quantities shall be stated separately as to each diverter from the mainstream, each point of diversion, and each of the States of Arizona, California and Nevada;

(D) Deliveries to Mexico of water in satisfaction of the obligations of Part III of the Treaty of February 3, 1944, and separately stated, water passing to Mexico in excess of treaty requirements;

(E) Diversions of water from the mainstream of the Gila and San Francisco Rivers and the consumptive use of such water, for the benefit of the Gila National Forest.

RECORDS OF RELEASES OF WATER THROUGH
REGULATORY STRUCTURES IN ACCORDANCE WITH
ARTICLE V(A) OF THE DECREE OF
THE SUPREME COURT OF THE UNITED STATES
IN ARIZONA v. CALIFORNIA DATED MARCH 9, 1964

CALENDAR YEAR 1993

The following tabulations for calendar year 1993 show final records of releases of water through regulatory structures controlled by the United States. At Hoover, Davis, Parker, Palo Verde, Imperial, and Laguna Dams, the records are furnished by the U.S. Geological Survey based on measurements at or below the structures.

The record of river flow through Headgate Rock Dam was computed using the record of flow at the gaging station "Colorado River below Parker Dam, Arizona-California," and deducting from it the record of flow at the gaging station "Divisions for Colorado River Indian Reservation Main Canal near Parker, Arizona." The diversions are made at Headgate Rock Dam.

RELEASES OF WATER THROUGH REGULATORY STRUCTURES
CONTROLLED BY THE UNITED STATES
CALENDAR YEAR 1993

FINAL RECORDS	(THOUSAND ACRE-FEET)												
STRUCTURE	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
GLEN CANYON DAM	783.9	638.6	597.7	592.4	592.8	613.6	896.3	927.7	661.2	532.7	613.8	795.8	8246.5
HOOVER DAM	284.4	61.5	336.6	782.4	1061.0	823.4	929.5	712.1	516.3	663.2	533.8	740.7	7444.9
DAVIS DAM	157.6	97.6	344.0	898.9	865.8	868.4	931.1	827.4	647.8	575.4	457.3	614.9	7286.2
PARKER DAM	100.8	193.3	523.6	623.7	620.7	611.6	653.1	588.3	500.4	457.0	313.4	348.1	5534.0
HEADGATE ROCK DAM 1/	99.8	183.5	465.9	555.6	546.9	530.5	565.4	517.5	454.5	418.5	283.8	308.8	4930.6
PALO VERDE DAM	136.1	156.4	429.3	516.9	491.1	470.5	466.0	433.2	379.7	377.6	235.3	277.0	4369.1
IMPERIAL DAM	23.2	16.9	20.6	20.3	21.5	20.2	21.9	24.6	22.0	19.9	16.7	20.5	248.1
DIVERSION TO MITTRY LAKE FROM GILA MAIN CANAL	0.9	0.8	0.9	0.9	0.9	0.9	1.0	1.0	1.0	1.0	1.0	0.9	11.1
SUM IMPERIAL DAM + DIVERSION TO MITTRY LAKE	24.1	17.7	21.5	21.2	22.5	21.1	22.9	25.6	23.0	20.8	17.6	21.5	259.2
LAGUNA DAM	24.9	17.5	49.4	28.7	24.6	27.2	20.4	22.9	22.1	21.2	16.3	21.0	296.1

1/ Computed as Parker Dam release less diversion at Headgate Rock Dam.

RECORDS OF DIVERSIONS, RETURN FLOWS, AND CONSUMPTIVE USE
IN ACCORDANCE WITH ARTICLE V(B) OF THE DECREE OF
THE SUPREME COURT OF THE UNITED STATES IN
ARIZONA v. CALIFORNIA
DATED MARCH 9, 1964

CALENDAR YEAR 1993

The following tabulations for calendar year 1993 show final records of diversions of water from the mainstream of the Colorado River, return flow of such water to the mainstream and consumptive use of such water. The records were furnished by the U.S. Geological Survey, International Boundary and Water Commission, Bureau of Indian Affairs, Bureau of Reclamation (Reclamation), National Park Service, U.S. Fish and Wildlife Service, and water user agencies. Diversions from the All-American Canal and Gila Gravity Main Canal at Imperial Dam were assigned to each user by adding each user's proportional share of the total canal losses to the delivery taken by each user at its turnout from the canal.

The tabulations also show quantities of water pumped from the mainstream or from wells in the Colorado River flood plain. Amounts diverted by pumping were determined by: (1) For most electric pumps, diversions were computed on a monthly basis from power records and a "kilowatthour per acre-foot factor" that was determined by discharge measurement; (2) For pumps other than electric and some electric pumps, a consumptive use factor of 6 acre-feet per irrigated acre per year was used.

There are undetermined amounts of unmeasured return flow reaching the Colorado River by means of flow through aquifers connecting water use areas to the mainstream. Reclamation, working with the U.S. Geological Survey, is continuing the research and investigative program to determine the amounts of such unmeasured return flows.

Tabulations for calendar year 1993 do include acceptable determinations of the unmeasured Colorado River return flows to Lake Mead from Las Vegas Wash which accrue the State of Nevada and a portion of the unmeasured return flows from the Yuma Mesa which are credited to the State of Arizona.

No person or entity is entitled to divert or use Colorado River water without an entitlement. An entitlement is an authorization to beneficially use Colorado River water pursuant to: (1) a right decreed by the Supreme Court, (2) a contract with the United States through the Secretary of the Interior (Secretary), or (3) a Secretarial reservation of water. The recording of diversions, return flows, or consumptive use in this tabulation is for statistical use only and is not to be interpreted as an entitlement, indication that the use is authorized, or imply that return flow credits are associated with a specific entitlement.

DIVERSIONS FROM MAINSTREAM-AVAILABLE RETURN FLOW
AND CONSUMPTIVE USE OF SUCH WATER
CALENDAR YEAR 1993
STATE OF ARIZONA

FINAL RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
LAKE MEAD NAT'L RECREATION, AZ. DIVERSIONS FROM LAKE MEAD (TEMPLE BAR)	DIVERSION RETURNS CONSUMPTIVE USE	4	6	8	13	20	23	26	33	23	23	14	7	200
LAKE MEAD NAT'L RECREATION, AZ. DIVERSIONS FROM LAKE MOHAVE (DAVIS, KATHERINE, WILLOW BEACH)	DIVERSION RETURNS CONSUMPTIVE USE	12	11	15	22	32	37	48	47	37	33	20	16	330
L.C.R.D. PROJECT (DAVIS DAM) DIVERSION AT DAVIS DAM	DIVERSION RETURNS CONSUMPTIVE USE	6	4	8	10	8	9	11	10	10	12	9	4	101
BULLHEAD CITY PUMPED FROM WELLS	DIVERSION RETURNS CONSUMPTIVE USE	346	319	412	595	708	716	811	831	579	539	458	423	6737
DIV. AT DAVIS DAM, MOHAVE CO. PARKS	DIVERSION RETURNS CONSUMPTIVE USE	23	20	4	6	9	13	18	15	9	8	8	5	138
MOHAVE WATER CONSERVATION PUMPED FROM WELLS	DIVERSION RETURNS CONSUMPTIVE USE	369	339	416	601	717	729	829	846	588	547	466	428	6875
CONSOLIDATED WATER UTILITIES PUMPED FROM RIVER	DIVERSION RETURNS CONSUMPTIVE USE	28	23	29	38	44	53	58	55	55	42	39	33	497
MOHAVE VALLEY I. & D. DISTRICT PUMPED FROM WELLS	DIVERSION RETURNS CONSUMPTIVE USE	20	19	23	28	36	38	41	38	35	30	25	23	356
FORT MOHAVE INDIAN RESERVATION 6 PUMPS AND WELLS IN FLOOD PLAIN	DIVERSION RETURNS CONSUMPTIVE USE	473	603	2699	3319	4203	5028	6010	5273	3425	2979	1783	1825	37620
GOLDEN SHORES WATER CONSERVATION DIST PUMPED FROM WELLS	DIVERSION 2/3/4 RETURNS CONSUMPTIVE USE	255	1289	4423	6273	7257	9875	11176	7158	4667	3457	2166	1578	59573
HAVASU NATIONAL WILDLIFE REFUGE INLET-NW NE NW SEC 33 T9N R5SW G&SRM WELL 8N/23E-15Aa (TOPOCK MARSH)	DIVERSION 2/ RETURNS CONSUMPTIVE USE	22	18	30	32	40	49	53	51	40	34	24	23	416
LAKE HAVASU IRRIGATION AND DRAINAGE DISTRICT PUMPED FROM WELLS	DIVERSION RETURNS CONSUMPTIVE USE	23	0	0	0	2260	10590	9630	7540	4540	4210	2440	0	41233
	DIVERSION 2/ RETURNS CONSUMPTIVE USE	8	7	11	12	15	18	20	19	15	13	9	9	156
	DIVERSION RETURNS CONSUMPTIVE USE	0	0	0	0	0	0	0	2460	0	0	0	0	2460
	DIVERSION RETURNS CONSUMPTIVE USE	31	7	11	12	2275	10608	9650	5099	4555	4223	2449	9	38929
CENTRAL ARIZONA PROJECT PUMPED FROM LAKE HAVASU	DIVERSION RETURNS CONSUMPTIVE USE	599	566	882	929	1286	1190	1711	1303	1284	1162	930	824	12666
	DIVERSION RETURNS CONSUMPTIVE USE	27671	4163	60176	123365	115743	123354	153489	117793	47001	32548	55095	164402	1024800

