

ARIZONA WATER BANKING AUTHORITY

WEDNESDAY, JANUARY 21, 1998

ARIZONA DEPARTMENT OF WATER RESOURCES

PLEASE PRINT

1	NAME: ELIZABETH STORY REPRESENTING: TONOPAH IRRIGATION DISTRICT	BUSINESS ADDRESS: PO BOX 159 TONOPAH 85326	ARE YOU ALREADY ON OUR MAILING LIST?	TEL: 386-4066 FAX: E-MAIL:
2	NAME: SHIELA SCHMIDT REPRESENTING: JENNINGS, STROSS & SALMON	BUSINESS ADDRESS: 2 N. CENTRAL AVE PHOENIX 85004		TEL: 262-5879 FAX: 253-3255 E-MAIL:SSCHMIDT@JSSLAS.COM
3	NAME: MICHAEL BLOCK REPRESENTING: METRO WATER DISTRICT	BUSINESS ADDRESS: PO BOX 36870 TUCSON 85740`		TEL: 520-575-8100 FAX: 520-575-8454 E-MAIL:MBLOCK@METROWATER.COM
4	NAME: ROBERT BARRETT REPRESENTING: CAP	BUSINESS ADDRESS: 23636 N. 7TH ST. PHOENIX		TEL: 869-2135 FAX: 869-2735 E-MAIL:RBARRETT@CAP-AZ.COM
5	NAME: TOM HINE REPRESENTING: AZ POWER AUTHORITY	BUSINESS ADDRESS: 10632 N. 11TH ST PHOENIX 85020		TEL: 870-1828 FAX: 944-5425 E-MAIL:
6	NAME: J. JOHN MIHLIK REPRESENTING: WEST MARICOPA COMBINE, INC.	BUSINESS ADDRESS: 2198 E. CAMELBACK., #340 PHOENIX 85016		TEL: 224-0711 FAX: 224-5455 E-MAIL:

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7	NAME: HARRY RUZGERIAN REPRESENTING: MWD, SO. CALIFORNIA	BUSINESS ADDRESS:		TEL: 213-217-6082 FAX: E-MAIL:
8	NAME: DALE ENSMINGER REPRESENTING: BUREAU OF RECLAMATION	BUSINESS ADDRESS: BOULDER CITY, NV 89005	ARE YOU ALREADY ON OUR MAILING LIST?	TEL: 702-293-8659 FAX: 702-293-8041 E-MAIL:
9	NAME: LE GRAND NEILSON REPRESENTING: BUREAU OF RECLAMATION	BUSINESS ADDRESS::		TEL: 702-293-8411 FAX: E-MAIL:
10	NAME: G.L. EDWARDS REPRESENTING: CRC - NEV	BUSINESS ADDRESS: 555 E. WASHINGTON LAS VEGAS 89101		TEL: 702-486-2670 FAX: 702-486-2697 E-MAIL:
11	NAME: LARRY GEARE REPRESENTING: CIBOLA VALLEY IRRIG. DIST.	BUSINESS ADDRESS:		TEL: 483-9515 FAX: E-MAIL:
12	NAME: KAY BROTHERS REPRESENTING: SO. NEV. WATER AUTHORITY	BUSINESS ADDRESS 1001 S. VALLEY VIEW LAS VEGAS		TEL: 702-258-3176 FAX: E-MAIL:

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13	NAME: HAROLD GOODMAN REPRESENTING: CITY OF GLENDALE	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
14	NAME: AMBER HATHAWAY REPRESENTING: REP. BOB STUMP	BUSINESS ADDRESS 230 N. 1ST AVE. PHOENIX 85025		TEL: 379-6923 FAX: 271-0611 E-MAIL:
15	NAME: DON POPE REPRESENTING: YUMA COUNTY WATER USER'S ASSOC. & STUDY COMMISSION	BUSINESS ADDRESS	ARE YOU ALREADY ON OUR MAILING LIST?	TEL: FAX: E-MAIL:
16	NAME: BETH MILLER REPRESENTING: CITY OF MESA	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
17	NAME: DENNIS RULE REPRESENTING: CITY OF TUCSON	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
18	NAME: COLLEEN DEEGAN REPRESENTING: SNTR. JON KYL	BUSINESS ADDRESS 724 HART WASHINGTON, DC 20510		TEL: 202-224-4521 FAX: 202-224-2207 E-MAIL:

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19	NAME: JOHN HETRICK REPRESENTING: SRP	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
20	NAME: CYNTHIA HAGLIN REPRESENTING: CITY OF CHANDLER	BUSINESS ADDRESS 25 S. ARIZONA PL., ST 304 CHANDLER 85225		TEL: 786-2236 FAX: E-MAIL:
21	NAME: TIM PHILLIPS REPRESENTING: FLOOD CONTROL DISTRICT	BUSINESS ADDRESS		TEL: 506-4718 FAX: E-MAIL:
22	NAME: TOM JOHNSON REPRESENTING: FLOOD CONTROL DISTRICT, MARICOPA DISTRICT	BUSINESS ADDRESS 2801 W DURANGO PHOENIX	ARE YOU ALREADY ON OUR MAILING LIST?	TEL: 506-4703 FAX: E-MAIL:
23	NAME: PAUL ORME REPRESENTING: MSIDD/CAIDD	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
24	NAME: JAMES E. SWANSON REPRESENTING: CITY OF SURPRISE	BUSINESS ADDRESS		TEL: 546-5517 FAX: E-MAIL:
25	NAME: RAYMOND ROESSEL REPRESENTING: BUREAU OF INDIAN AFFAIRS	BUSINESS ADDRESS TWO ARIZONA CENTER 400 N. 5TH STREET PHOENIX 85004		TEL: 379-6789 FAX: E-MAIL:

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26	NAME: DANA WALKER REPRESENTING: PHELPS DODGE CORP	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
27	NAME: BILL ALLEN REPRESENTING: GOODYEAR	BUSINESS ADDRESS ASL HYDROLOGIC & ENGIN. SERVICES 1130 E. MISSOURI, STE 110 PHOENIX		TEL: FAX: E-MAIL:
28	NAME: PAT DESCHAMPS REPRESENTING: STANTECH CONSULTING	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
29	NAME: TONIA GARRETT REPRESENTING: ELLIS, BAKER & PORTER	BUSINESS ADDRESS	ARE YOU ALREADY ON OUR MAILING LIST?	TEL: FAX: E-MAIL:
30	NAME: BOB McCAIN REPRESENTING: AMWUA	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
31	NAME: LARRY DOZIER REPRESENTING: CAP	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
32	NAME: ROCK CRAMER REPRESENTING: VICKSBURG FARMS	BUSINESS ADDRESS		TEL: FAX: E-MAIL:

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33	NAME: FLOYD MARSH REPRESENTING: CITY OF SCOTTSDALE	BUSINESS ADDRESS 9388 E. SAN SALVADOR DR. SCOTTSDALE AZ 85258		TEL: 391-5683 FAX: 391-5615 E-MAIL: FMARSH@CITY.SCOTTSDALE.AZ.US
34	NAME: JIM SWEENEY REPRESENTING: MARICOPA WATER DISTRICT	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
35	NAME: CYNTHIA STEFANOVIC REPRESENTING: STATE LAND DEPT.	BUSINESS ADDRESS 1616 W. ADAMS PHOENIX 85007		TEL: 542-2669 FAX: 542-4668 E-MAIL:
36	NAME: JAY MOYES REPRESENTING: MEYER, HENDRICKS, BIVEN & MOYES	BUSINESS ADDRESS 3003 N. CENTRAL AVE. BOX 2199 PHOENIX 85001	ARE YOU ALREADY ON OUR MAILING LIST?	TEL: 604-2106 FAX: 263-5333 E-MAIL: JIMOYES@MHBM.ATT.NET.COM
37	NAME: KEVIN ADAM REPRESENTING: SENATOR JOHN McCAIN	BUSINESS ADDRESS 1839 S. ALMA SCHOOL., STE 375 MESA 85210		TEL: 491-4300 FAX: 491-9584 E-MAIL:
38	NAME: CHUCK CULLOM REPRESENTING: BOOKMAN-EDMONSTON	BUSINESS ADDRESS 302 N. 1ST AVE. PHOENIX 85003		TEL: FAX: E-MAIL:
39	NAME: JIM HARTDEGEN REPRESENTING:	BUSINESS ADDRESS		TEL: 929-4474 FAX: 929-4480 E-MAIL:

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40	NAME: JULIE LEMMON REPRESENTING: FLOOD CONTROL DISTRICT, MARICOPA COUNTY	BUSINESS ADDRESS 1805 N. SCOTTSDALE RD., ST#5 TEMPE 85281		TEL: 941-1126 FAX: 941-2551 E-MAIL: JMLEMMON@WORLDNET.ATT.NET
41	NAME: BILL SWAN REPRESENTING: IMPERIAL IRRIGATION DISTRICT	BUSINESS ADDRESS 6320 E. EXETER BLVD. SCOTTSDALE 85251		TEL: 941-5339 FAX: 941-8658 E-MAIL:
42	NAME: REPRESENTING:	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
43	NAME: REPRESENTING:	BUSINESS ADDRESS	ARE YOU ALREADY ON OUR MAILING LIST?	TEL: FAX: E-MAIL:
44	NAME: REPRESENTING:	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
45	NAME: REPRESENTING:	BUSINESS ADDRESS		TEL: FAX: E-MAIL:
46	NAME: REPRESENTING:	BUSINESS ADDRESS		TEL: FAX: E-MAIL:

Arizona Water Banking Authority
500 North Third Street, Phoenix, Arizona 85004
Telephone 602-417-2418
Fax 602-417-2401

FINAL AGENDA
Wednesday, January 21, 1998
9:30 a.m.

Arizona Department of Water Resources
Third floor conference room

- I. Welcome / Opening Remarks
- II. Adoption of Minutes of December 17 Meeting
- III. Discussion of the 1998 Annual Plan of Operation and Staff Activities
- IV. Discussion and Recommendation on Number of Credits to be Reserved for Outside CAP
- V. Proposed Update to the Storage Facility Inventory
- VI. Staff Presentation and Discussion of Federal Register Proposed Rule on Interstate Banking issued 12/31/97
- VII. Brief Discussion of Annual Report Process
- VIII. Update on Interstate Discussions
- IX. Call to the Public
- X. Adjournment

Future Meeting Dates:

Wednesday, February 18, 1998

Wednesday, March 18, 1998

Persons with a disability may request a reasonable accommodation, such as a sign language interpreter, by contacting the Arizona Water Banking Authority at (602) 417-2418 or (602) 417-2455 (T.D.). Requests should be made as early as possible to allow time to arrange the accommodation.

ARIZONA WATER BANKING AUTHORITY
Draft Minutes

December 17, 1997
Arizona Department of Water Resources



AUTHORITY MEMBERS
Rita P. Pearson, Chairman
Tom Griffin, Vice-Chairman
Bill Chase, Secretary
Grady Gammage, Jr.
Richard S. Walden

EX OFFICIO MEMBERS
Senator Pat Corner
Rep. Gail Griffin

Welcome / Opening Remarks

Chairman Pearson opened the Arizona Water Banking Authority meeting. All members of the Authority were present with the exception of Grady Gammage.

Adoption of Minutes of November 19 Meeting

The November 19 meeting minutes were adopted as submitted.

Update of 1997 Plan of Operation

Tim Henley stated that for the months of November and December there will not be a lot of activity. The Water Banking Authority (Bank) will have recharged approximately 330,000 af of water in 1997.

Discussion and approval of the 1998 Annual Plan of Operation

Mr. Henley stated that the draft 1998 Plan of Operation was presented at the GUAC meetings in Tucson, Pinal County and Phoenix. The Tucson GUAC was concerned that there still is not a lot of recharge in their area. The Tucson GUAC suggested that the Bank look at more groundwater savings. Tucson would like to see more recharge in their AMA, recognizing that direct facilities are hard to get started. Mr. Henley stated that his concern is whether the Bank has sufficient capacity to support their needs.

Tucson's Metro Water District (MWD) also submitted comments, which supported the concerns raised at the Tucson GUAC meeting. They would like to look at additional in lieu recharge and are concerned about the cost recovery factor.

Ms. Pearson requested that copies of the letters from the Tucson GUAC and MWD be made available to the Authority members for review.

Mr. Henley stated that SRP has agreed to recharge approximately 80,000 af at GRUSP. Consequently, the Bank may be able to recharge 360,000 - 370,000 af in 1998. The Bank's new irrigation district partner, Tonopah Irrigation District, will be recharging approximately 4,000 af for 1998.

Table 3 has been amended to show changes in cost, such as Avra Valley, which was originally \$22.00 af, and is now estimated at \$15.00 af. CAVSARP is estimated to cost \$14.00 af. Lower Santa Cruz is still in the development phase and is estimated to be \$20.00 af. Mr. Henley stated that he is projecting the Bank will spend \$11.3 million in 1998. It is projected, with the carry-overs from 1997 and the new revenues for 1998, the Bank will have approximately \$13.9 million available for the Bank's use to recharge water.

The 1998 Plan of Operation was adopted as presented, subject to amendments as needed.

Discussion and approval of the Central Avra Valley Storage and Recovery Project Agreement

The Bank will be paying \$14 af for the use of the facility (referring to Section 10, pg 5 of the agreement). The fee is made up of two components; the energy component to pump the water, and the operation of the pumping facilities.

Dennis Rule, representing Tucson Water, has taken this agreement before their City Council, and it was approved. 1,500 af has been recharged in the facility since October 1997. All three basins have been brought on-line and converted from a 5,000 gal per minute pump to a 15,000 gal per minute pump. It is anticipated that CAVSARP should be able to get their full 10,000 af under the pilot program permit within the calendar year.

The motion to approve and sign the CAVSARP agreement was moved and approved.

Status of Innovations in Government Application

Ms. Kunasek stated that the essay components of the application have been completed. Any comments should be submitted to the Bank by December 31 in order to meet the January 7 deadline.

