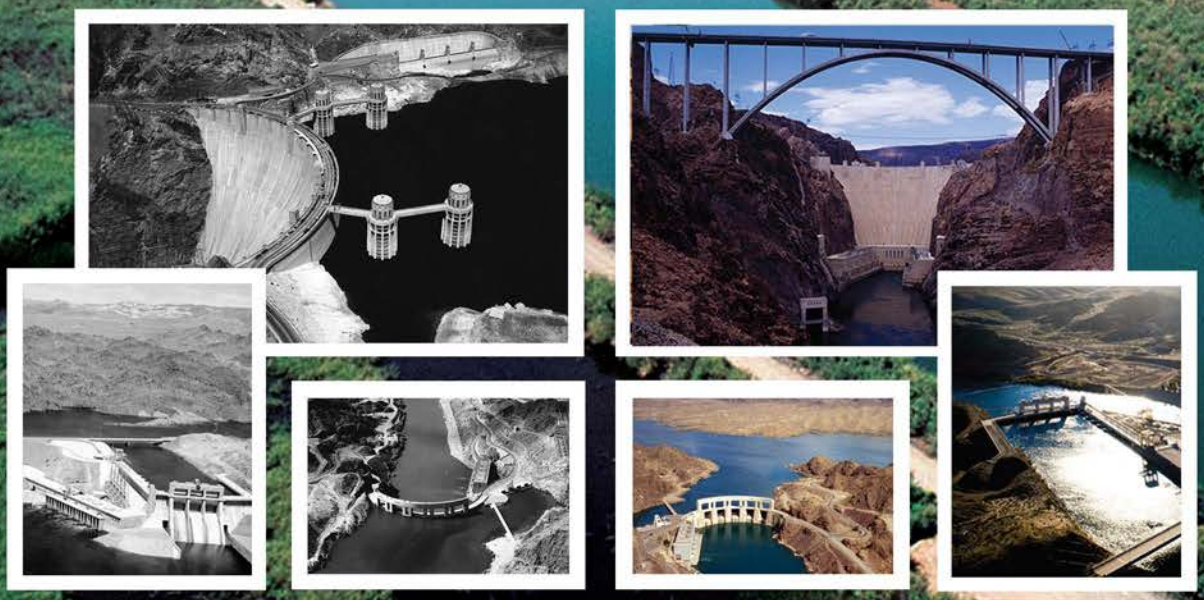
RECLAMATION

Managing Water in the West

Calendar Year 2017

Colorado River Accounting and Water Use Report: Arizona, California, and Nevada



U.S. Department of the Interior
Bureau of Reclamation
Lower Colorado Region
Boulder Canyon Operations Office

May 2018

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May 15, 2018

Mission Statements

Department of the Interior

The Department of the Interior protects and manages the Nation’s natural resources and cultural heritage; provides scientific and other information about those resources; and honors its trust responsibilities or special commitments to American Indians, Alaska Natives, and affiliated island communities.

Bureau of Reclamation

The mission of the Bureau of Reclamation is to manage, develop, and protect water and related resources in an environmentally and economically sound manner in the interest of the American public.

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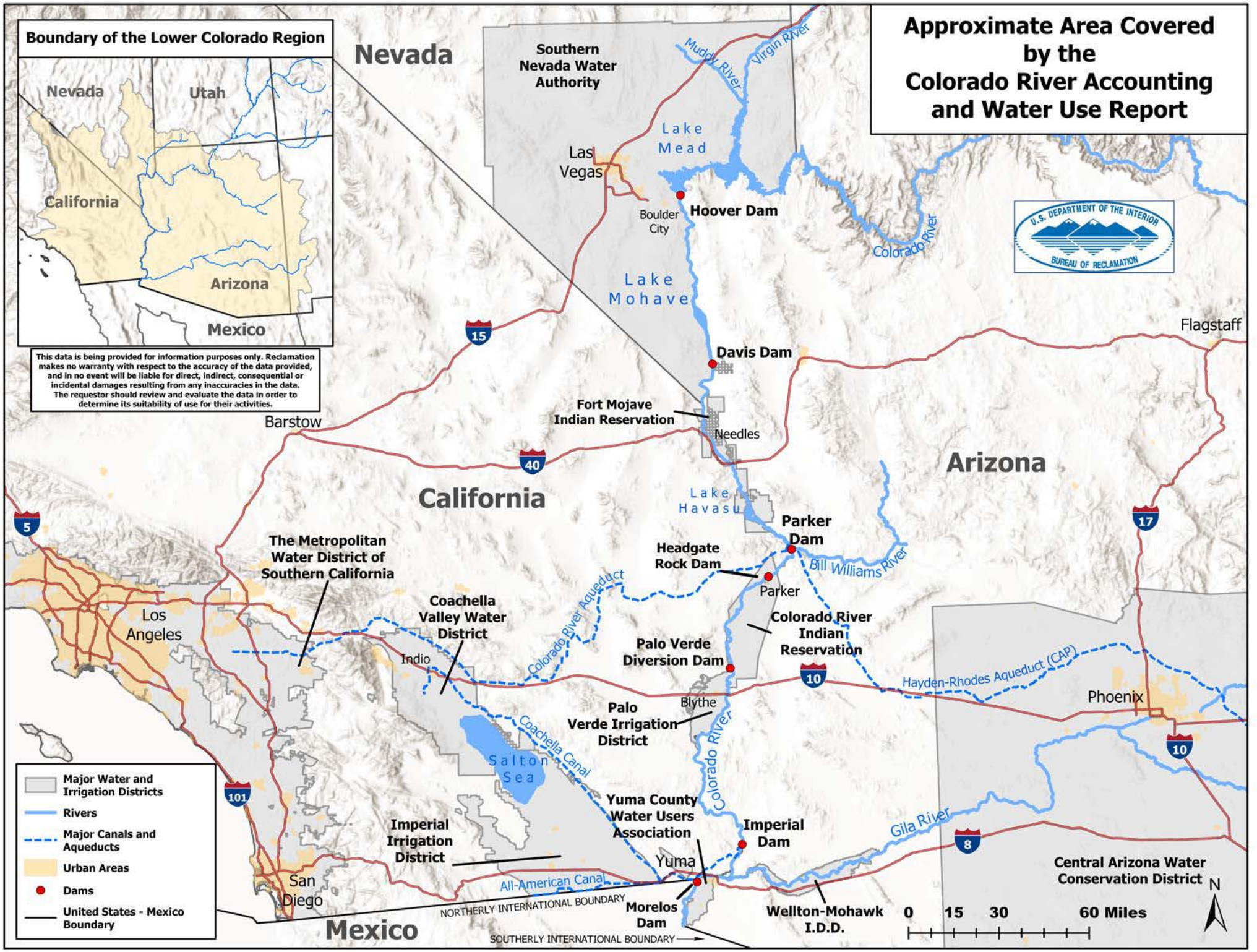

Approximate Area Covered by the Colorado River Accounting and Water Use Report
Boundary of the Lower Colorado Region
Nevada
Utah
California
Arizona
Mexico
This data is being provided for information purposes only. Reclamation makes no warranty with respect to the accuracy of the data provided, and in no event will be liable for direct, indirect, consequential or incidental damages resulting from any inaccuracies in the data. The requestor should review and evaluate the data in order to determine its suitability of use for their activities.
Nevada
Southern Nevada Water Authority
Las Vegas
Lake Mead
Muddy River
Virgin River
Boulder City
Hoover Dam
Colorado River
U.S. DEPARTMENT OF THE INTERIOR
BUREAU OF RECLAMATION
Lake Mohave
Flagstaff
Davis Dam
Fort Mojave Indian Reservation
Needles
Barstow
Arizona
California
Lake Havasu
Parker Dam
Headgate Rock Dam
Bill Williams River
Parker
The Metropolitan Water District of Southern California
Coachella Valley Water District
Colorado River Aqueduct
Colorado River Indian Reservation
Los Angeles
Indio
Palo Verde Diversion Dam
Hayden-Rhodes Aqueduct (CAP)
Blythe
Phoenix
Palo Verde Irrigation District
Coachella Canal
Salton Sea
Colorado River
Major Water and Irrigation Districts
Rivers
Major Canals and Aqueducts
Urban Areas
Dams
United States - Mexico Boundary
Yuma County Water Users Association
Imperial Irrigation District
Imperial Dam
Gila River
Yuma
San Diego
All-American Canal
Central Arizona Water Conservation District
NORTHERLY INTERNATIONAL BOUNDARY
Morelos Dam
Wellton-Mohawk I.D.D.
SOUTHERLY INTERNATIONAL BOUNDARY
Mexico
0 15 30 60 Miles
N
5
15
40
10
17
8
101

Acronyms and Abbreviated Terms

These acronyms and abbreviations are found in the text, footnotes, and headings within this document.

AAC	All-American Canal
AACLP	All-American Canal Lining Project
ADP	Arizona diesel pump
ADW	Arizona diesel well
AEP	Arizona electric pump
AEW	Arizona electric well
AF	acre-feet
AFY	acre-feet per year
ALTSC	Accumulated Long Term Storage Credit
AOP	Annual Operating Plan
ASLD	Arizona State Land Department
Assn.	Association
AWBA	Arizona Water Banking Authority
BLM	Bureau of Land Management
BOY	beginning-of-year
CAP	Central Arizona Project
CAWCD	Central Arizona Water Conservation District
CCLP	Coachella Canal Lining Project
CDP	California diesel pump
CDW	California diesel well
CDEW	California diesel electric well
CEP	California electric pump
CEW	California electric well
CFR	Code of Federal Regulations
CFS	Cubic Feet per Second
CRBC	Colorado River Board of California
CRCN	Colorado River Commission of Nevada
CRIT	Colorado River Indian Tribes
CRWDA	Colorado River Water Delivery Agreement
CU	consumptive use
CVWD	Coachella Valley Water District
CY	calendar year
Diff.	difference
Dist.	district
DPOC	Drainage Pump Outlet Channel
DRA	Drought Response Agreement
ECICS	Extraordinary Conservation Intentionally Created Surplus
ET	evapotranspiration
EOY	end-of-year
FEIS	Final Environmental Impact Statement
FYIR	Fort Yuma Indian Reservation
GGMC	Gila Gravity Main Canal
ICUA	Intentionally Created Unused Apportionment
I.D.D.	Irrigation and Drainage District
IBWC	International Boundary and Water Commission
ICS	Intentionally Created Surplus
IID	Imperial Irrigation District
IOPP	Inadvertent Overrun and Payback Policy
ISG	Colorado River Interim Surplus Guidelines
IUS	Interstate Underground Storage credits
KAF	Thousand acre-feet
LCR	Lower Colorado River
LCR MSCP	Lower Colorado River Multi-Species Conservation Program
LCWSP	Lower Colorado Water Supply Project
LHFO	Lake Havasu Field Office (BLM)
LTSC	Long Term Storage Credit
MAF	Million acre-feet
MSCP	Multi-Species Conservation Program
MWD	The Metropolitan Water District of Southern California
MOD	Main Outlet Drain
MODE	Main Outlet Drain Extension
M&I	Municipal and Industrial
NWR	National Wildlife Refuge
NIB	Northerly International Boundary
PSCP	Pilot System Conservation Program
PPR	Present Perfected Right
PVER	Palo Verde Ecological Reserve
PVID	Palo Verde Irrigation District
QSA	Quantification Settlement Agreement
SIB	Southerly International Boundary
SIRA	Storage and Interstate Release Agreement
SDCWA	San Diego County Water Authority
SLRSP	San Luis Rey Settlement Parties
SNWA	Southern Nevada Water Authority
SCIA	System Conservation Implementation Agreement
TCM	Thousand Cubic Meters
USGS	United States Geological Survey
YAO	Yuma Area Office (Reclamation)
YDP	Yuma Desalting Plant
YFO	Yuma Field Office (BLM)
YID	Yuma Irrigation District
YMIDD	Yuma Mesa Irrigation and Drainage District
YPRD	Yuma Project Reservation Division

Glossary

Accumulated Long Term Storage Credits (ALTSC): The cumulative amount of Long Term Storage Credits in a storing entity's long-term storage account.

Bypass Drain: The 53-mile-long, concrete-lined drain, which extends from the end of the Main Outlet Drain Extension near Morelos Dam to the Ciénega de Santa Clara (Ciénega) in Mexico. The Bypass Drain, constructed to assist the United States in meeting its obligations under Minute No. 242 of the International Boundary and Water Commission, conveys pumped drainage from the Wellton-Mohawk Irrigation and Drainage District and the Yuma area to the Ciénega.

Colorado River Aquifer: The aquifer underlying the Colorado River mainstream consisting of permeable, partly saturated sediments and sedimentary rocks that are hydraulically connected to the Colorado River so that water can move between the Colorado River and the aquifer in response to withdrawal of water from the aquifer or differences in water-level elevations between the Colorado River and the aquifer.

Colorado River Basin: All of the drainage area of the Colorado River System and all other territory within the United States of America to which the waters of the Colorado River System shall be beneficially applied.

Colorado River System: That portion of the Colorado River and its tributaries within the United States.

Colorado River water: Water in or withdrawn from the mainstream.

Consuming State: The Lower Division State in which Intentionally Created Unused Apportionment will be used.

Consumptive use: Diversions from the mainstream of the Colorado River less such Return Flow thereto as is available for consumptive use in the United States or in satisfaction of the Mexican Treaty Obligation. Consumptive use from the mainstream within a Lower Division state includes water drawn from the mainstream by underground pumping.

Consolidated Decree: The Consolidated Decree of the Supreme Court of the United States in *Arizona* v. *California et al.* 547 U.S. 150 (2006), or as it may be further modified.

Domestic Use: The use of water for household, stock, municipal, mining, milling, industrial, and other like purposes, but excluding the use of water for the generation of electric power.

Drainage Pump Outlet Channel (DPOC): The DPOC drainage system consists of 24 wells which provide groundwater drainage for the agricultural lands of the South Gila Valley. When this drainage water is returned to the Colorado River by DPOC Nos. 1, 2, 3, and 4, it is part of the water delivered to Mexico above Morelos Dam in accordance with the 1944 Mexican Water Treaty.

Drought Response Program Actions: The Bureau of Reclamation's Drought Response Program supports a proactive approach to drought. It provides assistance to water users for drought contingency planning, including consideration of climate change information and to take actions that will build long-term resiliency to drought.

Entitlement: An authorization to beneficially use Colorado River water pursuant to: (1) a right decreed by the Supreme Court, (2) a water delivery contract with the United States through the Secretary of the Interior, or (3) a Secretarial Reservation.

Intentionally Created Unused Apportionment (ICUA): Unused apportionment developed consistent with the laws of the Storing State which exists solely as a result of, and would not exist except for, implementing a Storage and Interstate Release Agreement.

Inadvertent Overrun: Colorado River water diverted, pumped or received by an entitlement holder within the Lower Division States that is in excess of the water user's entitlement or approved water order for that year.

Lee Ferry: The point in the mainstream of the Colorado River one mile below the mouth of the Paria River that divides the upper and lower basins.

Live Storage: That part of the total reservoir capacity from which water can be withdrawn by gravity. This capacity is equal to the total capacity less the dead pool capacity. Dead pool is the storage volume in a reservoir that cannot be drained by gravity through a dam's outlet works, spillway, or power plant intake structures and can only be pumped out.

Lower Basin: Those parts of the States of Arizona, California, Nevada, New Mexico, and Utah within and from which waters naturally drain into the Colorado River System below Lee Ferry, and also all parts of said States located without the drainage area of the Colorado River System which are now or shall hereafter be beneficially served by waters diverted from the System below Lee Ferry.

Lower Division States: The States of Arizona, California, and Nevada.

Long Term Storage Credits (LTSC): Colorado River water that has been stored offstream pursuant to a Storage and Interstate Release Agreement and credited to a storer's long-term storage account for use in future years.

Main Outlet Drain (MOD): A channel that conveys pumped groundwater drainage from the Wellton-Mohawk Valley to the Gila River near the confluence with the Colorado River.

Main Outlet Drain Extension (MODE): A 12-mile-long channel extending from the Main Outlet Drain that conveys drainage from the Wellton-Mohawk Irrigation and Drainage District and Yuma area to points above or below Morelos Dam. Under certain conditions it includes discharge from the DPOCs and YMC.

Mainstream: Mainstream means the main channel of the Colorado River downstream from Lee Ferry within the United States, including the reservoirs behind dams on the main channel, and Senator Wash Reservoir off the main channel.

Mexican Treaty Obligation: The United States obligation under the Treaty Between the United States of America and Mexico, "Utilization of Waters of the Colorado and Tijuana Rivers and of the Rio Grande" (1944 Mexican Water Treaty), signed February 3, 1944, including supplements to and obligations associated with Minutes of the International Boundary and Water Commission adopted pursuant to the 1944 Mexican Water Treaty.

Offstream Storage: Storage in a surface reservoir off of the mainstream or in a groundwater aquifer. Offstream storage includes indirect recharge when Colorado River water is exchanged for groundwater that otherwise would have been pumped and consumed.

Pilot System Conservation Program: A pilot program for funding the creation of Colorado River system water through voluntary water conservation and reductions in use.

Protective and Regulatory Pumping Unit – 242 Wellfield: A wellfield and delivery system located within a 5-mile-wide strip of land north of the United States/Mexico boundary in southwestern Arizona. The unit currently consists of 21 wells which intercept part of the groundwater underflow moving southward into Mexico from the Yuma Mesa in the United States. The groundwater recovered by the unit is collected in a conveyance system (the 242 Lateral) and is delivered to Mexico by the United States at the Southerly International Boundary as a portion of the Mexican Treaty Obligation.

Regulatory Structures: Hoover Dam, Davis Dam, Parker Dam, Headgate Rock Dam, Palo Verde Dam, Imperial Dam, Laguna Dam and all other dams and works on the mainstream controlled or operated by the United States regulating the flow of water in the mainstream or the diversion of water from the mainstream.

Return Flow: Mainstream water that has been diverted and which flows back to the Colorado River or the Colorado River Aquifer as measured or unmeasured flow, and is available for use in the United States or in satisfaction of the Mexican Treaty Obligation.

Storage and Interstate Release Agreement (SIRA): An agreement consistent with Title 43, CFR, Part 414 between the Secretary and authorized entities in two or more Lower Division States that addresses the details of: (1) Offstream storage of Colorado River water by a storing entity for future use within the Storing State; (2) Subsequent development of ICUA by the storing entity, consistent with the laws of the Storing State; (3) A request by the storing entity to the Secretary to release ICUA to the consuming entity; (4) Release of ICUA by the Secretary to the consuming entity; and (5) The inclusion of other entities that are determined by the Secretary and the storing entity and the consuming entity to be appropriate to the performance and enforcement of the agreement.

Storing State: A Lower Division State in which water is stored off the mainstream in accordance with a Storage and Interstate Release Agreement for future use in that State.

Unused Apportionment: Colorado River water within a Lower Division State's basic or surplus apportionment, or both, which is not otherwise put to beneficial consumptive use during that year within that State.

Upper Basin: Those parts of the States of Arizona, Colorado, New Mexico, Utah, and Wyoming within and from which waters naturally drain into the Colorado River System above Lee Ferry, and also all parts of said States located without the drainage area of the Colorado River System which are now or shall hereafter be beneficially served by waters diverted from the System above Lee Ferry.

Yuma Mesa Conduit: A 14.6-mile long pipeline which collects water from multiple wellfields that are part of the overall groundwater recovery and river regulation program for the Yuma area. The groundwater recovered from these wellfields is collected into the conduit and discharged either to the Yuma Desalting Plant, the MODE, the Southerly International Boundary with Mexico via the Yuma Main Drain, or the Colorado River via the Yuma Mesa Conduit Outlet, a discharge point approximately 6 miles upstream of Morelos Dam.

DISCLAIMER:
Terms contained within this Glossary are defined to provide general information and are not intended to change, modify, or interpret the laws, rules, decrees, and treaties from which they are originally derived.

Table 1. Summary of Colorado River Water Accounting and Use Data, Calendar Year 2017. (All values are in acre-feet except as noted.)

Lower Division States Consumptive Use				**TOTAL**
Arizona				2,509,503
California				4,026,515
Nevada				243,425
Total Lower Division States Consumptive Use				**6,779,443**
Mexico				
Total Deliveries to Mexico in Satisfaction of Treaty Requirements				1,500,000
Delivery of Mexico's Water Reserve				0
To Mexico in Excess of Treaty Requirements				16,688
Accountable Deliveries to Mexico				**1,516,688**
Total Consumptive Use - Lower Division States and Mexico[1]				**8,296,131**
Water Bypassed Pursuant to IBWC Minute No. 242				**126,701**
Reservoir Contents - At Year's End (Thousands of Acre-Feet)				
Live Storage in Lake Powell				14,068
Live Storage in Lake Mead				10,221
Live Storage - Lake Powell plus Lake Mead				**24,289**
Percentage of Live Storage - Lake Powell				57.8%
Percentage of Live Storage - Lake Mead				39.1%
Percentage of Live Storage - Lake Powell plus Lake Mead				**48.2%**
Total System Storage[2]				**32,017**
Percentage of Total System Storage				**53.7%**
Interstate Water Banking	**BOY Balance**	**Storage[3]**	**Recovered**	**EOY Balance**
Water Stored in Arizona by the AWBA for the Benefit of SNWA, NV	601,041	0	0	601,041
Water Stored in California by the MWD for the Benefit of SNWA, NV	330,225	0	0	330,225
Total Water Stored for the Benefit of SNWA, NV	**931,266**	**0**	**0**	**931,266**
Lower Colorado Water Supply Project Use[4]		**Non-Federal**	**Federal**	**Total**
		7,143	234	7,377
Intentionally Created Surplus[5]	**BOY Balance**	**Creation**	**Reductions**	**EOY Balance**
Arizona	103,050	23,750	0	126,800
California	187,057	385,132	19,811	552,378
Nevada	531,607	56,185	5,479	582,313
Total - Lower Division States	**821,714**	**465,067**	**25,290**	**1,261,491**

Footnotes: See following page.

Table 1 Footnotes:

[1] The sum of Total Lower Division States Consumptive Use and Accountable Deliveries to Mexico.

[2] Total EOY live system storage. This includes the Upper Basin reservoirs Powell, Navajo, Crystal, Morrow Point, Blue Mesa, Flaming Gorge, Fontenelle, and Lower Basin reservoirs Mead, Mohave, and Havasu. Based on total live system storage capacity of 59,626,000 AF.

[3] The net volume of water stored by the storing entity during the reporting year and available for delivery to the storing entity in a future year.

[4] Pumpage of Lower Colorado Water Supply Project wellfield to offset certain Colorado River water uses in California.

[5] ICS creation amounts are provisional until verified by Reclamation. Reductions include system assessment, IOPP payback, delivery, and evaporation.

Table 2. Monthly Storage Contents of the Colorado River System Reservoirs, Calendar Year 2017. (Values in thousand acre-feet except as noted.)

	2016 EOY Balance	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	CHANGE
End of Month Live Storage [1]														
Lake Powell	11,797	11,359	11,217	11,364	12,149	13,667	15,408	15,385	14,952	14,664	14,530	14,332	14,068	2,271
Percentage of Lake Powell Live Storage [2]	48.5%	46.7%	46.1%	46.7%	50.0%	56.2%	63.3%	63.3%	61.5%	60.3%	59.7%	58.9%	57.8%	9%
Lake Mead	10,079	10,521	10,838	10,707	10,420	10,141	9,971	9,931	10,131	10,182	10,202	10,090	10,221	142
Percentage of Lake Mead Live Storage [3]	38.6%	40.3%	41.5%	41.0%	39.9%	38.8%	38.2%	38.0%	38.8%	39.0%	39.1%	38.6%	39.1%	1%
Total Live Storage - Lake Powell and Lake Mead	21,876	21,880	22,055	22,071	22,569	23,808	25,379	25,316	25,083	24,846	24,732	24,422	24,289	2,413
Total Percent of Live Storage - Lake Powell and Lake Mead	43.4%	43.4%	43.7%	43.8%	44.7%	47.2%	50.3%	50.2%	49.7%	49.3%	49.0%	48.4%	48.2%	5%
Lake Mohave	1,653	1,712	1,690	1,718	1,684	1,719	1,699	1,744	1,689	1,603	1,512	1,619	1,636	-17
Lake Havasu	573	567	586	577	594	586	588	592	585	564	548	577	557	-16
Reservoir Storage in the Lower Basin [4]	12,305	12,800	13,114	13,002	12,698	12,446	12,258	12,267	12,405	12,349	12,262	12,286	12,414	109
Percentage of Live Storage in the Lower Basin [5]	43.1%	44.8%	45.9%	45.5%	44.5%	43.6%	42.9%	43.0%	43.5%	43.3%	43.0%	43.0%	43.5%	0.4%
Lower Basin Storage plus Lake Powell [6]	24,102	24,159	24,331	24,366	24,847	26,113	27,666	27,652	27,357	27,013	26,792	26,618	26,482	2,380
Percentage of Live Storage, Lower Basin plus Lake Powell [7]	45.6%	45.7%	46.0%	46.1%	47.0%	49.4%	52.3%	52.3%	51.7%	51.1%	50.7%	50.3%	50.1%	5%
Total System Storage [8]	29,451	29,452	29,625	29,899	30,440	31,706	33,705	33,817	33,428	32,918	32,610	32,358	32,017	2,566
Percentage of Total System Storage [9]	49.4%	49.4%	49.7%	50.1%	51.1%	53.2%	56.5%	56.7%	56.1%	55.2%	54.7%	54.3%	53.7%	4%

Footnotes:

[1] Actual values may differ from the displayed values due to rounding and being displayed to the nearest thousand acre-feet.

[2] Percentage of total live storage capacity available in Lake Powell. Based on total live storage capacity of 24,322,000 AF.

[3] Percentage of total live storage capacity available in Lake Mead. Based on total live storage capacity of 26,120,000 AF.

[4] The sum of end-of-month storage in reservoirs Mead, Mohave, and Havasu.