DIVERSIONS FROM MAINSTREAM-AVAILABLE RETURN FLOW
AND CONSUMPTIVE USE OF SUCH WATER
CALENDAR YEAR 1993
STATE OF ARIZONA

FINAL RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
TOWN OF PARKER														
PUMPED FROM RIVER	DIVERSION	0	0	0	0	2	17	28	23	8	0	0	0	78
1 WELL-NW NW NW SEC 7 T9N R19W G&SRM	DIVERSION	43	39	62	84	105	106	107	104	105	93	55	56	959
	RETURNS	0	0	0	0	0	1	1	2	1	0	0	0	5
	CONSUMPTIVE USE	43	39	62	84	107	122	134	125	112	93	55	56	1032
COLORADO RIVER INDIAN RESERVATION														
DIVERSION AT HEADGATE ROCK DAM	DIVERSION	982	9790	57750	68070	73790	81120	87720	70840	45920	38480	29620	39290	603372
1 PUMP FROM RIVER (B-04-22)14 bbd	DIVERSION 2/3/	0	0	0	0	0	0	0	0	0	0	0	0	0
	RETURNS	12459	10232	17507	21640	22312	23996	22677	23875	20902	19771	17740	18368	231479
	CONSUMPTIVE USE	-11477	-442	40243	46430	51478	57124	65043	46965	25018	18709	11880	20922	371893
EHRENBURG IMPROVEMENT ASSN.														
1 PUMP SW SEC 3 T3N R22W G&SRM	DIVERSION	19	15	20	30	34	36	46	40	34	28	20	22	344
	RETURNS													
	CONSUMPTIVE USE													
CIBOLA VALLEY IRRIGATION DISTRICT														
5 PUMPS SEC'S 20, 21 & 26T1N R23W	DIVERSION 2/	40	40	1644	2742	2369	3715	4658	2722	1749	1340	653	473	22145
	RETURNS													
	CONSUMPTIVE USE													
CIBOLA NATIONAL WILDLIFE REFUGE														
3 PUMPS	DIVERSION	635	509	868	937	1146	1389	1515	1458	1146	960	682	671	11916
	RETURNS													
	CONSUMPTIVE USE													
IMPERIAL NATIONAL WILDLIFE REFUGE														
2 WELLS SEC 13 T5S R22W G&SRM	DIVERSION 2/	483	384	655	707	865	1049	1144	1101	865	725	515	507	9000
	RETURNS													
	CONSUMPTIVE USE													
YUMA PROVING GROUND														
DIVERSION AT IMPERIAL DAM	DIVERSION	0	5	4	3	0	0	1	1	2	1	0	0	17
	RETURNS	0	0	0	0	0	0	0	0	0	0	0	0	0
	CONSUMPTIVE USE	0	5	4	3	0	0	1	1	2	1	0	0	17
STURGES														
DIVERSION AT IMPERIAL DAM	DIVERSION	99	109	342	372	525	621	841	371	186	730	261	260	4717
(WARREN ACT)	RETURNS	44	11	21	15	11	11	12	7	2	16	21	12	183
	CONSUMPTIVE USE	55	98	321	357	514	610	829	364	184	714	240	248	4534
WELLTON MOHAWK I. & D. DISTRICT														
DIVERSION AT IMPERIAL DAM	DIVERSION	2857	10411	19688	32278	29521	35981	36820	30826	35293	27744	20308	18254	299981
	RETURNS	12336	5557	6998	8610	12100	12525	11578	11846	12491	13898	10408	12007	130354
	CONSUMPTIVE USE	-9479	4854	12690	23668	17421	23456	25242	18980	22802	13846	9900	6247	169627
CITY OF YUMA														
DIVERSION AT IMPERIAL DAM (AAC)	DIVERSION	1201	1109	1454	1721	2050	2227	2297	2363	2097	1943	1615	1562	21639
DIVERSION AT IMPERIAL DAM (GILA)	DIVERSION	43	45	60	54	59	60	64	64	62	36	27	21	595
	RETURNS	748	816	1070	735	1012	808	894	737	545	605	639	683	9292
	CONSUMPTIVE USE	496	338	444	1040	1097	1479	1467	1690	1614	1374	1003	900	12942
MARINE CORPS AIR STATION (YUMA)														
DIVERSION AT IMPERIAL DAM	DIVERSION	63	89	43	114	224	233	269	224	201	174	86	61	1781
	RETURNS													
	CONSUMPTIVE USE													
SOUTHERN PACIFIC COMPANY														
DIVERSION AT IMPERIAL DAM	DIVERSION	4	4	4	4	4	4	4	4	4	4	4	4	48
	RETURNS													
	CONSUMPTIVE USE													

DIVERSIONS FROM MAINSTREAM-AVAILABLE RETURN FLOW
AND CONSUMPTIVE USE OF SUCH WATER
CALENDAR YEAR 1993
STATE OF ARIZONA

FINAL RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
YUMA MESA FRUIT GROWERS ASSN. DIVERSION AT IMPERIAL DAM	DIVERSION	1	1	1	1	1	1	1	1	1	1	1	1	12
	RETURNS													
	CONSUMPTIVE USE													
UNIVERSITY OF ARIZONA DIVERSION AT IMPERIAL DAM (WARREN ACT)	DIVERSION	30	38	52	85	56	44	69	56	47	92	53	40	662
	RETURNS													
	CONSUMPTIVE USE													
YUMA UNION HIGH SCHOOL DIVERSION AT IMPERIAL DAM	DIVERSION	21	27	4	5	4	5	46	41	35	20	15	15	238
	RETURNS													
	CONSUMPTIVE USE													
CAMILLE, ALEC. JR. DIVERSION AT IMPERIAL DAM (WARREN ACT)	DIVERSION	0	2	5	0	2	3	4	2	1	0	0	0	19
	RETURNS													
	CONSUMPTIVE USE													
DESERT LAWN MEMORIAL DIVERSION AT IMPERIAL DAM	DIVERSION	1	3	9	10	15	20	20	19	16	9	3	2	127
	RETURNS													
	CONSUMPTIVE USE													
NORTH GILA VALLEY IRRIGATION DISTRICT DIVERSION AT IMPERIAL DAM 7/	DIVERSION	1138	1915	3838	5175	4213	3553	2405	1764	4607	4883	2587	2533	38611
	RETURNS	972	976	1720	2382	1998	1845	1547	1244	2331	2931	1960	1787	21693
	CONSUMPTIVE USE	166	939	2118	2793	2215	1708	858	520	2276	1952	627	746	16918
YUMA IRRIGATION DISTRICT DIVERSION AT IMPERIAL DAM 7/ PUMPED FROM PRIVATE WELLS	DIVERSION	1274	1744	4949	6021	5826	3770	3834	3956	7636	6396	4174	2863	52443
	DIVERSION	461	671	823	651	161	736	764	648	860	757	739	812	8083
	RETURNS	1146	1004	1626	1551	1115	1133	1204	1058	1601	1517	1520	1076	15551
	CONSUMPTIVE USE	589	1411	4146	5121	4872	3373	3394	3546	6895	5636	3393	2599	44975
YUMA MESA I. & D. DISTRICT DIVERSION AT IMPERIAL DAM 7/	DIVERSION	1855	8315	18539	23035	26620	28863	30726	29673	22707	17761	10066	10187	228347
	RETURNS	2948	2986	3951	3682	4226	3790	3436	3096	1652	2450	2567	2581	37365
	CONSUMPTIVE USE	-1093	5329	14588	19353	22394	25073	27290	26577	21055	15311	7499	7606	190982
UNIT "B" I. & D. DISTRICT DIVERSION AT IMPERIAL DAM 7/	DIVERSION	547	1110	2810	3155	3335	3441	3752	3578	3038	2525	1535	1584	30410
	RETURNS	642	475	655	594	702	623	571	499	277	411	425	441	6315
	CONSUMPTIVE USE	-95	635	2155	2561	2633	2818	3181	3079	2761	2114	1110	1143	24095
YUMA COUNTY WATER USERS ASSOCIATION DIVERSION AT IMPERIAL DAM PUMPED FROM WELLS 7F/	DIVERSION	6422	10970	22588	33670	33903	27663	25689	22075	26798	48336	22794	18067	298975
	DIVERSION	457	489	544	534	453	486	534	443	374	347	559	509	5729
	RETURNS	8976	9780	10548	11811	10588	8697	8560	8600	9545	13188	13384	11207	124884
	CONSUMPTIVE USE	-2097	1679	12584	22393	23768	19452	17663	13918	17627	35495	9969	7369	179820
COCOPAH INDIAN RESERVATION DIVERSION AT IMPERIAL DAM PUMPED FROM WELLS 7F/	DIVERSION	0	116	188	212	240	21	126	21	158	406	48	52	1588
	DIVERSION	533	432	733	789	964	1165	1273	1223	963	808	573	564	10020
	RETURNS	0	6	5	4	6	1	4	0	5	9	2	2	44
	CONSUMPTIVE USE	533	542	916	997	1198	1185	1395	1244	1116	1205	619	614	11564
PUMPED FROM SOUTH GILA WELLS (DPOC'S) RETURNS 5/		4566	4453	3325	3791	4589	4222	4105	4208	3308	3955	3189	1642	45353