Update on Interstate Discussions

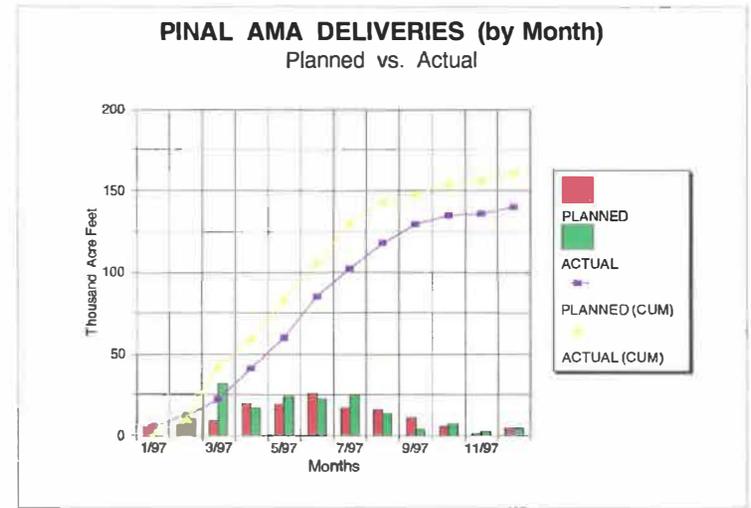
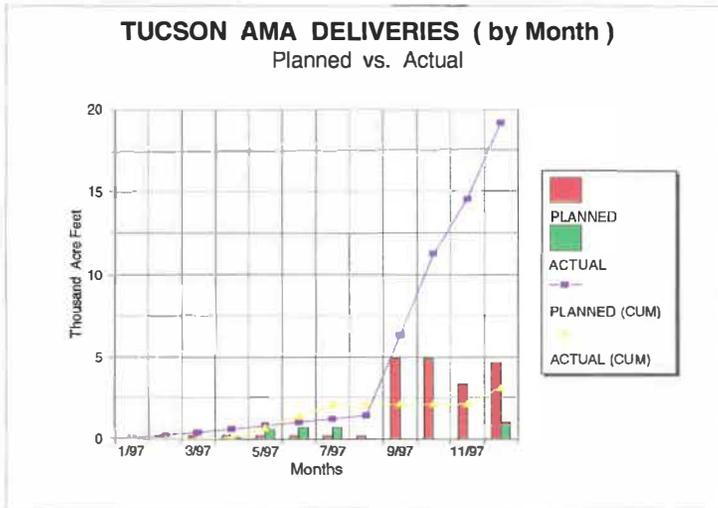
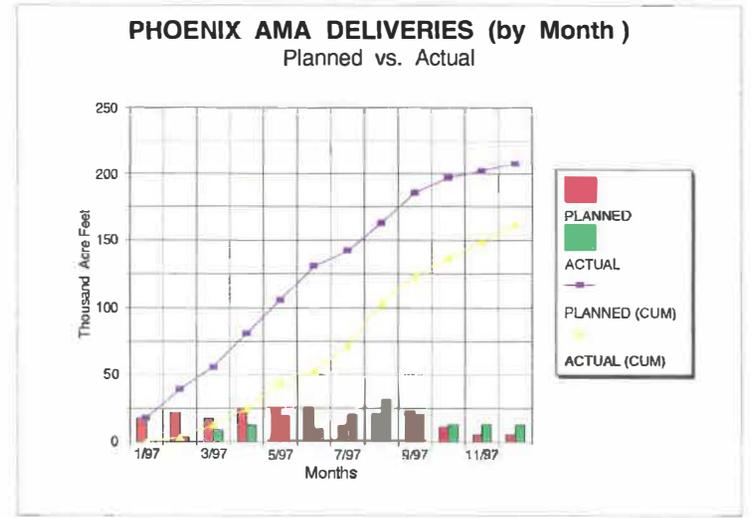
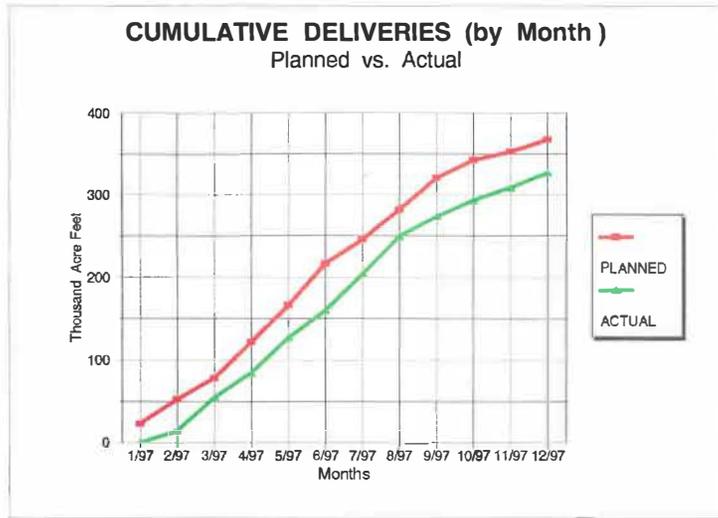
Ms. Pearson stated that she would be attending the Colorado River Water User's Association meeting in Las Vegas. There will be a speech by Secretary of the Interior, Bruce Babbitt, and he will be making reference to the interstate water banking regulations, which will be published in the federal register (scheduled to be published December 31, 1997).

The federal regulations notice will be put on the agenda for the Water Banking Authority meeting scheduled for January 21, 1998.

Call to the Public

Chairman Pearson adjourned the meeting at 10:00 a.m.

1997 PLAN OF OPERATION



Actual deliveries updated 14-Jan-98

	jan	feb	mar	apr	may	jun	jul	aug	sep	oct	nov	dec	total	
Phoenix AMA														
GRUSP	0	0	1,961	0	8,302	727	0	0	4,448	6,021	9,439	10,024	40,922	GRUSP
RWCD	0	0	3,689	8,121	8,326	4,676	8,267	6,164	3,529	4,253	2,133	0	49,158	RWCD
NMIDD	0	3,310	3,490	4,400	2,100	3,700	6,992	15,590	7,618	0	0	0	47,200	NMIDD
QCID	0	0	0	0	0	0	3,566	7,263	3,719	1,559	1,044	2,459	19,610	QCID
MWD	0	0	0	0	0	0	578	2,171	904	919	531	0	5,103	MWD
CHCID	0	0	0	0	0	0	0	0	0	0	0	0	0	CHCID
Subtotal	0	3,310	9,140	12,521	18,728	9,103	19,403	31,188	20,218	12,752	13,147	12,483	161,993	
Pinal AMA														
CAIDD	0	6,825	19,967	8,208	10,000	0	0	0	0	0	0	0	45,000	CAIDD
MSIDD	0	2,446	8,422	5,402	8,923	12,780	10,940	3,838	1,496	5,492	2,247	2,994	64,980	MSIDD
HIDD	0	1,400	3,300	3,300	5,015	9,575	13,485	9,423	2,667	1,520	5	1,431	51,121	HIDD
Subtotal	0	10,671	31,689	16,910	23,938	22,355	24,425	13,261	4,163	7,012	2,252	4,425	161,101	
Tucson AMA														
Avra Vally	0	0	0	55	644	743	695	20	0	0	0	0	2,157	Avra Vally
CAVSRP	0	0	0	0	0	0	0	0	0	0	0	984	984	CAVSRP
Pima Mine	0	0	0	0	0	0	0	0	0	0	0	0	0	Pima Mine
Lower Santa Cruz	0	0	0	0	0	0	0	0	0	0	0	0	0	L. Santa Cru
Subtotal	0	0	0	55	644	743	695	20	0	0	0	984	3,141	
TOTAL	0	13,981	40,829	29,486	43,310	32,201	44,523	44,469	24,381	19,764	15,399	17,892	326,235	

1. Describe the program. Please emphasize its creative and novel elements. What is the innovation?

The primary mission of the Water Bank is to “recharge” (or put into the ground) currently unused Colorado River water for future use by municipal and industrial users in times of shortage on the Colorado River or in case of disruptions in the Central Arizona Project (CAP) delivery system. The Water Banking Authority is permitted to purchase only water that is not currently being used by Arizona’s Colorado River communities or by CAP subcontractors. The Water Bank uses direct recharge, which involves storing purchased water in large spreading basins that directly replenish water supplies in the aquifer, and indirect recharge (also known as “in-lieu” recharge), where irrigation districts purchase Colorado River water from the Water Bank to be used “in lieu” of pumping groundwater.

The Water Bank has four main goals. First, the Water Bank helps Arizona meet the objectives of the state Groundwater Code by replenishing depleted groundwater aquifers. The Water Bank earns storage credits when it stores renewable surface water directly underground in aquifers or delivers that water to an entity that is currently pumping groundwater, thus replacing that pumpage and leaving the groundwater in place. The Bank’s activities help prevent a condition known as “groundwater overdraft,” or when pumping exceeds the rate at which aquifers are replenished. Recharge by the Water Bank helps prevent the serious effects of groundwater overdraft, including subsidence, earth fissures, migration of contaminants, increased pumping costs, depleted water tables, and impacts to riparian habitats.

Second, the Water Bank has the opportunity to assist in the settlement of Native American water rights claims. The affected parties often negotiate settlements to resolve tribal claims to surface water supplies. Credits earned by the Water Bank can provide another pool of water to be used in settlements. For example, credits the Water Bank has earned for stored groundwater can be transferred to a tribe as a component of a settlement.

Third, the Water Bank facilitates water exchanges to assist Colorado River communities during drought. The communities along the Colorado River have their own contracts for Colorado River water. Because their groundwater is considered Colorado River water, they have no way to replace a reduction in their groundwater supplies during drought. The Water Bank provides a valuable tool to allow these communities to firm their supplies by exchanging credits for surface water in times of drought. The Water Bank could also provide the opportunity to use credits to meet additional future demand.

Fourth, the Water Bank has a regional component by contracting with similar authorities in California and Nevada to allow these states to annually acquire a portion of Arizona’s temporary surplus of Colorado River water. The contracting state would pay to store water in Arizona, helping to replenish Arizona’s aquifers, and in the future would be able to draw a similar quantity directly from the Colorado River. This process is known as interstate water banking, and it underscores Arizona’s commitment to being a good neighbor by helping its sister states in the Lower Basin in a time of need.

The Water Bank was created under the assumption that it would change and grow over time. The legislation that created the program also created a Study Commission that examines new and different opportunities for the Water Bank and regularly publishes reports on its findings.

2. What problems does your innovative program address?

Water banking addresses the critical issue of water scarcity in an arid environment by protecting against future water supply shortages to municipal and industrial water users. The program encourages conserving groundwater use today and replaces that use with Colorado River water. Colorado River water is renewable. Each year, snow melt and rainfall replenish the River's water supply. Groundwater is replaced at a much slower rate, particularly in the desert. The Water Bank provides incentives for using a renewable resource rather than a finite one. The Colorado River is completely appropriated, some would argue overappropriated. In the future, there will be intense competition for its use. By recharging the water today when it is available, the Water Bank will effectively utilize a scarce natural resource.

The Water Bank helps Arizona meet the management plan objectives of Arizona's Groundwater Code. The goal of the management plans for the Phoenix, Tucson, and Prescott Active Management Areas is to achieve "safe-yield" of groundwater (i.e., when long-term groundwater withdrawals do not exceed water recharged into the aquifer) by the year 2025. The water banking program requires groundwater users who receive water from the Water Bank to forego their groundwater pumping and take water from another source. That other source is the excess Colorado River the Water Bank has purchased. The result is conservation of groundwater so precious in a desert environment. The Water Bank acquires "credits" that allow it to recover groundwater when renewable surface water supplies are depleted due to drought or CAP delivery system failure.

The Water Bank can assist in the settlement of Native American water rights claims. These claims stem from litigation in the state courts, acts of Congress, and ongoing negotiations between the federal government, the settlement parties, and the tribes to determine the proper allocation of water to each tribe. The Water Banking Authority's enabling legislation provides that one of the purposes of the Water Bank is to provide the opportunity for storing water brought into Arizona through the CAP to help implement the settlement of water right claims by Native American tribes within Arizona. By providing credits for groundwater usage, the Water Bank (i.e., the State) can transfer water rights to Native American tribes without depriving other users.

The Water Bank also provides Arizona communities along the Colorado River with a stable water source. For example, the Water Bank could exchange credits it has earned to make water available to cities in Mohave County (which is located along the Colorado River) when shortages on the Colorado River due to drought would otherwise reduce their supplies.

3. Who are the current and potential beneficiaries of your program? What are the direct or indirect benefits to citizens?

The current direct beneficiaries of the Water Bank are irrigation districts, which contract with the Water Bank to acquire Colorado River water instead of pumping groundwater. Agricultural water use in Arizona is significant. Prior to the construction of the CAP, groundwater was the primary source of water for agriculture. After the CAP was completed, Colorado River water was available but unaffordable for most agricultural users. The Water Bank has made CAP-delivered water affordable. The Water Bank provides renewable Colorado River water to agricultural users, and this source of water mitigates the effect of pumping limited groundwater supplies.

Arizona citizens benefit directly from this program by obtaining an additional source of water. The Water Bank protects municipal and industrial users of Colorado River against droughts or other shortages by providing a “backup” supply.

The Water Bank’s indirect recharge program benefits tribal communities because it stabilizes water tables under or adjacent to the reservations, thereby alleviating tribal concerns about groundwater pumping by adjacent agricultural users. There may be opportunities to use direct recharge and water exchanges to firm supplies for the tribes. There are also opportunities to enhance riparian habitats by utilizing existing river channels and stream beds to deliver Colorado River water to direct recharge sites.

Potential beneficiaries of the Water Bank include the citizens of Nevada and California because these states will soon be permitted to acquire and store Arizona’s temporary excess water in Arizona to protect against future shortages and create additional supplies for their own states.

The primary indirect benefit to citizens is being a part of responsible management of our natural resources. Arizona has a stringent groundwater code (which was the recipient of an Innovations in American Government award in 1983); the Water Bank provides a vital mechanism for achieving Arizona’s groundwater management goals. Arizona can be proud of its decision to look toward the future, anticipate continued progress and growth, and create a mechanism to prevent a shortage of the west’s most precious natural resource.

4. What are the most significant achievements of the program?

No other state has a water bank like Arizona. It does not limit its focus to short-term water supply needs but promotes the long-term water management goals of the state and the region. The Water Bank enables Arizona to protect itself against future water shortages without taking more than its share of Colorado River water and at the same time performs an invaluable conservation function by protecting against overuse of Arizona's increasingly scarce groundwater supplies.

In its first year of operation, the Water Bank has been an enormous success and has surpassed even its own goals. The Bank has purchased and recharged 330,000 acre feet of Colorado River water. (An acre foot is enough water to meet the needs of a family of five for one year.) That water is recharged using one of two methods: direct recharge (involving underground storage facilities) or indirect recharge programs.

The Water Bank performs direct recharge by storing the water it purchases in large spreading basins that directly replenish water supplies in the aquifer. An example of direct recharge is the Water Bank's delivery of water to a constructed facility via the Agua Fria River which also performs a vital riparian repair function along the Agua Fria. Indirect or in lieu recharge involves the sale of water to irrigation districts who take water from the Colorado River in lieu of groundwater. The Water Bank then earns credits that enable it to recover the groundwater. Five percent of that total is never recovered: it is known as the "cut to the aquifer" and is an additional bonus quantity of water for the aquifer.