[5] The percentage of available live storage capacity held in the Lower Basin (Lakes Mead, Mohave and Havasu). Based on total live storage capacity of 28,549,000 AF.

[6] The sum of end-of-month storage in Lake Powell (Upper Basin) and Lakes Mead, Mohave and Havasu (Lower Basin).

[7] The percentage of available total live storage capacity held in Lake Powell (Upper Basin) and Lakes Mead, Mohave, and Havasu (Lower Basin). Based on total live storage capacity of 52,871,000 AF.

[8] Total end-of-month system storage; includes Reclamation reservoirs in the Upper and Lower Basins of the Colorado River system.

[9] The percentage of total end-of-month system storage. This includes the Upper Basin Lakes Powell, Navajo, Crystal, Morrow Point, Blue Mesa, Flaming Gorge, Fontenelle, and Lower Basin Lakes Mead, Mohave, and Havasu. Based on total live system storage capacity of 59,626,000 AF.

COMPILATION OF RECORDS IN ACCORDANCE WITH ARTICLE V OF THE CONSOLIDATED DECREE OF THE UNITED STATES SUPREME COURT IN ARIZONA *v.* CALIFORNIA, 547 U.S. 150 (2006)

In accordance with Article V of the Consolidated Decree of the United States Supreme Court in Arizona *v.* California, 547 U.S. 150 (2006) (Consolidated Decree):

"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."

This *Calendar Year 2017 Colorado River Accounting and Water Use Report: Arizona, California, and Nevada* presents the records compiled pursuant to the Consolidated Decree for Calendar Year 2017. Copies of this and previous years' reports may be found on the Bureau of Reclamation's (Reclamation) website at: www.usbr.gov/lc/region/g4000/wtracct.html.

ARTICLE V(A): RECORDS OF RELEASES OF WATER THROUGH REGULATORY STRUCTURES CONTROLLED BY THE UNITED STATES

In accordance with Article V(A) of the Consolidated Decree, Table 3 documents records of releases of Colorado River water through Glen Canyon, Hoover, Davis, Parker, Palo Verde, Imperial and Laguna Dams. Records of releases through Glen Canyon and Hoover Dams are provided by Reclamation. Records of releases through Davis, Parker, Palo Verde, Imperial and Laguna Dams are provided by the United States Geological Survey (USGS) and are based upon measurements at or downstream of the dams.

The record of river flow through Headgate Rock Dam is computed using the record of flow at USGS gaging station 09247520 "Colorado River below Parker Dam, Arizona-California," and deducting from it the record of flow at the USGS gaging station 09428500 "Diversions for Colorado River Indian Reservation Main Canal near Parker, Arizona" measured at Headgate Rock Dam.

The record of flow through Imperial Dam is computed as the sum of releases through the Dam, plus water delivered to Mittry Lake and the Laguna Division Conservation Area. Flow through the Dam does not include diversions into the All-American Canal (AAC) and the Gila Gravity Main Canal (GGMC).

Table 3. Releases of Water Through Regulatory Structures Controlled by the United States, Calendar Year 2017. (Values are in acre-feet.)

STRUCTURE	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Glen Canyon Dam	880,296	710,688	722,416	622,545	652,405	749,032	850,141	900,116	663,071	640,161	630,069	739,549	8,760,489
Hoover Dam	499,756	487,736	911,223	960,955	916,507	864,434	884,957	683,264	599,545	596,104	731,345	594,269	8,730,095
Davis Dam	428,100	499,000	878,900	991,200	873,600	873,900	836,200	755,800	711,400	687,800	615,400	574,300	8,725,600
Parker Dam	259,600	414,900	700,900	763,100	671,600	725,600	687,200	580,300	477,400	457,300	344,200	339,100	6,421,200
Headgate Rock Dam	249,657	388,240	649,910	692,320	603,310	652,150	612,680	514,750	425,380	412,850	317,780	309,291	5,828,318
Palo Verde Diversion Dam	213,800	321,300	529,000	565,300	480,300	500,100	504,300	422,200	383,900	380,500	294,400	280,900	4,876,000
Imperial Dam	30,190	19,500	43,280	25,119	26,170	16,450	16,170	25,720	42,120	14,320	18,470	14,010	291,519
GGMC Diversion for Mittry Lake	544	557	639	713	680	688	797	687	660	714	603	606	7,888
GGMC Diversion for Laguna Division Conservation Area	4,919	4,443	4,919	4,760	4,451	4,759	4,917	4,182	3,775	4,456	4,753	4,830	55,164
Sum of Imperial Dam, Mittry, and Laguna	35,653	24,500	48,838	30,592	31,301	21,897	21,884	30,589	46,555	19,490	23,826	19,446	354,571
Laguna Dam	34,700	24,430	44,370	26,200	30,230	21,130	26,770	30,840	41,250	19,690	21,960	20,060	341,630

ARTICLE V(B): RECORDS OF DIVERSIONS, RETURN FLOWS AND CONSUMPTIVE USE

In accordance with Article V(B) of the Consolidated Decree, Tables 4 through 6 document the final records of diversions of water from the mainstream of the Colorado River, return flow to the mainstream, and the consumptive use of such water within the Lower Division States of Arizona, California, and Nevada.

The tabulations, based upon records furnished by Reclamation, the United States Geological Survey (USGS), the International Boundary and Water Commission, water users, or other agencies, document quantities of water drawn by surface diversion from the mainstream of the Colorado River, pumped directly from the mainstream, or pumped from wells in the Colorado River aquifer.

There are a number of smaller entities for which diversions are reported annually by either the USGS or by the water user. For those diversions reported by the USGS, the USGS verifies the crops being grown and uses evapotranspiration methodologies to estimate the crop consumptive use; the USGS then applies irrigation efficiency coefficients to derive the estimated diversions.

For each water user, this tabulation reports the user's total diversion, measured return flow, estimated unmeasured return flow, and consumptive use. Unmeasured returns are computed by multiplying a water user's diversion by an unmeasured return flow factor. Reclamation continues to refine estimates of unmeasured returns.

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, or (3) a Secretarial reservation of water. The listing of a use in this report should not be interpreted as an entitlement or an indication that the use is authorized.

For those water users whose diversions are made from the Topock Marsh Inlet Canal, All-American Canal, or the Gila Gravity Main Canal, diversions include each user's proportionate share of the total canal losses, which are added to the delivery taken by each user at its turnout from the canal. The portion of the canal loss which returns to the mainstream is provided to each water user as a measured return flow credit.

For the areas downstream of the Northerly International Boundary (NIB), Reclamation does not consider pumping of wells from the flood plain or the underlying aquifer to be a diversion of Colorado River water. This position[1] is based on the following: the groundwater can reasonably be assumed to be flowing towards Mexico and therefore, not to be flowing toward the Colorado River upstream of Mexico's point of diversion near NIB. As such, this water does not return to the River to be made available for consumptive use in the United States or in satisfaction of the Mexican Treaty Obligation. In accordance with this position, Reclamation discontinued reporting these wells beginning in 2004. If hydrologic conditions change, Reclamation will address the need to report these wells.

[1] *Summary Description of Accounting for Water Use in the Yuma Area Beginning with Calendar Year 2003.* Available on Reclamation's website at http://www.usbr.gov/lc/region/g4000/4200Rpts/YumaWtrAcct.pdf

Table 4. State of Arizona - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Marble Canyon Company														
Pumped from well	Diversion	1	1	1	1	2	2	2	2	2	1	1	0	16
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	1	1	1	1	1	1	0	0	0	6
	Consumptive Use	1	1	1	0	1	1	1	1	1	1	1	0	10
Lake Mead National Recreation Area														
National Park Service														
Pumped from well at Temple Bar	Diversion	2	3	2	9	12	12	13	10	5	4	4	1	77
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	2	3	2	9	12	12	13	10	5	4	4	1	77
Lake Mead National Recreation Area														
National Park Service														
Pumped from Lake Mohave - Katherine Landing	Diversion	8	8	13	15	19	20	20	19	17	15	10	15	179
Pumped from Lake Mohave - Willow Beach	Diversion	2	2	2	2	2	3	3	3	2	2	2	1	26
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	10	10	15	17	21	23	23	22	19	17	12	16	205
McAlister Family Trust														
Pumped from river and well	Diversion	0	0	1	1	1	1	1	1	1	1	1	1	10
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	1	0	0	0	0	0	0	0	1	1	3
	Consumptive Use	0	0	0	1	1	1	1	1	1	1	0	0	7
Bureau of Reclamation														
Davis Dam Diversion	Diversion	0	2	1	0	0	0	0	1	2	7	1	1	15
	Measured Returns	0	2	1	0	0	0	0	0	2	7	1	1	14
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	0	0	0	0	0	0	0	1	0	0	0	0	1
Bullhead City														
Pumped from wells	Diversion	598	576	720	810	930	975	1,151	1,022	950	915	799	748	10,194
Mohave County Parks, Lake Mohave diversion	Diversion	1	1	1	1	2	2	2	2	1	2	1	1	17
	Measured Returns	0	0	0	0	0	0	0	0	0	14	11	15	40
	Unmeasured Returns	198	190	238	268	308	322	380	338	314	303	264	247	3,370
	Consumptive Use	401	387	483	543	624	655	773	686	637	600	525	487	6,801
Mohave Water Conservation District														
Pumped from wells	Diversion	72	60	79	82	95	98	108	95	102	92	80	71	1,034
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	24	20	26	27	31	33	36	31	34	30	26	23	341
	Consumptive Use	48	40	53	55	64	65	72	64	68	62	54	48	693
EPCOR Water Arizona, Inc.														
Pumped from wells	Diversion	43	41	50	49	53	54	70	68	59	59	56	67	669
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	15	14	17	17	19	19	24	24	21	21	20	23	234
	Consumptive Use	28	27	33	32	34	35	46	44	38	38	36	44	435
Mohave Valley I.D.D.														
Pumped from wells and Topock Marsh Inlet for agriculture use	Diversion	684	903	2,340	2,791	2,906	3,235	3,894	3,557	2,163	2,716	1,481	1,023	27,693
Pumped from wells for domestic use	Diversion	340	330	393	473	526	557	548	669	607	566	504	410	5,923
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	496	619	1,394	1,565	1,620	1,872	2,118	2,037	1,287	1,599	984	674	16,265
	Consumptive Use	528	614	1,339	1,699	1,812	1,920	2,324	2,189	1,483	1,683	1,001	759	17,351
Fort Mojave Indian Reservation														
Pumped from river for agriculture use	Diversion	1,046	4,572	5,379	6,711	7,906	8,802	8,521	8,760	4,294	4,758	2,335	1,763	64,847
Pumped from river and wells for domestic use	Diversion	64	86	135	155	151	293	205	271	144	208	146	119	1,977
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	511	2,143	2,536	3,158	3,706	4,184	4,014	4,154	2,042	2,284	1,141	866	30,739
	Consumptive Use	599	2,515	2,978	3,708	4,351	4,911	4,712	4,877	2,396	2,682	1,340	1,016	36,085

Table 4. State of Arizona - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Golden Shores Water Conservation District														
Pumped from wells	Diversion	23	22	28	29	34	64	41	43	38	41	36	25	424
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	8	7	9	10	11	21	14	14	12	14	12	8	140
	Consumptive Use	15	15	19	19	23	43	27	29	26	27	24	17	284
Havasu National Wildlife Refuge														
Firebreak Inlet Canal	Diversion	24	150	3,065	5,023	3,318	3,312	2,984	1,787	1,316	1,224	427	215	22,845
Farm Ditch	Diversion [1]	-7	10	623	1,097	708	731	614	311	225	194	30	19	4,555
Pumped from well	Diversion	10	11	15	17	20	25	27	26	20	17	12	12	212
	Measured Returns [2]	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	24	150	3,259	5,401	3,560	3,580	3,190	1,869	1,374	1,263	413	216	24,299
	Consumptive Use	3	21	444	736	486	488	435	255	187	172	56	30	3,313
Crystal Beach Water Conservation District														
Pumped from wells	Diversion	7	7	8	9	10	11	11	11	10	10	9	8	111
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	2	2	3	3	4	4	4	4	4	4	3	3	40
	Consumptive Use	5	5	5	6	6	7	7	7	6	6	6	5	71
Lake Havasu City														
Pumped from wells	Diversion	734	706	895	942	1,039	1,170	1,329	1,251	1,189	1,158	1,132	892	12,437
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	279	268	340	358	395	445	505	475	452	440	430	339	4,726
	Consumptive Use	455	438	555	584	644	725	824	776	737	718	702	553	7,711
Arizona State Parks (Windsor Beach)														
Pumped from wells	Diversion	0	0	0	0	1	0	1	0	0	2	2	0	6
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	1	1	0	2
	Consumptive Use	0	0	0	0	1	0	1	0	0	1	1	0	4
Central Arizona Project														
Pumped from Lake Havasu	Diversion	126,924	62,359	136,275	159,848	174,612	79,014	71,258	70,184	134,073	130,498	126,715	143,853	1,415,613
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	126,924	62,359	136,275	159,848	174,612	79,014	71,258	70,184	134,073	130,498	126,715	143,853	1,415,613
Hillcrest Water Company														
Pumped from wells	Diversion	1	1	2	3	2	2	2	2	3	3	3	4	28
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	1	1	1	1	1	1	1	1	1	1	10
	Consumptive Use	1	1	1	2	1	1	1	1	2	2	2	3	18
Springs Del Sol Domestic Water Improvement District														
Pumped from wells	Diversion	0	0	0	0	0	0	1	1	0	1	0	1	4
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	1	0	0	0	0	0	1
	Consumptive Use	0	0	0	0	0	0	0	1	0	1	0	1	3
Brooke Water, LLC														
Pumped from river and wells	Diversion	33	33	41	38	43	44	51	49	50	44	41	39	506
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	11	11	13	13	14	14	17	16	16	15	14	13	167
	Consumptive Use	22	22	28	25	29	30	34	33	34	29	27	26	339
Town of Parker														
Pumped from wells	Diversion	50	49	57	69	85	90	97	93	75	73	63	59	860
	Measured Returns	17	16	17	16	17	15	16	16	16	17	16	17	196
	Unmeasured Returns	14	14	16	20	24	26	28	26	21	21	18	17	245
	Consumptive Use	19	19	24	33	44	49	53	51	38	35	29	25	419

Table 4. State of Arizona - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Colorado River Indian Reservation														
Diversion at Headgate Rock Dam	Diversion	9,943	26,660	50,990	70,780	68,290	73,450	74,520	65,550	52,020	44,450	26,420	29,809	592,882
Pumped from river and wells	Diversion	334	383	500	556	682	801	871	835	663	579	436	421	7,061
	Measured Returns	15,596	17,880	20,151	21,992	22,319	24,803	26,498	24,969	25,853	22,693	22,026	22,213	266,993
	Unmeasured Returns	565	1,487	2,832	3,923	3,793	4,084	4,147	3,651	2,898	2,477	1,477	1,663	32,997
	Consumptive Use	-5,884	7,676	28,507	45,421	42,860	45,364	44,746	37,765	23,932	19,859	3,353	6,354	299,953
Rayner Ranches														
Pumped from river (AEP-9) and well (AEW-35)	Diversion	0	259	342	358	616	617	715	715	441	259	0	0	4,322
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	91	120	125	216	216	250	250	154	91	0	0	1,513
	Consumptive Use	0	168	222	233	400	401	465	465	287	168	0	0	2,809
Ehrenburg Improvement Association														
Pumped from river	Diversion	17	17	21	24	28	32	38	37	32	29	26	20	321
	Measured Returns	4	2	6	3	5	3	4	3	3	3	2	2	40
	Unmeasured Returns	5	5	6	7	8	9	11	11	9	8	7	6	92
	Consumptive Use	8	10	9	14	15	20	23	23	20	18	17	12	189
North Baja Pipeline														
Pumped from wells	Diversion	7	18	26	32	29	42	45	27	23	15	8	11	283
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	2	6	9	11	10	15	16	9	8	5	3	4	98
	Consumptive Use	5	12	17	21	19	27	29	18	15	10	5	7	185
Cibola Valley I.D.D.														
Pumped from river for agriculture use	Diversion	166	529	790	1,309	864	1,007	1,062	981	265	379	266	1,297	8,915
Pumped from river for domestic use	Diversion	25	25	25	25	25	15	15	15	15	15	15	15	230
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	54	158	232	381	253	291	307	284	80	112	80	374	2,606
	Consumptive Use	137	396	583	953	636	731	770	712	200	282	201	938	6,539
Mohave County Water Authority														
Pumped from river	Diversion	0	0	83	75	81	94	105	136	0	0	0	0	574
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	24	21	23	27	30	39	0	0	0	0	164
	Consumptive Use	0	0	59	54	58	67	75	97	0	0	0	0	410
Hopi Tribe														
Pumped from river	Diversion	0	633	235	259	613	700	982	592	560	231	0	0	4,805
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	180	67	74	175	199	280	169	159	66	0	0	1,369
	Consumptive Use	0	453	168	185	438	501	702	423	401	165	0	0	3,436
GSC Farm, LLC														
Pumped from river	Diversion	0	159	257	85	325	480	412	299	387	37	0	33	2,474
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	45	73	24	93	137	117	85	110	11	0	10	705
	Consumptive Use	0	114	184	61	232	343	295	214	277	26	0	23	1,769
Arizona Game and Fish Commission														
Pumped from river	Diversion	0	0	353	397	295	420	425	427	0	0	0	0	2,317
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	101	113	83	120	121	122	0	0	0	0	660
	Consumptive Use	0	0	252	284	212	300	304	305	0	0	0	0	1,657
Cibola Island														
Pumped from river	Diversion	18	56	84	139	92	107	113	104	28	40	28	138	947
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	5	16	24	40	26	31	32	30	8	11	8	39	270
	Consumptive Use	13	40	60	99	66	76	81	74	20	29	20	99	677
Cibola National Wildlife Refuge														
Pumped from river	Diversion	479	402	631	1,396	1,488	2,000	1,541	2,064	1,291	1,397	1,572	1,010	15,271
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	182	153	240	530	565	760	586	784	491	531	597	384	5,803
	Consumptive Use	297	249	391	866	923	1,240	955	1,280	800	866	975	626	9,468

Table 4. State of Arizona - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Imperial National Wildlife Refuge														
Pumped from river	Diversion	63	242	244	336	288	337	297	381	267	313	288	112	3,168
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	24	92	93	128	109	128	113	145	101	119	109	43	1,204
	Consumptive Use	39	150	151	208	179	209	184	236	166	194	179	69	1,964
Bureau of Land Management														
Pumped from river and wells (Permitees, LHFO and YFO)	Diversion	32	44	68	10	100	84	104	161	105	153	108	95	1,064
Pumped from river (ADW-01) (leased by L. Pratt)	Diversion [3]	7	9	12	13	16	19	21	20	16	13	9	9	164
Pumped from river (ADP-1) and well (AEW-14) (leased by M. Lee)	Diversion [3]	8	10	14	15	18	22	24	23	18	16	11	11	190
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	16	21	33	14	47	44	51	71	49	64	45	40	495
	Consumptive Use	31	42	61	24	87	81	98	133	90	118	83	75	923
Fisher's Landing Water and Sewer, LLC														
Pumped from well	Diversion	1	1	1	1	0	1	1	2	2	1	1	2	14
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	1	1	0	0	1	3
	Consumptive Use	1	1	1	1	0	1	1	1	1	1	1	1	11
Shepard Water Company														
Pumped from well	Diversion	2	2	3	2	3	4	4	4	3	4	3	3	37
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	1	1	1	1	1	1	1	2	1	1	1	1	13
	Consumptive Use	1	1	2	1	2	3	3	2	2	3	2	2	24
U.S. Army Yuma Proving Grounds														
Diversion at Imperial Dam	Diversion	0	1	2	1	1	2	0	4	0	1	0	2	14
Pumped from wells	Diversion	16	18	20	35	50	75	75	61	45	50	24	9	478
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	16	19	22	36	51	77	75	65	45	51	24	11	492
JRJ Partners, LLC														
Pumped from river (AEP-1) and well (AEW-3)	Diversion	48	30	96	122	111	72	115	100	22	110	116	100	1,042
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	17	10	34	43	39	25	40	35	8	38	41	35	365
	Consumptive Use	31	20	62	79	72	47	75	65	14	72	75	65	677
Cha Cha, LLC														
Pumped from river (AEP-2/3) and wells (AEW-4/5, ADW-3)	Diversion	40	56	88	82	150	113	157	93	99	172	81	21	1,152
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	14	20	31	29	53	40	55	32	34	60	28	7	403
	Consumptive Use	26	36	57	53	97	73	102	61	65	112	53	14	749
Beattie Farms Southwest (Russell Youmans)														
Pumped from well (ADW-2)	Diversion	117	41	39	158	4	0	0	0	36	102	93	104	694
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	41	14	14	55	1	0	0	0	13	36	33	36	243
	Consumptive Use	76	27	25	103	3	0	0	0	23	66	60	68	451
Gila Monster Farms														
Diversion at Imperial Dam	Diversion	441	416	1,221	1,224	923	418	209	385	256	824	623	416	7,356
	Measured Returns	40	26	67	56	33	14	10	17	11	43	28	19	364
	Unmeasured Returns	168	158	464	465	351	159	79	146	97	313	237	158	2,795
	Consumptive Use	233	232	690	703	539	245	120	222	148	468	358	239	4,197
Wellton-Mohawk I.D.D.														
Diversion at Imperial Dam	Diversion	13,945	21,725	39,713	44,921	36,885	35,317	34,148	30,990	35,696	37,037	21,295	21,025	372,697
	GGMC Return	1,401	1,515	2,448	2,314	1,456	1,360	1,764	1,512	1,789	2,151	1,082	1,083	19,875
	Dome Return	492	540	545	707	545	366	172	305	335	379	456	584	5,426
	MOD Return [4]	8,333	8,684	9,431	8,220	8,836	8,592	8,495	8,428	8,777	8,674	8,174	6,420	101,064
	Total Returns	10,226	10,739	12,424	11,241	10,837	10,318	10,431	10,245	10,901	11,204	9,712	8,087	126,365
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	3,719	10,986	27,289	33,680	26,048	24,999	23,717	20,745	24,795	25,833	11,583	12,938	246,332

Table 4. State of Arizona - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
City of Yuma														
Diversion at Imperial Dam via AAC	Diversion	1,094	966	1,168	1,237	1,378	1,566	1,554	1,656	1,383	1,417	1,184	1,129	15,732
Diversion at Imperial Dam via GGMC	Diversion	953	821	943	829	691	357	361	402	421	509	1,017	976	8,280
Pumped from river for Yuma East Wetlands	Diversion	25	30	25	26	26	25	45	42	38	30	26	34	372
	Measured Returns	987	807	859	754	753	698	746	816	815	816	886	858	9,795
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	1,085	1,010	1,277	1,338	1,342	1,250	1,214	1,284	1,027	1,140	1,341	1,281	14,589
U.S. Marine Corps Air Station Yuma														
Diversion at Imperial Dam	Diversion	71	73	113	134	141	134	140	132	117	118	99	88	1,360
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	71	73	113	134	141	134	140	132	117	118	99	88	1,360
Union Pacific Railroad														
Diversion at Imperial Dam	Diversion	4	4	4	4	4	4	4	4	4	4	4	4	48
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	2	2	2	2	2	2	2	2	2	2	2	2	24
	Consumptive Use	2	2	2	2	2	2	2	2	2	2	2	2	24
University of Arizona														
Diversion at Imperial Dam	Diversion	31	40	62	76	87	98	102	138	88	95	63	56	936
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	31	40	62	76	87	98	102	138	88	95	63	56	936
Yuma Union High School District														
Delivery at East Main Canal	Diversion	6	6	14	18	14	23	25	15	13	17	10	10	171
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	2	2	4	5	4	6	6	4	3	4	3	3	46
	Consumptive Use	4	4	10	13	10	17	19	11	10	13	7	7	125
Desert Lawn Memorial Park														
Delivered by the City of Yuma	Diversion	1	1	1	1	3	3	3	6	4	2	2	2	29
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	1	1	1	2	1	1	1	1	9
	Consumptive Use	1	1	1	1	2	2	2	4	3	1	1	1	20
North Gila Valley Irrigation District														
Diversion at Imperial Dam	Diversion	1,719	2,121	3,500	3,570	5,516	5,412	5,521	2,916	3,315	4,130	3,244	2,330	43,294
Pumped from river	Diversion	36	24	89	68	56	108	63	51	58	32	9	61	655
	Measured Returns	1,346	1,501	2,016	2,000	2,972	3,080	2,971	1,688	1,900	2,400	2,125	1,502	25,501
	Unmeasured Returns	249	299	511	513	776	779	778	417	474	577	447	340	6,160
	Consumptive Use	160	345	1,062	1,125	1,824	1,661	1,835	862	999	1,185	681	549	12,288
Yuma Irrigation District														
Diversion at Imperial Dam	Diversion [5]	2,783	2,864	6,726	7,443	6,191	4,094	4,906	5,389	5,194	7,116	4,734	3,960	61,400
Pumped from wells	Diversion	27	32	123	221	29	72	221	184	184	80	81	64	1,318
	Measured Returns	961	860	1,745	1,791	1,460	1,005	1,237	1,362	1,320	1,808	1,223	1,030	15,802
	Unmeasured Returns	599	617	1,459	1,632	1,325	887	1,092	1,187	1,146	1,533	1,026	857	13,360
	Consumptive Use	1,250	1,419	3,645	4,241	3,435	2,274	2,798	3,024	2,912	3,855	2,566	2,137	33,556
Yuma Mesa I.D.D.														
Diversion at Imperial Dam	Diversion	9,233	8,283	14,901	15,833	20,357	23,010	24,765	24,739	18,437	16,653	10,437	10,606	197,254
	Measured Returns [6]	2,748	3,199	3,372	3,321	2,463	3,114	3,139	4,081	3,342	5,350	2,021	6,097	42,247
	Unmeasured Returns	1,477	1,325	2,384	2,533	3,257	3,682	3,962	3,958	2,950	2,664	1,670	1,697	31,559
	Consumptive Use	5,008	3,759	9,145	9,979	14,637	16,214	17,664	16,700	12,145	8,639	6,746	2,812	123,448
Unit "B" I.D.D.														
Diversion at Imperial Dam	Diversion	1,199	1,059	1,906	2,324	2,942	3,290	3,611	3,663	2,475	2,735	1,636	1,216	28,056
	Measured Returns [6]	428	527	535	553	400	509	501	674	537	928	343	1,030	6,965
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	771	532	1,371	1,771	2,542	2,781	3,110	2,989	1,938	1,807	1,293	186	21,091