DIVERSIONS FROM MAINSTREAM-AVAILABLE RETURN FLOW
AND CONSUMPTIVE USE OF SUCH WATER
CALENDAR YEAR 1993
STATE OF ARIZONA

WATER USER	FINAL RECORDS	(ACRE-FEET)												TOTAL 1/
		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	
OTHER USERS PUMPING FROM COLORADO RIVER AND WELLS IN FLOOD PLAIN DAVIS DAM TO INTERNATIONAL BOUNDARY	DIVERSION 6/ RETURNS CONSUMPTIVE USE	1866	1495	2549	2752	3365	4079	4449	4282	3364	2819	2003	1971	35013
ARIZONA TOTALS	DIVERSION	50565	56925	208946	317853	321513	351401	392308	318089	219997	202508	162016	269553	2871673
	RETURNS	44837	36296	47426	54815	58659	57652	54589	57632	52660	58751	51855	49806	624978
	CONSUMPTIVE USE	5728	20629	161520	263038	262854	293749	337719	260457	167337	143757	110161	219747	2246695

NOTE: The term 'CONSUMPTIVE USE' in this tabulation means diversions including underground pumping, less measured return flow and less current estimated unmeasured return flow to the river.

- 1/ No surface returns unless shown.
- 2/ Reported annual total only, distributed monthly according to nearby users.
- 3/ Calculated by assuming an annual diversion of 6 ac-ft per irrigated acre.
- 4/ Calculated using monthly power records.
- 5/ Pumped from underground and credited as return flow to Yuma Mesa Division but unassigned to districts as returns. Includes quantities of drainage from Yuma Mesa, Unit B, as well as from South Gila Valley.
- 6/ Details on Arizona Supplemental Sheets.
- 7/ Summation for the Yuma Mesa Division, consisting of the North Gila Valley Irrigation District, the Yuma Irrigation District, and the Yuma Mesa Irrigation & Drainage District is as follows:

Item	Annual Totals (Acre-Feet)
Diversions at Imperial Dam A/	319401
Pumped from wells	8083
Surface returns from South Gila Valley (S.Gila Canal Wasteway)	5122 *
Return flow North Gila Valley (6 drains & wasteways)	5801 *
Return flow South Gila Valley wells (DPOC's)	45353
Return flow Yuma Mesa Outlet Drain B/	20630 *
Return flow protective and regulatory pumping unit C/	5454 *
Estimated unmeasured groundwater return flow D/	22014
Return flow share of Gila Main Canal loss E/	15587 *
Subtotal return flow F/	119961 119962 check sum from above
Consumptive Use (see note above)	207523 207522 check sum from above
(A) Total for the North Gila Valley, The Yuma Irrigation and the Yuma Mesa Irrigation and Drainage Districts, and 'Unit B'.	
(B) Estimated at 85 percent of the Yuma Mesa Outlet Drain with balance credited to 'Unit B'.	
(C) Estimated at 85 percent of Protective and Regulatory Pumping Unit with balance credited to 'Unit B'.	
(D) Estimated at 38 percent of the North Gila Valley Diversion at Imperial Dam plus 14 percent of Yuma Irrigation District diversion at Imperial Dam. (Based on analysis of the USGS Report 83-4220 entitled 'A Method for Estimating Ground-Water Return Flow to the Lower Colorado River in the Yuma Area')	
(E) Diversion*milage weighted share of Gila Main Canal loss less canal surface evaporation (1397 acft/yr) and phreatophytes (2154 acft/yr).	
(F) Additional unmeasured amounts of return flows from the Yuma Mesa Irrigation and Drainage District, 'Unit B', the Cocopah Indian Reservation, and the Yuma County Water Users Association (YCWUA) are utilized to meet consumptive uses in the United States and in partial satisfaction of the Mexican Treaty obligation. Some of these underground flows are recovered by pumping from wells on the Cocopah Indian Reservation and in the YCWUA area, and by some of the surface drains in the YCWUA area. Efforts will be made to at least quantify these return flows within broad limits by respective water user entities in future years.	

PUMPAGE FROM COLORADO RIVER
AND WELLS IN FLOOD PLAIN
DAVIS DAM TO INTERNATIONAL BOUNDARY
CALENDAR YEAR 1993
STATE OF ARIZONA

FINAL RECORDS

(ACRE-FEET)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
Rayner, Jack Jr.	(B-04-22)34 DCC(CDD) 3/	218.6	175.1	298.6	322.3	394.1	477.8	521.2	501.6	394.1	330.1	234.6	230.9	4101.0
Rayner, Jack Jr.	(B-04-22)34 DCC(DCD) 3/	25.4	20.4	34.7	37.5	45.8	55.6	60.6	58.3	45.8	38.4	27.3	26.9	477.0
Ehrenberg Water	(B-03-22)03 bac 3/	18.3	14.7	25.0	27.0	33.1	40.1	43.7	42.1	33.1	27.7	19.7	19.4	344.0
Arakelian, George	(B-03-22)16 DBD(DAD) 3/	117.4	94.0	160.3	173.1	211.6	256.5	279.9	269.3	211.6	177.3	126.0	124.0	2202.0
Pratt, L.	Sec14 T7S R22W ABC 2/3/	22.4	17.9	30.6	33.0	40.4	48.9	53.4	51.4	40.4	33.8	24.0	23.6	420.0
Dulin, A.	(C-8-22) 7CCD 3/	21.0	16.8	28.7	31.0	37.9	45.9	50.1	48.2	37.9	31.7	22.5	22.2	394.0
Magco of AZ	(C-8-22) 18CBD 3/	17.2	13.8	23.5	25.4	31.0	37.6	41.1	39.5	31.0	26.0	18.5	18.2	323.0
Magco of AZ	(C-8-22) 24BDD 3/	64.0	51.2	87.4	94.3	115.3	139.8	152.5	146.8	115.3	96.6	68.6	67.6	1200.0
Auza, Pete	SEC24 T08S R22W BDD 3/	69.0	55.3	94.3	101.8	124.4	150.9	164.6	158.4	124.4	104.2	74.1	72.9	1295.0
Auza, Pete	(C-8-22) 18DDD 3/	38.4	30.7	52.4	56.6	69.2	83.9	91.5	88.1	69.2	58.0	41.2	40.5	720
Yowelman, R.	SEC17 T08S R22W CCB 2/3/	51.2	41.0	69.9	75.5	92.3	111.8	122.0	117.4	92.3	77.3	54.9	54.0	960.0
Cameron Bros.	SEC24 T08S R22W CCB 3/	26.8	21.5	36.6	39.5	48.3	58.6	63.9	61.5	48.3	40.5	28.8	28.3	503.0
Ott, Judd T.	SEC30 T08S R22W BAB 3/	12.6	10.1	17.3	18.6	22.8	27.6	30.1	29.0	22.8	19.1	13.6	13.3	237.0
Ott, Judd T.	(C-8-22) 19CCA 3/	32.5	26.0	44.3	47.9	58.5	70.9	77.4	74.5	58.5	49.0	34.8	34.3	609.0
Cameron Bros	SEC24 T08S R22W CAD 3/	20.0	16.1	27.4	29.6	36.1	43.8	47.8	46.0	36.1	30.3	21.5	21.2	376.0
Ott	SEC24 T08S R23W DCC 3/	42.1	33.7	57.4	62.0	75.8	91.9	100.3	96.5	75.8	63.5	45.1	44.4	789.0
Peach	SEC22 T08S R23W DDC 3/	7.4	5.9	10.0	10.8	13.3	16.1	17.5	16.9	13.3	11.1	7.9	7.8	138.0
AZ Prod	SEC23 T08S R23W CDA 3/	4.1	3.3	5.6	6.1	7.4	9.0	9.8	9.4	7.4	6.2	4.4	4.3	77.0
Yucca Pwr Plant	SEC36 T16S R12E CBA 3/	19.8	15.8	27.0	29.2	35.7	43.2	47.2	45.4	35.7	29.9	21.2	20.9	371.0
Slade, Dwane	SEC28 T16S R22E CDA 3/	7.1	5.7	9.7	10.5	12.8	15.5	16.9	16.3	12.8	10.7	7.6	7.5	133.0
Curry Farms	SEC29 T16S R22E DAC 3/	7.2	5.8	9.8	10.6	13.0	15.7	17.2	16.5	13.0	10.9	7.7	7.6	135.0
Power, R.E. & P.	SEC30 T16S R22E ACC 2/3/	151.9	121.7	207.5	224.0	273.9	332.0	362.2	348.6	273.9	229.4	163.0	160.5	2850.0
Hall, Ansil	SEC36 T16S R21E BCB 2/3/	23.0	18.4	31.4	34.0	41.5	50.3	54.9	52.8	41.5	34.8	24.7	24.3	432.0
Burrell	SEC33 T08S R24W BAB 2/3/	16.0	12.8	21.8	23.6	28.8	35.0	38.1	36.7	28.8	24.2	17.2	16.9	300.0
Huerta Packing	16S/21E-25Ha 3/	60.9	48.8	83.1	89.8	109.7	133.0	145.1	139.7	109.7	91.9	65.3	64.3	1142.0
Huerta Packing	16S/21E-25DAD 3/	70.8	56.7	96.7	104.4	127.6	154.7	168.8	162.4	127.6	106.9	76.0	74.8	1328.0
Cocopah Bend RV	16S/22E-30Fb 3/	18.1	14.5	24.8	26.7	32.7	39.6	43.2	41.6	32.7	27.4	19.4	19.1	340.0
Pacific Coast Fm	SEC19 T09S R24W BAD 3/	43.3	34.7	59.1	63.8	78.0	94.6	103.2	99.3	78.0	65.4	46.4	45.7	812.0
Pacific Coast Fm	(C-9-24) 19BDD 3/	37.2	29.8	50.8	54.9	67.1	81.3	88.7	85.4	67.1	56.2	39.9	39.3	698.0
Pacific Coast Fm	(C-9-24) 19BDA 3/	23.3	18.7	31.9	34.4	42.1	51.0	55.7	53.6	42.1	35.3	25.1	24.7	438.0
Consoul, Lee	SEC31 T09S R24W AAA 3/	37.0	29.7	50.6	54.6	66.8	81.0	88.3	85.0	66.8	55.9	39.8	39.1	695.0
Waymon Farms	(C-9-24) 31BBA 3/	33.2	26.6	45.3	48.9	59.8	72.5	79.1	76.1	59.8	50.1	35.6	35.0	622.0
W. Brand-D. Donnely	(C-9-25) 35ABA 2/3/	33.6	26.9	45.9	49.5	60.5	73.4	80.1	77.0	60.5	50.7	36.0	35.5	630.0
J W Cuming	(C-10-25) 18BA 3/	108.0	86.6	147.6	159.3	194.8	236.1	257.6	247.9	194.8	163.2	115.9	114.1	2027.0
P. Sibley	(C-10-25) 2CDA 2/3/	103.9	83.3	142.0	153.3	187.4	227.2	247.8	238.5	187.4	157.0	111.5	109.8	1950.0
J W Cuming	(C-10-25) 14ADB 3/	44.5	35.6	60.7	65.6	80.1	97.2	106.0	102.0	80.1	67.1	47.7	47.0	834.0
C & J Cummings	(C-10-25) 26BAB 2/3/	25.6	20.5	34.9	37.7	46.1	55.9	61.0	58.7	46.1	38.6	27.5	27.0	480.0
J. Barkley	(C-10-25) 35CBA 2/3/	25.6	20.5	34.9	37.7	46.1	55.9	61.0	58.7	46.1	38.6	27.5	27.0	480.0
J W Cuming	(C-11-25) 2BBA 3/	49.2	39.4	67.2	72.5	88.7	107.5	117.3	112.9	88.7	74.3	52.8	52.0	923.0
Hughes, Earl	(C-11-25) 3DAC 3/	89.8	71.9	122.7	132.4	161.9	196.3	214.2	206.1	161.9	135.6	96.4	94.9	1685.0
Havasui Water Co. (AZ)	3/	20.0	16.0	27.3	29.5	36.0	43.7	47.7	45.9	36.0	30.2	21.5	21.1	375.0
Hillcrest Water Co.		1.0	1.1	1.3	1.5	2.2	1.9	1.8	2.3	1.5	2.0	1.5	1.0	19.0
Bureau of Land Management		7.9	6.3	10.8	11.7	14.3	17.3	18.9	18.2	14.3	12.0	8.5	8.4	148.5