Both methods of recharge demonstrate the value of water banking: taking renewable surface water that is temporarily available today and storing it for use in times of future shortage or drought. The program conserves finite groundwater supplies, thereby reducing the negative impacts of depleting these supplies. The Water Bank is a model program now serving as the framework for federal regulations issued by the U.S. Bureau of Reclamation to support interstate water banking through Arizona's Water Bank program.

5. How replicable is the program? What obstacles might others encounter?

The program is replicable to the extent that any entity may purchase or conserve water and store that water in a manner that facilitates groundwater replenishment and assures a water supply for a later point in time. Both private and public entities are permitted to engage in water banking in Arizona if they meet the requirements of the state's Groundwater Code and other relevant laws.

The achievements of the Water Bank can be successfully replicated in other jurisdictions using other sources of water. Entities outside of Arizona (whether private or public) can engage in similar water banking activities with their own water supplies. Federal regulations governing interstate water banking support this proposition. A locality must have the infrastructure to support water transport and storage and must develop a means of tracking water usage and forbearance.

In order to further explore additional opportunities for water banking, the enabling legislation created a Water Banking Authority Study Commission comprised of a broad cross-section of the Arizona community, including municipal and industrial water users, persons from Native American tribes, persons affiliated with environmental interests, agricultural water users including those that do not use the CAP facilities, and persons generally interested in CAP issues and Colorado River utilization issues. All members are knowledgeable about water resources management in Arizona and have focused on potential obstacles and opportunities in water banking. Other states interested in water banking could benefit from Arizona's Study Commission model.

6. List all current funding sources, with dollar and percentage contributions, for each for your current operating budget. If applicable, include separate subtotals for public and private funds and sources. Provide details of any unusual financial features not described elsewhere.

Much of the funding for the AWBA comes from existing revenue sources and from fees that are charged to those benefitting directly from the stored water. Sources of funding include:

- (1) Fees for groundwater pumping annually collected within the Phoenix, Pinal, and Tucson Active Management Areas. In the Phoenix AMA, Tucson AMA, and most areas of the Pinal AMA, the pumping fee for water banking purposes is \$2.50 per acre foot. For groundwater pumping in areas of the Pinal AMA not served by the CAP, the \$2.50 fee is phased in over 7 years. The groundwater pumping fees must be used to benefit the area in which they were collected.

The pumping fees for 1997 totaled \$3,750,000. Of that total, the Phoenix AMA provided \$2,000,000, the Tucson AMA provided \$750,000, and the Pinal AMA provided \$1,000,000.

- (2) The Central Arizona Water Conservation District (which operates the CAP) is authorized to levy a four cent *ad valorem* property tax in the CAP service area to pay for water storage. Revenues are deposited annually in the Water Banking Fund. Estimated revenues for 1997 are \$6,250,000.
- (3) An annual general fund appropriation based on the level of water storage necessary to meet long-term state needs. For fiscal years 1997 and 1998, the Arizona Legislature has appropriated \$2,000,000 to the Water Bank.
- (4) Fees collected from the sale of stored water credits used for drought protection. Fees are charged only if the credits were originally paid for with general fund money.

Fees from in-lieu recharge participants (irrigation districts) are based on the cost to pump groundwater. In calendar year 1997, in-lieu recharge participants paid \$21 per acre foot.

Monies collected pursuant to items 1 and 2 are committed to the Water Banking Authority until 2016. Monies from the general fund are appropriated annually.

MEMORANDUM



To: Authority Members
From: Tim Henley, Manager
Subject: Long-term Storage Credits for outside CAP
Date: January 21, 1998

The Authority's enabling legislation requires the Authority to reserve a reasonable number of long-term storage credits accrued with the general fund appropriations for the benefit of the municipal and industrial (M&I) users of Colorado River water in Arizona that are outside of the Central Arizona Project (CAP) service area. In 1997, the Authority began to develop long-term storage credits with general fund appropriations, so it is appropriate for the Authority to address the issue of how many of those credits should be reserved for the areas outside the CAP service area.

Background

In 1997, the Study Commission determined the frequency and magnitude of potential shortages to the Colorado River water M&I users who are not CAP subcontractors. These users are commonly referred to as Priority 4 users because of their Colorado River use priority and include the following M&I contract holders.

<u>MOHAVE COUNTY</u>		<u>LA PAZ COUNTY</u>	
Bullhead City	15,210 af	Continental Telephone	1 af
Crystal Beach	132 af	City of Parker	1,030 af
Gold Standard Mine	75 af	Brook Water Co.	680 af
Golden Shores	2,000 af	Ehernburg Imp. Dist.	500 af
Havasu Water Co.	993 af	Hillcrest Water Co.	84 af
Lake Havasu City	19,180 af	Town of Quartzite	1,070 af
Lakeview City	400 af	TOTAL	3,365 af
Mc Allister	40 af		
Mohave County Water Auth.	18,500 af	<u>YUMA COUNTY</u>	
Mohave Valley I.D.D	41,000 af	Edward Roy	1 af
Mohave Water Cons. Dist.	1,800 af	Smucker Park	33 af
Western States Minerals	70 af	TOTAL	34 af
TOTAL	99,400 af		

In addition to these contracts there are several contracts for irrigation uses with the same priority. The Authority can only firm M&I supplies under its existing authority.

Utilizing various assumptions, the Study Commission analyzes three methods for determining shortages with each method having two cases for distributing shortages among the contract holders. Two cases were required because there are two differing points of view on how the contracts' shortage provisions will be enforced. While recognizing the difficulty in predicting shortage and the uncertainty in how shortages will be distributed, the Study Commission recommended a conservative approach for determining the number of credits necessary to firm M&I contractor supplies. They recommended an approach that would require the development of approximately 420,000 af of credits to firm the water supplies of the M&I users outside the CAP area for the next 100 years. The 100-year horizon was selected in recognition of the assured and adequate water supply requirements. I have attached the relevant pages from the Arizona Water Banking Authority Study Commission's "Interim Report" dated November 1, 1997 for your review.

Recommendation

After reviewing the recommendation of the Study Commission, I would recommend that from the credits developed with the general fund appropriations the Authority reserve 420,000 af of credits to supplement the current supplies of the Priority 4 M&I users outside the CAP service area. Reserving these credits will firm those current supplies for at least 100 years. I would further recommend that the 420,000 af be subdivided by county utilizing the existing contract amounts on a prorata basis as follows.

<u>Mohave County</u>	<u>La Paz County</u>	<u>Yuma County</u>
96%	3%	1%
403,200 af	12,600 af	4,200 af

While the enabling legislation requires the Authority to reserve the credits, it is silent on how or when those credits should be developed. Based on the current studies shortages are not expected until the mid 2020s, which means the Authority has several years to actually develop the credits.

Credits developed utilizing general fund appropriations can be used for four basic purposes: (1) firming M&I supplies for outside the CAP, (2) firming M&I supplies for CAP subcontractors, (3) assisting in American Indian settlements, and (4) fulfill the water management objectives of the Third Management Plan. The Authority will have to determine an appropriate distribution for the other three purposes. The Authority will also have to decide how the credits will be distributed in any given year among the four purposes. Recognizing that the other purposes have not been quantified, I would recommend that the approximately 150,000 af of credits developed utilizing general fund appropriations in 1997, be distributed to firm the M&I supplies for outside the CAP. Based on the above percentages the distribution would be as follows.

Mohave County

144,000 af

La Paz County

4,500 af

Yuma County

1,500 af

This recommendation for the annual distribution would only apply to the credits developed in 1997. The Authority should revisit this distribution annually or sooner if the other purposes for the uses of the credits are quantified during the next year.

I would also recommend that the Authority notify the appropriate entity in each of the counties of the total credits to be reserved for their benefit and the distribution of the credits developed in 1997.

The Study Commission continues to study mechanisms that could be employed to recover the credits.

Issue 1

Determine the frequency and magnitude of potential shortages to municipal and industrial water users of Colorado River water who are not Central Arizona Project subcontract holders.

Discussion

The USBR has established the following priority system for Colorado River water contractors in Arizona.

Table 1 - Arizona Colorado River Priority System

First Priority	Satisfaction of Present Perfected Rights as defined and provided for in the <i>Arizona v. California</i> decree.
Second Priority	Satisfaction of Federal Reservations and Perfected Rights established or effective prior to September 30, 1968. (Second and third priority are coequal.)
Third Priority	Satisfaction of entitlements pursuant to contracts between the United States and water users in the State of Arizona executed on or before September 30, 1968. (Second and third priority are coequal.)
Fourth Priority	<p>Satisfaction of Entitlements pursuant to: (1) contracts, Secretarial reservations, and other arrangements between the United States and water users in the State of Arizona entered into or established subsequent to September 30, 1968 for use on Federal, State, or privately owned lands in the state of Arizona (for a total quantity not to exceed 164,652 af of diversion annually); and (2) Contract No. 14-06-W-245 dated December 15, 1972, as amended between the United States and the Central Arizona Water Conservation District for the delivery of Mainstream Water for the Central Arizona Project, including use of Mainstream Water on Indian lands.</p> <p>Entitlements having a fourth priority as defined in (1) and (2) herein are coequal. Reductions in Entitlements having a fourth priority shall be borne by each entitlement holder in the same proportion as its entitlement, or as required by law or regulation. If, however, a reduction-sharing agreement is entered into between two or more such authorized users, then the reduction shall be shared among the parties as provided in the agreement, subject to approval by the Contracting Officer after consultation with ADWR.</p>
Fifth Priority	<p>Satisfaction of Entitlements to any unused Arizona entitlement.</p> <p>Any entity with a contract for fifth priority water shall utilize its fifth priority entitlement only after the Contracting Officer has determined that Mainstream Water is available under applicable law or regulation, and the Contracting Officer provides written notification that such Mainstream Water is available in a specific year, subject to the scheduling and the reduction provisions of the contract. Reduction or elimination of the fifth priority water use shall be determined by the Contracting Officer after consultation with ADWR, or on the basis of the contract dates, or as required by law or regulation.</p>
Sixth Priority	<p>Satisfaction of Entitlements to Surplus Apportionment Water.</p> <p>Any contractor for sixth priority water shall utilize its sixth priority entitlement only after the Contracting Officer has determined that Mainstream Water is available under applicable law or regulation, and the Contracting Officer provides written notification that such Mainstream Water is available in a specific year, subject to the scheduling and reduction provisions of the contract. Reduction or elimination of the sixth priority water use shall be as determined by the Contracting Officer or on the basis of the contract dates, or as required by law or regulation.</p>

Water contractors within Priorities 1 through 3 have a much lower probability of experiencing a reduced delivery than those in Priorities 4 through 6. Priority 5 and 6 contractors are allowed to use water on an “as available” basis and so their uses must be limited to those which are temporary or may be easily discontinued. The critical class determination is Priority class 4 which is represented by the CAP and other contractors whose entitlement is within the state’s basic apportionment of 2.8 maf, but who have a contract date of 1968 or later. Priority 4 contractors are vulnerable to shortage because of provisions in the Colorado River Basin Project Act. The shortage sharing mechanism for CAP water users set forth in a Secretary of the Interior Record of Decision provides that agricultural subcontractors take the first shortages, followed by Indian and municipal and industrial (M&I) contractors, who share in remaining shortages.

For Priority 4 contractors along the Colorado River, there is no document similar to the Record of Decision. The ADWR has always held that shortages for these contractors should follow the same approach as the CAP. However, the USBR has recently taken a different approach. In the USBR approach, both agricultural and M&I contractors are treated equally and will share shortages on a pro rata basis.

The ADWR used the CRSSez computer model to analyze the likelihood of shortages to Priority 4 contractors located outside of the CAP service area. The model is used as a forecasting tool and provides an estimate of probable Colorado River water supplies in future years based on a number of hydrologic, demand, and operating assumptions. The availability of the Colorado River supply to water users in Arizona is dependent upon a number of factors. Some of the most important factors include: the amount of water in the reservoir system; the reservoir operating criteria used to determine if a surplus, normal, or shortage condition exists; the total demand for water by upper and lower basin water users and water users in Mexico; and the hydrology or water supply that the river system generates each year. Unfortunately, none of these critical factors have been definitively established, although much effort has been spent in recent years to collect additional data and to look at a variety of operational strategies.

The Study Commission recognized that predicting the amount of Colorado River shortages would be important to a number of issues it is considering. It therefore formed a Planning and Modeling Issues Subcommittee which has been meeting concurrently with the other subcommittees. The Planning and Modeling Issues Subcommittee worked with ADWR staff to evaluate a number of critical parameters and then ran the CRSSez model numerous times to determine the influence of the parameter on the timing and volumes of Priority 4 shortages. Based on those studies, the subcommittee recommended which assumptions should be used by the Study Commission in its deliberations. The Interim Report produced by the subcommittee describes the studies performed and the recommended assumptions.

The results of the ADWR study indicate that shortages to Priority 4 water users are likely over the next one hundred years but are very unlikely until sometime after the year 2025. **Figure 1** represents the *probability* of a Priority 4 shortage, and **Figure 2** shows the *amount* of a Priority 4 shortage.

Figure 1

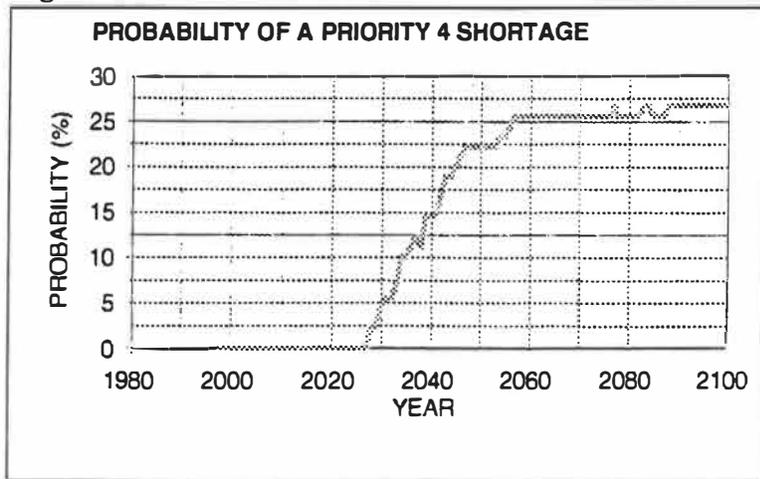
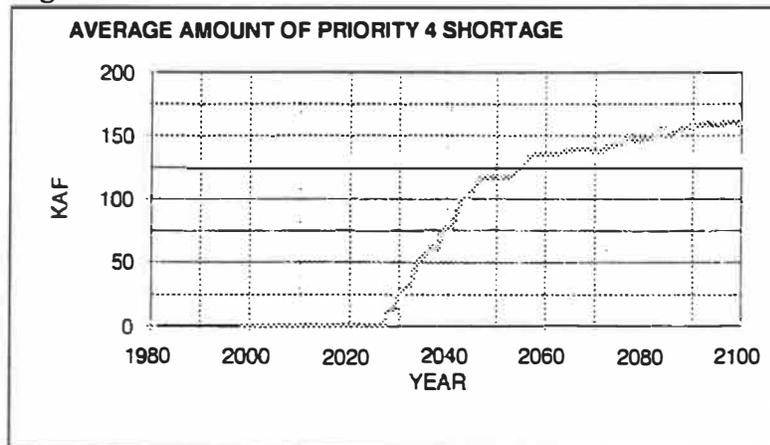


Figure 2



The ADWR study estimated the amount of Priority 4 shortages to non-CAP service area customers using three different *pro rata* methods: the **consumptive use** method, the **diversion** method, and the **contract amount** method. Colorado River area Priority 4 contracts list the maximum diversion amount the contractor is allowed.