Table 4. State of Arizona - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Arizona State Land Department														
Pumped from river and wells for agriculture use	Diversion	550	699	1,319	1,256	1,182	1,152	1,146	1,148	826	922	857	624	11,681
Pumped from river and wells for domestic use	Diversion	3	3	3	3	3	4	4	7	5	4	4	4	47
	Measured Returns	13	9	22	19	11	5	3	6	4	14	9	6	121
	Unmeasured Returns	194	246	463	441	415	405	403	404	291	324	301	220	4,107
	Consumptive Use	346	447	837	799	759	746	744	745	536	588	551	402	7,500
George Ogram														
Delivered via GGMC	Diversion	19	27	9	0	0	0	0	26	74	54	21	51	281
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	7	9	3	0	0	0	0	9	26	19	8	18	99
	Consumptive Use	12	18	6	0	0	0	0	17	48	35	13	33	182
Ogram Boys' Enterprises														
Delivered via GGMC	Diversion	15	26	99	202	269	86	125	3	0	23	47	28	923
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	5	9	35	71	94	30	44	1	0	8	16	10	323
	Consumptive Use	10	17	64	131	175	56	81	2	0	15	31	18	600
Fort Yuma Indian Reservation														
Pumped from river for Yuma East Wetlands	Diversion	17	19	99	166	116	149	178	142	148	177	17	21	1,249
Pumped from river for agriculture use (Cha Cha Farms)	Diversion	2	4	2	3	5	2	9	4	4	3	7	3	48
Surface delivery to Ranch "5"	Diversion	10	8	53	36	50	76	16	0	49	48	38	34	418
Pumped from wells for domestic use	Diversion [7]	3	2	2	3	3	3	4	2	2	2	2	2	30
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	11	11	55	73	61	81	72	52	71	81	22	21	611
	Consumptive Use	21	22	101	135	113	149	135	96	132	149	42	39	1,134
Armon Curtis														
Pumped from river (AEP-4)	Diversion [3]	7	9	12	13	16	20	21	21	16	13	10	9	167
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	2	3	4	4	6	7	7	8	6	4	4	3	58
	Consumptive Use	5	6	8	9	10	13	14	13	10	9	6	6	109
Yuma County Water Users' Association														
Diversion at Imperial Dam	Diversion	17,714	18,543	39,217	45,968	30,992	25,278	32,316	21,403	23,946	36,952	27,279	20,129	339,737
Pumped from wells	Diversion	83	122	121	107	148	167	148	86	44	147	136	140	1,449
	Measured Returns	11,259	9,709	10,616	9,477	9,417	7,808	8,833	7,660	9,704	10,155	12,090	9,279	116,007
	Unmeasured Returns	374	392	826	968	654	534	682	451	504	779	576	426	7,166
	Consumptive Use	6,164	8,564	27,896	35,630	21,069	17,103	22,949	13,378	13,782	26,165	14,749	10,564	218,013
R. Griffin														
Pumped from river (ADP-3,4)	Diversion [3]	1	2	2	2	3	3	3	4	3	2	2	2	29
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	1	1	1	1	1	1	2	1	0	1	1	11
	Consumptive Use	1	1	1	1	2	2	2	2	2	2	1	1	18
Power														
Pumped from river (ADP-3,4)	Diversion [3]	4	5	7	8	9	11	12	12	9	8	5	5	95
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	1	2	3	3	3	4	4	4	3	3	1	2	33
	Consumptive Use	3	3	4	5	6	7	8	8	6	5	4	3	62
Griffin Ranches														
Pumped from river (ADP-3,4)	Diversion [3]	3	4	6	6	8	10	11	10	8	7	5	5	83
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	1	1	2	2	3	3	4	3	3	3	2	2	29
	Consumptive Use	2	3	4	4	5	7	7	7	5	4	3	3	54
Milton Phillips														
Pumped from river (ADP-3,4)	Diversion [3]	2	2	3	3	4	5	5	5	4	4	3	2	42
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	1	1	1	1	1	2	2	2	1	1	1	1	15
	Consumptive Use	1	1	2	2	3	3	3	3	3	3	2	1	27

Table 4. State of Arizona - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Victor Power														
Pumped from river (ADP-3,4)	Diversion [3]	1	1	1	1	2	2	2	2	2	1	1	1	17
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	1	0	0	0	1	1	1	1	1	0	0	0	6
	Consumptive Use	0	1	1	1	1	1	1	1	1	1	1	1	11
Cocopah Indian Reservation														
Diversion at Imperial Dam	Diversion	52	41	94	471	0	0	0	0	0	18	19	50	745
Pumped from river and wells	Diversion [3,8]	69	86	116	127	154	187	203	196	155	129	92	90	1,604
	Measured Returns	5	2	2	4	0	0	0	0	0	0	1	1	15
	Unmeasured Returns	41	43	71	203	52	64	69	67	53	50	38	48	799
	Consumptive Use	75	82	137	391	102	123	134	129	102	97	72	91	1,535
Bureau of Reclamation's Yuma Area Office														
Pumped from wells	Diversion	0	36	0	72	77	12	0	0	0	0	0	0	197
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	0	36	0	72	77	12	0	0	0	0	0	0	197
Arizona Public Service Company														
Pumped from well	Diversion	0	0	0	0	0	0	0	24	1	0	0	0	25
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	11	0	0	0	0	11
	Consumptive Use	0	0	0	0	0	0	0	13	1	0	0	0	14
Gary Pasquinelli														
Pumped from river (ADP-5)	Diversion	13	5	32	79	63	40	0	0	48	69	32	16	397
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	5	2	11	27	22	14	0	0	17	24	11	6	139
	Consumptive Use	8	3	21	52	41	26	0	0	31	45	21	10	258
Pumped from the South Gila Wells (DPOCs)	Measured Returns [9]	3,794	4,360	5,089	2,484	19	2,707	4,645	5,076	2,589	5,291	96	5,496	41,646
	Unmeasured Returns	-3,794	-4,360	-5,089	-2,484	-19	-2,707	-4,645	-5,076	-2,589	-5,291	-96	-5,496	-41,646
	Consumptive Use	0	0	0	0	0	0	0	0	0	0	0	0	0
Arizona Totals														
	Diversion	**192,119**	**157,637**	**316,756**	**380,840**	**374,993**	**280,149**	**282,477**	**254,676**	**294,713**	**300,359**	**236,437**	**245,763**	**3,316,919**
	Measured Returns	**47,424**	**49,639**	**56,922**	**53,711**	**50,706**	**54,079**	**59,034**	**56,613**	**56,997**	**60,743**	**50,590**	**55,653**	**652,111**
	Unmeasured Returns	**1,854**	**4,500**	**12,997**	**20,821**	**22,199**	**20,604**	**19,054**	**16,365**	**12,764**	**10,725**	**10,028**	**3,394**	**155,305**
	Consumptive Use	**142,841**	**103,498**	**246,837**	**306,308**	**302,088**	**205,466**	**204,389**	**181,698**	**224,952**	**228,891**	**175,819**	**186,716**	**2,509,503**

Footnotes:

[1] Diversion values are normally positive. Should negative diversion values occur, water is flowing from the canal to the river.

[2] The South Dike is the point of measured return flow for the Refuge and meter readings will normally indicate a positive flow of water from the Refuge into the river. If the flow reverses and water flows into the Refuge instead, a negative value will be recorded; when this occurs, this is considered a diversion.

[3] Calculated by the USGS using field crop verification and ET methodologies. A description of this methodology is included in the Significant Documents.

[4] MOD return flow credit is the measured flow at Station 0+00. When comparing this return value to the "Water Bypassed Pursuant to IBWC Minute No. 242", differences can result due to a combination of transmission loss, DPOC and Yuma Mesa Conduit discharge into the MODE, MODE water that has been desalinated, and MODE water discharged to the river. During periods of sustained flow in the Gila River this measurement may include both Colorado River and Gila River water. At such times Reclamation will determine how best to differentiate return flows from the two sources.

[5] Diversion does not include water delivered to users (George Ogram, Ogram Boys' Enterprises, and some ASLD lands) located outside of District boundaries.

[6] YMIDD receives 85 percent of the return flows from the Yuma Mesa Conduit Outlet and the Protective and Regulatory Pumping Unit; Unit B receives the remaining 15 percent.

Yuma Mesa Conduit Outlet Flows (AF) = 7,240

Protective and Regulatory Pumping Unit (AF) = 26,015

[7] Diversion is an estimate of the amount of domestic water required by FYIR, AZ.

[8] Diversion amounts include pumpage from wells ADP-3, 4, AEW-15, 16, and the Cocopah Bend R.V. Park. The reported diversion includes deliveries to the Cocopah Tribe's Trust lands and 239 AF to the Tribe's Fee lands located within PPR No. 7.

[9] Until comprehensive modeling of the Yuma area to determine how unmeasured returns are affected by pumping of the DPOC wellfield is complete, this pumpage is added to Arizona's measured returns and subtracted from Arizona's unmeasured returns.

Table 5. State of California - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Fort Mojave Indian Reservation														
Pumped from river and well for agriculture use	Diversion	111	380	1,214	1,454	1,845	1,932	1,193	2,149	1,731	1,179	483	110	13,781
Pumped from wells for domestic use	Diversion	5	2	3	3	5	6	5	5	5	5	3	2	49
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	54	176	562	673	855	895	553	995	802	547	225	52	6,389
	Consumptive Use	62	206	655	784	995	1,043	645	1,159	934	637	261	60	7,441
City of Needles														
Pumped from wells	Diversion	90	90	136	153	182	191	202	199	154	198	157	135	1,887
	Measured Returns	31	28	31	31	31	30	32	33	31	32	30	29	369
	Unmeasured Returns	8	10	62	43	9	17	31	51	8	97	49	43	428
	Consumptive Use [1]	51	52	43	79	142	144	139	115	115	69	78	63	1,090
Southern California Gas Company														
Pumped from wells	Diversion	0	0	0	1	1	2	2	3	3	1	2	1	16
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use [2]	0	0	0	1	1	2	2	3	3	1	2	1	16
Pacific Gas and Electric Company														
Pumped from wells	Diversion	11	14	19	20	25	30	33	32	25	21	15	14	259
	Measured Returns	9	11	15	16	20	24	27	26	20	17	12	12	209
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use [2]	2	3	4	4	5	6	6	6	5	4	3	2	50
Havasu Water Company														
Pumped from wells	Diversion	1	2	3	3	3	4	4	4	3	3	2	2	34
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	1	1	1	1	1	2	2	1	1	1	1	1	14
	Consumptive Use [2]	0	1	2	2	2	2	2	3	2	2	1	1	20
Vista Del Lago														
Pumped from wells	Diversion	1	1	2	2	2	3	3	3	2	2	2	2	25
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	1	1	1	1	1	1	1	1	1	1	10
	Consumptive Use [2]	1	1	1	1	1	2	2	2	1	1	1	1	15
Non-Federal Subcontractors to the LCWSP														
Pumped from wells	Diversion	13	16	22	23	28	35	37	36	28	24	17	17	296
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	5	6	9	9	11	14	15	14	11	10	7	7	118
	Consumptive Use [2]	8	10	13	14	17	21	22	22	17	14	10	10	178
Wetmore, Kenneth C.														
Pumped from well	Diversion	0	0	0	0	1	1	1	1	1	0	0	0	5
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	1	0	1	0	0	0	2
	Consumptive Use	0	0	0	0	1	1	0	1	0	0	0	0	3
Williams, Jerry O. and Deloris P.														
Pumped from well	Diversion	0	0	0	0	0	0	0	1	0	0	0	0	1
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	1	0	0	0	0	1
	Consumptive Use	0	0	0	0	0	0	0	0	0	0	0	0	0

Table 5. State of California - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Carney, Jerome D.														
Pumped from wells	Diversion	0	0	0	0	0	0	0	0	0	0	0	0	0
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	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
Wetmore, Mark M.														
Pumped from well	Diversion	0	0	1	1	1	1	1	1	1	1	1	0	9
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	1	0	0	0	0	1	1	1	0	4
	Consumptive Use	0	0	1	0	1	1	1	1	0	0	0	0	5
Chemehuevi Indian Reservation														
Pumped from river and wells	Diversion	10	12	18	17	25	30	37	243	27	24	28	18	489
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	5	5	8	8	12	14	17	112	12	11	13	9	226
	Consumptive Use	5	7	10	9	13	16	20	131	15	13	15	9	263
The Metropolitan Water District of Southern California														
Pumped from Lake Havasu	Diversion	68,003	13,265	24,003	42,451	44,199	57,439	58,044	57,955	55,601	69,368	89,259	100,180	679,767
	Measured Returns	256	237	239	207	230	229	219	215	203	239	227	239	2,740
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	67,747	13,028	23,764	42,244	43,969	57,210	57,825	57,740	55,398	69,129	89,032	99,941	677,027
Bureau of Reclamation - Parker Dam and Government Camp														
Diversion at Parker Dam	Diversion	0	0	0	0	0	1	0	0	0	0	0	0	1
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use [2]	0	0	0	0	0	1	0	0	0	0	0	0	1
Colorado River Indian Reservation														
Pumped from river and wells (agriculture)	Diversion	104	129	177	192	234	283	310	298	234	196	139	137	2,433
Pumped from wells for Big River Development	Diversion	30	29	36	43	49	59	61	56	54	47	38	31	533
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	56	66	89	97	117	143	155	148	120	101	74	70	1,236
	Consumptive Use	78	92	124	138	166	199	216	206	168	142	103	98	1,730
Palo Verde Irrigation District														
Diversion at Palo Verde Dam	Diversion	21,570	37,260	56,450	69,810	73,910	88,880	96,140	89,970	64,840	58,960	38,040	37,040	732,870
Pumped from river	Diversion [3,4]	82	102	139	150	183	222	243	233	184	154	109	107	1,908
	Measured Returns	26,386	25,886	28,472	29,858	34,507	35,170	35,869	34,771	34,601	33,993	30,234	29,755	379,502
	Unmeasured Returns	1,410	3,232	3,988	4,602	5,486	6,343	6,784	6,880	5,235	4,547	2,941	2,886	54,334
	Consumptive Use	-6,144	8,244	24,129	35,500	34,100	47,589	53,730	48,552	25,188	20,574	4,974	4,506	300,942
Lake Enterprises														
Pumped from river	Diversion	0	0	0	0	0	0	0	0	0	0	0	0	0
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	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
Bureau of Land Management														
Pumped from wells (Permittees, LHFO and YFO)	Diversion	28	18	23	23	22	29	18	65	24	32	26	23	331
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	10	5	7	6	7	10	6	17	7	9	8	6	98
	Consumptive Use	18	13	16	17	15	19	12	48	17	23	18	17	233

Table 5. State of California - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Yuma Project Reservation Division														
Indian Unit														
Diversion at Imperial Dam	Diversion	1,880	2,044	5,328	7,394	5,506	3,144	1,846	3,436	2,803	4,619	3,368	3,072	44,440
Pumped from wells for domestic use	Diversion [5]	34	42	58	63	76	93	101	97	77	64	45	45	795
	Measured Returns	142	82	117	55	17	9	6	15	49	50	115	74	731
	Unmeasured Returns	320	348	899	1,245	932	541	325	590	481	782	570	521	7,554
Bard Unit														
Diversion at Imperial Dam	Diversion	1,807	1,960	3,858	5,041	3,162	3,157	2,708	2,404	3,459	3,880	3,755	2,795	37,986
	Measured Returns	79	45	45	21	6	5	5	5	35	24	73	38	381
	Unmeasured Returns	302	327	644	842	528	527	452	401	578	648	627	467	6,343
Unassigned Yuma Project Reservation Division Measured Returns [6]		2,397	1,896	1,842	2,375	2,172	2,228	1,345	1,345	1,451	1,873	2,263	2,109	23,296
Total Yuma Project Reservation Division Consumptive Use [7]		481	1,348	5,697	7,960	5,089	3,084	2,522	3,581	3,745	5,186	3,520	2,703	44,916
Fort Yuma Indian Reservation														
Ranch 1														
Pumped from well and river (CEW-2; CDP-3)	Diversion [4]	13	16	21	23	28	34	37	36	28	24	17	17	294
Ranch 2 Parcel 3														
Pumped from well and river (CEW-2; CDP-4)	Diversion [4]	7	9	12	13	16	20	21	21	16	14	10	9	168
Ranch 3														
Pumped from well and river (CEW-2; CDP-5)	Diversion [4]	0	0	0	0	0	0	0	0	0	0	0	0	0
Ranch 4														
Pumped from well and river (CEW-1,15; CDP-1,2)	Diversion [4]	41	52	70	76	93	113	123	119	93	78	55	55	968
Ranch 5														
Diverted from the AAC	Diversion	23	19	118	78	111	170	35	0	109	108	85	76	932
Ranch 7														
Pumped from well and river (CEW-1,15; CDP-1,2)	Diversion [4]	8	10	14	15	18	22	24	23	18	15	11	10	188
Ranch 15														
Pumped from well (CEW-14)	Diversion [4]	18	24	32	35	42	52	56	54	43	36	25	25	442
Ranch 17														
Pumped from river (CDP-6,7)	Diversion [4]	0	0	0	0	0	0	0	0	0	0	0	0	0
Sum of Diversions for the FYIR Ranches in California	Diversion	110	130	267	240	308	411	296	253	307	275	203	192	2,992
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	50	57	119	108	139	184	133	113	138	123	89	85	1,338
	Consumptive Use	60	73	148	132	169	227	163	140	169	152	114	107	1,654
Yuma Island California														
Arizona State Land Department Trust Lands	Diversion [4]	171	214	292	314	389	468	512	488	386	327	231	222	4,014
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	78	96	129	140	176	207	229	220	172	146	104	98	1,795
	Consumptive Use	93	118	163	174	213	261	283	268	214	181	127	124	2,219
City of Winterhaven														
Pumped from well	Diversion	8	8	8	7	7	14	7	8	7	8	8	7	97
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	3	2	3	2	2	5	2	3	2	3	3	2	32
	Consumptive Use	5	6	5	5	5	9	5	5	5	5	5	5	65

Table 5. State of California - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Imperial Irrigation District														
Diversion at Imperial Dam	Diversion	58,392	127,709	245,589	268,744	283,328	279,141	261,534	228,921	215,151	229,926	156,229	133,951	2,488,615
	Measured Returns	6,985	8,182	8,320	3,236	1,429	1,371	1,373	1,534	6,462	3,999	8,487	5,275	56,653
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
Delivery from Warren H. Brock Reservoir	Consumptive Use [8]	11,514	12,385	14,275	12,542	12,290	9,489	9,140	9,392	0	0	10,550	14,632	116,209
Total IID Consumptive Use	Total Consumptive Use	62,921	131,912	251,544	278,050	294,189	287,259	269,301	236,779	208,689	225,927	158,292	143,308	2,548,171
Water Transferred to SDCWA for Mitigation	Diversion [9]	19,512	11,142	5,246	3,318	2,443	4,670	6,876	7,379	3,554	11,645	13,966	20,673	110,424
	Measured Returns	2,334	714	178	40	12	23	36	49	107	203	759	814	5,269
	Consumptive Use	17,178	10,428	5,068	3,278	2,431	4,647	6,840	7,330	3,447	11,442	13,207	19,859	105,155
Coachella Valley Water District														
Diversion at Imperial Dam	Diversion	13,207	19,622	26,805	31,836	35,883	36,715	37,300	36,673	28,945	29,222	28,214	19,508	343,930
	Measured Returns	1,580	1,257	908	383	181	180	196	246	869	508	1,533	768	8,609
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	11,627	18,365	25,897	31,453	35,702	36,535	37,104	36,427	28,076	28,714	26,681	18,740	335,321
California Totals														
	Diversion	**185,180**	**214,191**	**369,697**	**431,303**	**451,817**	**476,961**	**467,514**	**430,913**	**377,606**	**410,181**	**334,340**	**318,284**	**4,467,987**
	Measured Returns	**40,199**	**38,338**	**40,167**	**36,222**	**38,605**	**39,269**	**39,108**	**38,239**	**43,828**	**40,938**	**43,733**	**39,113**	**477,759**
	Unmeasured Returns	**2,302**	**4,331**	**6,521**	**7,778**	**8,276**	**8,903**	**8,706**	**9,547**	**7,570**	**7,027**	**4,713**	**4,248**	**79,922**
	Consumptive Use	**154,193**	**183,907**	**337,284**	**399,845**	**417,226**	**438,278**	**428,840**	**392,519**	**326,208**	**362,216**	**296,444**	**289,555**	**4,026,515**

Footnotes:

[1] In 2017, the City of Needles (Needles) conserved 146 AF under the Pilot System Conservation Program. In accordance with System Conservation Implementation Agreement No. 15-XX-30-W0596, Needles' Colorado River consumptive use in excess of 1,077 AF (its 1,223 AF PPR entitlement adjusted for the 146 AF of conservation) is offset by pumping from the LCWSP. For additional details, see Table 16.

[2] Tabulated consumptive use is offset by pumping from the LCWSP. For additional details, see Table 16.

[3] Water pumped from the river for delivery to non-canal lands served by PVID upstream of Palo Verde Diversion Dam. The water reported in this line item represents a portion of the diversion previously reported within the item "Colorado River Indian Reservation: Pumped from river and wells (agriculture)".

[4] Calculated by the USGS using field crop verification and ET methodologies. A description of this methodology is included in the Significant Documents. Points of diversion for the Yuma Island in CA are AEP-02, AEP-03, AEW-04, AEW-05, ADW-03, CEP-01, CEP-02, CDW-02, CDW-05, CDW-07, CDW-08, CEW-07, CEW-09, CEW-12, CEW-13. See the USGS maps in the Significant Documents section.

[5] Diversion is an estimate of the amount of domestic water required by the YPRD Indian Unit.

[6] Unassigned measured returns include drainage from the Indian Unit and the Bard Unit in the Reservation Division, but excludes seepage from the AAC.

[7] Calculated as the sum of diversions (83,221 AF) minus the sum of: measured returns (1,112 AF), unmeasured returns (13,897 AF) and unassigned measured returns (23,296 AF).

[8] Colorado River water captured in the Warren H. Brock Reservoir and delivered to IID as consumptive use. Flow measurement is made at the Brock Reservoir outlet channel, Station 21+36.

[9] As referenced in Column 7, Exhibit B, of the CRWDA and the IID/SDCWA Water Transfer Agreement, as amended, IID conserves water for transfer to SDCWA for delivery, by exchange from non-Colorado River sources, to the Salton Sea for mitigation purposes. For additional details, see Table 18.

Table 6. State of Nevada - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Bureau of Reclamation														
Hoover Dam Diversion	Diversion	5	5	6	6	7	6	6	6	6	5	5	5	68
	Measured Returns	2	2	2	2	2	2	2	3	2	2	2	2	25
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	3	3	4	4	5	4	4	3	4	3	3	3	43
Robert B. Griffith Water Project														
Pumped from Lake Mead	Diversion	25,972	23,751	33,727	36,694	45,181	43,813	47,268	45,125	37,909	40,545	32,533	30,032	442,550
Lake Mead National Recreation Area														
National Park Service														
Pumped from Lake Mead	Diversion	18	19	27	24	28	36	43	37	34	28	21	20	335
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	18	19	27	24	28	36	43	37	34	28	21	20	335
Basic Water Company														
Pumped from Lake Mead	Diversion	289	289	318	291	361	389	498	466	488	362	327	373	4,451
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	289	289	318	291	361	389	498	466	488	362	327	373	4,451
City of Henderson														
Pumped from Lake Mead	Diversion	860	857	1,084	970	972	1,003	1,155	1,329	1,203	1,207	1,156	825	12,621
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	860	857	1,084	970	972	1,003	1,155	1,329	1,203	1,207	1,156	825	12,621
Nevada Department of Wildlife														
Pumped from Lake Mead	Diversion	52	51	41	41	41	47	46	33	34	39	35	35	495
	Measured Returns	51	50	40	41	40	47	45	32	34	38	34	34	486
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	1	1	1	0	1	0	1	1	0	1	1	1	9
Pacific Coast Building Products														
Pumped from Lake Mead	Diversion	77	68	78	77	81	99	80	70	66	71	65	82	914
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	77	68	78	77	81	99	80	70	66	71	65	82	914
Las Vegas Wash Return Flow	Returns [1]	19,887	17,791	19,698	18,329	17,923	16,836	18,228	19,161	18,532	18,800	18,312	19,271	222,768
Lake Mead National Recreation Area														
National Park Service														
Pumped from Lake Mohave - Cottonwood Cove	Diversion	10	9	11	11	12	15	17	15	13	13	12	13	151
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	10	9	11	11	12	15	17	15	13	13	12	13	151
Big Bend Water District														
Pumped from river	Diversion	255	247	300	322	359	393	462	413	377	368	287	260	4,043
	Measured Returns	150	132	161	163	172	180	222	201	184	175	158	137	2,035
	Unmeasured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Consumptive Use	105	115	139	159	187	213	240	212	193	193	129	123	2,008
SNWA - Big Bend Conservation Area														
Pumped from wells	Diversion	0	0	0	0	0	0	0	0	0	0	0	0	0
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	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

Table 6. State of Nevada - Records of Diversion, Returns, and Consumptive Use, Calendar Year 2017. (Values are in acre-feet.)