*** Total Arizona Supplemental ***

1866
1495
2549
2752
3365
4079
4449
4282
3364
2819
2003
1971
35013

1458.4
1168.5
1992.3
2150.9
2630.1
3188
3477
3347
2629
2203
1505
1540

1/ Calculated from monthly power records and power-discharge measurements where available, else from power-discharge rate.
 2/ Calculated by assuming an annual diversion rate of 6 ac-ft per acre.
 3/ Reported annual total only, distributed monthly according to nearby users.

DIVERSIONS FROM MAINSTREAM-AVAILABLE RETURN FLOW
AND CONSUMPTIVE USE OF SUCH WATER
CALENDAR YEAR 1993
STATE OF CALIFORNIA

FINAL RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
FORT MOHAVE INDIAN RESERVATION PUMPED FROM RIVER AND WELLS	DIVERSION 7/ RETURNS CONSUMPTIVE USE	95	0	457	2538	3103	2837	3518	3017	1284	658	798	421	18725
CITY OF NEEDLES 4 WELLS NW SW SEC 29 T9N R23E SBM	DIVERSION RETURNS 10/ CONSUMPTIVE USE	183 124 59	144 101 44	169 117 52	292 172 120	407 231 176	481 260 220	481 269 211	477 271 206	409 235 174	295 180 115	230 143 87	142 105 37	3709 2207 1502
METROPOLITAN WATER DISTRICT DIVERSION FROM LAKE HAVASU	DIVERSION RETURNS 2/ CONSUMPTIVE USE	96127 348 95779	75305 299 75006	55497 279 55218	107767 296 107471	111286 262 111024	107108 245 106863	111885 247 111638	110537 261 110276	108843 238 108605	110613 259 110354	102199 289 101910	110164 305 109859	1207331 3328 1204003
PARKER DAM AND GOVERNMENT CAMP DIVERSION AT PARKER DAM	DIVERSION RETURNS CONSUMPTIVE USE	13	13	18	24	30	37	38	35	38	22	9	6	283
COLORADO RIVER INDIAN RESERVATION PUMPED FROM 11 PUMPS AND WELLS 4 PUMPS BIG RIVER	DIVERSION 4/ RETURNS CONSUMPTIVE USE	0 50	0 676	0 1108	0 985	0 860	0 958	0 1544	0 877	0 116	0 219	0 198	0 196	0 7787
CITY OF WINTERHAVEN 1 WELL SE SE NE SEC 27 T16S R22E SBM	DIVERSION 6/ RETURNS CONSUMPTIVE USE	6	5	9	9	12	14	15	15	12	10	7	6	120
PALO VERDE IRRIGATION DISTRICT DIVERSION FROM PALO VERDE DAM	DIVERSION RETURNS CONSUMPTIVE USE WATER MANAGEMENT ACCT. CREDITS 8/	6340 17559 -11219 60	21130 24519 -3389 5067	59510 29159 30351 6348	77360 33046 44314 10104	85030 37451 47579 13412	89130 38182 50948 13412	98220 39044 59176 16631	84860 40171 44689 8733	69170 37896 31274 9120	57410 38335 19075 3487	38690 33134 5556 2652	50250 34137 16113 3963	737100 402633 334467 92989
YUMA PROJECTS, RES. DIV. INDIAN UNIT DIVERSION AT IMPERIAL DAM	DIVERSION RETURNS CONSUMPTIVE USE	988 62 926	2337 83 2254	3886 87 3799	6319 97 6222	4774 95 4679	3664 72 3592	2772 64 2708	2931 54 2877	4214 116 4098	6548 122 6426	3728 152 3576	3314 80 3234	45475 1084 44391
YUMA PROJECTS, RES. DIV. BARD UNIT DIVERSION AT IMPERIAL DAM	DIVERSION RETURNS CONSUMPTIVE USE	408 13 395	1619 36 1583	4896 65 4831	6672 61 6611	7033 86 6947	5371 64 5307	4828 69 4759	3650 40 3610	4537 74 4463	6177 69 6108	2870 69 2801	3449 51 3398	51510 697 50813
RETURNS FROM YUMA PROJECT RESERVATION DIVISION RETURNS SUM YUMA PROJECTS, RES. DIV. USE	RETURNS 3/ CONSUMPTIVE USE	3306 -1985	1931 1906	2653 5977	2894 9939	3374 8252	3631 5268	3347 4120	2282 4205	2778 5783	4093 8441	3803 2574	3488 3144	37580 57624
IMPERIAL IRRIGATION DISTRICT DIVERSION AT IMPERIAL DAM	DIVERSION RETURNS CONSUMPTIVE USE	41563 3798 37765	98010 6777 91233	304247 11878 292369	351678 9628 342050	331066 11611 319455	313816 10740 303076	326906 13005 313901	307728 9895 297833	254544 12041 242503	250712 7874 242838	149725 10495 139230	156570 6675 149895	2886565 114417 2772148
COACHELLA VALLEY WATER DISTRICT DIVERSION AT IMPERIAL DAM	DIVERSION RETURNS CONSUMPTIVE USE	9082 830 8252	10894 753 10141	27676 1081 26595	35671 977 34694	38643 1355 37288	36069 1234 34835	36771 1463 35308	38495 1238 37257	33946 1606 32340	25742 808 24934	22853 1602 21251	16812 717 16095	332654 13664 318990