Consumptive use is defined as the diversions minus any measured or unmeasured return flows. In the consumptive use method, the Colorado River area water uses were estimated for each year based on an assumed build up in demand over time. For each year when a shortage could occur, the Colorado River consumptive use was compared with the CAP consumptive use and a proportion was developed. Any shortage for that year was shared between the Colorado River area and the CAP based on that proportion.

The diversion method is very similar to the consumptive use method except that diversions are used in the proportion. Since the CAP has no return flow to the Colorado River, its consumptive use and diversion are the same amount. The diversion amounts for the Colorado River area contractors are higher than the consumptive uses amounts.

The contract amount method develops the proportion of shortage based on the diversion amounts listed in the contracts. The contract amount is the maximum allowable diversion and is, therefore, not dependent upon a buildup schedule. Using the three methods, graphs were prepared to show the estimated average shortage for Colorado River area users. **Figures 3, 4, and 5** display those results.

Figure 3

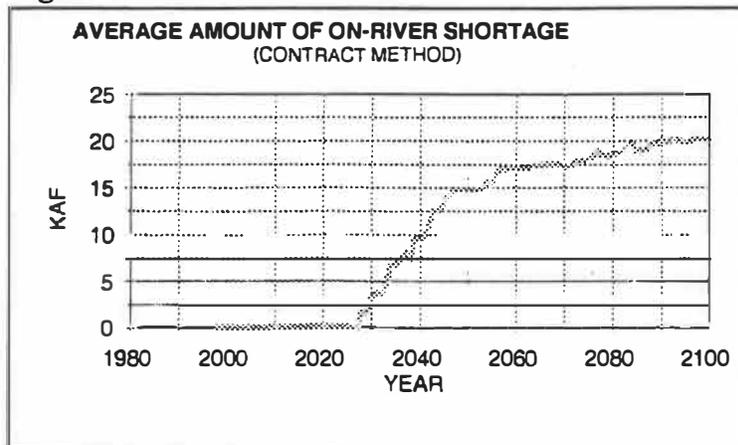


Figure 4

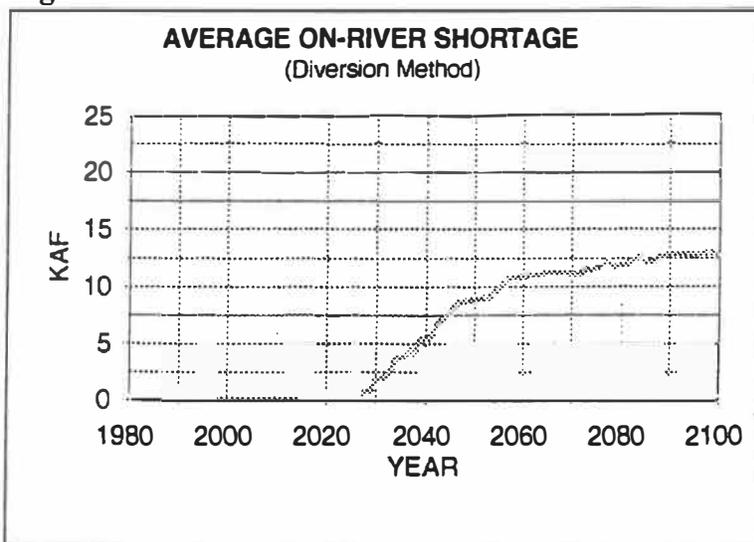
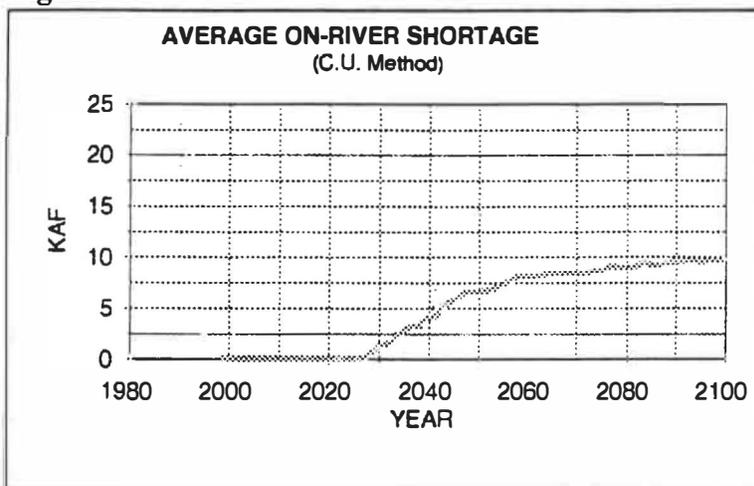


Figure 5



The next set of graphs displays the cumulative shortages for Priority 4 Colorado River area users using each of the three methods. Estimates of cumulative shortages help determine the amount of water the AWBA may seek to store if Colorado River area shortages are to be mitigated. **Figures 6, 7, and 8** display those results.

Figure 6

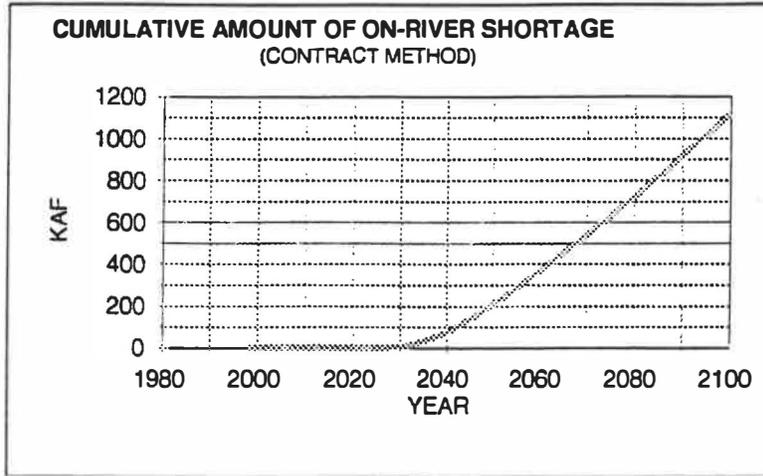


Figure 7

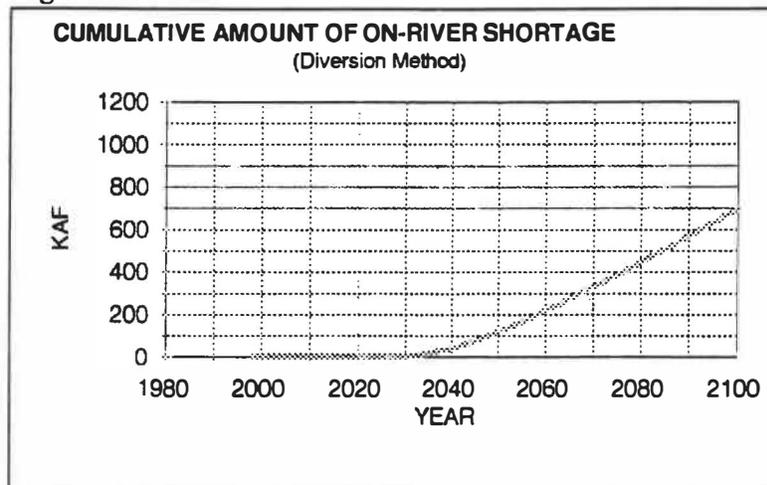
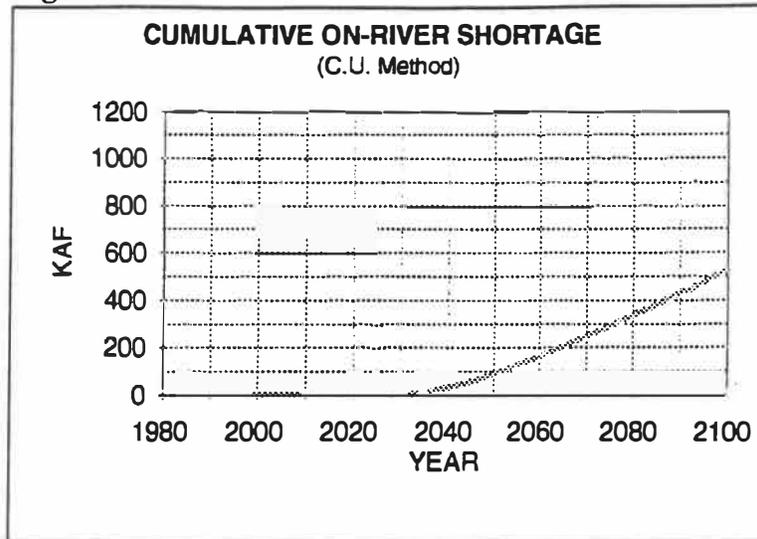


Figure 8



The ADWR studies then refined the shortage estimates to determine the amount of shortage to M&I Colorado River area users by using the ADWR shortage sharing assumption and then using the USBR shortage sharing assumption. **Tables 2, 3, and 4** display those results. The results indicate a wide range of amounts of water that must be banked to mitigate future M&I Colorado River area shortages depending on whether the USBR method is used and on the method for determining the ratio of shortage sharing with the CAP. The range is from a minimum of 21,000 af to a maximum of 780,000 af.

**Table 2: Cumulative Use (C.U.) Approach
Municipal and Industrial Shortages**

	Year 2000	Year 2025	Year 2050	Year 2075	Year 2100
ADWR					
Probable Shortage	0	0	0	3%	6%
Average Amount	0	0	0	0	1 kaf
Cumulative Amount	0	0	0	2 kaf	21 kaf
Bureau of Reclamation					
Probable Shortage	0	0	22%	26%	27%
Average Amount	0	0	4 kaf	5 kaf	6 kaf
Cumulative Amount	0	0	50 kaf	172 kaf	315 kaf

**Table 3: Diversion Approach
Municipal and Industrial Shortages**

	Year 2000	Year 2025	Year 2050	Year 2075	Year 2100
ADWR					
Probable Shortage	0	0	0	3%	6%
Average Amount	0	0	0	1 kaf	1 kaf
Cumulative Amount	0	0	0	3 kaf	28 kaf
Bureau of Reclamation					
Probable Shortage	0	0	22%	26%	27%
Average Amount	0	0	5 kaf	7 kaf	8 kaf
Cumulative Amount	0	0	66 kaf	229 kaf	420 kaf

**Table 4: Contract Approach
Municipal and Industrial Shortages**

	Year 2000	Year 2025	Year 2050	Year 2075	Year 2100
ADWR					
Probable Shortage	0	0	22%	26%	27%
Average Amount	0	0	2 kaf	2 kaf	2 kaf
Cumulative Amount	0	0	22 kaf	66 kaf	117 kaf
Bureau of Reclamation					
Probable Shortage	0	0	22%	26%	27%
Average Amount	0	0	10 kaf	13 kaf	14 kaf
Cumulative Amount	0	0	144 kaf	439 kaf	779 kaf

Findings and Recommendations

The subcommittee believes that providing adequate shortage protection for Colorado River municipal and industrial water users outside of the CAP service area is a critical function for the AWBA to fulfill. Water providers located along the Colorado River corridor usually lack a backup supply because water withdrawn from wells within the floodplain area is generally considered to be Colorado River water rather than groundwater. Therefore, when shortage conditions exist, these providers may be faced with extremely damaging water supply reductions. The advanced storage mechanism of the AWBA may be one of the easiest and least expensive ways to offset that shortfall.

The frequency and magnitude of shortages to Colorado River area Priority 4 contractors is very difficult to predict because there are differing interpretations regarding how shortages will be shared with the CAP and also how shortages will be shared between the non-CAP municipal and industrial and agricultural contractors. The subcommittee has performed an initial evaluation of the possibility of shortage using several different approaches. At the present time, the subcommittee recommends that a conservative approach be taken when looking at those assumed approaches. For example, while the subcommittee believes that the ADWR method of shortage sharing between M&I

and agricultural users better represents the state's priorities, it is recommended that the USBR method should be assumed for the purposes of the Study Commission since it is more conservative.

The subcommittee also recommends that studies focus on the need to protect against droughts that would occur for all likely M&I use even if the use projections would be in excess of current contract amounts. The subcommittee feels that it is reasonable to assume that water providers will seek to supplement their contract entitlements by the transfer or conversion of some agricultural contracts. However, it will probably not be economically feasible to bank water to protect against agricultural shortages. Future studies should attempt to estimate how much of the Colorado River area's Priority 4 water is likely to remain in agricultural use and how much will be converted to M&I use.

Proposed Update to the Storage Facility Inventory

Background

In March 1997, the Water Banking Authority developed a Storage Facility Inventory of all existing storage facilities and determined which facilities and capacities are available to the Water Bank over a ten-year period. *See* A.R.S. § 45-2452(D). The Inventory did not determine which facilities the Water Bank will use.

The Inventory examined the three AMAs and the remaining regions of the State, which provided a better understanding of local water needs and regional water management concerns. Each of the regions was examined for existing storage facilities that are physically capable of storing CAP water. That capacity was then compared to estimated Bank storage needs for each area. The Bank assumed that reevaluations of the storage facility inventory would be necessary more frequently than the statutory minimum of every five years, particularly in the early years of the Bank's operation.

The Inventory concluded that additional storage facilities are necessary to meet the needs of the Authority for the next 10 years in the Tucson AMA. Based on this determination, the Bank must develop a plan (Facility Plan) for additional storage facilities that specifies the type, location, date needed, and capacity of storage facilities necessary to meet the Bank's needs. A.R.S. § 45-2453(A).