WATER USER		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Fort Mojave Indian Reservation														
Pumped from river for agriculture use	Diversion	31	64	189	153	468	355	477	521	202	109	97	0	2,666
Pumped from wells for domestic use	Diversion	64	86	135	155	151	293	205	271	144	208	146	119	1,977
	Measured Returns	0	0	0	0	0	0	0	0	0	0	0	0	0
	Unmeasured Returns	31	50	107	102	204	214	225	261	114	105	80	39	1,532
	Consumptive Use	64	100	217	206	415	434	457	531	232	212	163	80	3,111
Nevada Totals														
	Diversion	**27,633**	**25,446**	**35,916**	**38,744**	**47,661**	**46,449**	**50,257**	**48,286**	**40,476**	**42,955**	**34,684**	**31,764**	**470,271**
	Measured Returns	**20,090**	**17,975**	**19,901**	**18,535**	**18,137**	**17,065**	**18,497**	**19,397**	**18,752**	**19,015**	**18,506**	**19,444**	**225,314**
	Unmeasured Returns	**31**	**50**	**107**	**102**	**204**	**214**	**225**	**261**	**114**	**105**	**80**	**39**	**1,532**
	Consumptive Use	**7,512**	**7,421**	**15,908**	**20,107**	**29,320**	**29,170**	**31,535**	**28,628**	**21,610**	**23,835**	**16,098**	**12,281**	**243,425**

Nevada Colorado River Storage in Local Aquifer [2]		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Las Vegas Valley Water District	BOY Balance													347,784
	Injected	0	0	0	0	0	0	0	0	0	0	0	0	0
	Withdrawn	0	0	0	0	0	0	0	0	83	255	138	106	582
	EOY Balance													347,202
City of North Las Vegas	BOY Balance													11,843
	Injected	0	0	0	0	0	0	0	0	0	0	0	0	0
	Withdrawn	0	0	0	0	0	0	0	0	0	0	0	0	0
	EOY Balance													11,843
Total	**BOY Cumulative Injected Storage**													**359,627**
	Total Current Year Injection													**0**
	Total Current Year Withdrawals													**582**
	EOY Cumulative Injected Storage													**359,045**

Footnotes:

[1] Estimated return based on historic use method adopted by the Task Force on Unmeasured Return Flows on August 28, 1984, and revised as noted in the Reclamation letter to SNWA and CRCN dated December 5, 2007 (included in the Significant Documents).

[2] Colorado River water injected into groundwater storage is accounted for as a consumptive use in the year in which it is diverted from the Colorado River. It will not be accounted for as a consumptive use in the year in which it is withdrawn from storage, but because it originated as Colorado River water it will be accounted for as a return flow credit in the year in which it returns to the Colorado River.

ARTICLE V(C): RECORDS FOR THE DISPOSITION OF WATER ORDERED BUT NOT DIVERTED

In accordance with Article V(C) of the Consolidated Decree, Tables 7 and 8 document records of 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 1944 Mexican Water Treaty (Treaty) or diverted by others in satisfaction of decreed rights.

In addition to the requirements of the Decree, the tabulations provided herewith also document quantities of such water passing to Mexico in excess of Treaty requirements and quantities captured in storage.

Water ordered but not diverted is the difference between the approved daily order and the mean daily delivery on the day the diversion was made. Daily orders are provided to Reclamation in advance of the delivery date by the amount of time required for water to travel between the storage location and the user's point of diversion from the mainstream.

To the extent possible, water ordered but not diverted was delivered to other diverters in satisfaction of their water rights. Any remaining water ordered but not diverted was distributed between delivery to storage, delivery to Mexico in satisfaction of Treaty requirements, and to Mexico in excess of Treaty requirements.

The water users listed in this tabulation are major water users from whom Reclamation receives a daily water order and, with the exception of CAP and MWD, are those that divert their water downstream of Parker Dam. Currently, no daily orders are received from water users in Nevada, therefore Reclamation has not created a tabulation for Nevada water users. In addition, the storage capacity of Lake Mead is large enough relative to Nevada's daily diversions from the reservoir that any water ordered but not diverted would be retained for future use and would not pass to Mexico in excess of Treaty requirements.

The "Passing to Mexico in Excess of Treaty" values displayed in this section of the report reflect the sum of the daily amounts of water passing to Mexico in excess of the daily Treaty amount, according to IBWC's schedule, resulting from water that had been ordered but not diverted. The "To Mexico in Excess of Treaty" values displayed in the Article V(D) section reflect all water under/over delivered to Mexico according to IBWC's schedule. The information provided in Article V(C) is unrelated to information provided in Article V(D) and comparisons between the tabulations should not be made.

Table 7. State of Arizona - Disposition of Water Ordered but not Diverted, Calendar Year 2017. (Values are in 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 [1]	10,472	467	638	7,348	5,893	767	669	1,657	3,530	1,187	216	4,602	37,446
Delivered to Mexico in Satisfaction of Treaty													
Diverted by Others													
Delivered to Storage [2]	10,472	467	638	7,348	5,893	767	669	1,657	3,530	1,187	216	4,602	37,446
Passing to Mexico in Excess of Treaty													
Colorado River Indian Reservation - Diversion at Headgate Rock Dam													
Ordered but not Diverted [1]	5,720	1,287	2,575	3,606	4,503	4,318	3,146	6,244	4,677	3,001	1,488	3,477	44,042
Delivered to Mexico in Satisfaction of Treaty	3,007	455	588	1,087	1,674	1,137	971	2,377	1,485	1,040	823	1,206	15,850
Diverted by Others	1,899	472	1,730	2,063	1,889	2,259	1,673	2,923	1,482	1,474	452	1,580	19,896
Delivered to Storage [3]	811	357	219	403	765	831	474	840	251	441	192	665	6,249
Passing to Mexico in Excess of Treaty	3	3	37	53	174	91	27	104	1,459	46	21	26	2,044
North Gila Valley Irrigation District - Diversion at Imperial Dam													
Ordered but not Diverted [1]	310	202	270	308	382	183	396	387	614	233	410	272	3,967
Delivered to Mexico in Satisfaction of Treaty	98	93	57	91	178	39	123	177	63	53	226	149	1,347
Diverted by Others	158	51	132	157	158	66	143	182	468	144	142	78	1,879
Delivered to Storage [3]	17	55	77	59	27	70	122	22	77	22	36	42	625
Passing to Mexico in Excess of Treaty	37	3	4	2	19	8	8	7	6	14	8	3	119
Gila Monster Farms - Diversion at Imperial Dam													
Ordered but not Diverted [1]	301	474	258	184	136	181	254	294	592	169	210	337	3,390
Delivered to Mexico in Satisfaction of Treaty	115	167	26	81	34	29	85	102	119	47	137	180	1,122
Diverted by Others	154	214	148	98	63	106	117	136	362	93	41	104	1,636
Delivered to Storage [3]	8	86	80	3	30	46	51	48	34	27	26	48	490
Passing to Mexico in Excess of Treaty	24	7	5	2	8	0	1	7	77	3	5	5	144
Wellton-Mohawk I.D.D. - Diversion at Imperial Dam													
Ordered but not Diverted [1]	3,249	2,243	1,314	808	1,951	1,171	1,469	1,150	1,980	458	2,580	489	18,862
Delivered to Mexico in Satisfaction of Treaty	832	1,449	366	391	781	316	296	335	305	92	1,202	62	6,427
Diverted by Others	2,093	272	649	358	779	431	681	353	732	261	1,206	375	8,190
Delivered to Storage [3]	16	455	214	25	350	406	488	444	109	68	112	48	2,735
Passing to Mexico in Excess of Treaty	307	66	85	34	40	19	5	19	834	37	60	4	1,510
Yuma Irrigation District - Diversion at Imperial Dam													
Ordered but not Diverted [1]	330	333	228	161	179	346	158	90	146	157	255	82	2,465
Delivered to Mexico in Satisfaction of Treaty	140	110	14	91	105	31	113	40	22	56	91	12	825
Diverted by Others	135	158	154	55	45	155	33	41	67	80	137	66	1,126
Delivered to Storage [3]	28	63	43	12	27	148	12	8	19	17	21	4	402
Passing to Mexico in Excess of Treaty	27	1	18	3	2	12	0	1	37	4	7	0	112
Yuma Mesa I.D.D. - Diversion at Imperial Dam													
Ordered but not Diverted [1]	1,401	1,414	2,143	1,151	1,497	1,710	1,293	1,396	1,855	1,996	2,111	1,418	19,385
Delivered to Mexico in Satisfaction of Treaty	259	562	842	540	882	440	533	536	797	709	1,034	925	8,059
Diverted by Others	991	611	1,016	449	359	743	435	636	763	804	1,017	366	8,190
Delivered to Storage [3]	6	224	268	145	174	508	320	206	151	433	52	104	2,591
Passing to Mexico in Excess of Treaty	146	17	18	16	83	19	5	18	143	50	9	23	547

Table 7. State of Arizona - Disposition of Water Ordered but not Diverted, Calendar Year 2017. (Values are in acre-feet.)

WATER USER	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Unit "B" I.D.D. - Diversion at Imperial Dam													
Ordered but not Diverted [1]	509	691	1,262	560	794	293	218	460	957	692	930	902	8,268
Delivered to Mexico in Satisfaction of Treaty	274	306	266	317	315	43	68	196	295	223	499	502	3,304
Diverted by Others	193	315	802	190	314	151	103	189	490	333	360	319	3,759
Delivered to Storage [3]	25	56	146	44	118	98	47	49	72	113	45	69	882
Passing to Mexico in Excess of Treaty	17	15	48	9	46	2	0	26	100	22	26	11	322
Yuma County Water Users' Association - Diversion at Imperial Dam													
Ordered but not Diverted [1]	753	3,033	1,036	949	3,983	1,700	1,895	2,679	2,021	2,198	3,259	3,258	26,764
Delivered to Mexico in Satisfaction of Treaty	294	1,369	361	311	1,653	487	967	618	316	581	1,781	1,364	10,102
Diverted by Others	365	948	421	258	1,511	608	499	1,573	850	1,295	1,036	1,159	10,523
Delivered to Storage [3]	72	626	67	372	663	578	415	417	334	254	399	698	4,896
Passing to Mexico in Excess of Treaty	22	90	187	7	157	28	14	70	521	68	42	37	1,243
Arizona Totals													
Ordered but not Diverted [1]	**23,045**	**10,144**	**9,724**	**15,075**	**19,318**	**10,669**	**9,498**	**14,357**	**16,372**	**10,091**	**11,459**	**14,837**	**164,589**
Delivered to Mexico in Satisfaction of Treaty	**5,019**	**4,511**	**2,520**	**2,909**	**5,622**	**2,522**	**3,156**	**4,381**	**3,402**	**2,801**	**5,793**	**4,400**	**47,036**
Diverted by Others	**5,988**	**3,041**	**5,052**	**3,628**	**5,118**	**4,519**	**3,684**	**6,033**	**5,214**	**4,484**	**4,391**	**4,047**	**55,199**
Delivered to Storage [2,3]	**11,457**	**2,390**	**1,752**	**8,412**	**8,048**	**3,451**	**2,599**	**3,691**	**4,578**	**2,560**	**1,099**	**6,279**	**56,315**
Passing to Mexico in Excess of Treaty	**583**	**202**	**402**	**126**	**529**	**179**	**60**	**252**	**3,177**	**244**	**178**	**109**	**6,041**

[1] Due to converting daily cfs values to monthly AF totals and rounding to the nearest whole number, the sum of the disposition of water volumes may not equal the Ordered but not Diverted volume.

[2] Water not diverted by the Central Arizona Project remains in Lake Havasu.

[3] Delivered to temporary storage in Senator Wash and Brock Reservoirs.

Table 8. State of California - Disposition of Water Ordered but not Diverted, Calendar Year 2017. (Values are in acre-feet.)

WATER USER	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
The Metropolitan Water District of Southern California - Diversion at Lake Havasu													
Ordered but not Diverted [1]	1,635	0	3,578	330	967	427	10	1,176	43	1,696	3,464	2,862	16,188
Delivered to Mexico in Satisfaction of Treaty													
Diverted by Others													
Delivered to Storage [2]	1,635	0	3,578	330	967	427	10	1,176	43	1,696	3,464	2,862	16,188
Passing to Mexico in Excess of Treaty													
Palo Verde Irrigation District - Diversion at Palo Verde Dam													
Ordered but not Diverted [1]	440	797	1,392	899	1,039	1,260	873	912	524	559	315	361	9,371
Delivered to Mexico in Satisfaction of Treaty	71	215	109	331	266	224	524	381	123	256	163	175	2,838
Diverted by Others	346	326	887	373	597	757	243	353	373	177	65	81	4,578
Delivered to Storage [3]	8	250	296	184	151	273	93	149	9	124	87	95	1,719
Passing to Mexico in Excess of Treaty	15	5	101	11	26	5	13	30	19	3	0	10	238
Yuma Project Reservation Division - Diversion at Imperial Dam													
Ordered but not Diverted [1]	5,314	3,966	1,161	1,240	4,894	1,010	2,175	695	1,718	2,893	7,351	6,167	38,584
Delivered to Mexico in Satisfaction of Treaty	1,809	1,254	256	493	1,817	375	922	280	246	937	3,738	2,624	14,751
Diverted by Others	3,008	1,788	554	581	2,356	333	870	297	1,122	1,428	2,505	2,388	17,230
Delivered to Storage [3]	253	869	286	157	607	284	359	114	175	432	991	1,074	5,599
Passing to Mexico in Excess of Treaty	244	55	64	10	115	17	24	5	176	96	117	82	1,005
Imperial Irrigation District - Diversion at Imperial Dam													
Ordered but not Diverted [1]	14,567	24,577	29,244	28,975	24,664	17,148	20,587	17,359	9,092	10,353	19,168	20,939	236,673
Delivered to Mexico in Satisfaction of Treaty	8,215	12,184	14,164	13,241	15,428	7,411	11,087	8,568	2,445	4,156	14,008	13,521	124,428
Diverted by Others	5,178	6,226	9,398	10,890	4,307	5,357	6,692	4,737	2,094	4,103	2,800	5,185	66,967
Delivered to Storage [3]	625	5,693	4,122	4,354	3,156	3,950	2,541	3,634	1,590	1,938	1,954	1,949	35,506
Passing to Mexico in Excess of Treaty	549	475	1,560	490	1,773	429	267	421	2,963	156	405	284	9,772
Coachella Valley Water District - Diversion at Imperial Dam													
Ordered but not Diverted [1]	1,266	661	464	470	1,873	2,289	3,211	3,284	4,792	886	1,367	2,024	22,587
Delivered to Mexico in Satisfaction of Treaty	649	359	67	174	682	469	970	1,213	1,011	206	907	678	7,385
Diverted by Others	400	184	288	187	949	1,134	1,547	1,117	2,045	363	300	1,051	9,565
Delivered to Storage [3]	184	100	109	98	211	628	674	867	333	236	142	282	3,866
Passing to Mexico in Excess of Treaty	32	19	1	10	30	58	21	87	1,403	80	19	14	1,774
California Totals													
Ordered but not Diverted [1]	**23,222**	**30,002**	**35,841**	**31,914**	**33,437**	**22,132**	**26,856**	**23,429**	**16,170**	**16,387**	**31,665**	**32,356**	**323,403**
Delivered to Mexico in Satisfaction of Treaty	**10,744**	**14,012**	**14,596**	**14,239**	**18,193**	**8,479**	**13,503**	**10,442**	**3,825**	**5,555**	**18,816**	**16,998**	**149,402**
Diverted by Others	**8,932**	**8,524**	**11,127**	**12,031**	**8,209**	**7,581**	**9,352**	**6,504**	**5,634**	**6,071**	**5,670**	**8,705**	**98,340**
Delivered to Storage [2,3]	**2,706**	**6,912**	**8,392**	**5,123**	**5,091**	**5,563**	**3,676**	**5,940**	**2,150**	**4,426**	**6,638**	**6,263**	**62,878**
Passing to Mexico in Excess of Treaty	**840**	**554**	**1,726**	**521**	**1,944**	**509**	**325**	**543**	**4,561**	**335**	**541**	**390**	**12,789**

[1] Due to converting daily cfs values to monthly AF totals and rounding to the nearest whole number, the sum of the disposition of water volumes may not equal the Ordered but not Diverted volume.

[2] Water not diverted by The Metropolitan Water District of Southern California remains in Lake Havasu.

[3] Delivered to temporary storage in Senator Wash and Brock Reservoirs.

ARTICLE V(D): RECORDS OF DELIVERIES TO MEXICO IN SATISFACTION OF PART III OF THE 1944 TREATY REQUIREMENTS AND WATER PASSING TO MEXICO IN EXCESS OF TREATY REQUIREMENTS

In accordance with Article V(D) of the Consolidated Decree, Table 9 documents the records of deliveries to Mexico of water in satisfaction of the obligations of Part III of the "Utilization of Waters of the Colorado and Tijuana Rivers and of the Rio Grande" (1944 Mexican Water Treaty (Treaty)), signed February 3, 1944 and water passing to Mexico in excess of Treaty requirements. The tabulations, based upon records furnished by the U.S. Section of the IBWC, show the quantities of water delivered to Mexico at the Northerly International Boundary, the Southerly International Boundary, the Limitrophe, and emergency deliveries to Tijuana (as applicable), pursuant to Articles 10 and 15 of the 1944 Mexican Water Treaty and related Minutes of the IBWC; and the quantities of water passing to Mexico in excess of Treaty requirements.

Minutes incorporated into the tabulations include:

1) Minute No. 242 – Permanent and Definitive Solution to the International Problem of the Salinity of the Colorado River, signed August 30, 1973.

2) Minute No. 318 – Adjustment of Delivery Schedules for Water Allotted to Mexico for the Years 2010 through 2013 as a Result of Infrastructure Damage in Irrigation District 014, Rio Colorado, Caused by the April 2010 Earthquake in the Mexicali Valley, Baja California, signed December 17, 2010.

3) Minute No. 319 – Interim International Cooperative Measures in the Colorado River Basin Through 2017 and Extension of Minute 318 Cooperative Measures to Address the Continued Effects of the April 2010 Earthquake in the Mexicali Valley, Baja California, signed November 20, 2012.

4) Minute No. 322 – Extension of the Temporary Emergency Delivery of Colorado River Water for Use in Tijuana, Baja California, signed January 19, 2017.

5) Minute No. 323 – Extension of Cooperative Measures and Adoption of a Binational Water Scarcity Contingency Plan in the Colorado River Basin, signed September 21, 2017.

Table 9. Deliveries to Mexico in Satisfaction of Part III of the 1944 Mexican Water Treaty, and Water Passing to Mexico in Excess of Treaty Requirements, Calendar Year 2017. (Values are in acre-feet.)

	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Colorado River at the Northerly International Boundary [1]	115,253	148,650	190,803	169,244	99,745	115,925	120,191	91,780	93,454	53,823	86,758	96,431	1,382,057
Deliveries to Mexico in Satisfaction of Treaty Requirements													
Delivery at the Limitrophe [2]	348	295	399	165	198	111	240	88	767	604	226	339	3,781
Delivery at Southerly International Boundary	10,647	11,082	11,766	11,463	10,584	9,793	10,134	10,343	9,552	11,035	12,026	12,131	130,554
Diversion Channel Discharge [3]		0	3	63	139	67	1	13	10				296
Delivery to Mexico at the Northerly International Boundary [4]	109,833	148,466	190,564	169,026	98,735	115,690	119,909	91,612	85,283	53,503	86,512	96,235	1,365,369
Total Deliveries to Mexico in Satisfaction of Treaty Requirements	120,828	159,843	202,732	180,717	109,656	125,661	130,284	102,056	95,612	65,142	98,764	108,705	1,500,000
Creation of Water for Mexico's Water Reserve [5]	0	0	0	0	0	0	0	0	0	0	0	0	0
Total to Mexico in Satisfaction of Treaty Requirements	120,828	159,843	202,732	180,717	109,656	125,661	130,284	102,056	95,612	65,142	98,764	108,705	1,500,000
Delivery of Mexico's Water Reserve	0	0	0	0	0	0	0	0	0	0	0	0	0
To Mexico in Excess of Treaty [6]	5,420	183	240	217	1,010	235	281	168	8,172	319	246	195	16,688
Accountable Deliveries to Mexico [7]	126,248	160,026	202,972	180,934	110,666	125,896	130,565	102,224	103,784	65,461	99,010	108,900	1,516,688
Water Bypassed Pursuant to IBWC Minute No. 242	5,693	9,030	10,698	11,671	15,308	11,847	9,773	10,567	10,598	9,580	15,132	6,805	126,701
Water Provided to the U.S. Pursuant to Section III.6.e.iii of IBWC Minute No. 319	0	0	0	0	0	0	0	0	0	0	0	124,000	124,000
Mexico's Water Reserve [5]													
BOY Balance													223,612
Creation													0
Delivery													0
Water Provided to the United States Pursuant to Section III.6.e.iii of Minute No. 319													(124,000)
Evaporation [8]													(2,988)
EOY Cumulative Balance Available for Future Delivery [9]													96,624

Note: Annual totals may differ from the sum of the displayed monthly values due to rounding and conversion from TCM to AF.

Footnotes:

[1] Flow in the river at the NIB as reported by IBWC as delivery to Mexico.

[2] Wasteway deliveries to the river limitrophe via the Cooper, 11 Mile, and 21 Mile lateral wasteways in satisfaction of the 1944 Treaty requirements.

[3] The Diversion Channel delivers water from the SIB confluence structure to the river or to the Bypass Drain. Consistent with a 2001 Memorandum of Understanding between Reclamation and the U.S. Section of the IBWC, during the months of January and October through December water was discharged to the Bypass Drain. During the months of February through September water was discharged to the Colorado River and was charged to the Treaty.

[4] That portion of the flows at NIB necessary to meet the 1.5 MAF Treaty obligation.

[5] Includes water deferred by Mexico pursuant to IBWC Minute Nos. 319 and 323. Pursuant to IBWC Minute No. 323, Mexico's Water Reserve includes Emergency Storage, Revolving Account, and Intentionally Created Mexican Allocation.

[6] Water passing to Mexico in excess of Mexico's daily schedule. Calculated as the sum of daily differences between actual flows to Mexico and Mexico's total schedule.

[7] Mexico's total water delivery. This value includes deliveries made in satisfaction of Treaty requirements in accordance with Mexico's scheduled diversions (including any water delivered pursuant to IBWC Minute Nos. 319 and 323) and water passing to Mexico in excess of Mexico's daily schedule. It does not include water bypassed pursuant to IBWC Minute No. 242.

[8] In accordance with IBWC Minute Nos. 319 and 323, a 3 percent reduction for evaporation is applied annually on December 31 to Mexico's Water Reserve, beginning in the year of creation.

[9] The cumulative volume of water deferred by Mexico (Mexico's Water Reserve) pursuant to Minute Nos. 319 and 323; includes water created during the reporting year and the prior year EOY balance, less deliveries made during the reporting year and the annual evaporation assessment.

ARTICLE V(E): RECORDS OF DIVERSIONS AND CONSUMPTIVE USE OF WATER FROM THE MAINSTREAM OF THE GILA AND SAN FRANCISCO RIVERS FOR THE BENEFIT OF THE GILA NATIONAL FOREST

Table 10. Diversions and Consumptive Use for the Benefit of the Gila National Forest, Calendar Year 2017.[1] (Values are in acre-feet.)

WATER SOURCE		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
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
Totals	Total Diversion	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**
	Total Consumptive Use	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**

[1]These data are provided annually by the New Mexico Interstate Stream Commission.

INFORMATION PROVIDED IN ADDITION TO THE REPORTING REQUIREMENTS OF THE CONSOLIDATED DECREE

The information contained in the following sections of this report is supplemental to the records required by Article V of the Consolidated Decree of the United States Supreme Court in Arizona *v.* California, 547 U.S. 150 (2006). This information provides a more extensive record of activities relating to federal management of the Colorado River. In concise tabulations specific to various agreements, policies, rules, or Records of Decision, this information is intended to help the reader correlate the records found in the Article V portion of this report with the various conservation, transfer, and exchange agreements. The penultimate section contains a list of documents significant to the actions taken by Reclamation, the Lower Division States, and the water user agencies for the calendar year documented in this report. The final section of this report contains a series of maps showing the general location of the water users tabulated in this report.

SUMMARY OF WATER AVAILABILITY AND USE BY STATE

The Secretary of the Interior (Secretary) makes Colorado River water available to the Lower Division States in accordance with Article II of the Consolidated Decree.

Under Article II, the Secretary apportions water to the states under shortage, normal, or surplus conditions, and, in accordance with Article II(B)6, may release to a state water which was apportioned to but unused by another state.

The amount of Colorado River water available for use in a state is impacted by various agreements and policies. Examples of these agreements and policies include storage and interstate release agreements, the Colorado River Water Delivery Agreement (CRWDA), the Inadvertent Overrun and Payback Policy (IOPP), and the Colorado River Interim Guidelines for Lower Basin Shortages and the Coordinated Operations for Lake Powell and Lake Mead (2007 Interim Guidelines), specifically, Intentionally Created Surplus (ICS).

Table 11 documents the amount of Colorado River water made available to each Lower Division State under Article II of the Consolidated Decree, water released pursuant to Article II(B)(6) of the Consolidated Decree, paybacks made by users within the state in accordance with IOPP, creation or delivery of ICS, and the total consumptive use within a state. In those years when a given program shows activity a line will be included within the table denoting the activity and the volume of water involved. Otherwise, the line is omitted.

The table demonstrates whether the consumptive use results in an underrun or overrun of the amount of Colorado River water available to each Lower Division State for the calendar year covered by this report.

Table 11. Apportionments, Article II(B)(6) Releases, Paybacks, and Total Consumptive Use by State, Calendar Year 2017. (Values are in acre-feet.)