DIVERSIONS FROM MAINSTREAM-AVAILABLE RETURN FLOW
AND CONSUMPTIVE USE OF SUCH WATER
CALENDAR YEAR 1993
STATE OF CALIFORNIA

FINAL RECORDS		(ACRE- FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
OTHER USERS PUMPING FROM COLORADO RIVER AND WELLS IN FLOOD PLAIN DAVIS DAM TO INTERNATIONAL BOUNDARY	DIVERSION 5/ RETURNS CONSUMPTIVE USE	950	1005	2524	2939	2540	2568	2920	2554	2119	2643	1927	1690	26381
CALIFORNIA TOTALS	DIVERSION	155805	211138	459998	592254	584784	562053	589897	555176	479232	461048	323233	343020	5317638
	RETURNS	26040	34499	45319	47171	54465	54428	57508	54212	54984	51740	49687	45558	575610
	CONSUMPTIVE USE	129765	176640	414678	545083	530319	507625	532389	500964	424248	409309	273547	297462	4742028
	WATER MANAGEMENT ACCT. CREDITS 8/	60	5067	6348	10104	13412	13412	16631	8733	9120	3487	2652	3963	92989
	TOTAL USE	129825	181707	421026	555187	543731	521037	549020	509697	433368	412796	276199	301425	4835017
WATER CONSERVATION PROGRAM IMPERIAL I. D./METROPOLITAN W. D. CONSERVED WATER 9/		2500	2886	4232	6349	6349	5772	6349	5194	5002	4425	3463	2309	54830

NOTE: The term 'CONSUMPTIVE USE' in this tabulation means diversions including underground pumping, less measured return flow and less current estimated unmeasured return flow to the river.

- 1/ No surface returns unless shown.
- 2/ Estimate based on measured regulatory reservoirs seepage returns less an estimated amount of phreatophyte use.
- 3/ Returns unassigned include drainage from the Indian Unit and the Bard Unit in the Reservation Division but excludes seepage from the All-American Canal.
- 4/ Calculated using monthly power records.
- 5/ Details on California Supplemental Sheets.
- 6/ Reported annual total only, distributed monthly according to nearby users.
- 7/ Calculated by assuming an annual diversion of 6 ac-ft per irrigated acre.
- 8/ PVID/MWD land fallow test program of 20,215 acres with 4.6 acft/ac of use in 1993. Water is accounted as used in the year saved and stored for the exclusive future use of MWD and not to be additive to current year MWD diversions. Current total account credits deposited less this years diversions of 0 acre-feet is 121290 acre-feet.
- 9/ IID/MWD Water Conservation Program Phase 1 conserved water made available by IID for diversion in current year by MWD. Amount made available and diverted by MWD in 1990 was 6,110 acre-feet, 1991 was 26,700 acre-feet, and 1992 was 33,929 acre-feet.
- 10/ Needles total return estimated as 40% of diversion plus measured returns (unpublished report, Colorado River Board of California). This years Needles values not reported. Diversion and return values estimated as 110% of 1992 values. Years 1990-1992 revised below.

PUMPAGE FROM COLORADO RIVER
AND WELLS IN FLOOD PLAIN
DAVIS DAM TO INTERNATIONAL BOUNDARY
CALENDAR YEAR 1993
STATE OF CALIFORNIA

FINAL RECORDS

(ACRE-FEET)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
Ida Cal	11N/22E -31Cb 2/4/	0.0	0.0	0.0	88.8	103.4	71.5	110.2	103.5	111.3	68.5	64.9	0.8	722.9
Ida Cal	11N/21E -36Hd 2/4/	0.0	0.0	0.0	88.1	94.4	112.8	135.3	108.8	50.7	95.6	48.9	49.5	784.1
Russell Bros.	11N/21E -36Pa	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Southern Cal Gas	9N/23E -29Qa	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Lye, C. L.	1S/24E -16Gb 2/4/	1.6	1.3	2.2	2.4	2.9	3.5	3.8	3.7	2.9	2.4	1.7	1.7	30.0
Land, Ralph	SEC35 T15S R23E DDC	0.0	45.3	52.0	100.6	75.4	33.5	3.4	6.7	58.7	36.9	26.8	10.1	449.4
Living Earth Frm	SEC35 T16S R23E BBC	11.3	4.1	7.3	10.5	9.7	11.3	3.2	13.8	7.3	23.5	30.0	20.5	152.5
Land, Ralph	SEC22 T16S R23E BDD	39.2	67.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	106.4
Power, Pete	SEC14 T16S R23E CCB 2/4/	108.7	87.1	148.5	160.3	196.0	237.7	259.3	249.5	196.0	164.2	116.7	114.9	2040.0
Dulin, A.	(C-8-22) 8DAC 4/	3.3	2.6	4.4	4.8	5.9	7.1	7.8	7.5	5.9	4.9	3.5	3.4	61.0
Dulin, A.	(C-8-22) 9CCC 4/	48.4	38.8	66.1	71.4	87.3	105.8	115.4	111.0	87.3	73.1	51.9	51.1	908.0
Spencer, Mindle	(C-8-22) 6CDA	67.8	87.2	208.9	315.5	250.4	190.9	269.8	171.6	182.6	273.9	208.9	167.4	2394.9
H & S Farms	(C-8-22) 7BAB	25.9	45.8	121.1	217.9	176.4	126.2	192.8	81.3	33.7	138.4	80.4	106.4	1346.3
Ed Wavers Farms	(C-8-22) 6BCD 2/4/	12.8	10.2	17.5	18.9	23.1	28.0	30.5	29.4	23.1	19.3	13.7	13.5	240.0
Ed Wavers Farms	(C-8-22) 6CBD	77.8	93.4	216.2	193.7	167.8	299.2	292.3	211.9	103.8	69.2	138.4	195.4	2059.1
Ed Wavers Farms	(C-8-22) 6CCA	89.1	99.4	209.3	117.6	185.1	211.9	299.2	134.9	109.0	89.1	48.4	122.8	1715.8
Spencer, M.	SEC9 T16S R23E CAC	60.2	18.1	8.8	48.4	53.3	11.6	7.8	58.6	56.6	137.0	85.3	89.9	635.6
Wavers, Edward M.	(C-8-23) 1BBA	17.5	5.8	37.9	23.3	17.5	35.0	43.7	37.9	17.5	11.7	0.0	2.9	250.7
Wavers, Edward M.	(C-8-23) 1BAD	9.4	11.8	28.3	2.4	11.8	47.1	33.0	28.3	2.4	0.0	0.0	2.4	176.9
Schaffer, F. (Harp)	(C-8-23) 2ADC 2/4/	17.6	14.1	24.0	25.9	31.7	38.4	41.9	40.4	31.7	26.6	18.9	18.6	330.0
Taylor Bros	(C-8-23) 2DDA	3.0	1.5	112.5	179.2	151.0	82.9	22.2	51.8	152.5	158.4	54.8	19.3	989.1
Easterday, Kitti	(C-8-23) 1DCC	60.9	2.8	92.7	103.8	16.6	13.8	0.0	0.0	0.0	0.0	0.0	0.0	290.6
Dees, Alex	(C-8-23) 1DAC	23.5	40.1	146.7	193.7	235.2	261.5	289.2	233.8	211.7	127.3	66.4	65.0	1894.1
Harp, P. (R. Harp)	(C-8-23) 12DAC 2/4/	51.2	41.0	69.9	75.5	92.3	111.8	122.0	117.4	92.3	77.3	54.9	54.0	960.0
Easterday, K.	(C-8-23) 12CDB	8.4	6.7	232.6	214.0	330.3	337.0	360.6	249.4	188.7	129.8	156.7	59.0	2273.2
Harp, (R. Harp)	(C-8-23) 13AAD 2/4/	32.0	25.6	43.7	47.2	57.7	69.9	76.3	73.4	57.7	48.3	34.3	33.8	600
Smith, F. (P. Power)	(C-8-23) 11DCA	63.6	51.2	121.8	83.0	0.0	2.8	69.2	1.4	76.1	258.7	213.1	41.5	982.4
Valdez, Mike	T16S R23E SEC 30Ec	0.0	42.9	250.4	238.0	43.6	0.0	0.0	161.9	31.8	199.2	160.5	226.9	1355.2
Valdez, Mike	T16S R23E SEC 30Fd	59.5	114.8	222.8	229.7	24.9	0.0	0.0	148.0	124.5	322.4	186.8	152.2	1585.6
Havasas Water Company (CA)	T5N R25E SEC31	2.9	2.4	3.8	4.8	6.3	8.8	9.2	7.6	6.2	5.7	4.3	3.7	65.7
Picacho Development Corp		7.6	6.1	10.6	11.0	6.1	6.1	10.3	2.9	12.4	11.0	6.3	13.8	104.2
Wetmore, Kenneth C. 2/3/4/		0.3	0.2	0.4	0.4	0.5	0.6	0.7	0.7	0.5	0.4	0.3	0.3	5.4
Wetmore, Mark M. 2/3/4/		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Sherman, Margaret T. 2/3/4/		1.3	1.0	1.7	1.9	2.3	2.8	3.0	2.9	2.3	1.9	1.4	1.3	23.9
Williams, Jerry 3/		0.1	0.0	0.0	0.0	0.2	0.1	0.2	0.2	0.1	0.1	0.1	0.1	1.2
Lindeman, William H. & Hazel D. 3/		0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.3
Carney, Jerome D. 3/4/		0.0	0.0	0.0	0.0	0.0	0.1	0.1	0.1	0.0	0.0	0.0	0.0	0.5
Andrade, Dorothy L. 3/4/		0.1	0.1	0.1	0.1	0.2	0.2	0.2	0.2	0.2	0.1	0.1	0.1	1.8
Bureau of Land Management		45.0	36.1	61.5	66.4	81.1	98.4	107.3	103.3	81.1	68.0	48.3	47.5	844.3
*** Total California Supplemental ***		950	1005	2524	2939	2540	2568	2920	2554	2119	2643	1927	1690	26381
	D	3	204	4	182	204	193	235	220	168	170	178	54	
	P	47	27	64	69	84	102	111	107	84	70	50	49	

1/ Calculated from monthly power records and power-discharge measurements where available, else from power-discharge rate.