Because entities within the Tucson AMA were in the process of preparing a Regional Recharge Plan, the Inventory did not include a schedule for completion of this Facility Plan. The Tucson entities involved in the Regional Recharge Plan have completed the task of prioritizing direct recharge facilities, as set forth in the presentation to the Authority at the November 1997 meeting. Having obtained this information, the Authority can appropriately begin development of a Facility Plan.

Update 1

The "Findings" section of the Tucson AMA portion of the Facility Inventory completed in March 1997 should be updated to include the following:

Using the Tucson Regional Recharge Plan for guidance, the Water Bank will develop a Plan for additional facilities in the Tucson AMA based upon the process set forth in A.R.S. § 45-2453. The process requires the Authority to do the following before completing its Facility Plan:

- (1) consider the amount of additional storage capacity needed to meet the Bank's needs;
- (2) consult with ADWR with respect to where water storage would most contribute to meeting the water management objectives;
- (3) consider the advice of CAWCD regarding the feasibility of delivering and storing CAP water at any proposed storage facility;
- (4) seek the advice of the ADEQ regarding any potential adverse impacts from a proposed storage facility to landowners and water users in the vicinity of any proposed storage facility;
- (5) consider the potential costs to the Bank of facilitating construction or development of a proposed storage facility and cost-effectiveness of any proposed storage facility;

- (6) ask CAWCD whether it or other entities would be willing to construct, maintain, and operate any proposed storage facility;
- (7) consider the way in which water stored at a proposed storage facility could be used by the Authority to achieve policy goals; and
- (8) consider any other relevant factors.

A.R.S. § 45-2453(B)(1-8).

The schedule for completing the Facility Plan is as follows:

<u>February 1998:</u>	Initiate discussions with ADWR
<u>March 1998:</u>	Initiate discussions with CAWCD
<u>June 1998:</u>	Draft Facility Plan available
<u>August 1998:</u>	Facility Plan ready for Authority approval

Recommendation

Staff recommends approving the update to the Facility Inventory of March 1997. The Facility Plan will incorporate the most recent findings and data contained in the Tucson Regional Recharge Plan.

Arizona Water Banking Authority
Review Schedule of Proposed Interstate Banking Rules

January 21, 1998 (Authority meeting)	Staff Presentation and discussion of Proposed Rule
January 28, 1998	Staff mails draft comments for review
<i>January 30, 1998 Deadline for requesting Public Hearing</i>	
February 6, 1998	Comments due on draft comments (Mail, Phone, Fax, or E-mail)
February 11, 1998	Revised draft comments mailed to the Authority Members
February 18, 1998 (Authority meeting)	Discuss revised comments and approve submittal of comments to Secretary of the Interior
February 26, 1998	Revise comments based on meeting discussion and submit comments to Secretary (mail to Authority)
March 2, 1998	Public comment period ends

Note: If Public Hearing is requested it should be scheduled after the Authority's February Meeting, which would allow the Authority to submit its comments at the Public Hearing. The Authority's comments could then be supplemented based on additional information learned at the Public Meeting. As an alternative to an additional submittal by the Authority, any additional Authority concerns could be included in the ADWR submittal.

COLORADO RIVER WATER USERS ASSOCIATION

**1997 Annual Conference
Caesars Palace
Las Vegas, Nevada**

**Address
by
Bruce Babbitt
Secretary of the Interior
9:30 a.m., December 18, 1997**

During each of the past two years I have come before you at your annual conference to review the status of water administration in the Lower Basin and to identify some of the steps that I believe are necessary to achieve sound long-term management of the Colorado River. On each occasion I have emphasized the desirability of consensus among the basin states, and initiatives within the states--and particularly within California--to develop a realistic strategy to assure that the needs of each state can be met without jeopardizing the entitlement of others. I have, in each instance, pledged my cooperation and assistance in these efforts, while stating my readiness to act as necessary to fulfill my responsibilities pursuant to the Law of the River.

I am pleased to be able to report positive action on several fronts. We have taken a major step toward bringing to fruition the interstate transfer by state-authorized entities pursuant to off-stream banking programs in the Lower Basin, as I shall describe in a moment. California has been moving forward in its effort to produce a workable plan that will permit it to live within its Colorado River apportionment. Though much remains to be done, there is measurable progress. The time is now ripe for me to take some initiatives designed to help move the California process along the path on which it has embarked. I shall describe those initiatives shortly, but first I would like to report on some other important Colorado River developments.

It is paradoxical that our current efforts to come to terms with the challenges of scarcity on the River occur during one of the wettest periods in recent history. The 1997 water runoff was 144% of normal, and this autumn has been unusually wet. The flows into Lake Powell during the past few months have run nearly two times normal, and the Colorado River reservoir system is at its highest level since 1986. As a result releases from Flaming Gorge, Aspinall and Glen Canyon reservoirs have been much above normal this fall, and flood control releases at non-damaging levels from Hoover Dam are projected early in 1998.

El Niño is very much on everyone's mind, and we are engaged in detailed and ongoing efforts to assure that we schedule releases effectively in order to reach proper Reservoir elevations. In that way we can better prepare for the possibility of increased runoff from a heavy late Spring rain or snow. Channel work is nearing completion in the Yuma area and in Mexico to prepare for higher than normal flows, and emergency action plans and table-top exercises have been completed for Hoover, Davis and Parker Dams. We are working diligently to handle anticipated high flows of water safely and effectively.

In light of the high level of system storage, I signed the 1998 Annual Operating Plan for the Colorado River Reservoirs, declaring a surplus which allows Colorado River water in excess of 7.5 million acre-feet to be used in the Lower Basin. A surplus for Mexico has also been determined and the International Boundary and Water Commission has informed Mexico that they may schedule an additional 200,000 acre-feet of use, pursuant to our Treaty. Depletions in the Lower Basin are expected to be about 8.2 million acre-feet in 1998, which presents no problem during a year like this one, but underlines why we are concerned that preparations be made for less abundant periods that are unavoidably before us.

Last year I noted that I had initiated an adaptive management process for future operation of Glen Canyon Dam to enable us to operate the dam so as to balance a variety of interests. We were able to show the benefits of that process recently when heavy rains in the Paria River basin deposited large quantities of sediment in the main channel of the Colorado River. A decision was made to run a test flow at full powerplant capacity to redeposit the sediment, and we did so successfully in early November. These are precisely the sort of innovative steps that adaptive management permits and encourages.

We are working together with the States, Tribes, environmental organizations and other interested stakeholders on the Lower Colorado River Multi-Species Conservation Program. The program plan is to provide protection for both currently listed threatened and endangered species and potentially listed species, along the Lower Colorado River. The plan is designed to address both the needs of the States for water and power production, and the consultation needs of the Bureau of Reclamation for River operations and maintenance.

This proposed program underscores our commitment to the restoration of threatened and endangered species, while addressing the water and power needs of the basin states. It is a cooperative endeavor that holds significant promise, and I applaud the Basin States for their commitment to work with us. It is also noteworthy as another demonstration of the workability of the basic requirements of the existing Endangered Species Act, when administered with sensitivity and imagination.

We are also turning our attention to the environmental challenges faced by the Salton Sea. I will be visiting the Salton Sea later this afternoon and tomorrow, and I am hopeful that we will soon be addressing its problems in cooperation with other interested parties.

I am pleased to be able to report positive developments in each of these areas. We are also progressing on that most stubbornly recalcitrant set of issues, water supply management in the Lower Basin. I would now like to turn to that subject.

OFFSTREAM STORAGE REGULATION

In my address last December, I said "I am instructing the Bureau of Reclamation to initiate a rulemaking process to develop water management regulations for the Lower Basin." I am pleased to announce that this process is now well underway. By the end of this month, the Bureau of Reclamation will publish in the Federal Register a proposed rule titled "Offstream Storage of Colorado River Water and Interstate Redemption or Transfer of Storage Credits in the Lower Division States". The proposed rule permits the States of Arizona, Nevada, and California to store Colorado River Water offstream for interstate use within the Lower Division States. It creates a procedural framework through which state authorized entities within the Lower Division can develop storage credits associated with Colorado River water that is stored offstream, and then use or transfer these credits within the Lower Division. The preamble to this Rule will note the importance of providing an opportunity for Indian tribes to participate in such storage and transfer activities. We will be receiving comments on the proposed rule during the 60 days following its publication.

While the opportunities created by this rule will be available to each of the Lower Division states, the rule should be of particular assistance to Arizona, which has enacted an offstream banking program, and should prove especially helpful to Nevada as it prepares to meet its needs during the early years of the next century.

When this rule becomes final, we will have in place one significant element of the program that is needed to facilitate water transfers in the Lower Basin. It is, however, only one piece of the puzzle, and much remains to be done, particularly to meet California's long term requirement to bring its demand in line with available supply.

BENEFICIAL USE AND TRANSFERS IN CALIFORNIA

As I have emphasized on several occasions, market based transfers within California must be founded on a baseline quantum of beneficially-used water from

which savings can be made. Thus far, efforts among the California agricultural agencies to achieve an agreed-upon quantification of entitlements from the Colorado River, and to settle long-standing differences about beneficial use, particularly within the Imperial Irrigation District, have been unsuccessful.

I want to reiterate the concern I expressed last year about California uses in excess of 4.4 million-acre feet. There is increased use in both the Palo Verde and Imperial Irrigation Districts. Though the agricultural entitlement under the first three priorities is only 3.85 million acre-feet per year, the agricultural districts have been using about 4 million acre-feet during each of the past several years. Indeed, except for the unusual years of 1992 and 1993, Imperial's diversions of Colorado River water have been steadily increasing over the past ten years. IID's diversions during the past two years have exceeded its long term average use by about 200,000 acre-feet per year, and that is in addition to some 106,000 acre-feet it is obliged to conserve under a transfer agreement with the Met.

This is a disturbing trend, and it is in tension with California's need to bring its use within its entitlement. I am aware of no convincing reason why the agricultural districts should be exceeding their 3.85 million acre-foot allotment. This year, for the first time, the Bureau of Reclamation declined to approve the initial IID diversion requested. In light of these developments, I am instructing the Bureau of Reclamation to scrutinize very carefully requests for deliveries in excess of long term averages by districts that are likely to result in total deliveries to the holders of the first three priorities that exceeds the 3.85 million acre-foot entitlement, and to report to me the implications of such requests for compliance with the statutory beneficial use limitation.

As steps are taken looking to ag-to-urban transfers of Colorado River water pursuant to the emerging California Plan, it becomes increasingly important that both beneficial use and quantification issues within the agricultural sector be resolved. So long as districts do not have fixed rights within the priorities of the seven party agreement, it becomes difficult if not impossible to ensure that water transfers do not end up increasing demand on the Colorado River. Moreover, if the only water transferred is water that otherwise would be wasted or not beneficially used, no net benefit to the River would result. For these reasons, transfers must be founded on a baseline quantum of beneficially-used water from which savings can be made.

I have repeatedly encouraged efforts by the agricultural districts to achieve a negotiated quantification, and I want emphatically to reiterate that message today. Alternatively, should a negotiated settlement not be achieved prior to the time that a district seeks required Secretarial approval for a transfer, I shall determine, as a precondition to approval, the maximum quantum of water out of which a transfer can be made.

I am aware that a draft agreement for transfer of conserved water between the Imperial Irrigation District and the San Diego County Water Authority was made public last week. Such agreements are a positive and important step in moving the emerging California Plan toward implementation. Of course we have not yet studied the draft and I cannot comment on any of its specific provisions. I do want to emphasize, however, that the policy on transfer approvals that I have just described will be applied to agreements such as that proposed between IID and the San Diego County Water Authority.

SURPLUS CRITERIA

I said last year that I would direct the Bureau of Reclamation to continue to operate under current guidelines for annual decisions regarding surplus determinations in order to give California an opportunity to put in place a realistic strategy to assure that it will be able to reduce its use when necessary. We are not there yet. The draft California "4.4 Plan" that was issued in October of this year is, however, a necessary and desirable step. The Plan properly recognizes the need for programs that will allow California to meet its Colorado River water needs from within its annual apportionment of Colorado River water of 4.4 million acre-feet when neither surplus water nor apportioned but unused water is available.

While the Plan is literally a blank in some crucial specifics--it neither specifies a date by which California's uses of Colorado River water will be reduced, nor does it state the amount of reduction to be achieved by that unspecified date--it does identify the internal sources from which about one-half of the present excess demand is expected to be met: 106,000 acre-feet/year from the existing IID/MWD conservation agreement; 200,000 acre-feet/year from a proposed IID/San Diego (SDCWA) transfer; and some 93,000 acre-feet/year through seepage recovery from the All-American and Coachella Canals. These are promising sources (though they present some as-yet unanswered questions), and they appear to provide the base for a realistic, and implementable, California Plan. I was also particularly pleased to see a provision for resolution of the San Luis Rey Indian Water Rights Settlement, which I consider an essential element of any strategy, as a component of the Plan.

However, a number of very important problems remain to be resolved, not the least among them a resolution of beneficial use and quantification issues within the agricultural districts so that transfers can go forward, and arrangements for transportation of transferred water through the Met's and San Diego's aqueduct (wheeling).

As I understand it, this proposal to reduce demand by about 400,000 acre-feet/year comprises the first of two phases of the evolving California Plan. I noted last year that I would defer the development of guidelines implementing surplus criteria in

order to give California an opportunity to put into place a realistic strategy for meeting its needs. Phase I of the draft California Plan outlines the elements of such a strategy. When further steps are taken so that firm commitments are in place for implementation of this phase of the Plan, including the execution of binding contracts, agreed-on arrangements for transportation, and resolution of quantification and beneficial use issues, I will adopt surplus criteria that will permit California to continue to meet its beneficial use needs from the Colorado River. I anticipate that these criteria will be effective for a specified number of years, at which time they will expire of their own terms, and will be reviewed before they are renewed, in order to ensure that California continues to make reasonable forward progress in implementation of its strategic plan.

CONCLUSION

The rate of change in matters affecting the Colorado River can sometimes be frustratingly slow, but I believe important progress is being made. I acknowledge the efforts made by California to shape a strategy for living within its entitlement which is helping to set us in the right direction, and I appreciate the constructive engagement of the other Basin States in that effort. We are setting a precedent of fruitful federal-state cooperation on the Colorado River. As my comments today should make clear, I also believe the time has come for me as River Master to play a more active role.

Much remains to be done, and I know that it cannot all be done in the next year or two. There are additional opportunities for marketing across state lines, and unfinished business relating to Tribal water rights. I reiterate my commitment to working within the Law of the River, to an insistence on prudent, non-wasteful use, and on the benefits of imaginative uses of marketing to implement voluntary, willing-buyer, willing-seller transactions. If we keep at it, we will be able to assure that every need will be addressed and that no entitlement holder, or state, will be disadvantaged.