STATE	ADJUSTMENTS	ACTUAL USE
Arizona	Basic Apportionment [1]	2,800,000
	System Conservation Water - Pilot System Conservation Program [2]	(18,692)
	System Conservation Water - Drought Response [3]	(80,000)
	Total Available Colorado River Water [4]	2,701,308
	Total Consumptive Use [5]	2,509,503
	State Underrun or (Overrun)	191,805
	Unused AZ Apportionment Left in Lake Mead [6]	(191,805)
	Net State Underrun or (Overrun)	0
California	Basic Apportionment [1]	4,400,000
	ICS Creation (MWD) [7]	(315,649)
	ICS Creation (IID) [7]	(21,983)
	Excess IID Conservation [8]	(35,399)
	System Conservation Water - Pilot System Conservation Program [2]	(298)
	Total Available Colorado River Water [4]	4,026,671
	Total Consumptive Use [5]	4,026,515
	State Underrun or (Overrun)	156
	Under-delivery to the Salton Sea for Mitigation Purposes [9]	(156)
	Net State Underrun or (Overrun)	0
Nevada	Basic Apportionment [1]	300,000
	Total Available Colorado River Water [4]	300,000
	Total Consumptive Use [5]	243,425
	State Underrun or (Overrun)	56,575
	Unused NV Apportionment Left in Lake Mead [10]	(56,575)
	Net State Underrun or (Overrun)	0

Footnotes:

[1] The state basic apportionment as described in Article II(B)(1) of the Consolidated Decree.

[2] The aggregate amount of water conserved in each state, in 2017, pursuant to individual System Conservation Implementation Agreements (SCIA) between Reclamation and water users participating in the Pilot System Conservation Program (PSCP). In accordance with the SCIAs, this System Conservation Water remained in Lake Mead to benefit system storage. For additional details, see Tables 17, 18, and 19.

[3] In 2017, Reclamation and the Gila River Indian Community (Community) entered into SCIA No. 17-XX-30-W0620, as was amended under Agreement No. 17-XX-30-W0623, in which the Community agreed to forego delivery of 80,000 AF of its CAP water entitlement in 2017. In accordance with the SCIA and Letter Agreement Nos. 17-XX-30-W0621 and 17-XX-30-W0624 between Reclamation and CAWCD, this water remained in Lake Mead to benefit system storage. This pilot project exhibited the need to develop a baseline for future conservation agreements.

[4] The total amount of Colorado River water available for use by the state during the reporting year.

[5] The total consumptive use of Colorado River water within the state as tabulated in the Article V(B) section of this report.

Footnotes continued on following page.

Table 11 Footnotes: Continued from previous page.

[6] By letter dated June 28, 2017, CAWCD notified Reclamation of its intent to adjust its diversions of unused Arizona basic apportionment in 2017 to effect a voluntarily contribution to Lake Mead. The volume of 191,805 AF remained in Lake Mead to benefit system storage.

[7] The amount of ICS created by the water user during the reporting year. Unless otherwise noted, ICS values displayed are provisional until verified by Reclamation.

[8] In 2017, IID conserved 80,937 AF of water in excess of its CRWDA water transfer obligations. Provisional data indicate that 21,983 AF were stored in Lake Mead by IID as Extraordinary Conservation ICS, 23,555 AF were delivered to MWD pursuant to the *California Agreement for the Creation and Delivery of Extraordinary Conservation Intentionally Created Surplus* , as amended, resulting in 35,399 AF of excess conservation. IID and MWD propose to credit this excess conservation to MWD's ICS account through the application of Section XI.G.3.B.8 of the 2007 Interim Guidelines, subject to Section XI.G.7.B.5. This proposal is currently under review. All ICS values are provisional until verified by Reclamation.

[9] In 2017, IID conserved 105,311 AF for Salton Sea mitigation purposes, but, due to measurement imprecision and operational/infrastructure limitations, only delivered 105,155 AF to the Salton Sea, resulting in a 156 AF under-delivery. To fulfill its 2017 mitigation requirement, IID plans to deliver 156 AF of conserved water to the Salton Sea in 2018.

[10] Colorado River water apportioned to, but not consumptively used by, Nevada in 2017. By letter dated October 23, 2017, SNWA notified Reclamation that it anticipated having unused Nevada basic apportionment available for offstream storage, and that, instead of moving the water offstream, SNWA would leave the water in Lake Mead to pilot a new ICS proposal. In accordance with the 2007 Interim Guidelines, creation of ICS is predicated upon the execution of an exhibit to the 2007 *Lower Colorado River Intentionally Created Surplus Forbearance Agreement* and a Delivery Agreement, and approval of an ICS Plan of Creation. As of the date of this report, these requirements have not been completed. Any ICS credited to SNWA from water stored in Lake Mead under this pilot project will be reflected in a future *Colorado River Accounting and Water Use Report* .

INTERSTATE WATER BANKING WITHIN THE STATES OF ARIZONA, CALIFORNIA, AND NEVADA

On November 1, 1999, the Secretary of the Interior adopted Federal regulations, codified at 43 CFR Part 414, establishing a procedural framework for carrying out an interstate water banking program. The rule provided for authorized parties to enter into agreements whereby Colorado River water may be stored off-stream in one state for future benefit of consuming entities in another state.

The primary mechanism through which these transactions may occur is a Storage and Interstate Release Agreement (SIRA), which permits authorized entities in the Lower Division States to store Colorado River water off-stream, develop intentionally created unused apportionment (ICUA) in a future year, and make the ICUA available to the Secretary for release for use in another Lower Division State. These SIRAs provide structure and guidance, in accordance with Article II(B)(6) of the Consolidated Decree, for the actions the Secretary will take in releasing Colorado River water to a specific entity in order to implement the interstate contractual distribution of water under the interstate water banking program.

Two SIRAs have been implemented under 43 CFR Part 414. The first SIRA was entered into on December 18, 2002, among Reclamation, on behalf of the Secretary, the Arizona Water Banking Authority (AWBA), the Southern Nevada Water Authority (SNWA), and the Colorado River Commission of Nevada (CRCN). This SIRA provides for the storage, by AWBA, of either the State of Arizona's basic or surplus apportionment or the State of Nevada's unused basic or surplus apportionment for the benefit of SNWA.

In 2001, AWBA, SNWA, and CRCN executed an Agreement for Interstate Water Banking, amended January 1, 2005, April 1, 2009, and May 20, 2013, specifying the interstate banking relationship among those parties. This agreement establishes the terms and conditions for the off-stream storage of Colorado River water in Arizona and the establishment of Long-Term Storage Credits (LTSC) for the benefit of SNWA.

Under the AWBA/SNWA/CRCN interstate banking agreement, Colorado River water diverted and banked in Arizona is accounted as consumptively used by Arizona in the year it is diverted and, as a result, LTSCs are created for SNWA. When LTSCs are recovered, SNWA will divert Colorado River water in exchange for the Central Arizona Water Conservation District's (CAWCD) use of the LTSCs pursuant to the SIRA. The Secretary will release ICUA created by AWBA, via CAWCDs forbearance to SNWA, in that same year pursuant to Article II(B)(6) of the Consolidated Decree. ICUA used by SNWA is in addition to Nevada's basic apportionment and is accounted as consumptive use of Colorado River water in Nevada for that year.

The second SIRA was entered into on October 27, 2004, among Reclamation, on behalf of the Secretary, the Metropolitan Water District of Southern California (MWD), SNWA, and CRCN. This SIRA provides for the storage, by MWD, of the State of Nevada's unused basic or surplus apportionment for the benefit of SNWA.

In 2004, MWD, SNWA, and CRCN, executed an Operational Agreement, amended August 2009, October 2012, and October 2015, specifying the interstate banking relationship among those parties, and providing the terms and conditions under which MWD will store Nevada unused basic apportionment for the benefit of SNWA. When SNWA requests delivery of this water, MWD will develop ICUA by reducing its diversion of Colorado River water. The ICUA developed by MWD through its reduced diversion of Colorado River water will be released by the Secretary for use by SNWA.

Table 12 documents the Accumulated Long Term Storage Credits (ALTSC) verified by AWBA and MWD, provisional LTSC accrued during the past year, LTSCs recovered during the past year, and ALTSC held for an entity with a SIRA.

Table 12. Colorado River Water Stored in one State Under 43 CFR Part 414 for the Benefit of Specific Entities in Another State (Interstate Water Banking), Calendar Year 2017. (Values are in acre-feet.)

	BOY Balance	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTALS
NEVADA														
Water diverted and stored in AZ by AWBA for the benefit of SNWA														
Verified 2016 EOY ALTSC [1]	601,041													
Accrued LTSC in 2017 [2]		0	0	0	0	0	0	0	0	0	0	0	0	0
Verified LTSC in 2017		0	0	0	0	0	0	0	0	0	0	0	0	0
ICUA Developed in 2017 [3]		0	0	0	0	0	0	0	0	0	0	0	0	0
Total ALTSC [4]		601,041	601,041	601,041	601,041	601,041	601,041	601,041	601,041	601,041	601,041	601,041	601,041	601,041
Water diverted and stored in CA by MWD for the benefit of SNWA														
Verified 2016 EOY ALTSC [1, 5]	330,225													
Diverted in 2017 [5]		0	0	0	0	0	0	0	0	0	0	0	0	0
Verified LTSC in 2017 [5]		0	0	0	0	0	0	0	0	0	0	0	0	0
ICUA Developed in 2017 [3, 5]		0	0	0	0	0	0	0	0	0	0	0	0	0
Total ALTSC [5]		330,225	330,225	330,225	330,225	330,225	330,225	330,225	330,225	330,225	330,225	330,225	330,225	330,225
TOTAL														
Water stored for the benefit of SNWA during the calendar year		0	0	0	0	0	0	0	0	0	0	0	0	0
Cumulative Balance of Water Stored for SNWA within AZ and CA [6]		931,266	931,266	931,266	931,266	931,266	931,266	931,266	931,266	931,266	931,266	931,266	931,266	931,266

Footnotes:

[1] ALTSCs are LTSCs verified by the banking entity before the beginning of the reporting year and available for recovery by a specific entity with a valid SIRA. The amount of ICUA developed cannot exceed verified LTSCs.

[2] Provisional LTSCs accrued during the reporting year for the benefit of a specific consuming entity in Nevada with a valid SIRA. Provisional LTSCs represent the amount of water diverted from the river and transported to the storage facility. Provisional LTSCs that have not been verified by AWBA or MWD are not eligible for certification and recovery. Accruals of LTSCs in Arizona for the benefit of consuming entities in Nevada and California are limited to 200,000 AF annually.

[3] ICUA developed by AWBA or MWD during the reporting year. AWBA or MWD have certified this amount to be available and the Secretary has released it to a specific entity with a valid SIRA. The ALTSCs are certified by AWBA or MWD when ICUA is requested, and prior to its release by the Secretary. Total recovery of ALTSCs from AWBA cannot exceed 100,000 AF annually, due to a limitation defined under Arizona state law. When water is released from storage, Arizona or MWD will be required to reduce its consumptive use through the development of ICUA in an amount equal to Nevada's requested release. Nevada will be allowed to utilize the unused apportionment in an amount equal to the ICUA made available.

[4] ALTSCs are the cumulative monthly sum of verified or estimated LTSCs.

[5] In 2004, MWD, SNWA, and the Secretary entered into a SIRA to allow MWD to divert and store water for the benefit of SNWA. When storage occurs, it must be Nevada unused apportionment, which will require Nevada to reduce its consumptive use by an amount equal to the total storage. When water is released from storage, MWD will be required to reduce its consumptive use through the development of ICUA in an amount equal to Nevada's requested release and Nevada will be allowed to utilize the unused apportionment in an amount equal to the ICUA made available by MWD.

[6] This cumulative balance includes both the BOY ALTSC balance as verified by AWBA and MWD and the verified LTSCs placed into storage during the reporting year.

INADVERTENT OVERRUNS AND PAYBACKS WITHIN THE STATES OF ARIZONA, CALIFORNIA, AND NEVADA

On October 10, 2003, the Secretary of the Interior executed the Colorado River Water Delivery Agreement authorizing the Inadvertent Overrun and Payback Policy (IOPP). The policy is set forth in the *Record of Decision, Colorado River Water Delivery Agreement, Implementation Agreement, Inadvertent Overrun and Payback Policy, and Related Federal Actions, Final Environmental Impact Statement,* published in the *Federal Register* at 69 Fed. Reg. 12202 (March 15, 2004). Effective January 1, 2004, the IOPP, which applies only to Colorado River water users in the Lower Division States, defines inadvertent overruns, establishes procedures to account for inadvertent overruns, and sets forth the requirements for payback of inadvertent overruns to the Colorado River system.

For various reasons, a user may inadvertently divert, pump or receive Colorado River water in an amount that exceeds that to which the user is entitled for that year pursuant to the user's water delivery contract, decreed water right, or Secretarial reservation (inadvertent overrun).

In accordance with the IOPP, paybacks are required to commence in the calendar year that immediately follows the release date of the final Water Accounting Report that reports the overrun. Section 2.6 of the IOPP sets forth the number of years within which an overrun must be paid back and the minimum payback required for each year. Overruns are not allowed in a year for which the Secretary has declared a Shortage condition.

The tabulations in Tables 13 through 15 document information associated with inadvertent overruns and paybacks, as applicable, for each individual water user, including:

1) The beginning-of-year overrun account balance.
2) The amount of overrun incurred in the reporting year.
3) The amount of validated paybacks made to the Colorado River system in the reporting year.
4) The end-of-year overrun balance.

Table 13. State of Arizona - Overruns, Paybacks, and Overrun Account Balances, Calendar Year 2017. (Values are in acre-feet.)

WATER USER	DETAILS	ANNUAL TOTALS		APPROVAL	ENTITLEMENT
		DIVERSION	CONSUMPTIVE USE		
No overruns or paybacks occurred within the State of Arizona in the reporting year.					

Table 14. State of California - Overruns, Paybacks, and Overrun Account Balances, Calendar Year 2017. (Values are in acre-feet.)

WATER USER	DETAILS	ANNUAL TOTALS DIVERSION	ANNUAL TOTALS CONSUMPTIVE USE	APPROVAL	ENTITLEMENT
No overruns or paybacks occurred within the State of California in the reporting year.					

Table 15. State of Nevada - Overruns, Paybacks, and Overrun Account Balances, Calendar Year 2017. (Values are in acre-feet.)

WATER USER	DETAILS	ANNUAL TOTALS		APPROVAL	ENTITLEMENT
		DIVERSION	CONSUMPTIVE USE		
No overruns or paybacks occurred within the State of Nevada in the reporting year.					

LOWER COLORADO WATER SUPPLY PROJECT

The Lower Colorado Water Supply Act (Act), Public Law 99-655, Nov. 14, 1986, authorized the Secretary of the Interior (Secretary) to construct, operate, and maintain the Lower Colorado Water Supply Project (LCWSP). Pursuant to the Act, the Secretary is authorized to enter into exchange contracts and contracts for the care, operation, and maintenance of all or any part of the project works, subject to such rules and regulations as the Secretary may prescribe. Reclamation assumed the care, operation, and maintenance of the LCWSP in 2013.

Any contracts executed by the Secretary to recover the costs of the LCWSP must be with persons, or Federal or non-Federal governmental entities whose lands or interests in lands are located adjacent to the Colorado River in the State of California who do not hold rights to Colorado River water or whose rights are insufficient to meet their present or anticipated future domestic, municipal, industrial, and recreational needs, as determined by the Secretary. Water for agricultural use is not authorized under the Act.

The Act authorized construction of wells with a total annual capacity of 10,000 acre-feet. Stage I of the LCWSP has been completed and consists of two wells located south of the All-American Canal (AAC) in Imperial County having a total design capacity of 5,000 acre-feet. The wells, which became operational as of August 1, 2003, pump groundwater and discharge it into the AAC for use by the Imperial Irrigation District (IID). IID then forbears the use of an equal amount of Colorado River water.

In September 1992, Reclamation entered into a contract to supply LCWSP water to the City of Needles (Needles) in annual amounts up to 3,500 acre-feet of the initial capacity. Pursuant to that contract, Needles enters into sub-contracts for delivery of LCWSP water to non-Federal water users in San Bernardino, Riverside, and Imperial Counties. The Colorado River Board of California (CRBC) receives and reviews applications for LCWSP sub-contracts, and makes recommendations to Reclamation. Reclamation reviews CRBC's recommendations and refers approved applicants to Needles for execution of subcontracts.

In September 1998, the Bureau of Land Management (BLM) was allocated 1,150 acre feet of Stage I capacity for consumptive use on BLM administered lands in California located adjacent to the Colorado River. In December 2004, a Reclamation determination reserved an additional 350 acre-feet of Stage I capacity of the LCWSP for use by Reclamation facilities in California on land adjacent to the Colorado River. With that determination, the estimated 5,000 acre-feet per year of Stage I capacity was completely allocated.

The Act, as amended in 2005 by Public Law 109-103, authorized the Secretary to enter into agreements for the design and construction of the remaining stages of the LCWSP. Additionally, it authorized contracts with persons or entities holding water delivery contracts under Section 5 of the Boulder Canyon Project Act of 1928 for municipal and industrial uses within the State of California. On March 26, 2007, Reclamation entered into a contract with Needles and The Metropolitan Water District of Southern California (MWD), allowing MWD to receive as much unused water as available. MWD is depositing certain monies in a Water Quality Maintenance Trust Fund (Trust Fund) to provide for the long-term viability of the LCWSP or its replacement.

In 2010, development began for Stage II of the LCWSP to provide the remaining authorized capacity of up to 5,000 acre-feet per year. In 2013, following the initial planning and environmental compliance phase, Needles and Reclamation entered into a design, acquisition, and construction agreement, funded by the Trust Fund. Two new wells were constructed in 2017. LCWSP-3 and LCWSP-4 began well-development pumping in December 2017 and November 2017, respectively. The well development period for the new wells was completed in early 2018, with completion of all LCWSP construction activities by the end of 2018. The LCWSP will produce the entire 10,000 acre-feet beginning in 2018.

Table 16. Summary of Uses Offset by Pumpage from the LCWSP, Calendar Year 2017. (Values are in acre-feet.)

		TOTALS
LCWSP Wellfield Pumpage [1]		7,377
Federal LCWSP Contractors [2]		
BLM	Consumptive Use	233
Bureau of Reclamation - Parker Dam and Government Camp	Consumptive Use	1
	Total Federal Contractors' Consumptive Use	234
Non-Federal LCWSP Contractors [3]		
City of Needles	Consumptive Use	13
Needles' Subcontractors		
Southern California Gas Company	Consumptive Use	16
Pacific Gas & Electric Company	Consumptive Use	50
Havasu Water Company	Consumptive Use	20
Vista del Lago	Consumptive Use	15
Needles' Other Subcontractors	Consumptive Use	178
	Needles' and Subcontractors' Consumptive Use	292
LCWSP Water Available to MWD [4]		6,851
	Total Non-Federal Contractors' Consumptive Use	7,143

Footnotes:

[1] Non-Colorado River water pumped from the LCWSP wellfield and delivered to IID for its use via the AAC. IID forbears the consumptive use of this amount from the Colorado River to make water available for exchange to the LCWSP beneficiaries.

[2] Total LCWSP Federal contractors' consumptive use. Colorado River water used was exchanged for LCWSP water.

[3] Total LCWSP Non-Federal consumptive use by the City of Needles and its subcontractors. Colorado River water used was exchanged for LCWSP water.

[4] Total amount of water pumped from the wellfield less consumptive use of LCWSP water by Federal and Non-Federal LCWSP contractors.

CONSERVATION, TRANSFERS, AND EXCHANGES

Colorado River water apportioned to the Lower Division States has been further apportioned among the states of Arizona, California, and Nevada and is generally committed to specific persons or entities on a permanent basis. Increasing water demands within the Lower Division States must be met through a combination of conservation, transfers, exchanges, or new water sources which augment the limited supply of Colorado River water.

On October 10, 2003, the Secretary of the Interior entered into the Colorado River Water Delivery Agreement (CRWDA) with Imperial Irrigation District, Coachella Valley Water District, the Metropolitan Water District of Southern California, and the San Diego County Water Authority to resolve longstanding disputes regarding the priority, use, and transfer of Colorado River water within California. The CRWDA recognizes a variety of water transfers, exchanges, and conservation programs which alter the delivery of certain Colorado River water for up to 75 years.

Concurrent with the CRWDA, the California agencies entered into the Quantification Settlement Agreement, including a series of supplemental agreements, which collectively implement many provisions of the CRWDA through water transfers, water exchanges, and water conservation measures. Data as a result of the implementation of these agreements are documented in this section.

Tables 17 through 19 entitled "State of (State) Transfers, Exchanges and Water Made Available by Extraordinary Conservation, Calendar Year 2017" tabulate these transactions reported within Arizona, California, and Nevada.

For California, the tabulation documents, by agreement, conservation outside of the CRWDA or in amounts that differ from those displayed in Exhibit B of the CRWDA.

For Arizona, California, Nevada the tabulation includes System Conservation Water created in 2017 under the Pilot System Conservation Program (PSCP). Under the PSCP, System Conservation Water, conserved through the voluntary implementation of extraordinary conservation pilot projects, remained in Lake Mead to benefit system storage.

Table 20 entitled "Bureau of Reclamation – Water Made Available by Conservation, Calendar Year 2017" documents water made available by Reclamation through conservation efforts. These include:

1) Groundwater introduced to the system by pumping certain wells in the Yuma area that discharge to the Colorado River via the Yuma Mesa Conduit.
2) Water stored in Warren H. Brock Reservoir.
3) Water discharged to the Colorado River as a result of the operation of the Yuma Desalting Plant.
4) Water conserved by the Gila River Indian Community pursuant to SCIA No. 17-XX-30-W0621 and Agreement No. 17-XX-30-W0623.
5) Water provided to the United States pursuant to Agreement No. 12-XX-30-W0565 (2012 Contributed Funds Agreement[1]).

Table 21 entitled "Exhibit B to the Colorado River Water Delivery Agreement" is reproduced from the CRWDA for convenient reference.

[1] Referring to the *Agreement Among the United States of America, Through the Department of the Interior, Bureau of Reclamation, The Metropolitan Water District of Southern California, the Colorado River Commission of Nevada, the Southern Nevada Water Authority, and the Central Arizona Water Conservation District, for a Pilot Program for the Conversion of Intentionally Created Mexican Allocation to Intentionally Created Surplus.*

Table 17. State of Arizona - Transfers, Exchanges, and Water Made Available by Extraordinary Conservation, Calendar Year 2017. (Values are in acre-feet.)

PROGRAM OR PARTICIPATING AGENCIES	TOTAL
Pilot System Conservation Program (PSCP) [1]	
City of Bullhead City [2]	40
Colorado River Indian Tribes [3]	8,572
Tohono O'odham Nation [4]	10,080

Footnotes:

[1] Water conserved from projects implemented pursuant to System Conservation Implementation Agreements (SCIA), executed in accordance with the July 30, 2014, *Agreement Among The United States of America, Through The Department of the Interior, Bureau of Reclamation, The Central Arizona Water Conservation District, The Metropolitan Water District of Southern California, Denver Water, and The Southern Nevada Water Authority, For A Pilot Program for Funding the Creation of Colorado River System Water through Voluntary Water Conservation and Reductions in Use* , as amended August 12, 2015 and March 8, 2016. Water conserved from projects implemented under the PSCP is for the sole purpose of increasing storage levels in Lake Mead and Lake Powell and will not accrue to the benefit or use of any individual water user.

[2] In 2015, Reclamation and the City of Bullhead City (City) entered into SCIA No. 15-XX-30-W0587, as amended, under the PSCP in which the City agreed to construct wastewater injection wells to recover and inject into the Colorado River aquifer effluent that would otherwise be lost by evaporation and dedicate a portion of this water as System Conservation Water. In accordance with the SCIA and Letter Agreement No. 15-XX-30-W0588 between Reclamation and CAWCD, this System Conservation Water remained in Lake Mead to benefit system storage.

[3] In 2016, Reclamation and the Colorado River Indian Tribes (Tribes) entered into SCIA No. 16-XX-30-W0606 under the PSCP in which the Tribes agreed to fallow 1,591 acres of farmland from October 1, 2016 through September 30, 2018 to create System Conservation Water. In accordance with the SCIA and Letter Agreement No. 16-XX-30-W0608 between Reclamation and CAWCD, the portion of water conserved in 2017 (reflected above) remained in Lake Mead to benefit system storage.

[4] In 2016, Reclamation and the Tohono O'odham Nation (Nation) entered into SCIA No. 16-XX-30-W0609 under the PSCP in which the Nation agreed to reduce delivery of its CAP water entitlement by 10,080 AF in 2017 to create System Conservation Water. In accordance with the SCIA and Letter Agreement No. 16-XX-30-W0611 between Reclamation and CAWCD, this System Conservation Water remained in Lake Mead to benefit system storage.

Table 18. State of California - Transfers, Exchanges, and Water Made Available by Extraordinary Conservation, Calendar Year 2017. (Values are in acre-feet.)

PROGRAM OR PARTICIPATING AGENCIES	TOTAL
IID Conservation	
1988 IID/MWD Conservation Agreement [1]	105,000
MWD Reduction for CVWD use [2]	0
Transfer to SDCWA [3]	100,000
SDCWA Mitigation Transfer [4]	105,311
IID Intra-Priority 3 Transfer to CVWD [5]	45,000
Extraordinary Conservation Delivered to MWD [6,7]	23,555
PVID/MWD Forbearance and Fallowing Program [8]	119,379
MWD/Bard Water District Pilot Seasonal Fallowing Program [9]	2,310
All-American Canal Lining Project [10]	
SDCWA Exchange with MWD	56,200
Supplemental Water	11,500
Total Conservation	67,700
Coachella Canal Lining Project [11]	
SDCWA Exchange With MWD	23,126
Supplemental Water	4,500
Mitigation	3,224
Total Conservation	30,850
Total MWD Exchange with SDCWA [12]	179,326
Pilot System Conservation Program (PSCP) [13]	
City of Needles [14]	146
CVWD [15]	152

Note: Additional transfers and water exchange obligations may be found in Table 21, Exhibit B to the CRWDA.

Footnotes:

[1] 1988 IID/MWD Water Conservation Program conserved water, determined in accordance with the amended 1988 Program Agreement and the amended 1989 Approval Agreement, made available by IID for diversion in the reporting year by MWD, reported as an annual total.