2/ Calculated by assuming an annual diversion rate of 6 ac-ft per acre.

3/ Location of well/pump not reported.

4/ Reported annual total only, distributed monthly according to nearby users.

DIVERSIONS FROM MAINSTREAM-AVAILABLE RETURN FLOW
AND CONSUMPTIVE USE OF SUCH WATER
CALENDAR YEAR 1993
STATE OF NEVADA

FINAL RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
BOULDER CANYON PROJECT														
DIVERSION AT HOOVER DAM	DIVERSION	0	8	6	7	11	21	21	0	15	12	7	9	117
	RETURNS													
	CONSUMPTIVE USE													
ROBERT B. GRIFFITH WATER PROJECT														
DIVERSION AT SADDLE ISLAND, LAKE MEAD	DIVERSION	17018	15914	20778	24282	29228	27994	30818	29561	25713	28757	23221	21836	295120
BY USER: BOULDER CITY 4/		226	212	383	561	753	819	989	954	821	648	399	332	7098
HENDERSON 4/		605	687	1250	1985	2627	3020	3683	3501	2986	2329	1439	1016	25127
LAS VEGAS VALLEY W.D. 4/		14865	13870	17511	19574	23047	21368	22796	21713	19126	23187	19684	19012	235752
NORTH LAS VEGAS 4/		1212	1038	1460	1908	2472	2441	2990	3023	2424	2305	1527	1354	24153
NELLIS AIR FORCE BASE 4/		110	106	174	255	329	346	360	370	356	288	171	123	2990
	RETURNS													
	CONSUMPTIVE USE													
LAKE MEAD NATIONAL RECREATION AREA														
DIVERSIONS FROM LAKE MEAD	DIVERSION	41	31	42	60	83	87	100	74	94	81	59	48	800
	RETURNS													
	CONSUMPTIVE USE													
LAKE MEAD NATIONAL RECREATION AREA														
DIVERSION FROM LAKE MOHAVE	DIVERSION	16	17	21	13	26	36	43	42	39	34	21	21	329
(COTTONWOOD)	RETURNS													
	CONSUMPTIVE USE													
BASIC MANAGEMENT INC.														
DIVERSION AT SADDLE ISLAND, LAKE MEAD	DIVERSION	578	458	541	506	468	563	551	668	613	556	520	510	6532
	RETURNS													
	CONSUMPTIVE USE													
CITY OF HENDERSON														
DIVERSION AT SADDLE ISLAND, LAKE MEAD	DIVERSION	766	527	579	585	836	738	772	734	716	708	659	662	8282
	RETURNS													
	CONSUMPTIVE USE													
NEVADA DEPARTMENT OF FISH & GAME														
DIVERSION AT SADDLE ISLAND, LAKE MEAD	DIVERSION	347	347	380	364	376	364	376	369	365	376	366	376	4406
	RETURNS	347	347	380	364	376	364	376	369	365	376	366	376	4406
	CONSUMPTIVE USE	0	0	0	0	0	0	0	0	0	0	0	0	0
CITY OF BOULDER CITY														
DIVERSION AT HOOVER DAM	DIVERSION	0	5	10	10	15	17	24	35	18	11	6	6	157
	RETURNS													
	CONSUMPTIVE USE													
PACIFIC COAST BUILDING PRODUCTS INC.														
DIVERSION AT GYPSUM WASH, LAKE MEAD	DIVERSION	29	44	53	43	49	65	55	49	59	57	40	51	594
	RETURNS													
	CONSUMPTIVE USE													
SOUTHERN CALIFORNIA EDISON														
PUMPED FROM SEC 24 T32S R66E MDB&M	DIVERSION	1259	1080	1034	783	1011	1382	1513	1702	1380	1410	1031	1222	14807
	RETURNS													
	CONSUMPTIVE USE													
BIG BEND WATER DISTRICT														
DIVERSION SEC 12 T32S R66E MDB&M	DIVERSION	259	252	255	330	421	408	466	491	423	401	355	326	4387
	RETURNS													
	CONSUMPTIVE USE													
LAS VEGAS WASH RETURN FLOWS	RETURNS 2/	12322	10471	11660	10998	10421	9589	8960	9585	8283	11189	11652	11623	126753

DIVERSIONS FROM MAINSTREAM-AVAILABLE RETURN FLOW
AND CONSUMPTIVE USE OF SUCH WATER
CALENDAR YEAR 1993
STATE OF NEVADA

FINAL RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
OTHER USERS PUMPING FROM COLORADO RIVER AND WELLS IN FLOOD PLAIN DAVIS DAM TO CALIFORNIA BOUNDARY	DIVERSION 3/ RETURNS CONSUMPTIVE USE	2	1	2	2	3	3	4	4	3	2	2	2	30
NEVADA TOTALS	DIVERSION RETURNS CONSUMPTIVE USE	20315 12669 7646	18684 10818 7866	23701 12040 11661	26985 11362 15623	32527 10797 21730	31678 9953 21725	34743 9336 25407	33729 9954 23775	29438 8648 20790	32405 11565 20840	26287 12018 14269	25069 11999 13070	335561 131159 204402
GROUNDWATER INJECTED STORAGE 5/														
LAS VEGAS VALLEY WATER DIST.	INJECTED WITHDRAWN	4132 0	3596 0	3009 0	1461 0	1086 0	0 0	0 0	0 0	0 0	1541 0	3865 0	5179 0	23869 0
CITY OF NORTH LAS VEGAS	INJECTED WITHDRAWN	122 0	105 0	33 0	16 0	16 0	0 0	0 0	0 0	0 0	140 0	125 0	110 0	667 0

NOTE: The term 'CONSUMPTIVE USE' in this tabulation means diversions including underground pumping, less measured return flow and less current estimated unmeasured return flow to the river.

1/ No surface returns unless shown.

2/ Estimated return based on historic use method adopted by the task force on unmeasured return flows on August 28, 1984 and as revised.

3/ Details on Nevada Supplemental Sheets.

4/ User deliveries adjusted by weighted use to equal total diversion at Lake Mead.

5/ Beginning of year cumulative injected storage of 47019 AF plus current year increase in injected storage of 24536 AF less current year withdrawals from injected storage of 0 AF yields year end total of 71555 AF injected storage.

PUMPAGE FROM COLORADO RIVER
AND WELLS IN FLOOD PLAIN
DAVIS DAM TO INTERNATIONAL BOUNDARY
CALENDAR YEAR 1993
STATE OF NEVADA

FINAL RECORDS	(ACRE-FEET)												
WATER USER	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
Sportsman Park (Clark Co. Parks) 2/	1.1	0.9	1.5	1.6	1.9	2.3	2.5	2.4	1.9	1.6	1.1	1.1	20.0
Boy Scouts of America SECS T33S R66E 2/	0.5	0.4	0.7	0.8	0.9	1.1	1.2	1.2	0.9	0.8	0.6	0.6	9.8
*** Total Nevada Supplemental ***	2	1	2	2	3	3	4	4	3	2	2	2	30

1/ Calculated from monthly power records and power-discharge measurements where available, otherwise from power-discharge rate.
2/ Reported annual total only, distributed monthly according to nearby users.

RECORDS OF RELEASES OF MAINSTREAM WATER PURSUANT TO
ORDERS BUT NOT DIVERTED BY PARTY ORDERING SAME
AND QUANTITY OF SUCH WATER DELIVERED TO MEXICO IN
SATISFACTION OF MEXICAN TREATY OR DIVERTED BY OTHERS
IN ACCORDANCE WITH ARTICLE V(C) OF THE
DECREE OF THE SUPREME COURT OF
THE UNITED STATES IN
ARIZONA v. CALIFORNIA DATED MARCH 9, 1964

CALENDAR YEAR 1993

The following tabulations for calendar year 1993 show records of releases of mainstream water pursuant to orders thereto, but not diverted by the party ordering the same, and the quantity of such water delivered to Mexico in satisfaction of the Mexican Treaty or diverted by others in satisfaction of decreed rights. Also shown are quantities of such rejected water delivered to Mexico in excess of treaty requirements and quantities delivered to storage. The quantities delivered to storage were available to release for future use.