-end-

Arizona Water Water Banking Authority
Discussion of Proposed Interstate Banking Rules
January 21, 1998

Arizona Revised Statutes

45-2423 . Powers and duties of authority

A. The authority, acting through its commission, shall:

1. Administer the Arizona water banking fund in accordance with this chapter.
2. Coordinate its staffing needs with the director and CAWCD.
3. Coordinate the storage of water and distribution and extinguishment of long-term storage credits with the director in accordance with this chapter and the water management objectives set forth in chapter 2 of this title.
4. Coordinate with CAWCD for the purchase, delivery and storage of Colorado river water delivered through the central Arizona project in accordance with this chapter.
5. Coordinate and confer with state agencies, municipal corporations, special districts, authorities, other political subdivisions, private entities, Indian communities and the United States on matters within their jurisdiction relating to the policy and purposes of this chapter.
6. Determine, on an annual basis, the quantity of Colorado river water to be stored by the authority and where that storage will occur.
7. Account for, hold and distribute or extinguish long-term storage credits in accordance with this chapter.
8. Comply with all aspects of chapter 3.1 of this title.
9. Adopt an official seal for the authentication of its records, decisions and resolutions.
10. Keep the minutes of its meetings, all records, reports and other information relating to its work and programs in permanent form, systematically indexed and filed.

B. The authority, acting through its commission, may:

1. Apply for and hold water storage permits.
2. Accrue, exchange and hold long-term storage credits in accordance with this chapter.
3. Make and execute all contracts, including intergovernmental agreements pursuant to title 11, chapter 7, article 3, that shall be signed by the chairperson, or in the chairperson's absence the vice-chairperson, and attested by the secretary, necessary to:
 - (a) Obtain for storage Colorado river water delivered through the central Arizona project. Agreements by which the authority obtains Colorado river water are exempt from the requirements of title 41, chapter 23.
 - (b) Affiliate water storage permits held by the authority with storage facility permits.
 - (c) Store Colorado river water at permitted storage facilities.
 - (d) Distribute long-term storage credits earned by the authority to make water available to municipal and industrial users of Colorado river water in this state that are inside or outside of the CAWCD service area, in accordance with the provisions of this chapter.
 - (e) Store Colorado river water in Arizona on behalf of appropriately authorized agencies in California and Nevada.
 - (f) Cause a decrease in Arizona diversions from the Colorado river, ensuring that Arizona will use less than its full entitlement to Colorado river water in years in which California and Nevada agencies are contractually authorized to call on the water stored on their behalf by the authority.
 - (g) Distribute long-term storage credits earned by the authority on behalf of agencies in California

and Nevada to Colorado river water users in Arizona to use in place of Colorado river water that would have otherwise been used by those Arizona users.

4. Sue and be sued.

5. Perform all other acts necessary for the authority to carry out its purposes, powers and duties in accordance with this chapter.

6. Submit a request for a general fund appropriation to the legislature each year. A request shall be accompanied by a budget detailing how the appropriation would be used and justifying the need for the appropriation.

45-2427 . Limitation on powers

A. This chapter does not authorize the authority to exercise any right of eminent domain.

B. The authority shall not store Colorado river water that would otherwise have been used in this state.

C. The authority shall not enter into contracts with agencies in California and Nevada for the storage of water on their behalf until both of the following occur:

1. Regulations are in effect, promulgated by the secretary of the interior of the United States, that facilitate and allow the contractual distribution of unused entitlement under article II(b)(6) of the decree.

2. The director finds that the rules promulgated by the secretary of the interior adequately protect this state's rights to Colorado river water, as those rights are defined by the decree.

45-2471 . Interstate water banking agreements

A. The authority may negotiate and enter into interstate water banking agreements with appropriately authorized agencies in California and Nevada, if all of the following apply:

1. The provisions of section 45-2427, subsection C have been met.

2. The director and at least two other voting members of the commission vote in agreement to enter into an interstate banking agreement.

3. The authority shall not enter into agreements with California and Nevada agencies that require the authority to reduce Arizona diversions from the Colorado river more than a total of one hundred thousand acre-feet of water in any one year.

4. No interstate banking agreement may be inconsistent with the decree.

B. In each interstate water banking agreement, the authority may agree to store Colorado river water in Arizona so that the stored water may be used in place of Arizona diversions from the Colorado river in years in which the California or Nevada agency requests water from the authority.

C. In each interstate water banking agreement, the California or Nevada agency shall agree to pay to the authority all costs that are or will be incurred by the authority in storing and recovering Colorado river water pursuant to the interstate banking agreement. The costs include all of the following:

1. The cost of acquiring Colorado river water.

2. The cost of delivering that Colorado river water through the central Arizona project to a

storage facility, including fees for the operation, maintenance, pumping energy and capital costs of the central Arizona project as established by CAWCD.

3. Amounts equivalent to taxes ordinarily paid by CAWCD subcontractors and their customers to pay for the repayment, operation and maintenance costs of the central Arizona project, to the extent those equivalent amounts are not collected by paragraph 8 of this subsection.

4. The cost of storing that Colorado river water.

5. The cost of constructing, operating and maintaining a storage facility to the extent that facility stores water for the California or Nevada agency.

6. The cost of recovering the stored water and delivering it to Colorado river water users in this state to use in place of Colorado river water that would otherwise be used.

7. A fee equivalent to the approximate amount of administrative, legal and technical expenses incurred by the authority in storing water for the California or Nevada agency, recovering that stored water and making an equivalent amount of Colorado river water available to the California or Nevada agency.

8. Any fee paid in lieu of taxes pursuant to section 48-3715, subsection B by the authority in acquiring the water to be stored.

D. In each water banking agreement, the authority shall agree that in years in which the California or Nevada agency requests recovery of water stored in Arizona, the authority shall cause a decrease in Arizona diversions from the Colorado river by the amount of water requested for recovery by the California or Nevada agency, thus creating unused entitlement for delivery to that agency by the United States secretary of the interior pursuant to article ii(b)(6) of the decree. These banking agreements may provide that during years when the secretary of the interior has declared a shortage on the Colorado river, no decrease in Arizona diversions shall be required.

E. Each interstate banking agreement shall specify that if the California or Nevada agency breaches the terms of the agreement the authority shall cease creating unused entitlement for that entity until the breach is cured.

45-2472 . Distribution of long-term storage credits

A. The authority may distribute long-term storage credits accrued through the use of monies paid by California and Nevada agencies pursuant to interstate banking agreements to CAWCD or other users of Colorado river water in this state, if both of the following apply:

1. CAWCD or other water user agrees to use the long-term storage credits to replace diversions that otherwise would have been made from the Colorado river.

2. CAWCD or other water user agrees to reduce its diversion of Colorado river water in years in which the authority is obligated to recover stored water on behalf of a California or Nevada agency in an amount equivalent to the long-term storage credits distributed.

B. The authority may pay from the monies collected from the California or Nevada agency in the banking fund to CAWCD or other users of Colorado river water that have agreed to reduce diversions from the Colorado river in accordance with subsection A the amount necessary to compensate CAWCD or other water user for increased costs incurred in recovering and using the stored water in place of diverting Colorado river water.

SUPREME COURT OF THE UNITED STATES
No. 8, ORIGINAL
STATE OF ARIZONA, PLAINTIFF
V.
STATE OF CALIFORNIA, ET AL., DEFENDANTS
DECREE.-MARCH 9,1964.

It is ORDERED, ADJUDGED AND DECREED that

I. For the purposes of this decree:

(A) "Consumptive use" means diversions from the stream less such return flow thereto as is available for consumptive use in the United States or in satisfaction of the Mexican treaty obligation;

(B) "Mainstream" means the mains of the Colorado River downstream from Lee Ferry within the United States, including the reservoir thereon;

(C) Consumptive use from the mainstream within a state shall include all consumptive uses of water of the mainstream including water drawn from the mainstream by underground pumping, and including but not limited to, consumptive uses made by persons, by agencies of that state, and by the United States for the benefit of Indian reservations and other federal establishments within the state;

(D) "Regulatory structures controlled by the United States" refers to Hoover Dam, Davis Dam, Parker Dam, Headgate Rock Dam, Palo Verde Dam, Imperial Dam, Laguna Dam and all other dams and works on the mains now or hereafter controlled or operated by the United States which regulate the flow of water in the mainstream or the diversion of water from the mainstream;

(D) "Water controlled by the United States" refers to the water in Lake Mead, Lake Mohave, Lake Havasu and all other water in the mainstream below Lee Ferry and within the United States;

(F)"Tnbutaries" means all stream systems the waters of which naturally drain into the mains of the Colorado River below Lee Ferry;

(G) "Perfected right" means a water right acquired in accordance with state law, which right has been exercised by the actual diversion of a specific quantity of water that has been applied to a defined area of land or to definite municipal or industrial works, and in addition shall include water rights created by the reservation of mainstream water for the use of federal establishments under federal law whether or not the water has been applied to beneficial use;

(H) "Present perfected rights" means perfected rights, as here defined, existing as of June 25, 1929, the effective date of the Boulder Canyon Project Act;

(I) "Domestic use" shall include the use of water for household, stock, municipal, mining, milling, industrial, and other like purposes, but shall exclude the generation of electrical power;

(J) "Annual" and "Year," except where the context may otherwise require, refer to calendar years;

(K) Consumptive use of water diverted in one state for consumptive use in another state shall be treated as if diverted in the state for whose benefit it is consumed.

II. The United States, its officers, attorneys, agents and employees be and they are hereby severally enjoined:

(A) From operating regulatory structures controlled by the United States and from releasing water controlled by the United States other than in accordance with the following order of priority:

- (1) For river regulation, improvement of navigation, and flood control;
- (2) For irrigation and domestic uses, including the satisfaction of present perfected rights; and
- (3) For power;

Provided, however, that the United States may release water in satisfaction of its obligations to the United States of Mexico under the treaty dated February 3, 1944, without regard to the priorities specified in this subdivision (A);

(B) From releasing water controlled by the United States for irrigation and domestic use in the States of Arizona, California and Nevada, except as follows:

- (1) If sufficient mainstream water is available for release, as determined by the Secretary of the Interior, to satisfy 7,500,000 acre-feet of annual consumptive use in the aforesaid three states, then of such 7,500,000 acre-feet of consumptive use, there shall be apportioned 2,800,000 acre-feet for use in Arizona, 4,400,000 acre-feet for use in California, and 300,000 acre-feet for use in Nevada;
- (2) If sufficient mainstream water is available for release, as determined by the Secretary of the Interior, to satisfy annual consumptive use in the aforesaid states in excess of 7,500,000 acre-feet, such excess consumptive use is surplus, and 50% thereof shall be apportioned for use in Arizona and 50% for use in California; provided, however, that if the United States so contracts with Nevada, then 46% of such surplus shall be apportioned for use in Arizona

and 4% for use in Nevada;

(3) If insufficient mainstream water is available for release, as determined by the Secretary of the Interior, to satisfy annual consumptive use of 7,500,000 acre-feet in the aforesaid three states, then the Secretary of the Interior, after providing for satisfaction of present perfected rights in the order of their priority dates without regard to state lines and after consultation with the parties to major delivery contracts and such representatives as the respective states may designate, may apportion the amount remaining available for consumptive use in such manner as is consistent with the Boulder Canyon Project Act as interpreted by the opinion of this Court herein, and with other applicable federal statutes, but in no event shall more than 4,400,000 acre-feet be apportioned for use in California including all present perfected rights;

(4) Any mainstream water consumptively used within a state shall be charged to its apportionment, regardless of the purpose for which it was released:

(5) Notwithstanding the provisions of Paragraphs (1) through (4) of this subdivision (B), mainstream water shall be released or delivered to water users (including but not limited to, public and municipal corporations and other public agencies) in Arizona, California, and Nevada only pursuant to valid contracts therefor made with such users by the Secretary of the Interior, pursuant to Section 5 of the Boulder Canyon Project Act or any other applicable federal statute;

(6) If, in any one year, water apportioned for consumptive use in a state will not be consumed in that state, whether for the reason that delivery contracts for the full amount of the state's apportionment are not in effect or that users cannot apply all of such water to beneficial uses, or for any other reason, nothing in this decree shall be construed as prohibiting the Secretary of the Interior from releasing such apportioned but unused water during such year for consumptive use in the other states. No rights to the recurrent use of such water shall accrue by reason of the use thereof;

Proposed Regulations

Department of Interior

CFR Part 414

Offstream Storage of Colorado River Water and Interstate Redemption of Storage Credits in the Lower Division States; Proposed Rule

DEPARTMENT OF THE INTERIOR

Bureau of Reclamation

AGENCY: Bureau of Reclamation, Interior.

ACTION: Notice of proposed rulemaking.

SUMMARY: Under this proposed rule Colorado River water may be stored offstream in the Lower Basin to permit future interstate use of Colorado River water in the Lower Division States (Arizona, California, or Nevada). This proposed rule would establish the procedural framework under which authorized entities (for example, a State-authorized water bank) in any Lower Division State could store offstream Colorado River water to develop storage credits associated with that water, and redeem those water storage credits within the Lower Division. This rule would increase the efficiency, flexibility, and certainty in Colorado River management.

DATES: Comments:

Any comments must be received by Reclamation at the address below on or before March 2, 1998.

Request for Public Hearings

Upon request, Reclamation will hold public hearings on the proposed rule in Las Vegas, Nevada, Phoenix, Arizona and Ontario, California. Reclamation will accept requests for public hearings until 4:00 p.m. Pacific time on January 30, 1998.

ADDRESSES:

Comments

If you wish to comment, you may submit your comments by any one of several methods. You may mail comments to Bureau of Reclamation, Administrative Record, Lower Colorado Regional Office, P.O. Box 61470, Boulder City, NV 89006-1470. You may also comment via

the Internet at bjohnson@lc.usbr.gov (see Electronic Access and Filing Addresses under **SUPPLEMENTARY INFORMATION**). In addition, you may hand-deliver comments to Bureau of Reclamation, Administrative Record, Lower Colorado Regional Office, 400 Railroad Avenue, Boulder City, Nevada.

Comments, including names and street addresses of respondents, will be available for public review at this address during regular business hours (7:45 a.m. to 4:15 p.m.), Monday through Friday, Pacific time, except holidays. If you wish to request that Reclamation consider withholding your name or street address from public review or from disclosure under the Freedom of Information Act, you must state this prominently at the beginning of your comment. All submissions from organizations or businesses, and from individuals identifying themselves as representatives or officials of organizations or businesses, will be made available for public inspection in their entirety.