[2] In accordance with the amended 1989 Approval Agreement, CVWD may request up to 20,000 AF of the water conserved by IID for MWD under the 1988 IID/MWD Water Conservation Agreement. MWD reduces its use by up to 20,000 AF of water conserved for use by CVWD, which is reflected in the displayed value above.

[3] As referenced in Column 5, Exhibit B, of the CRWDA, IID conserves water for transfer to SDCWA.

Footnotes continued on following page.

Table 18 Footnotes: Continued from previous page.

[4] As referenced in Column 7, Exhibit B, of the CRWDA and the IID/SDCWA Water Transfer Agreement, as amended, IID conserves water for transfer to SDCWA for delivery, by exchange from non-Colorado River sources, to the Salton Sea for mitigation purposes. As shown in Exhibit B, IID's 2017 Salton Sea mitigation requirement was 150,000 AF; however, in 2016 IID pre-delivered 44,689 AF of conserved water, created through fallowing, to the Sea for the stated purpose of reducing its 2017 mitigation balance to 105,311 AF (150,000 – 44,689 = 105,311). As reported above, in 2017, IID conserved 105,311 AF for mitigation purposes, but due to measurement imprecision and operational/infrastructure limitations–only delivered 105,155 AF to the Salton Sea, resulting in a 156 AF under-delivery. To fulfill its 2017 mitigation requirement, IID plans to deliver 156 AF of conserved water to the Salton Sea in 2018. Also, as first reported in the 2010 Water Accounting Report (and subsequent reports), in 2010 IID delivered 46,546 AF of Colorado River water to the Salton Sea with a stated intention to store the water for use for Salton Sea mitigation requirements in 2011 and half of 2012. IID did not conserve an equivalent amount of water in 2011 and 2012 for delivery to the Salton Sea resulting in a Colorado River system storage depletion of 46,546 AF. This matter is the subject of a series of letters between Reclamation and IID, including Reclamation's letter dated May 3, 2013; IID's letter dated June 28, 2013; and Reclamation's letter dated July 2, 2013, and currently remains under discussion between Reclamation and IID. Pursuant to the *Minute No. 319 Binational ICS Delivery Agreement* between the United States and IID, IID agrees to not request and Reclamation will not deliver to IID any Binational ICS available to IID under Minute No. 319 until this outstanding dispute has been resolved.

[5] IID conserves water under an acquisition agreement with CVWD to meet the IID/CVWD Intra-priority 3 Transfer obligation as referenced in Column 8, Exhibit B of the CRWDA.

[6] For informational purposes: Water conserved by IID through extraordinary conservation and delivered to MWD pursuant to the *California Agreement for the Creation and Delivery of Extraordinary Conservation Intentionally Created Surplus* , as amended.

[7] In the 2015 *Colorado River Accounting and Water Use Report* , the amount of "Extraordinary Conservation Delivered to MWD" was reported as 38,313 AF. As described in IID and MWD's joint letter dated April 18, 2018, this amount has been corrected to 45,477 AF (an increase of 7,164 AF).

[8] The provisional amount of PVID's annual reduction in agricultural consumptive use of Colorado River water through land fallowing as a result of fallowing 25,947 acres from January through July and 23,356 acres from August through December in the reporting year. This provisional amount is currently under review and the final amount will be reflected in a future *Colorado River Accounting and Water Use Report* based on values verified in the final report titled *Calendar Year 2017 Fallowed Land Verification Report, PVID/MWD Forbearance and Fallowing Program* .

[9] Bard Water District's seasonal reduction in consumptive use of Colorado River water through land fallowing. This value represents the preliminary estimate of the reduction in Bard Water District's consumptive use as a result of fallowing 752 acres from March 15 through July 15 and 889 acres from April 15 through August 15 in the reporting year.

[10] The Secretarial Determination of water conserved by lining certain reaches of the AAC was issued in December 2009 (see Significant Documents). As a result, conserved water was distributed in accordance with the Allocation Agreement among the United States, MWD, CVWD, IID, SDCWA, and the SLRSP, dated October 10, 2003 and Public Law 100-675, as amended.

[11] The Secretarial Determination of water conserved by the CCLP was issued in January 2008 (see Significant Documents). As a result, conserved water was distributed in accordance with the Allocation Agreement among the United States, MWD, CVWD, IID, SDCWA, and the SLRSP, dated October 10, 2003, Public Law 100-675, as amended, and Exhibit B to the Settlement Agreement between CVWD and SDCWA, dated October 30, 2007.

[12] The amount shown represents water exchanged between MWD and SDCWA in the reporting year. This is the sum of: IID Conservation - Transfer to SDCWA (100,000 AF), All-American Canal Lining Project - SDCWA Exchange with MWD (56,200 AF), and the Coachella Canal Lining Project - SDCWA Exchange with MWD (23,126 AF).

[13] Water conserved from projects implemented pursuant to System Conservation Implementation Agreements (SCIA), executed in accordance with the July 30, 2014, *Agreement Among The United States of America, Through The Department of the Interior, Bureau of Reclamation, The Central Arizona Water Conservation District, The Metropolitan Water District of Southern California, Denver Water, and The Southern Nevada Water Authority, For A Pilot Program for Funding the Creation of Colorado River System Water through Voluntary Water Conservation and Reductions in Use* , as amended August 12, 2015 and March 8, 2016. Water conserved from projects implemented under the PSCP is for the sole purpose of increasing storage levels in Lake Mead and Lake Powell and will not accrue to the benefit or use of any individual water user.

[14] In 2016, Reclamation and the City of Needles (Needles) entered into SCIA No. 15-XX-30-W0596 under the PSCP in which Needles agreed to implement water conservation measures on the Rivers Edge Golf Course to create System Conservation Water. In accordance with the SCIA, this System Conservation Water remained in Lake Mead to benefit system storage.

[15] In 2016, Reclamation and CVWD entered into SCIA No. 15-XX-30-W0593 under the PSCP in which CVWD agreed to establish a Furrow/Flood to Drip Conversion Rebate Program to create System Conservation Water. In accordance with the SCIA, this System Conservation Water remained in Lake Mead to benefit system storage.

Table 19. State of Nevada - Transfers, Exchanges, and Water Made Available by Extraordinary Conservation, Calendar Year 2017. (Values are in acre-feet.)

PROGRAM OR PARTICIPATING AGENCIES	TOTAL
Pilot System Conservation Program (PSCP) [1]	
SNWA [2]	744

Footnotes:

[1] Water conserved from projects implemented pursuant to System Conservation Implementation Agreements (SCIA), executed in accordance with the July 30, 2014, *Agreement Among The United States of America, Through The Department of the Interior, Bureau of Reclamation, The Central Arizona Water Conservation District, The Metropolitan Water District of Southern California, Denver Water, and The Southern Nevada Water Authority, For A Pilot Program for Funding the Creation of Colorado River System Water through Voluntary Water Conservation and Reductions in Use* , as amended August 12, 2015 and March 8, 2016. Water conserved from projects implemented under the PSCP is for the sole purpose of increasing storage levels in Lake Mead and Lake Powell and will not accrue to the benefit or use of any individual water user.

[2] In 2016, Reclamation and SNWA entered into SCIA No. 16-XX-30-W0612 under Phase II of the PSCP in which SNWA agreed to conserve up to 860 AF per year, from October 1, 2016 through September 30, 2019, of post-1929 Virgin River surface water rights to create System Conservation Water. In accordance with the SCIA, the portion of water conserved in 2017 remained in Lake Mead to benefit system storage. (Volume noted is provisional until verified by Reclamation.)

Table 20. Bureau of Reclamation - Water Made Available by Conservation, Calendar Year 2017. (Values are in acre-feet.)

CONSERVATION PROGRAM	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	TOTAL
Arizona Groundwater Permit [1]	0	0	0	0	0	0	0	0	0	0	0	0	0
Warren H. Brock Reservoir Storage [2]	4,907	15,612	15,705	12,788	11,157	9,144	9,634	6,403	0	0	13,359	17,641	116,350
Yuma Desalting Plant Discharge to the Colorado River [3]	8	16	21	2	0	18	18	18	18	18	18	15	170
Drought Response Conservation - Gila River Indian Community [4]													80,000
Pilot System Conservation Program [5]													19,734
System Water Provided to the U.S. Pursuant to the 2012 Contributed Funds Agreement [6]												29,000	29,000

Footnotes:

[1] In 2007, the Bureau of Reclamation was granted a permit to withdraw Arizona groundwater for return flow credits to offset bypass flows to Mexico. The values shown represent the return flow credits earned in accordance with the permit in the year covered by this report.

[2] Colorado River water stored in Warren H. Brock Reservoir. This total does not necessarily represent all new conservation or system efficiency gains by the reservoir. The difference between the value shown here and the amount shown in the California Article V(B) section, IID tabulation, "Delivery From Warren H. Brock Reservoir", consists of changes in reservoir storage and losses from the reservoir.

[3] Water created by operation of the Yuma Desalting Plant and discharged to the Colorado River.

[4] In 2017, Reclamation and the Gila River Indian Community (Community) entered into SCIA No. 17-XX-30-W0620, as was amended under Agreement No. 17-XX-30-W0623, in which the Community agreed to forego delivery of 80,000 AF of its CAP water entitlement in 2017. In accordance with the SCIA and Letter Agreement Nos. 17-XX-30-W0621 and 17-XX-30-W0624 between Reclamation and CAWCD, this water remained in Lake Mead to benefit system storage. This pilot project exhibited the need to develop a baseline for future conservation agreements.

[5] Water conserved from projects implemented pursuant to System Conservation Implementation Agreements (SCIA), executed in accordance with the July 30, 2014, *Agreement Among The United States of America, Through The Department of the Interior, Bureau of Reclamation, The Central Arizona Water Conservation District, The Metropolitan Water District of Southern California, Denver Water, and The Southern Nevada Water Authority, For A Pilot Program for Funding the Creation of Colorado River System Water through Voluntary Water Conservation and Reductions in Use* , as amended August 12, 2015 and March 8, 2016. Water conserved from projects implemented under the PSCP is for the sole purpose of increasing storage levels in Lake Mead and Lake Powell and will not accrue to the benefit or use of any individual water user. (Volume shown is the total amount of System Conservation Water conserved in 2017 from projects implemented in Arizona, California, and Nevada. See Tables 17, 18, and 19 for additional details.)

[6] The amount of system water credited to the United States pursuant to Agreement No. 12-XX-30-W0565, the *Agreement Among the United States of America, Through the Department of the Interior, Bureau of Reclamation, The Metropolitan Water District of Southern California, the Colorado River Commission of Nevada, the Southern Nevada Water Authority, and the Central Arizona Water Conservation District, for a Pilot Program for the Conversion of Intentionally Created Mexican Allocation to Intentionally Created Surplus.*

Table 21. Exhibit B to the Colorado River Water Delivery Agreement.

EXHIBIT B

QUANTIFICATION AND TRANSFERS[1]

In Thousands of Acre-feet

Column:	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23
			IID Priority 3a											CVWD Priority 3a									
				Reductions											Reductions			Additions					
	Calendar Year	[2]Priority 1, 2 and 3b	IID Priority 3a Quantified Amount	[3]IID Reduction : MWD 1988 Agreement Transfer	IID Reduction : SDCWA Transfer	[4]IID Reduction : AAC Lining IID, SDCWA & SLR	[5,6]IID Reduction : SDCWA Mitigation Transfer	[7]Intra-Priority 3 Transfer IID/CVWD	[6]IID Reduction: MWD Transfer with Salton Sea Restoration	[8]IID Reduction : Conditional ISG Backfill	[9]IID Reduction : Misc. PPRs	IID Reductions: Total Amount *(sum of columns 4 through 11)*	[10]IID Net Consumptive Use Amount *(difference between column 3 and column 12)*	CVWD Priority 3a Quantified Amount	[4]CVWD Reduction : CC Lining, SDCWA & SLR	[9]CVWD Reduction : Misc. PPRs	[11]CVWD Reductions: Total Amount *(sum of columns 15 + 16)*	[7]Intra-Priority 3 Transfer IID/CVWD	[3]Intra-Priority 3 Transfer MWD/CVWD	CVWD Net Consumptive Use Amount *(columns 14 - 17 plus columns 18 + 19)*	Total Priority 1-3 Use Plus PPR Consumptive Use *(sum of columns 2+13+20 plus 11+16)*	[12]ISG Benchmarks	[12]Annual Targets
1	2003	420	3,100	110	10	0	5	0	0	0	11.5	136.5	2,963.5	330	0	3	3	0	20	347	3,745.0	3,740	3,740
2	2004	420	3,100	110	20	0	10	0	0	0	11.5	151.5	2,948.5	330	0	3	3	0	20	347	3,730.0		3,707
3	2005	420	3,100	110	30	0	15	0	0	0	11.5	166.5	2,933.5	330	0	3	3	0	20	347	3,715.0		3,674
4	2006	420	3,100	110	40	0	20	0	0	9	11.5	190.5	2,909.5	330	26	3	29	0	20	321	3,665.0	3,640	3,640
5	2007	420	3,100	110	50	0	25	0	0	0	11.5	196.5	2,903.5	330	26	3	29	0	20	321	3,659.0		3,603
6	2008	420	3,100	110	50	67.7	25	4	20	0	11.5	288.2	2,811.8	330	26	3	29	4	20	325	3,571.3		3,566
7	2009	420	3,100	110	60	67.7	30	8	40	0	11.5	327.2	2,772.8	330	26	3	29	8	20	329	3,536.3	3,530	3,530
8	2010	420	3,100	110	70	67.7	35	12	60	0	11.5	366.2	2,733.8	330	26	3	29	12	20	333	3,501.3		3,510
9	2011	420	3,100	110	80	67.7	40	16	80	0	11.5	405.2	2,694.8	330	26	3	29	16	20	337	3,466.3		3,490
10	2012	420	3,100	110	90	67.7	45	21	100	0	11.5	445.2	2,654.8	330	26	3	29	21	20	342	3,431.3	3,470	3,470
11	2013	420	3,100	110	100	67.7	70	26	100	0	11.5	485.2	2,614.8	330	26	3	29	26	20	347	3,396.3		3,462
12	2014	420	3,100	110	100	67.7	90	31	100	0	11.5	510.2	2,589.8	330	26	3	29	31	20	352	3,376.3		3,455
13	2015	420	3,100	110	100	67.7	110	36	100	0	11.5	535.2	2,564.8	330	26	3	29	36	20	357	3,356.3		3,448
14	2016	420	3,100	110	100	67.7	130	41	100	0	11.5	560.2	2,539.8	330	26	3	29	41	20	362	3,336.3		3,440
15	2017	420	3,100	110	100	67.7	150	45	91	0	11.5	575.2	2,524.8	330	26	3	29	45	20	366	3,325.3		
16	2018	420	3,100	110	130	67.7	0	63	0	0	11.5	382.2	2,717.8	330	26	3	29	63	20	384	3,536.3		
17	2019	420	3,100	110	160	67.7	0	68	0	0	11.5	417.2	2,682.8	330	26	3	29	68	20	389	3,506.3		
18	2020	420	3,100	110	193	67.7	0	73	0	0	11.5	454.7	2,645.3	330	26	3	29	73	20	394	3,473.8		
19	2021	420	3,100	110	205	67.7	0	78	0	0	11.5	472.2	2,627.8	330	26	3	29	78	20	399	3,461.3		
20	2022	420	3,100	110	203	67.7	0	83	0	0	11.5	474.7	2,625.3	330	26	3	29	83	20	404	3,463.8		
21	2023	420	3,100	110	200	67.7	0	88	0	0	11.5	477.2	2,622.8	330	26	3	29	88	20	409	3,466.3		
22	2024	420	3,100	110	200	67.7	0	93	0	0	11.5	482.2	2,617.8	330	26	3	29	93	20	414	3,466.3		
23	2025	420	3,100	110	200	67.7	0	98	0	0	11.5	487.2	2,612.8	330	26	3	29	98	20	419	3,466.3		
24	2026	420	3,100	110	200	67.7	0	103	0	0	11.5	492.2	2,607.8	330	26	3	29	103	20	424	3,466.3		
25	2027	420	3,100	110	200	67.7	0	103	0	0	11.5	492.2	2,607.8	330	26	3	29	103	20	424	3,466.3		
26	2028	420	3,100	110	200	67.7	0	103	0	0	11.5	492.2	2,607.8	330	26	3	29	103	20	424	3,466.3		
	2029-2037	420	3,100	110	200	67.7	0	103	0	0	11.5	492.2	2,607.8	330	26	3	29	103	20	424	3,466.3		
	2038-2047[13]	420	3,100	110	200	67.7	0	103	0	0	11.5	492.2	2,607.8	330	26	3	29	103	20	424	3,466.3		
	2048-2077[14]	420	3,100	110	200	67.7	0	100	0	0	11.5	489.2	2,610.8	330	26	3	29	100	20	421	3,466.3		

1 Exhibit B is independent of increases and reductions as allowed under the Inadvertent Overrun and Payback Policy.

2 Any higher use covered by MWD, any lesser use will produce water for MWD and help satisfy ISG Benchmarks and Annual Targets.

3 IID/MWD 1988 Conservation Program conserves up to 110,000 AFY and the amount is based upon periodic verification. Of amount conserved, up to 20,000 AFY to CVWD (column 19), which does not count toward ISG Benchmarks and Annual Targets, and remainder to MWD.

4 Ramp-up amounts may vary based upon construction progress, and final amounts will be determined by the Secretary pursuant to the Allocation Agreement.

5 Any amount identified in Exhibit B for mitigation purposes will only be from non-Colorado River sources and these amounts may be provided by exchange for Colorado River water.

6 Water would be transferred to MWD subject to satisfaction of certain conditions and to appropriate federal approvals. For informational purposes only, these transfers may also be subject to state approvals. Schedules are subject to adjustments with mutual consent. After 2006, these quantities will count toward the ISG Benchmarks (column 22) and Annual Targets (column 23) only if and to the extent that water is transferred into the Colorado River Aqueduct for use by MWD and/or SDCWA.

7 MWD can acquire if CVWD declines the water. Any water obtained by MWD will be counted as additional agricultural reduction to help satisfy the ISG Benchmarks and Annual Targets. MWD will provide CVWD 50,000 AFY of the 100,000 AFY starting in year 46.

8 IID has agreed to provide transfer amounts to meet the minimum ISG benchmarks, not to exceed a cumulative total of 145,000 AF. Maximum transfer amounts are 25,000 AF in 2006, 50,000 AF plus the unused amount from 2006 in 2009, and 70,000 AF plus the unused amounts from 2006 and 2009 in 2012. In addition to the maximum transfer amounts IID has also committed that no more than 72,500 AF of reduced inflow to the Salton Sea would result from these additional transfers.

9 Up to the amount shown, as agreed upon reduction to IID or CVWD to cover collectively the sum of individual Miscellaneous PPRs, federal reserved rights and decreed rights. This is a reduction that counts towards ISG Benchmarks and Annual Targets.

10 For purposes of Subparagraph 8(b)(2)(i) and (ii) and 8(c)(1) and (4) the Secretary will take into account: (i) the satisfaction of necessary conditions to certain transfers (columns 7 and 9) not within IID's control: (ii) the amounts of conserved water as determined, where such amounts may vary (columns 4, 6, 9 and 10); and (iii) with respect to column 7, reductions by IID will be considered in determining IID's compliance regardless of whether the conserved water is diverted into the Colorado River Aqueduct.

11 For purposes of Subparagraph 8(c)(1) and (4) the Secretary will take into account: (i) the satisfaction of necessary conditions to certain transfers (columns 15 and 16) not within CVWD's control; and (ii) the amounts of conserved water as determined, where such amounts may vary (column 15).

12 All-consumptive use of priorities 1 through 3 plus 14,500 AF of PPRs must be within 25,000 AF of the amount stated.

13 Assumes SDCWA does not elect termination in year 35.

14 Assumes SDCWA and IID mutually consent to renewal term of 30 years.

Notes:

Substitute transfers can be made provided the total volume of water to be transferred remains equal or greater than amounts shown consistent with applicable federal approvals.

The shaded columns represent amounts of water that may vary.

INTENTIONALLY CREATED SURPLUS

In 2006, Reclamation entered into letter agreements with the Imperial Irrigation District and the Metropolitan Water District of Southern California to implement a demonstration program for the development of Intentionally Created Surplus (ICS). In this program, ICS refers to a quantity of surplus water the Secretary may make available for release under Article II(B)(2) of the Consolidated Decree. The demonstration program covered calendars years 2006 – 2007 and required that ICS be created through extraordinary conservation measures.

On December 13, 2007, the Secretary of the Interior signed the *Record of Decision, Colorado River Interim Guidelines for Lower Basin Shortages and the Coordinated Operations for Lake Powell and Lake Mead* (2007 Interim Guidelines). Beginning in 2008, the creation of ICS is governed by the 2007 Interim Guidelines. Section 3, pages 38-43 of the 2007 Interim Guidelines contains the policies and guidelines concerning the categories of creation, delivery, and accounting for Intentionally Created Surplus.

Under the 2007 Interim Guidelines, ICS may be created by an approved water user using a variety of approved measures within the four established ICS categories: Extraordinary Conservation ICS, Tributary Conservation ICS, System Efficiency ICS, and Imported ICS. Also stipulated in the 2007 Interim Guidelines are the limitations as to the maximum quantities of ICS that may be created during each year, delivered in a year, and accumulated in a water user's ICS account.

The following conditions apply to ICS:

1) During the year of creation, and with the exception of System Efficiency ICS, there is a one-time deduction of 5 percent from the amount of ICS created which is dedicated to system storage to provide a collective storage benefit for Colorado River water users.
2) Beginning in the year after its creation, and with the exception of System Efficiency ICS, an annual evaporation loss of 3 percent is applied to the quantity of ICS remaining in an ICS account at the end of each year. This assessment is not applied during a shortage year.
3) If the Secretary releases Flood Control Surplus water, Extraordinary Conservation ICS accumulated in ICS accounts is reduced by the amount of the Flood Control Surplus on an acre-foot for acre-foot basis until no Extraordinary Conservation ICS remains.
4) If a water user has an overrun payback obligation, the water user must repay the obligation in full before it can request or receive delivery of ICS.

The Secretary is responsible for approving plans for the creation of ICS, modifications to those plans, and developing procedures to account for and verify ICS creation and delivery.

Table 22 documents information associated with ICS, as applicable, for each individual water user, including.

1) The beginning of year ICS account balance.
2) The amount of ICS created in the reporting year.
3) The amount of ICS delivered in the reporting year.
4) The end of year ICS account balance, after applying reductions for system assessment, IOPP payback, and evaporation, as appropriate.

Table 22. Intentionally Created Surplus by State, User, and ICS Type, Calendar Year 2017. (Values are in acre-feet.)

State/Water User	ICS Type	BOY Balance	Creation [1]	System Assessment [2]	IOPP Payback [3]	Delivery	Evaporation Loss [4]	EOY Balance [5]
Arizona								
CAWCD [6]	System Efficiency - Warren H. Brock	100,000	0	N/A	0	0	N/A	100,000
	System Efficiency - YDP Pilot Run	3,050	0	N/A	0	0	N/A	3,050
	Binational ICS [7]	0	23,750	N/A	0	0	N/A	23,750
							Total Arizona:	**126,800**
California								
MWD	Extraordinary Conservation [8,9]	67,643	315,649	15,782	0	0	2,029	365,481
	System Efficiency - Warren H. Brock [8]	65,000	0	N/A	0	0	N/A	65,000
	System Efficiency - YDP Pilot Run	24,397	0	N/A	0	0	N/A	24,397
	Binational ICS [7]	0	23,750	N/A	0	0	N/A	23,750
							Total MWD:	478,628
IID	Extraordinary Conservation	30,017	21,983	1,099	0	0	901	50,000
	Binational ICS [7,10]	0	23,750	N/A	0	0	N/A	23,750
							Total IID:	73,750
							Total California:	**552,378**
Nevada								
SNWA	Extraordinary Conservation converted from Tributary Conservation / Imported [11]	128,557	0	0	0	0	3,857	124,700
	Tributary Conservation	N/A	32,435	1,622	0	0	N/A	30,813
	Imported - Coyote Spring Valley	N/A	0	0	0	0	N/A	0
	System Efficiency - Warren H. Brock	400,000	0	N/A	0	0	N/A	400,000
	System Efficiency - YDP Pilot Run	3,050	0	N/A	0	0	N/A	3,050
	Binational ICS [7]	0	23,750	N/A	0	0	N/A	23,750
							Total Nevada:	**582,313**
							Total ICS stored in Lake Mead: EOY 2017	**1,261,491**

Footnotes:

[1] The amount of ICS created by the water user during the reporting year. Unless otherwise noted, all current year values displayed in this column are provisional until verified by Reclamation.

[2] In accordance with Section 3.B.2. of the 2007 Interim Guidelines, there shall be a one-time deduction of 5 percent from the amount of ICS in the year of creation. This system assessment shall result in additional system water in storage in Lake Mead.

[3] In accordance with Section 3.C.7 of the 2007 Interim Guidelines, if a contractor has an overrun payback obligation, the contractor must repay the overrun payback obligation in full before requesting or receiving delivery of ICS. If a contractor requests to use its ICS credits to pay back an overrun, the contractor's ICS account(s) shall be reduced by the amount of the payback prior to calculating the evaporation loss and the remaining ICS credits available to the contractor.

[4] In accordance with Section 3.B.7 of the 2007 Interim Guidelines, a 3 percent evaporation loss shall be applied annually to the EOY balance of Extraordinary Conservation ICS beginning in the year after the ICS is created and continuing until no Extraordinary Conservation ICS remains in Lake Mead.

[5] The EOY balance of ICS including creation, reductions, and delivery taking place in the reporting year.

[6] As reflected in Table 11 of the 2015 and 2016 *Colorado River Accounting and Water Use Report* , CAWCD notified Reclamation that it anticipated creating up to 96,000 AF of Extraordinary Conservation ICS in 2015 and 98,922 AF of Extraordinary Conservation ICS in 2016, and provided Reclamation with information to support such creation. In accordance with the 2007 Interim Guidelines, creation of ICS is predicated upon the execution of an exhbit to the 2007 *Lower Colorado Basin Intentionally Created Surplus Forbearance Agreement* and a Delivery Agreement, and approval of an ICS Plan of Creation. As of the date of this report, these requirements have not been completed. Any ICS credited to CAWCD will be reflected in a future *Colorado River Accounting and Water Use Report* .