Water ordered but not diverted was analyzed daily for each diverter as the positive difference between the finally approved daily order and the mean daily delivery requested on the day the diversion was made. The monthly quantities shown on the tabulations are the sum of the daily positive quantities. Final approval of daily orders was given in advance of the delivery date by the amount of travel time involved in conveying the water from the storage point to the diversion point on the mainstream. To the extent possible, "water ordered but not diverted" was delivered to others in satisfaction of their rights. The quantities of such deliveries are shown on the tabulation.

Deliveries of water to Mexico in satisfaction of the Mexican Treaty were scheduled based on Mexico's daily orders. Releases from storage were scheduled in sufficient quantities, which when added to return flows, would meet Mexico's daily orders. Deliveries of water to Mexico in satisfaction of the treaty, therefore, were considered to have been made entirely from releases from storage and from return flows scheduled for that purpose and not from water ordered but not diverted by other Colorado River water users. Therefore, the tabulations show no "water ordered but not diverted" as being delivered to Mexico in satisfaction of the treaty.

To date, no orders are received for diversion from the Colorado River in Nevada so no sheet is included for Nevada. The storage capacity of Lake Mead is so large in relation to the present daily diversions from the reservoir by Nevada that any "water ordered but not diverted" would be retained for future use and would have no significant effect on scheduling of daily operations of the reservoir.

RELEASE OF MAINSTREAM WATER PURSUANT TO ORDERS
BUT NOT DIVERTED BY PARTY ORDERING SAME
AND
QUANTITY OF SUCH WATER DELIVERED TO MEXICO IN SATISFACTION OF MEXICAN TREATY OR DIVERTED BY OTHERS
CALENDAR YEAR 1993
STATE OF ARIZONA

FINAL RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
CENTRAL ARIZONA PROJECT DIVERSION AT LAKE HAVASU	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	24136	4737	12859	10853	15193	8368	5450	38641	20684	7852	21881	13435	184089
	DIVERTED BY OTHERS													
	DELIVERED TO STORAGE 2/ DELIVERED TO MEXICO IN EXCESS OF TREATY	24136	4737	12859	10853	15193	8368	5450	38641	20684	7852	21881	13435	184089
		0	0	0	0	0	0	0	0	0	0	0	0	0
COLO. RIVER INDIAN RESERVATION DIVERSION AT HEADGATE ROCK	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	0	530	0	936	1170	2876	1894	2821	1454	930	688	809	14108
	DIVERTED BY OTHERS	0	345	0	821	345	2251	1246	1474	732	672	541	192	8619
	DELIVERED TO STORAGE 2/ DELIVERED TO MEXICO IN EXCESS OF TREATY	0	185	0	115	825	625	648	1347	722	258	147	617	5489
		0	0	0	0	0	0	0	0	0	0	0	0	0
NORTH GILA VALLEY I.D. DIVERSION AT IMPERIAL DAM	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	1876	1476	2112	2279	3007	1444	2356	1422	1803	3416	2850	1793	25834
	DIVERTED BY OTHERS	208	476	692	1220	924	801	1301	214	966	772	391	545	8510
	DELIVERED TO STORAGE 2/ DELIVERED TO MEXICO IN EXCESS OF TREATY	1378	960	1420	1059	2083	643	1055	1208	837	2644	2459	1248	16994
		290	40	0	0	0	0	0	0	0	0	0	0	330
STURGES (WARREN ACT) GILA PROJECT DISTRICTS DIVERSION AT IMPERIAL DAM 1/	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	0	0	0	0	0	0	0	0	0	0	0	0	0
	DIVERTED BY OTHERS	0	0	0	0	0	0	0	0	0	0	0	0	0
	DELIVERED TO STORAGE 2/ DELIVERED TO MEXICO IN EXCESS OF TREATY	0	0	0	0	0	0	0	0	0	0	0	0	0
		0	0	0	0	0	0	0	0	0	0	0	0	0
WELLTON-MOHAWK I. & D. DISTRICT DIVERSION AT IMPERIAL DAM	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	2955	3779	3285	1634	3747	2182	2023	5584	5024	5599	6928	2378	45118
	DIVERTED BY OTHERS	244	159	555	226	434	700	476	615	284	603	208	262	4766
	DELIVERED TO STORAGE 2/ DELIVERED TO MEXICO IN EXCESS OF TREATY	2183	3432	2730	1408	3313	1482	1547	4969	4740	4996	6720	2116	39636
		528	188	0	0	0	0	0	0	0	0	0	0	716
YUMA IRRIGATION DISTRICT DIVERSION AT IMPERIAL DAM	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	430	647	210	123	204	252	109	260	363	415	855	506	4374
	DIVERTED BY OTHERS	20	54	89	79	28	155	42	32	161	63	36	147	906
	DELIVERED TO STORAGE 2/ DELIVERED TO MEXICO IN EXCESS OF TREATY	192	571	121	44	176	97	67	228	202	352	819	359	3228
		218	22	0	0	0	0	0	0	0	0	0	0	240

RELEASE OF MAINSTREAM WATER PURSUANT TO ORDERS
 BUT NOT DIVERTED BY PARTY ORDERING SAME
 AND
 QUANTITY OF SUCH WATER DELIVERED TO MEXICO IN SATISFACTION OF MEXICAN TREATY OR DIVERTED BY OTHERS
 CALENDAR YEAR 1993
 STATE OF ARIZONA

FINAL RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
YUMA MESA I. & D. DISTRICT DIVERSION AT IMPERIAL DAM	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	811	2959	2271	3529	1904	1285	1950	1386	2557	3251	3838	1507	27248
	DIVERTED BY OTHERS	79	444	740	1970	282	627	859	276	708	460	488	214	7147
	DELIVERED TO STORAGE 2/ DELIVERED TO MEXICO IN EXCESS OF TREATY	573	2156	1531	1559	1622	658	1091	1110	1849	2791	3350	1293	19583
		159	359	0	0	0	0	0	0	0	0	0	0	518
UNIT "B" I. & D. DISTRICT DIVERSION AT IMPERIAL DAM	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	381	587	307	526	383	422	468	563	778	460	799	343	6017
	DIVERTED BY OTHERS	34	177	8	220	73	119	252	186	105	87	77	123	1461
	DELIVERED TO STORAGE 2/ DELIVERED TO MEXICO IN EXCESS OF TREATY	240	354	299	306	310	303	216	377	673	373	722	220	4393
		107	56	0	0	0	0	0	0	0	0	0	0	163
YUMA COUNTY WATER USERS ASSN. DIVERSION AT IMPERIAL DAM	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	1470	3398	4778	2360	4814	2087	4608	3796	3798	2212	8037	5947	47305
	DIVERTED BY OTHERS	377	766	2775	1424	3055	1726	3033	1706	2067	1139	2942	2341	23351
	DELIVERED TO STORAGE 2/ DELIVERED TO MEXICO IN EXCESS OF TREATY	163	2420	2003	936	1759	361	1575	2090	1731	1073	5095	3606	22812
		930	212	0	0	0	0	0	0	0	0	0	0	1142
ARIZONA TOTALS	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	32059	18113	25822	22240	30422	18916	18858	54473	36461	24135	45876	26718	354093
	DIVERTED BY OTHERS	962	2421	4859	5960	5141	6379	7209	4503	5023	3796	4683	3824	54760
	DELIVERED TO STORAGE 2/ DELIVERED TO MEXICO IN EXCESS OF TREATY	28865	14815	20963	16280	25281	12537	11649	49970	31438	20339	41193	22894	296224
		2232	877	0	0	0	0	0	0	0	0	0	0	3109

1/ No order received.
 2/ Available for future use.

RELEASE OF MAINSTREAM WATER PURSUANT TO ORDERS
BUT NOT DIVERTED BY PARTY ORDERING SAME
AND
QUANTITY OF SUCH WATER DELIVERED TO MEXICO IN SATISFACTION OF MEXICAN TREATY OR DIVERTED BY OTHERS
CALENDAR YEAR 1993
STATE OF CALIFORNIA