Public Hearings

If Reclamation receives a request to schedule public hearings in Las Vegas, Nevada; Phoenix, Arizona; or Ontario, California, Reclamation will hold such hearings at the following locations: McCarran International Airport, 5757 Wayne Newton Boulevard, Commissioner's Meeting Room, 5th Floor, Terminal 1, Las Vegas, Nevada; Bureau of Indian Affairs conference room, 2 Arizona Center, 400 North 5th Street, 12th Floor, Phoenix, Arizona; Red Lion Hotel, 222 North Vineyard, Ontario, California. Upon request, Reclamation will consider holding public hearings in other locations, at times and on dates that Reclamation will announce prior to the hearings.

Request for public hearings and request to participate in public hearings

Submit requests for public hearings and requests to participate in public hearings orally or in writing to Mr. Dale E. Ensminger, Boulder Canyon Operations Office, Bureau of Reclamation, P.O. Box 61470, Boulder City, Nevada 89006-1470, telephone (702) 293-8659.

FOR FURTHER INFORMATION CONTACT:

Mr. Dale Ensminger, telephone (702) 293-8659.

SUPPLEMENTARY INFORMATION:

This section provides the following information:

I. Public Comment Procedures

Written Comments

Electronic Access and Filing Addresses

Public Hearings

II. Background

III. Purpose of this Rule

IV. Prior Rulemaking Proceedings

V. Section-by-Section Analysis of Proposed Rule

VI. Procedural Matters

Environmental Compliance

Paperwork Reduction Act

Regulatory Flexibility Act

Unfunded Mandates Reform Act of 1995

Executive Order 12612, Federalism Assessment

Executive Order 12630, Taking Implications Analysis

Executive Order 12866, Regulatory Planning and Review

Author

List of Subjects in 43 CFR Part 414

I. Public Comment Procedures

Written Comments

Written comments on the proposed rule should be specific, should be confined to issues pertinent to the proposed rule, and should explain the reason for any recommended change. Where possible, comments should reference the specific section or paragraph of the proposed rule that the commenter is addressing. Reclamation will not necessarily consider or include in the Administrative Record for the final rule comments which Reclamation receives after the close of the comment period (see **DATES**) or comments delivered to an address other than those listed above (see **ADDRESSES**).

Electronic Access and Filing Addresses

If you comment via the Internet at bjohnson@lc.usbr.gov (see **ADDRESSES**), please submit comments as an ASCII file avoiding the use of special characters and any form of encryption. Please also include "attn: AC1006-AA40" and your name and return address in your Internet message. If you do not receive a confirmation from the system that we have received your Internet message, contact us directly at (702) 293-8411.

Public Hearings

Individuals who wish to attend but not testify at any hearing should contact the person identified under **FOR FURTHER INFORMATION CONTACT** beforehand to verify that Reclamation will hold the hearing. Reclamation will hold public hearings on the proposed rule as specified above if a member of the public requests a public hearing. Any person who desires to participate at a hearing at a particular location should inform Mr. Dale E. Ensminger under **FOR FURTHER INFORMATION CONTACT** either orally or in writing of the desired hearing location by 4:00 p.m. Pacific time January 30, 1998. If no one has contacted Mr. Dale E. Ensminger to express an interest in participating in a hearing at a given location by that date, Reclamation will not hold that hearing. If only one person expresses an interest, Reclamation

may hold a public meeting rather than a hearing, and Reclamation will include the results in the Administrative Record. If Reclamation holds a hearing, Reclamation will continue the hearing until all persons wishing to testify have had an opportunity to do so. In order to assist the transcriber and to ensure an accurate record, Reclamation requests that each person who testifies at a hearing give the transcriber a copy of that testimony. In order to assist Reclamation in hearing preparation, Reclamation also requests that each person who plans to testify submit to Reclamation at the address previously specified (see ADDRESSES) an advance copy of that testimony.

II. Background

The Colorado River serves as a source of water for irrigation, domestic, and other uses in the States of Arizona, California, Colorado, Nevada, New Mexico, Utah, and Wyoming, and in the Republic of Mexico. The initial apportionment of water from the Colorado River was made by an interstate compact, the Colorado River Compact, dated November 24, 1922 (Compact). The Compact became effective in 1929 following ratification by six states and approval by the Congress of the United States. The State of Arizona became the final State to ratify the Compact in 1944. The Compact defined the Colorado River Basin and divided the seven States into two basins, an Upper Basin and a Lower Basin. The Compact apportioned to each basin, in perpetuity, the exclusive beneficial consumptive use of 7.5 million acre-feet (maf) of water. Under the Compact, "consumptive use" means diversions of water from the mainstream of the Colorado River, including water drawn from the mainstream by underground pumping, less return flow to the river.

The Lower Basin includes 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 (Arizona), a point in the mainstream of the Colorado River 1 mile below the mouth of the Paria River. The Compact also grouped the seven States into two divisions, the Upper Division and the Lower Division. The Lower Division consists of the States of Arizona, California, and Nevada. All mainstream Colorado River water apportioned by the Compact to the Lower Basin is divided among the three Lower Division States. All mainstream Colorado River waters apportioned to the Lower Basin, except for a few thousand acre-feet apportioned to the State of Arizona, have been allocated to specific entities and, except for certain Federal establishments, placed under permanent water delivery contracts with the Secretary for irrigation or domestic use. These entities include irrigation districts, water districts, municipalities, Federal establishments including Indian reservations, public institutions, private water companies, and individuals.

The Supreme Court of the United States, in its Opinion of June 3, 1963, (373 U.S. 546) and Decree entered March 9, 1964 (376 U.S. 340) (Decree), in the case of *Arizona v. California*, et al., confirmed that the Secretary was vested with sufficient authority and charged with the responsibility to direct, manage, and coordinate the operation of dams and related works on the Colorado River in the Lower Basin. The Supreme Court concluded, among other things, that the Secretary derives significant authority from the contract authority under section 5 of the Boulder Canyon Project Act of 1928 (45 Stat. 1057, 43 U.S.C. 617)(BCPA) that requires water users in

the Lower Basin to have a contract with the Secretary. The Supreme Court further concluded that Congress intended the Secretary, principally through the Secretary's section 5 contract power, to carry out the allocation of the waters of the mainstream of the Colorado River among the Lower Basin States and to decide which water users within each State would get water and on what terms. Accordingly, the Secretary acts as water master of the Colorado River in the Lower Basin.

The Decree excludes Federal establishments from the BCPA requirement for a contract with the Secretary, but the water allocated to a Federal establishment is included within the apportionment of the Lower Division State in which the Federal establishment is located. Waters available to a Lower Division State within its apportionment but with a priority date later than June 25, 1929, have been allocated by the Secretary to water users within that State after consultation with the State.

Many Colorado River water rights originated as "perfected rights" that are specified in the Decree as rights acquired in accordance with State law and exercised by the actual diversion of a specific quantity of water for beneficial use on a defined area of land or to definite municipal or industrial works, and in addition will include water rights created by the reservation of mainstream water for the use of Federal establishments under Federal law whether or not the water has been applied to beneficial use. The highest priority Colorado River water rights are present perfected rights (PPR's) that the Decree defines as those perfected rights existing on June 25, 1929 (the effective date of the BCPA). The Decree also recognizes Federal Indian reserved rights for the quantity of water necessary to irrigate all the practically irrigable acreage on five Indian reservations along the Colorado River. The Decree defines the rights of Indian and other Federal reservations to be Federal establishment PPR's. PPR's are important because in any year in which there is less than 7.5 maf of Colorado River water available for consumptive use in the Lower Basin States, PPR's will be satisfied first in the order of their priority without regard to State lines.

In 1996, Arizona enacted a State-authorized program establishing an Arizona State Water bank that would allow offstream storage of Colorado River water and subsequent interstate delivery of such stored water through redemption of credits pursuant to Interstate Storage Agreements. In the future, other Lower Division States may enact comparable measures.

III. Purpose of this Rule

Arrangements that facilitate more efficient use of the limited Colorado River water resource are beneficial to all water users. This proposed rule addresses offstream storage of Colorado River water and development of storage credits by authorized entities within the Lower Division States. Authorized entities include a State water banking authority, or other entity of a Lower Division State holding entitlements to Colorado River water, expressly authorized pursuant to applicable laws of Lower Division States to: (1) Enter into Interstate Storage Agreements; (2) develop intentionally created unused apportionment; (3) acquire the right to use intentionally created unused apportionment; or (4) develop or redeem storage credits for the benefit of an authorized entity in another Lower Division State.

The rule will establish a framework for the Secretary to follow in approving and

administering interstate agreements to allow offstream storage and contractual distribution of Colorado River water, and thereby encourage voluntary interstate water transactions among the Lower Division States. Such voluntary water transactions, including interstate contractual distribution of Colorado River water consistent with the BCPA and the requirements of the Supreme Court of the United States in its Decree entered March 9, 1964 (3376 U.S. 340) (Decree) in *Arizona v. California, et al.*, can help to satisfy regional water demands. The proposed rule does not deal with intrastate storage and distribution of water.

The proposed rule will foster prudent water management in the Lower Division States by allowing authorized entities of Consuming States, pursuant to an interstate agreement, to store Colorado River water offstream, to receive storage credits for the stored water, and to recover this water for future use. The offstream storage will be accomplished through an authorized entity of the Storing State. The water to be stored will be basic apportionment from the Storing State or unused basic apportionment or unused surplus apportionment of the Consuming State. The proposed rule is based on the understanding that this type of offstream storage is a beneficial consumptive use of Colorado River water. The rule is permissive in nature and is intended to encourage and facilitate these voluntary water transactions.

The proposed rule is designed to improve the Secretary's ability to fulfill his responsibilities to manage the Lower Basin of the Colorado River on a more efficient basis. This proposed rule is expected to be a first step toward improving the efficiency associated with management of the Colorado River in the Lower Basin.

While taking action in the form of this proposed rule to assist the States of the Lower Division of the Colorado River to meet their water needs, the Department also acknowledges its responsibilities to the Indian Tribes in the Lower Division. The Department is interested in finding ways that the Tribes may more fully benefit from the water rights they hold in the Lower Basin, and in protecting the availability of water supplies to which these rights attach.

The focus in the proposed rule is on the use of State-authorized entities, including water banks, as a vehicle for authorizing interstate storage and redemption of storage credits associated with Colorado River water. The Department believes that the interstate water storage and deliveries permitted by these rules can be implemented without compromising its responsibilities toward, and in fact may lead to benefits to, the Indian Tribes. The Department's proposed reliance on State-authorized entities is predicated, in part, on its expectation that these entities will be operated in a fashion that provides an opportunity for Indian Tribes to participate in storage and similar activities. In this regard the Department notes that the State of Arizona is examining "mechanisms that will enable Indian communities that hold entitlements to Colorado River water to participate in water banking with the Arizona Water Banking Authority." Arizona Laws 1996, ch. 308, Sec. 27. The Department encourages Arizona and the other Lower Division States to implement programs within the existing Law of the River that will allow the Tribes to more fully benefit from their water rights.

In addition, the Department will be mindful of the need to protect local tribal water resources when fulfilling its role as set forth in these interstate water banking rules. Tribes as well as other water rights holders may, for example, have concerns regarding the potential impacts of future groundwater withdrawals from a water bank on their water rights. The Department wants to work with Lower Division States and authorized entities banking

Colorado River water to ensure that water stored and recovered for interstate delivery does not adversely impact those local tribal water resources. Under the proposed rule the Secretary will, when determining whether to approve a proposed interstate transaction, take into account, among other things, the potential impacts of a proposed transaction on water rights holders, including Indian Tribes. See Sec. 414.3(b).

Finally, this proposal does not address, and is not intended to govern the exercise of, whatever authority the Secretary of the Interior has to consider and implement, in appropriate situations, tribal storage and water transfer activities.

Except as described below, the Secretary, in reviewing an Interstate Storage Agreement, will not focus on the price associated with utilization of storage credits or other financial details agreed to by the authorized entities as willing sellers and willing buyers. The transaction must leave the United States in no worse a financial position than if the transaction had not occurred. When it is operationally feasible to do so, United States facilities may be available for use in storing, delivering, and distributing Colorado River water offstream under the proposed rule to the extent that the United States is fully reimbursed for relevant capital, interest, and operation and maintenance costs. Approval to deliver Colorado River water cannot obligate the Federal Government to incur extra non-reimbursable expenses to store water or deliver it to a new location. Further, existing Reclamation law requires adjustment in repayment terms when use of the water shifts from a non-interest bearing category to an interest-bearing category, such as from agriculture use to municipal and industrial use. Additionally, if pumping power is needed to affect a given transaction, the parties to the transaction must provide or pay for such power, and may have to secure it from non-Federal sources.

The actions and transactions contemplated in the proposed rule are within the current authority of the Secretary, the BCPA, and the Decree. Under BCPA, with the exception of Federal Establishments PPR's, no authorized entity may receive Colorado River water except in accordance with a contract with the Secretary. Where appropriate to implement the Interstate Storage Agreement, the Secretary will contract for water deliveries under Section 5 of the Boulder Canyon Project Act. In accordance with specific approvals, offstream storage and development of storage credits for interstate purposes have already taken place on a limited basis. The proposed rule will provide a standard set of procedures to be used in place of the ad hoc processes that have been used for previous interstate water transactions. These procedures will provide greater flexibility, certainty, and assurance to all parties potentially interested in entering into interstate transactions for storage of Colorado River water and use or redemption of storage credits. This increased certainty is expected to promote more efficient management of the Colorado River and facilitate additional voluntary water transactions of this type among Lower Basin water users.

The Secretary will consider the implications of the proposed Interstate Storage Agreement for the financial interests of the United States and the United States will require the parties who benefit from the transactions to fund the United States' reasonable costs to evaluate, process, and/or approve transactions entered into under this rule. In considering a request for approval of an Interstate Storage Agreement for offstream storage of Colorado River water and use or redemption of storage credits, the Secretary will consider, among other relevant factors: applicable law; applicable contracts; potential effects on trust resources; potential effects on

contractors or Federal entitlement holders, including Indian and non-Indian PPR holders and other Indian tribes; potential effects on other third parties; environmental impacts and effects on threatened and endangered species; comments from interested parties, particularly parties who may be affected by the proposed action; and other relevant factors, including the implications of the proposed Interstate Storage Agreement for the financial interests of the United States.