[7] The amount of Binational ICS credited pursuant to Agreement No. 12-XX-30-W0565, the *Agreement Among the United States of America, Through the Department of the Interior, Bureau of Reclamation, The Metropolitan Water District of Southern California, the Colorado River Commission of Nevada, the Southern Nevada Water Authority, and the Central Arizona Water Conservation District, for a Pilot Program for the Conversion of Intentionally Created Mexican Allocation to Intentionally Created Surplus* , as modified by Section 4.6 of the *Interim Operating Agreement for Implementation of Minute No. 323* .

Footnotes continued on following page.

Table 22 footnotes: Continued from previous page.

[8] MWD's Extraordinary Conservation and System Efficiency ICS BOY Balances reflect an upward adjustment in the amount of 62,999 AF and 8,992 AF, respectively, to correct for an accounting error related to the Palo Verde Ecological Reserve (PVER) conservation area for the period 2006-2015. For additional information, see Significant Documents item number 37.

[9] In addition to MWD's ICS creation, IID and MWD propose to credit an additional 35,399 AF of IID's excess conservation to MWD's ICS account through the application of Section XI.G.3.B.8 of the 2007 Interim Guidelines, subject to Section XI.G.7.B.5. This proposal is currently under review. Once verified by Reclamation, MWD's 2017 ICS creation total would be adjusted accordingly.

[10] Pursuant to the *Minute No. 319 Binational ICS Delivery Agreement between the United States and IID* , IID agrees to not request and Reclamation will not deliver to IID any Binational ICS available to IID under Minute No. 319 until the outstanding dispute regarding Salton Sea conservation and mitigation has been resolved.

[11] The verified amount of Tributary Conservation ICS created by SNWA in 2016 is 25,077 AF. This is revised from the provisonal amount of 25,030 AF shown in the 2016 *Colorado River Accounting and Water Use Report* . After applying the 5 percent reduction for system assessment to the verified amount, the 2016 EOY Tributary Conservation ICS balance is 23,823 AF. In accordance with Section 3.A.2 of the Interim Guidelines, this amount was converted to Extraordinary Conservation ICS at the beginning of 2017.

DOCUMENTS AND LETTERS SIGNIFICANT TO THE DELIVERY OF AND ACCOUNTING FOR THE USE OF COLORADO RIVER WATER IN CALENDAR YEAR 2017

The table below includes agreements, letters, regulations and operating plans that impacted Reclamation's delivery of Colorado River water during calendar year 2017. These documents may be retrieved by clicking on the item in the electronic version of the report which is available on Reclamation's website: www.usbr.gov/lc/region/g4000/wtracct.html. These documents are best accessed using Microsoft's Internet Explorer. Acronyms used below are defined on the page of this report entitled, "Acronyms and Abbreviated Terms."

RECORDS OF DECISION	
1.	The Record of Decision for Colorado River Interim Guidelines for Lower Basin Shortages and the Coordinated Operations for Lake Powell and Lake Mead dated December 13, 2007. This document provides the framework used by the Secretary of the Interior for shortage, coordinated operation of Lake Powell and Lake Mead, and to encourage conservation, plan for shortages, implement closer coordination of operations of Lake Powell and Lake Mead, and preserve flexibility to deal with further challenges.
2.	The Record of Decision for the Colorado River Water Delivery Agreement: Implementation Agreement, Inadvertent Overrun and Payback Policy, and Related Federal Actions Final Environmental Impact Statement. The Water Delivery Agreement provides certainty regarding water entitlements that are necessary for continued effective implementation of the Secretary's responsibilities as Water Master on the lower Colorado River.

REPORTS	
3.	2017 Annual Operating Plan Executive Summary that outlines the criteria under which the Colorado River was operated during Calendar Year 2016 considering current and anticipated hydrologic conditions.

INTERIM DETERMINATIONS	
4.	The Secretary's Interim Determination for the amount of water conserved and the amount of water made available for allocation as a result of the Coachella Canal Lining Project, dated January 31, 2008.
5.	The Secretary's Interim Determination for the amount of water conserved and the amount of water made available for allocation as a result of the All-American Canal Lining Project, dated December 4, 2009.

DOCUMENTS AND LETTERS SIGNIFICANT TO THE DELIVERY OF AND ACCOUNTING FOR THE USE OF COLORADO RIVER WATER IN CALENDAR YEAR 2017

PILOT SYSTEM CONSERVATION PROGRAM	
6.	Agreement (No. 14-XX-30-W0574) Among The United States of America, Through The Department of the Interior, Bureau of Reclamation, The Central Arizona Water Conservation District, The Metropolitan Water District of Southern California, Denver Water, and The Southern Nevada Water Authority, For A Pilot Program for Funding the Creation of Colorado River System Water through Voluntary Water Conservation and Reductions in Use, dated July 30, 2014, including Amendment Nos. 1 and 2.
7.	System Conservation Implementation Agreement No. 15-XX-30-W0587 Between Reclamation and City of Bullhead City, Arizona to Implement a Pilot System Conservation Program, dated September 15, 2015.
8.	System Conservation Implementation Agreement No. 16-XX-30-W0606 Between Reclamation and the Colorado River Indian Tribes to Implement a Pilot System Conservation Program, dated September 14, 2016.
9.	System Conservation Implementation Agreement No. 16-XX-30-W0609 Between Reclamation and the Tohono O'odham Nation to Implement a Pilot System Conservation Program, dated September 14, 2016.
10.	System Conservation Implementation Agreement No. 15-XX-30-W0596 Between Reclamation and the City of Needles to Implement a Pilot System Conservation Program, dated April 15, 2016.
11.	System Conservation Implementation Agreement No. 15-XX-30-W0593 Between Reclamation and the Coachella Valley Water District to Implement a Pilot System Conservation Program, dated January 11, 2016.
12.	System Conservation Implementation Agreement No. 16-XX-30-W0612 Between Reclamation and the Southern Nevada Water Authority to Implement a Pilot System Conservation Program, dated October 17, 2016.

DROUGHT RESPONSE	
13.	System Conservation Implementation Agreement No. 17-XX-30-W0620 Between Reclamation and the Gila River Indian Community, dated January 18, 2017.
14.	Agreement No. 17-XX-30-W0623 Among Reclamation, the Arizona Department of Water Resources, the Gila River Indian Community, the City of Phoenix, and the Walton Family Foundation, Inc., to Fund the Creation of Colorado River System Water Through Voluntary Water Conservation and Reductions in Use During 2017, dated July 14, 2017.

INTENTIONALLY CREATED SURPLUS	
15.	Documents related to the creation, delivery, and accounting of IID's ICS, calendar year 2017.
16.	Documents related to the creation, delivery, and accounting of MWD's ICS, calendar year 2017.

DOCUMENTS AND LETTERS SIGNIFICANT TO THE DELIVERY OF AND ACCOUNTING FOR THE USE OF COLORADO RIVER WATER IN CALENDAR YEAR 2017

INTENTIONALLY CREATED SURPLUS	
17.	Documents related to the creation, delivery, and accounting of SNWA's ICS, calendar year 2017.
18.	Documents related to the creation, delivery, and accounting of CAWCD's ICS, calendar year 2017.

INTERSTATE WATER BANKING	
19.	43 CFR Part 414: Offstream Storage of Colorado River Water: Development and Release of Intentionally Created Unused Apportionment in the Lower Division States; Final Rule.
20.	Documents related to Colorado River water diverted and stored in Arizona by AWBA for the benefit of SNWA.
21.	Documents related to Colorado River water diverted and stored in California by MWD for the benefit of SNWA.

INADVERTENT OVERRUN AND PAYBACK POLICY	
22.	Inadvertent Overrun and Payback Policy, October 10, 2003.

COLORADO RIVER WATER DELIVERY AGREEMENT	
23.	Reclamation's letter to IID dated May 3, 2013, discussing transfer and payback issues due to the direct delivery of Colorado River water to the Salton Sea in 2010.
24.	IID's letter to Reclamation dated June 28, 2013, discussing its set of actions due to the direct delivery of Colorado River water to the Salton Sea in 2010.
25.	Reclamation's letter to IID dated July 2, 2013, discussing the transfer and payback issues due to the direct delivery of Colorado River water to the Salton Sea in 2010.
26.	CVWD's letter to Reclamation dated January 15, 2018, providing a final accounting for the amount of environmental mitigation water used in Calendar Year 2017 for the Coachella Canal Lining Project and the remaining water available for transfer to the SDCWA.

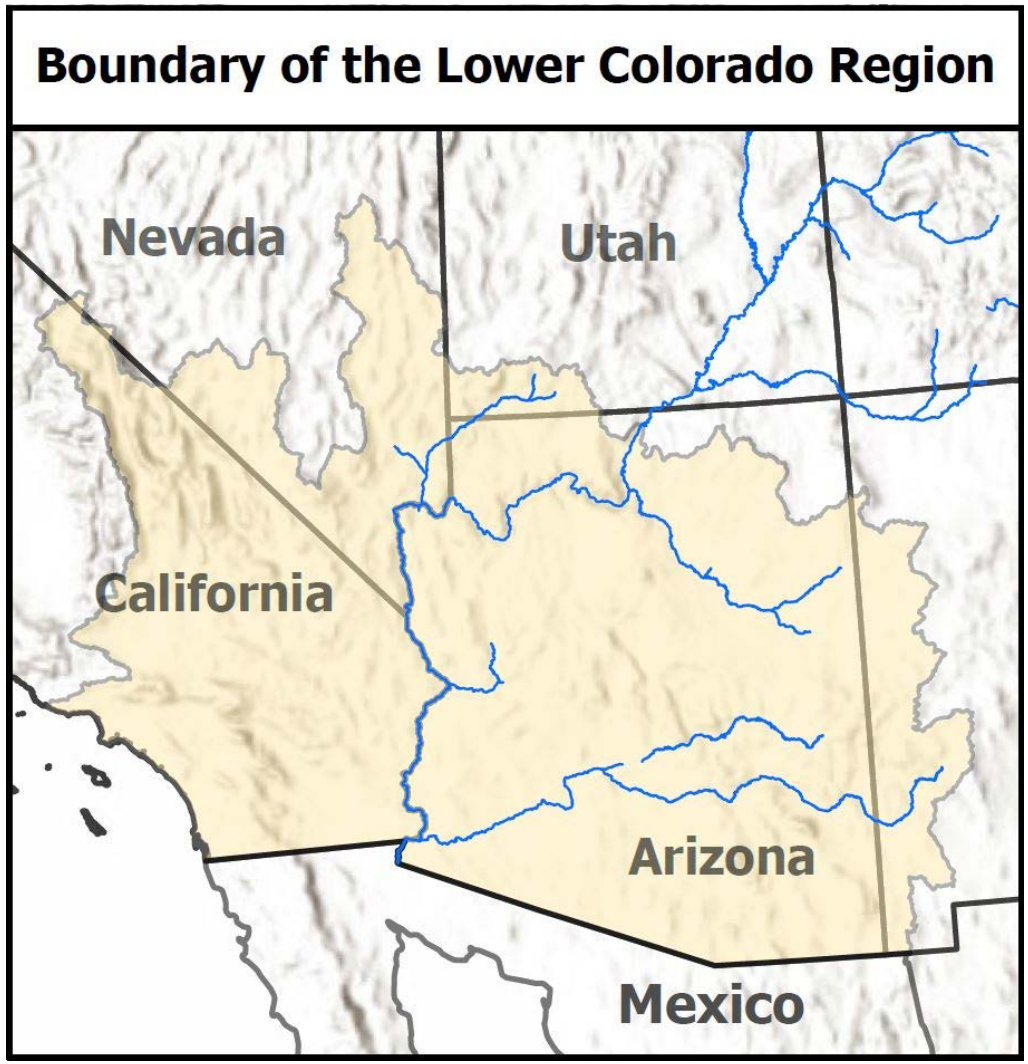
DOCUMENTS AND LETTERS SIGNIFICANT TO THE DELIVERY OF AND ACCOUNTING FOR THE USE OF COLORADO RIVER WATER IN CALENDAR YEAR 2017

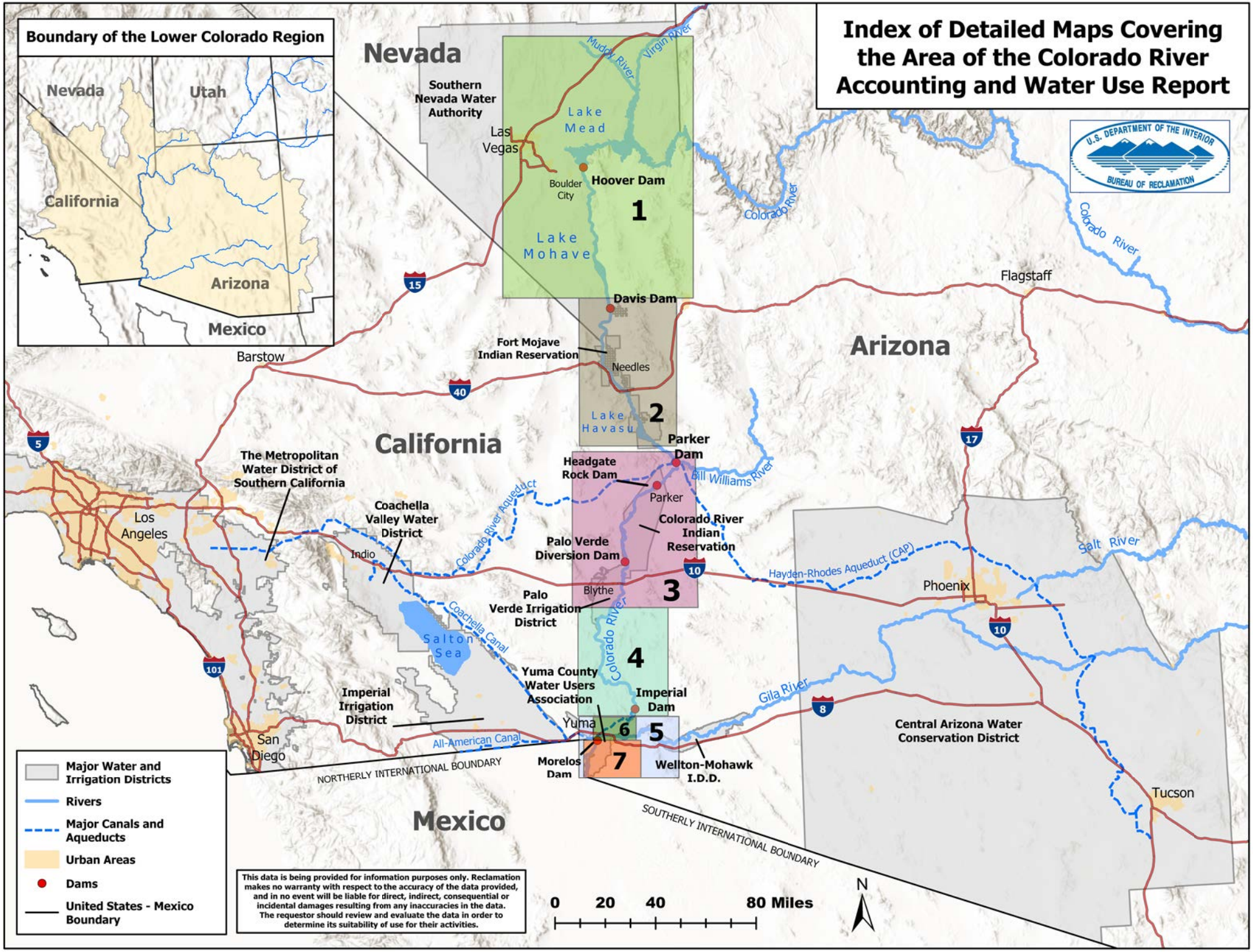
WATER ACCOUNTING	
27.	A description on how irrigation water is calculated by the USGS for areas where estimates of diversion are required.
28.	Maps showing the locations of the wells and river pumps reported by the USGS.
29.	CAWCD's letter to Reclamation dated June 28, 2017, regarding its revised estimates of Colorado River water diversion for calendar year 2017, in which CAWCD notified Reclamation that it anticipated leaving unused Arizona basic apportionment in Lake Mead to effect a voluntary contribution to benefit system storage.
30.	2007 California Agreement for the Creation and Delivery of Extraordinary Conservation Intentionally Created Surplus (California ICS Agreement).
31.	2015 Amendment No. 1 to the 2007 California ICS Agreement.
32.	IID's letter to MWD dated October 27, 2017, requesting to store up to 69,000 AF of IID's 2017 excess extraordinary conservation water in MWD's system.
33.	MWD's letter to IID dated November 28, 2017, in which MWD agreed to store up to 69,000 AF of IID's excess extraordinary conservation water in calendar year 2016.
34.	IID and MWD joint letter dated April 18, 2018, re: a 2015 IID Total Diversion to Field Loss Percentage Calculation Correction and Related Adjustment to IID's Excess and Additional Excess Extraordinary Conservation Intentionally Created Surplus Delivered to Metropolitan's System
35.	Procedure for Determining Return Flow Credits to Nevada from Las Vegas Wash, adopted by the Task Force on Unmeasured Return Flows on August 28, 1984.
36.	Reclamation letter to SNWA and CRCN dated December 5, 2007 regarding Las Vegas Valley Return Flow Credit Methodology.
37.	Technical Report: Calculation of Consumptive Use and Unmeasured Return Flow from the Palo Verde Ecological Reserve – Calendar Years 2006-2016.

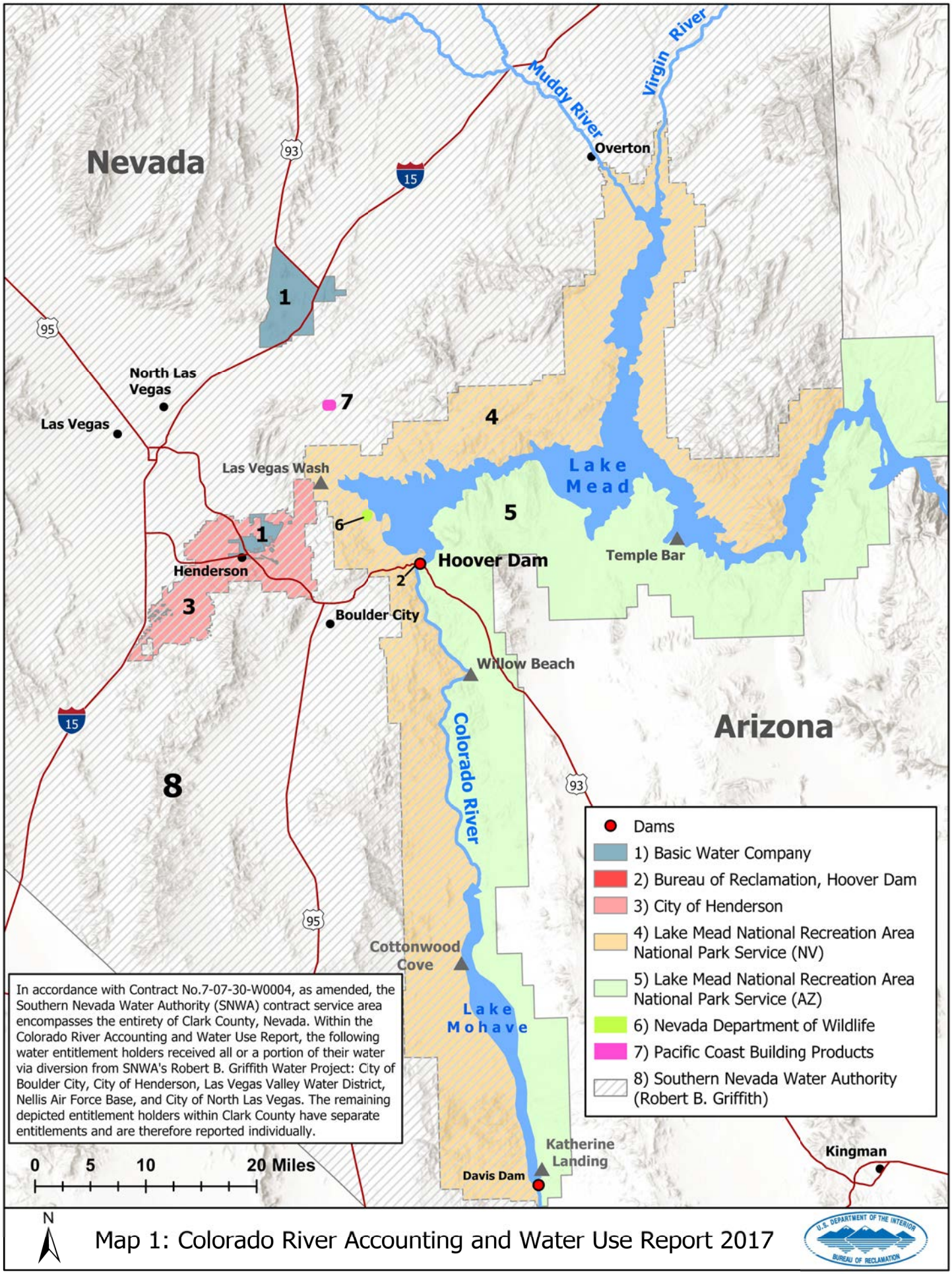
DOCUMENTS AND LETTERS SIGNIFICANT TO THE DELIVERY OF AND ACCOUNTING FOR THE USE OF COLORADO RIVER WATER IN CALENDAR YEAR 2017

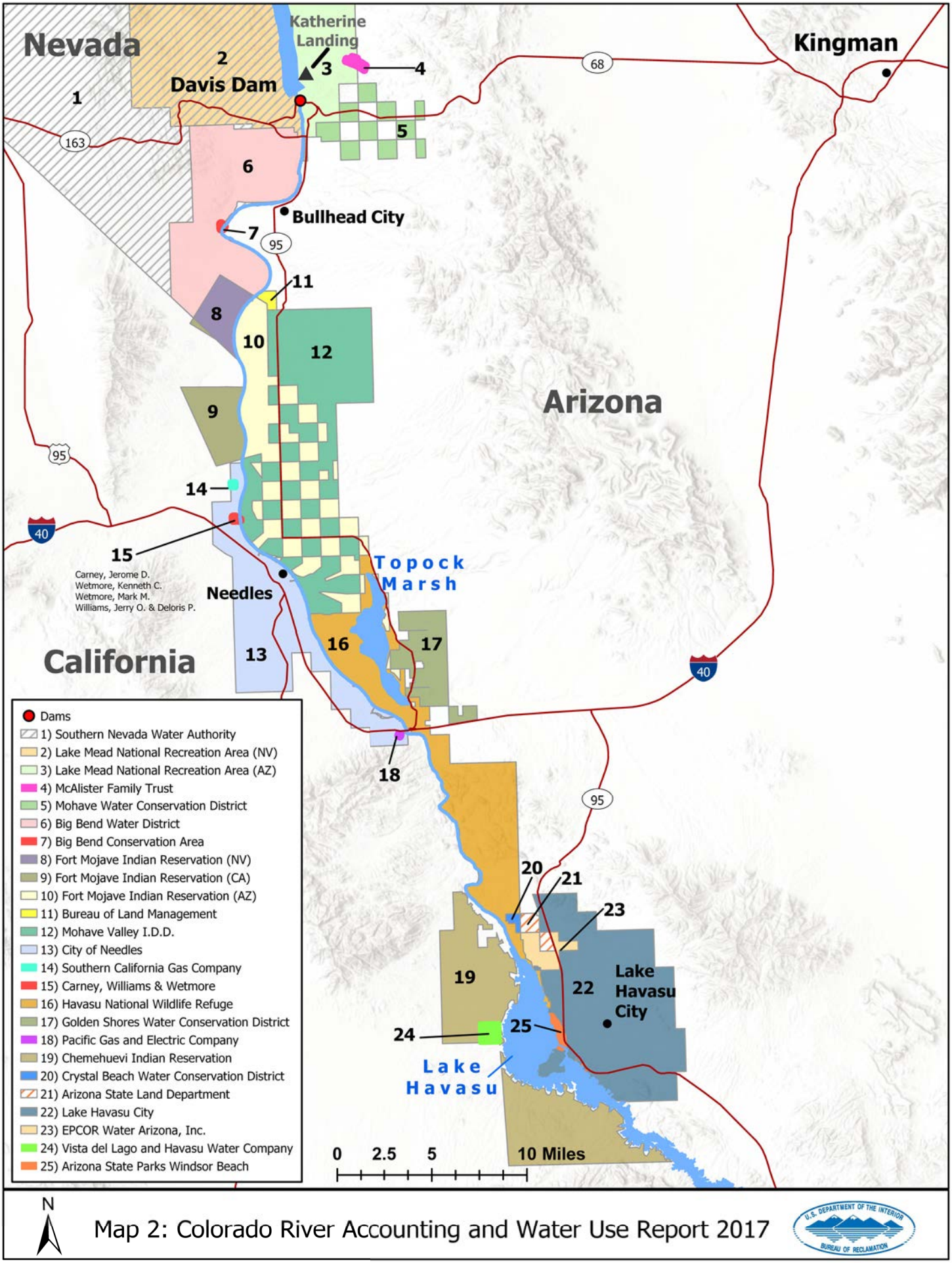
UNITED STATES-MEXICO 1944 WATER TREATY	
38.	Minute No. 242 – Permanent and Definitive Solution to the International Problem of the Salinity of the Colorado River.
39.	Minute No. 318 – Adjustment of Delivery Schedules for Water Allotted to Mexico for the Years 2010 Through 2013 as a Result of Infrastructure Damage in Irrigation District 014, Rio Colorado, Caused by the April 2010 Earthquake in the Mexicali Valley, Baja California.
40.	Minute No. 319 – Interim International Cooperative Measures in the Colorado River Basin Through 2017 and Extension of Minute 318 Cooperative Measures to Address the Continued Effects of the April 2010 Earthquake in the Mexicali Valley, Baja California.
41.	Minute No. 322 – Extension of the Temporary Emergency Delivery of Colorado River Water for use in Tijuana, Baja California
42.	Minute No. 323 – Extension of Cooperative Measures and Adoption of a Binational Water Scarcity Contingency Plan in the Colorado River Basin
43.	2001 Memorandum of Understanding between Reclamation and the U.S. Section of the IBWC regarding deliveries at SIB.
44.	USIBWC's Letter to Reclamation dated December 14, 2017, advising Reclamation of the implementation of Section III.6.e.iii of Minute No. 319.
45.	Reclamation's letter to USIBWC dated December 19, 2017, regarding the conversion of water pursuant to Section III.6.e.iii of Minute No. 319.
46.	USIBWC's letter to Reclamation dated April 26, 2018, advising Reclamation on the accounting of the volumes of Colorado River water deferred by Mexico in accordance with Minute Nos. 318, 319, and 323.
47.	Reclamation's letter to USIBWC dated May 11, 2018, stating its concurrence with the accounting of the volumes of Colorado River water deferred by Mexico.