FINAL RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
METROPOLITAN WATER DISTRICT DIVERSION AT LAKE HAVASU	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	4749	11758	3352	2328	323	1699	1103	1721	1043	1940	1346	2388	33750
	DIVERTED BY OTHERS													
	DELIVERED TO STORAGE 1/ DELIVERED TO MEXICO IN EXCESS OF TREATY	4749	11758	3352	2328	323	1699	1103	1721	1043	1940	1346	2388	33750
PALO VERDE IRRIGATION DISTRICT DIVERSION AT PALO VERDE DAM	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	8376	85	1141	1801	2356	2698	1111	2212	952	119	857	1355	23063
	DIVERTED BY OTHERS	1325	36	524	1148	1859	2263	559	859	645	103	549	490	10360
	DELIVERED TO STORAGE 1/ DELIVERED TO MEXICO IN EXCESS OF TREATY	7051	35	617	653	497	435	552	1353	307	16	308	865	12689
YUMA PROJECT RES. DIVISION DIVERSION AT IMPERIAL DAM	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	5022	2168	506	454	1628	726	1934	2811	1390	309	3471	1414	21833
	DIVERTED BY OTHERS	871	545	280	369	899	672	1349	1537	787	202	1357	516	9384
	DELIVERED TO STORAGE 1/ DELIVERED TO MEXICO IN EXCESS OF TREATY	2925	1538	226	85	729	54	585	1274	603	107	2114	898	11138
IMPERIAL IRRIGATION DISTRICT DIVERSION AT IMPERIAL DAM	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	7545	7131	10098	2275	2436	657	2023	1281	1144	609	9039	7103	51341
	DIVERTED BY OTHERS	668	714	2779	1291	990	464	783	355	309	286	724	960	10323
	DELIVERED TO STORAGE 1/ DELIVERED TO MEXICO IN EXCESS OF TREATY	4025	5881	7319	984	1446	193	1240	926	835	323	8315	6143	37630
COACHELLA VALLEY WATER DIST. DIVERSION AT IMPERIAL DAM	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	1918	1553	204	103	117	246	109	56	103	242	452	549	5652
	DIVERTED BY OTHERS	198	442	119	103	50	232	28	18	77	194	129	298	1888
	DELIVERED TO STORAGE 1/ DELIVERED TO MEXICO IN EXCESS OF TREATY	1335	1010	85	0	67	14	81	38	26	48	323	251	3278
CALIFORNIA TOTALS	ORDERED BUT NOT DIVERTED DELIVERED TO MEXICO IN SATISFACTION OF TREATY	27610	22695	15301	6961	6860	6026	6280	8081	4632	3219	15165	12809	135639
	DIVERTED BY OTHERS	3062	1737	3702	2911	3798	3631	2719	2769	1818	785	2759	2264	31955
	DELIVERED TO STORAGE 1/ DELIVERED TO MEXICO IN EXCESS OF TREATY	20085	20222	11599	4050	3062	2395	3561	5312	2814	2434	12406	10545	98485

1/ Available for future use.

RECORDS OF DELIVERIES TO MEXICO OF WATER
IN SATISFACTION OF THE TREATY OF FEBRUARY 3, 1944
AND WATER PASSING TO MEXICO IN EXCESS OF
TREATY REQUIREMENTS IN ACCORDANCE WITH
ARTICLE V(D) OF THE DECREE OF
THE SUPREME COURT OF THE UNITED STATES
IN ARIZONA v. CALIFORNIA DATED MARCH 9, 1964

CALENDAR YEAR 1993

DELIVERIES TO MEXICO IN SATISFACTION OF PART III OF 1944 TREATY
AND
WATER PASSING TO MEXICO IN EXCESS OF TREATY REQUIREMENTS
CALENDAR YEAR 1993

FINAL RECORDS	(ACRE-FEET)												
WATER USER	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
ACTUAL DELIVERY IN SATISFACTION OF TREATY	265563	595099	1339906	937821	563720	317014	216066	176908	179522	212967	224653	163533	5192772
TO MEXICO AS SCHEDULED	136548	143430	159095	142699	110782	117136	151813	124245	111858	69721	98906	133767	1500000
TO MEXICO IN EXCESS OF SCHEDULE 1/	129015	451669	1180811	795122	452938	199878	64253	52663	67664	143246	125747	29766	3692772
BYPASS PURSUANT TO MINUTE 242	7090	9953	14202	10839	8747	1805	3014	2964	1238	1294	180	112	61438

1/ Water that is lost to the United States through releases into the Colorado River at above Morelos Dam in excess of Lower Basin delivery orders and Mexican Treaty requirements. These excess waters exceed water orders in Mexico and are generally not diverted for beneficial use in Mexico.

RECORDS OF DIVERSIONS OF WATER FROM THE
MAINSTREAM OF THE GILA AND SAN FRANCISCO RIVERS
AND THE CONSUMPTIVE USE OF SUCH WATER, FOR THE BENEFIT
OF THE GILA NATIONAL FOREST IN ACCORDANCE WITH
ARTICLE V(E) OF THE DECREE OF
THE SUPREME COURT OF THE UNITED STATES IN
ARIZONA v. CALIFORNIA DATED MARCH 9, 1964

CALENDAR YEAR 1993

DIVERSIONS FROM MAINSTREAM OF GILA AND SAN FRANCISCO RIVERS
 AND
 CONSUMPTIVE USE OF SUCH WATER FOR BENEFIT OF THE GILA NATIONAL FOREST
 CALENDAR YEAR 1993

FINAL RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
GILA RIVER	DIVERSION	0	0	0	0	0	0	0	0	0	0	0	0	0
	CONSUMPTIVE USE	0	0	0	0	0	0	0	0	0	0	0	0	0
SAN FRANCISCO RIVER	DIVERSION	0	0	0	0	0	0	0	0	0	0	0	0	0
	CONSUMPTIVE USE	0	0	0	0	0	0	0	0	0	0	0	0	0

1/ Zero diversions reported for 1993.

R E V I S I O N S

RECORDS OF DIVERSIONS, RETURN FLOWS, AND CONSUMPTIVE USE
IN ACCORDANCE WITH ARTICLE V(B) OF THE DECREE OF
THE SUPREME COURT OF THE UNITED STATES IN

ARIZONA v. CALIFORNIA

DATED MARCH 9, 1964

REVISIONS FOR CALENDAR YEARS 1990, 1991, AND 1992

REVISION 1990

DIVERSIONS FROM MAINSTREAM-AVAILABLE RETURN FLOW
AND CONSUMPTIVE USE OF SUCH WATER
CALENDAR YEAR 1990
STATE OF CALIFORNIA

REVISED RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
CITY OF NEEDLES														
4 WELLS NW SW SEC 29 T9N R23E SBM	DIVERSION	174	140	238	257	314	381	416	400	314	263	187	184	3267
	RETURNS 10/	104	85	125	137	168	201	223	219	167	153	130	123	1834
	CONSUMPTIVE USE	71	55	113	120	146	179	192	181	147	110	57	61	1433
CALIFORNIA TOTALS														
	DIVERSION	304797	361092	497763	564799	618750	577180	629775	568094	486523	455000	380995	361764	5806532
	RETURNS	38403	36433	44254	48327	52898	47552	58590	54876	55035	55155	48528	48859	588909
	CONSUMPTIVE USE	266394	324659	453509	516473	565852	529628	571185	513219	431489	399845	332468	312905	5217623

10/ Needles total return estimated as 40% of diversion plus measured returns (unpublished report, Colorado River Board of California).

REVISION 1991

DIVERSIONS FROM MAINSTREAM-AVAILABLE RETURN FLOW
AND CONSUMPTIVE USE OF SUCH WATER
CALENDAR YEAR 1991
STATE OF CALIFORNIA

REVISED RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
CITY OF NEEDLES														
4 WELLS NW SW SEC 29 T9N R23E SBM	DIVERSION	162	165	180	288	385	422	428	373	276	268	182	137	3266
	RETURNS 10/	98	94	105	140	194	216	227	207	162	152	116	99	1810
	CONSUMPTIVE USE	64	71	75	148	191	206	201	166	114	116	66	38	1456
CALIFORNIA TOTALS														
	DIVERSION	281911	363742	378842	569359	616122	582813	623139	569084	477711	490122	376181	257223	5586249
	RETURNS	40968	39217	43323	44080	50264	47862	53902	53783	54723	57748	51997	44597	582464
	CONSUMPTIVE USE	240943	324525	335519	525279	565858	534951	569237	515301	422987	432374	324184	212626	5003784

10/ Needles total return estimated as 40% of diversion plus measured returns (unpublished report, Colorado River Board of California).

REVISION 1992

DIVERSIONS FROM MAINSTREAM-AVAILABLE RETURN FLOW
AND CONSUMPTIVE USE OF SUCH WATER
CALENDAR YEAR 1992
STATE OF CALIFORNIA

REVISED RECORDS		(ACRE-FEET)												
WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL 1/
CITY OF NEEDLES														
4 WELLS NW SW SEC 29 T9N R23E SBM	DIVERSION	166	131	154	265	370	437	437	434	372	268	209	129	3372
	RETURNS 10/	112	91	107	156	210	237	245	247	214	163	130	96	2007
	CONSUMPTIVE USE	54	40	47	109	160	200	192	187	158	105	79	33	1365
CALIFORNIA TOTALS														
	DIVERSION	278646	277247	366394	520931	587881	559850	580615	455651	423273	437161	364472	263241	5115362
	RETURNS	36970	40704	46423	51426	62752	56142	54182	55243	51601	51559	45632	46962	599595
	CONSUMPTIVE USE	241676	236542	319971	469505	525129	503708	526433	400408	371672	385602	318841	216280	4515768
	WATER MANAGEMENT													
	ACCT. CREDITS 8/	0	0	0	0	0	0	0	11992	7179	3258	2220	3652	28301
	TOTAL USE	241676	236542	319971	469505	525129	503708	526433	412400	378851	388860	321061	219932	4544069

8/ PVID/MWD land fallow test program of 20,215 acres with 1.4 acft/ac of use in 1992. Water is accounted as used in the year saved and stored for the exclusive future use of MWD and not to be additive to current year MWD diversions.

10/ Needles total return estimated as 40% of diversion plus measured returns (unpublished report, Colorado River Board of California).