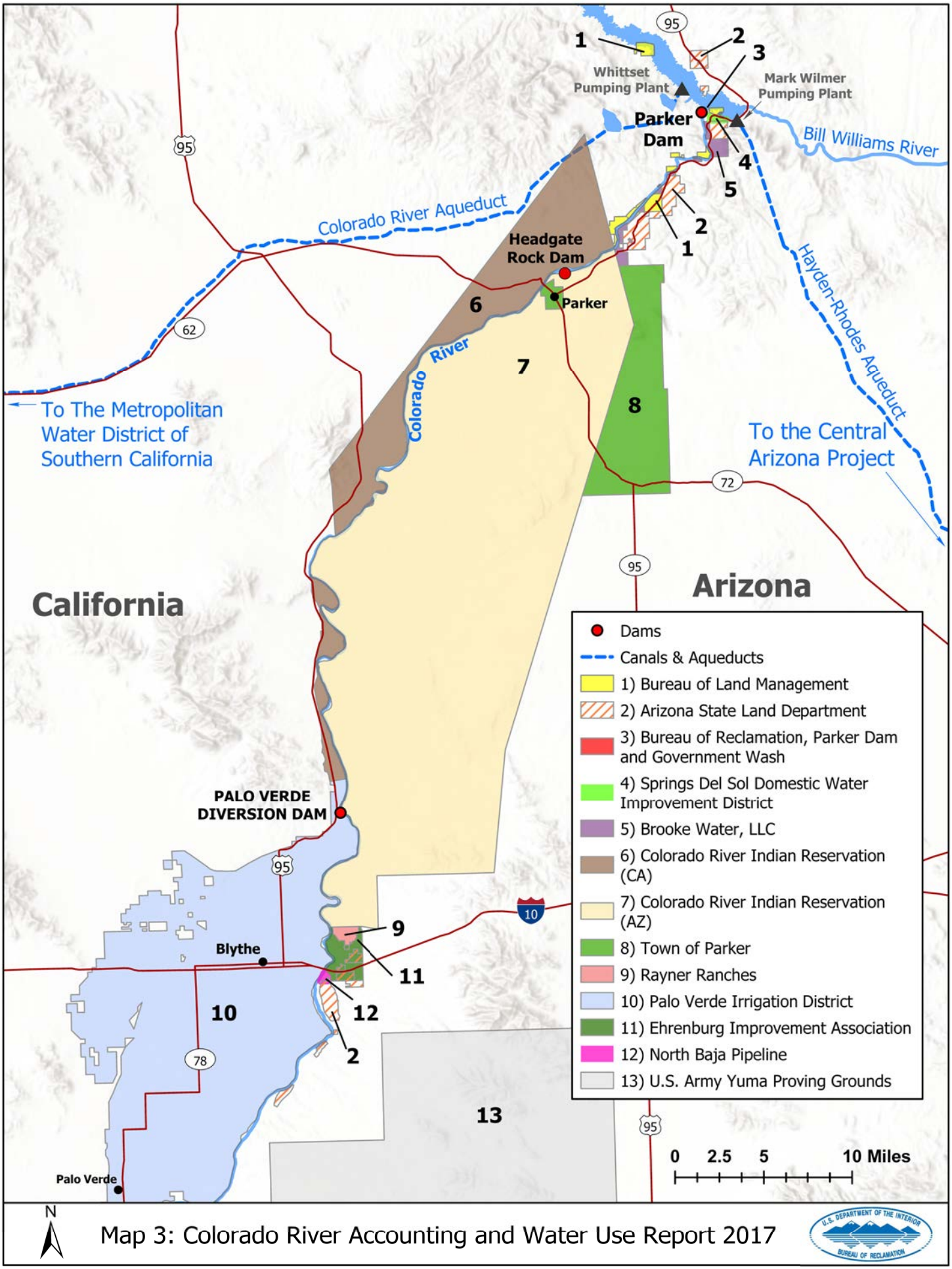
Maps Identifying the General Location of Lower Colorado River Water Users



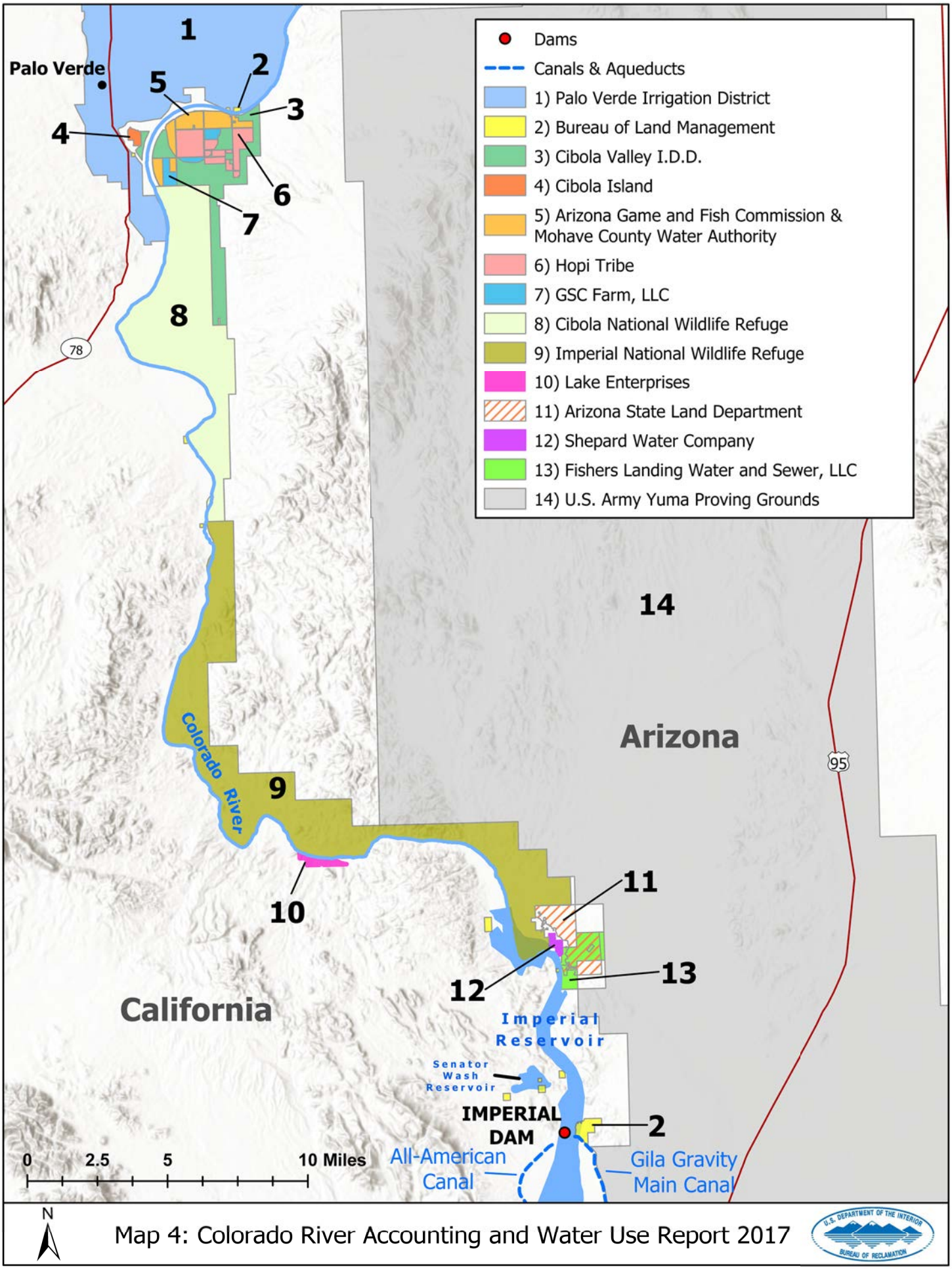

Index of Detailed Maps Covering the Area of the Colorado River Accounting and Water Use Report
Boundary of the Lower Colorado Region
Nevada
Utah
California
Arizona
Mexico
U.S. DEPARTMENT OF THE INTERIOR
BUREAU OF RECLAMATION
Nevada
Southern Nevada Water Authority
Las Vegas
Lake Mead
Muddy River
Virgin River
Boulder City
Hoover Dam
1
Lake Mohave
Colorado River
Davis Dam
Fort Mojave Indian Reservation
Needles
2
Lake Havasu
Barstow
Flagstaff
Arizona
California
Parker Dam
Headgate Rock Dam
Bill Williams River
Parker
Colorado River Indian Reservation
The Metropolitan Water District of Southern California
Coachella Valley Water District
Colorado River Aqueduct
Los Angeles
Indio
Palo Verde Diversion Dam
Hayden-Rhodes Aqueduct (CAP)
Salt River
Phoenix
Blythe
3
Palo Verde Irrigation District
Coachella Canal
Salton Sea
4
Colorado River
Yuma County Water Users Association
Imperial Dam
Imperial Irrigation District
Yuma
6
5
Gila River
Central Arizona Water Conservation District
All-American Canal
San Diego
Morelos Dam
7
Wellton-Mohawk I.D.D.
Tucson
NORTHERLY INTERNATIONAL BOUNDARY
SOUTHERLY INTERNATIONAL BOUNDARY
Mexico
Major Water and Irrigation Districts
Rivers
Major Canals and Aqueducts
Urban Areas
Dams
United States - Mexico Boundary
This data is being provided for infomation purposes only. Reclamation makes no warranty with respect to the accuracy of the data provided, and in no event will be liable for direct, indirect, consequential or incidental damages resulting from any inaccuracies in the data. The requestor should review and evaluate the data in order to determine its suitability of use for their activities.
0 20 40 80 Miles
N

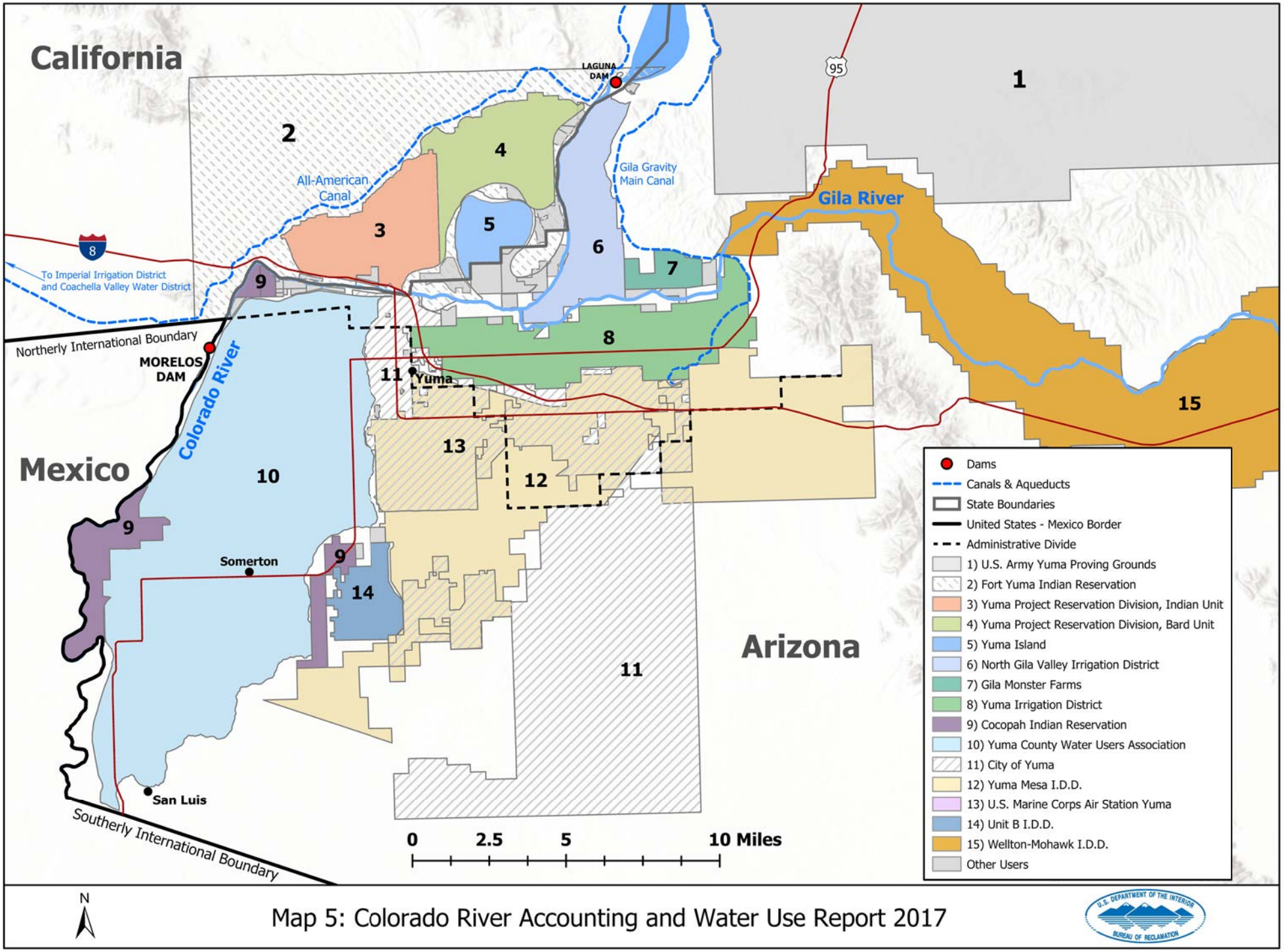

Nevada
Arizona
Muddy River
Virgin River
Overton
Lake Mead
North Las Vegas
Las Vegas
Las Vegas Wash
Henderson
Boulder City
Hoover Dam
Temple Bar
Willow Beach
Colorado River
Lake Mohave
Cottonwood Cove
Katherine Landing
Davis Dam
Kingman
1
2
3
4
5
6
7
8
93
15
95
0 5 10 20 Miles
N
Dams
1) Basic Water Company
2) Bureau of Reclamation, Hoover Dam
3) City of Henderson
4) Lake Mead National Recreation Area National Park Service (NV)
5) Lake Mead National Recreation Area National Park Service (AZ)
6) Nevada Department of Wildlife
7) Pacific Coast Building Products
8) Southern Nevada Water Authority (Robert B. Griffith)
In accordance with Contract No.7-07-30-W0004, as amended, the Southern Nevada Water Authority (SNWA) contract service area encompasses the entirety of Clark County, Nevada. Within the Colorado River Accounting and Water Use Report, the following water entitlement holders received all or a portion of their water via diversion from SNWA's Robert B. Griffith Water Project: City of Boulder City, City of Henderson, Las Vegas Valley Water District, Nellis Air Force Base, and City of North Las Vegas. The remaining depicted entitlement holders within Clark County have separate entitlements and are therefore reported individually.
Map 1: Colorado River Accounting and Water Use Report 2017
U.S. DEPARTMENT OF THE INTERIOR
BUREAU OF RECLAMATION


Nevada
Arizona
California
Katherine Landing
Davis Dam
Kingman
Bullhead City
Needles
Topock Marsh
Lake Havasu City
Lake Havasu
Carney, Jerome D.
Wetmore, Kenneth C.
Wetmore, Mark M.
Williams, Jerry O. & Deloris P.
Dams
1) Southern Nevada Water Authority
2) Lake Mead National Recreation Area (NV)
3) Lake Mead National Recreation Area (AZ)
4) McAlister Family Trust
5) Mohave Water Conservation District
6) Big Bend Water District
7) Big Bend Conservation Area
8) Fort Mojave Indian Reservation (NV)
9) Fort Mojave Indian Reservation (CA)
10) Fort Mojave Indian Reservation (AZ)
11) Bureau of Land Management
12) Mohave Valley I.D.D.
13) City of Needles
14) Southern California Gas Company
15) Carney, Williams & Wetmore
16) Havasu National Wildlife Refuge
17) Golden Shores Water Conservation District
18) Pacific Gas and Electric Company
19) Chemehuevi Indian Reservation
20) Crystal Beach Water Conservation District
21) Arizona State Land Department
22) Lake Havasu City
23) EPCOR Water Arizona, Inc.
24) Vista del Lago and Havasu Water Company
25) Arizona State Parks Windsor Beach
0 2.5 5 10 Miles
N
Map 2: Colorado River Accounting and Water Use Report 2017
U.S. DEPARTMENT OF THE INTERIOR
BUREAU OF RECLAMATION

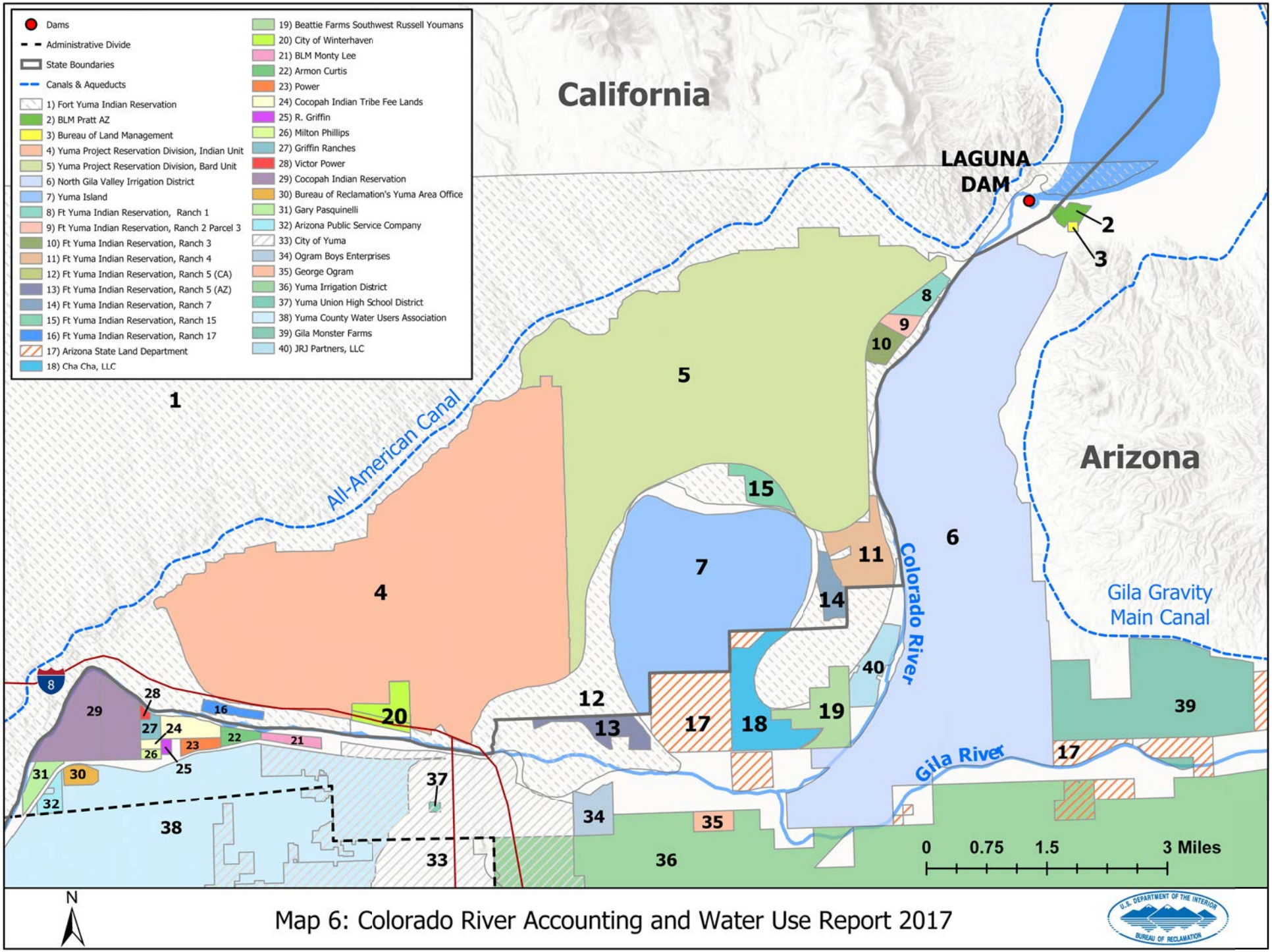


Map 3: Colorado River Accounting and Water Use Report 2017

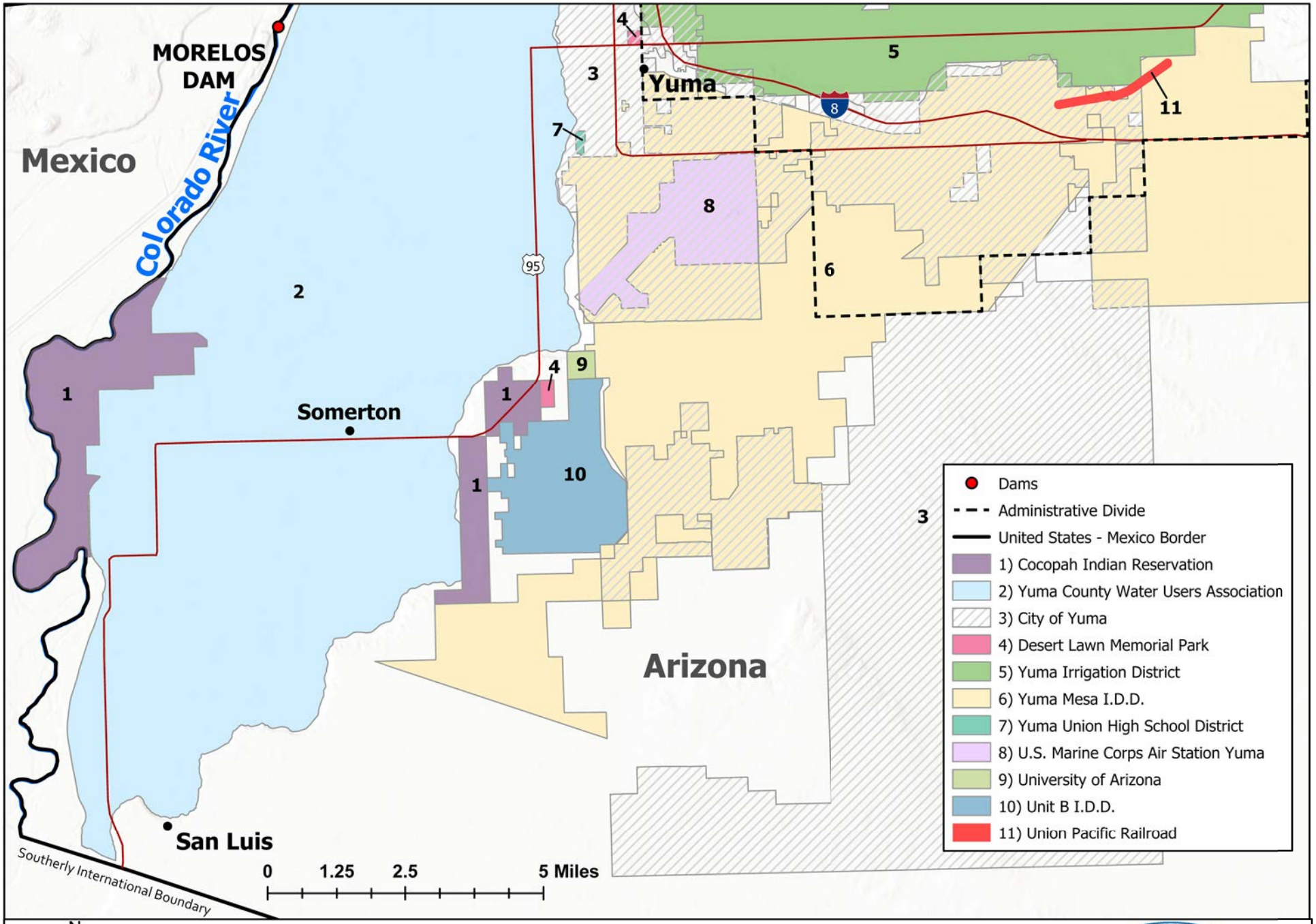

Dams
Canals & Aqueducts
1) Palo Verde Irrigation District
2) Bureau of Land Management
3) Cibola Valley I.D.D.
4) Cibola Island
5) Arizona Game and Fish Commission & Mohave County Water Authority
6) Hopi Tribe
7) GSC Farm, LLC
8) Cibola National Wildlife Refuge
9) Imperial National Wildlife Refuge
10) Lake Enterprises
11) Arizona State Land Department
12) Shepard Water Company
13) Fishers Landing Water and Sewer, LLC
14) U.S. Army Yuma Proving Grounds
Palo Verde
Arizona
California
Colorado River
Imperial Reservoir
Senator Wash Reservoir
IMPERIAL DAM
All-American Canal
Gila Gravity Main Canal
78
95
0 2.5 5 10 Miles
N
Map 4: Colorado River Accounting and Water Use Report 2017



Map 5: Colorado River Accounting and Water Use Report 2017



Map 6: Colorado River Accounting and Water Use Report 2017



Map 7: Colorado River Accounting and Water Use Report 2017