IV. Prior Rulemaking Proceedings

In 1991, 1992, and 1994, Reclamation developed draft rules for administering Colorado River water entitlements and distributed drafts to known interested parties. Among other things, those drafts included provisions that would have allowed instream storage of water saved, interstate transfer of conserved water, reductions in entitlements due to nonuse, and proposed water conservation criteria. Because of the controversy associated with these proposals, Reclamation suspended further work on the rule in late 1994 to allow the Lower Division States time to develop a consensus on storage and interstate transfer issues. While a consensus on all of these issues has not been achieved, it appears that there is strong support and demand for a new, more narrowly focused rule that will facilitate offstream water storage and interstate water delivery programs in the Lower Basin.

V. Section by section analysis of the Proposed Rule

Section 414.1. Purpose

Under this proposed rule Colorado River water may be stored offstream to permit future interstate use of Colorado River water. This proposed rule would establish the procedural framework under which authorized entities of any of the Lower Division States (Arizona, California, or Nevada) could store offstream through another authorized entity (for example, State-authorized water banks) in any Lower Division State. Colorado River water allocated but not taken by water entitlement holders within the State where the storage occurs, or unused basic apportionment, or surplus apportionment of the Consuming State. The authorized entity of the Storing State would develop, on behalf of the authorized entity in the consuming state, storage credits associated with that water. When unused apportionment is intentionally created to satisfy a request for delivery of water from storage credits, the authorized entity must ensure that its State's consumptive use is decreased by a quantity sufficient to offset the quantity of storage credits that are to be made available as unused apportionment by the Secretary and delivered for use in another Lower Division State in accordance with Article II(B)(6) of the Decree. This rule would increase efficiency, flexibility, and certainty in Colorado River management.

The proposed rule establishes procedures for interstate contractual distribution derived from credits for Colorado River water stored offstream. These procedures will apply to all holders of entitlements to use Colorado River water in the Lower Division States. The proposed rule allows authorized entities of any Lower Division State to enter into agreements with authorized entities of another Lower Division State to store Colorado River water offstream, develop

storage credits, and redeem storage credits associated with that water, subject to the approval of the Secretary.

Section 414.2. Definitions

This section of the rule defines terms that are used in the rule. The following terms are defined by or derived from the Decree: basic apportionment, Colorado River water, consumptive use, mainstream, surplus apportionment, and unused apportionment. Most of the other terms were defined for the purposes of this rule to establish a common understanding of terms relating to storage of water.

All Interstate Storage Agreements for offstream storage of Colorado River water and the interstate redemption of storage credits under this proposed rule would be executed by a State water banking authority, or other entities holding entitlements to Colorado River water, expressly authorized pursuant to applicable laws of Lower Division States to: (1) enter into Interstate Storage Agreements; (2) develop intentionally created unused apportionment; (3) acquire the right to use intentionally created unused apportionment; or (4) develop or redeem storage credits for the benefit of an authorized entity in another Lower Division State. States are encouraged to define the term "authorized entity" broadly so as not to exclude appropriate entities potentially interested in entering into arrangements to develop or acquire water storage credits on an interstate basis. Constraints placed on "authorized entities" will have the likely effect of reducing the net benefits associated with the proposed rule.

The proposed rule includes a definition of intentionally created unused apportionment of Colorado River water. As proposed, it does not specify what measures or actions may be used to create such apportionment. In Section 414.3, the Secretary specifies the information that he will consider in approving any proposed Interstate Storage Agreement. Subparagraph (a)(7) of Section 414.3 directs that any request for approval of a proposed Interstate Storage Agreement, "specify which action the authorized entity will take to create intentionally created unused apportionment." The Department seeks comment on the issue of whether the final definition of intentionally created unused apportionment should specify what types of measures or actions the Secretary would approve as intentionally created unused apportionment. Comments should identify actions that would be adequate to demonstrate the development of intentionally created unused apportionment.

Section 414.3. Interstate Storage Agreements and Redemption of Storage Credits

The proposed rule would authorize offstream storage of Colorado River water in the Lower Division States by State-authorized entities on the basis of approved Interstate Storage Agreements. Under this section of the proposed rule, a Lower Division State authorized entity could establish a water bank and store Colorado River water on behalf of authorized entities in the other two Lower Division States. Such water banks could store water consisting of water allocated but not taken by water entitlement holders within the Storing State, or unused basic apportionment, or surplus apportionment of the Consuming State.

The proposed rule assumes that there are two ways to "store" water in offstream storage:

direct storage or indirect storage. Direct storage can be accomplished by putting water into an underground aquifer at an underground water storage facility or in a surface reservoir located off the mainstream of the Colorado River. Indirect storage can be accomplished through groundwater savings that result from replacing established groundwater use with Colorado River water.

A central feature of the procedures in the proposed rule is the Interstate Storage Agreement. Under this section of the proposed rule, the authorized entities of two or more Lower Division States may enter into an agreement to store Colorado River water offstream. To become effective, these agreements require approval by the Secretary. To obtain the approval of the Secretary, each Interstate Storage Agreement must contain a description of the following: quantity of water to be stored; location of storage; type and source of water; accounting, reporting and use of storage credits associated with water to be stored; end use of water to be stored; and the extent to which Federal facilities or resources will be used to deliver or store Colorado River water stored offstream.

Under the proposed rule, the Secretary has 120 days to approve or disapprove such agreements unless the Secretary determines that additional time is necessary to review the agreement because the proposal involves significant environmental compliance activities or other issues. In reviewing any proposed Interstate Storage Agreement, the Secretary will consider the following: applicable law; applicable contracts; potential effects on trust resources; potential effects on contractors or Federal entitlement holders, including Indian and non-Indian present perfected rights (PPR) holders and other Indian tribes; potential effects on third parties; environmental impacts and effects on threatened and endangered species; comments from interested parties, particularly parties who may be affected by the proposed action; and other relevant factors, including the implications of the proposed Interstate Storage Agreement for the financial interests of the United States.

Under this section of the proposed rule, storage credits are developed for the benefit of the authorized entity for which Colorado River water is placed in offstream storage. The storage credits entitle the entity to recover water at a later date. The authorized entities involved in the transaction will account for the water diverted and stored offstream under an Interstate Storage Agreement, and prior to any redemption of storage credits certify to the Secretary that water associated with storage credits has been stored. The Secretary must be satisfied that necessary actions have been taken to develop intentionally created unused apportionment. Once this determination has been made, the Secretary will make available this intentionally created unused apportionment for use by the authorized entity of the Consuming State consistent with the BCPA, Article II(B)(6) of the Decree, and all other applicable laws. Also, under this section, Interstate Storage Agreements may be assigned in whole or in part to authorized entities upon the agreement of the parties to the Interstate Storage Agreement and approval of the Secretary.

Section 414.4. Reporting Requirements and Accounting for Storage Credits

Under this section of the proposed rule, each authorized entity that has stored Colorado River water offstream for interstate purposes must submit a report to the Secretary by January 31 of each year. The report will specify the quantity of Colorado River water that was stored

during the previous year and is recoverable in future years and the number of storage credits associated with that water. Under this proposed rule, the Department has assumed that storage credits would be equal to the quantity of water stored less deductions and losses from storage that includes losses attributable to evaporation or percolation or water required by State law to remain in an aquifer. Such reports will also specify the balance of Colorado River storage credits redeemed during the previous year and the balance of such credits that remain recoverable as of December 31 of the previous year. This reporting requirement will not impose a burden on the authorized entity of a Storing State because the authorized entity will need to maintain these records for its own purposes.

Under the proposed rule, the United States will continue to fulfill the requirements of the Decree that requires the Secretary to prepare and maintain, at least annually, complete, detailed, and accurate records of diversions of water from the mainstream, return flow of such water to the mainstream, and consumptive use of such water. Under the proposed rule, the water diverted and stored offstream will be accounted for as consumptively used in that same year in the Storing State, in accordance with Article V of the Decree. The accounting records would also reflect an equivalent quantity of storage credits in the Storing State. When unused apportionment is intentionally created to satisfy a request for delivery of water from storage credits, the authorized entity must take action to ensure that its State's consumptive use is decreased by a quantity sufficient to offset the quantity of water made available as unused apportionment by the Secretary and delivered for use in another Lower Division State. After the authorized entity confirms in writing to the Secretary the quantity of water to be delivered for use in the Consuming State and includes documentation of actions taken to intentionally create a like quantity of unused apportionment, the Secretary will declare unused apportionment available within the Storing State and allocate that unused apportionment to the Consuming State to allow recovery of the storage credits. The intentionally created unused apportionment so made available to the Consuming State by the Secretary will be accounted for as consumptively used when Colorado River water in the amount of the intentionally created unused apportionment is released for use in the Consuming State, in accordance with Article V of the Decree.

Under the proposed rule and in accordance with Article II(B)(6) of the Decree, the Secretary may release in any one year any Colorado River water that is apportioned for consumptive use in a Lower Division State but which will be unused in that State for consumptive use in another Lower Division States in that same year. The water so released for consumptive use in the other Lower Division States is unused apportionment.

For example, under the proposed rule, when storage credits are redeemed, Colorado River water that would otherwise be supplied to a water user in a Storing State could be supplied from offstream storage in that State. The Storing State will reduce its Colorado River water use in accordance with the approved Interstate Storage Agreement. Then the Secretary, in accordance with the terms of Article II (B)(6) of the Decree, will make the Colorado River water available to the Consuming State. No other Lower Division State or other user in the Storing State will be able to claim the water since the Secretary is authorized under Article II (B)(6) of the Decree to make such water available, and the Secretary will have agreed to implement the terms of the Interstate Storage Agreement. No other Lower Division State will be eligible to receive water

made available to the Consuming that Interstate Storage Agreement.

Section 414.5. Water Quality

This section of the rule is a disclaimer which states that except for specific water quality responsibilities that are established for the Secretary by Federal law, the Secretary does not guarantee the quality of water released or delivered through Federal facilities. Water quality will be monitored by the Environmental Protection Agency and the Army Corps of Engineers and will be subject to State or Tribal jurisdiction, as appropriate, in accordance with the Clean Water Act.

Section 414.6 Environmental Compliance

Under the proposed rule, the Secretary is responsible for ensuring the actions taken under the rule comply with the National Environmental Policy Act of 1969, as amended (NEPA), the Endangered Species Act of 1973, as amended (ESA), and will integrate the requirements of other statutes, laws, and executive orders as required for Federal actions taken under this proposed rule.

Federal actions requiring environmental compliance may include, but are not limited to, approval of transactions that entail changes in the place or quantity of water diversions necessary to store a Lower Division State's water. In evaluating a proposed Federal action taken under this part for compliance with the National Environmental Policy Act, the Secretary will consider effects on natural and other resources as identified in the Bureau of Reclamation's National Environmental Policy Act (NEPA) Handbook and other relevant environmental laws and regulations. The parties to a proposed transaction would be responsible for completing environmental compliance documentation in accordance with the standards set forth in the Bureau of Reclamation's NEPA Handbook and subject to Reclamation approval prior to the Secretary's approval of the proposed action.

The Department, through Reclamation, will collect in advance the estimated costs incurred by the United States in evaluating, processing, or approving the action from the persons or entities who would benefit from a proposed action under this rule.

VI. Procedural Matters

Environmental Compliance

Reclamation has prepared a draft environmental assessment (DEA). Reclamation has placed the DEA on file in the Reclamation Administrative Record at the address specified previously. The public is invited to review the DEA by contacting Reclamation at the addresses listed above (see **ADDRESSES**) and suggests that anyone wishing to submit comments in response to the DEA do so in accordance with the Written Comments section above.

Compliance with NEPA, the ESA, and other relevant statutes, laws, and executive orders will be completed for future Federal actions taken under this rule to ensure that any action

authorized or carried out by the Secretary does not jeopardize the continued existence of any threatened or endangered species, does not adversely modify or destroy a critical habitat, and is analyzed by an appropriate environmental document. Consultation and coordination between Reclamation, the Fish and Wildlife Service, other agencies, and interested parties will be completed on a case-by-case basis.

Paperwork Reduction Act

The Department believes that this rule does not contain information collection requirements that the Office of Management and Budget (OMB) must approve under the Paperwork Reduction Act of 1995, 44 U.S.C. 3501 et seq. This proposed rule is geographically limited to the States of Arizona, California and Nevada. The proposed rule covers authorized entities that would store Colorado River water off the mainstream of the Colorado River. The information to be reported will be compiled by the authorized entities in the course of their normal business and the annual reports to the Secretary will not impose any significant time or cost burden. It is estimated that each respondent would need one hour at an estimated cost of \$20 to complete the annual reporting requirement. Moreover, the Department assumes that there will never be an industry-wide collection of information and assumes that there will always be fewer than 10 entities required to report information. Notwithstanding these circumstances, the Department intends to seek information collection approval from the OMB, pursuant to the Paperwork Reduction Act of 1995, 44 U.S.C. 3501 et seq.

Regulatory Flexibility Act

Congress enacted The Regulatory Flexibility Act of 1980 (RFA), 5 U.S.C. 601 et seq., to ensure that Government regulations do not unnecessarily or disproportionately burden small entities. The RFA requires a regulatory flexibility analysis if a rule would have a significant economic impact, either detrimental or beneficial, on a substantial number of small entities. An initial RFA analysis has been completed. This rule will not impose any direct cost on small entities. A benefit-cost analysis was completed and concludes that the proposed rule does not impose significant or unique impact upon small governments (including Indian communities), small entities such as water purveyors, water districts, or associations, or individual entitlement holders.

Unfunded Mandates Reform Act of 1995

The adoption of 43 CFR part 414 will not result in any unfunded mandate to State, local, or tribal governments in the aggregate, or to the private sector, of \$100 million or more in any one year.

Executive Order 12612, Federalism Assessment

[The proposed rule does not alter the relationship between the Federal Government and the](#)

States under the Decree nor does it alter the distribution of power and responsibilities among the various levels of government. Therefore, in accordance with Executive Order 12612, the Secretary has determined that this proposed rule does not have sufficient federalism implications to warrant preparation of a Federalism Assessment.

Executive Order 12630, Takings Implications Analysis

The proposed rule does not represent a government action capable of interfering with constitutionally protected property rights. This rule does not impose additional fiscal burdens on the public. This rule would not result in physical invasion or occupancy of private property or substantially affect its value or use. The rule would not result in any Federal action that would place a restriction on a use of private property. The rule does not affect a Colorado River water entitlement holder's right to use its full water entitlement. Under the proposed rule, an authorized entity may store unused Colorado River water available from an entitlement holder's water rights only if the water right holder does not use or store that water on its own behalf. Under the proposed rule, the only water that can be used to satisfy storage credits is unused apportionment created by the forbearance of a use which otherwise would have occurred. Therefore, the Department of the Interior has determined that the rule would not cause a taking of private property or require further discussion of takings implications under this Executive Order.

Executive Order 12866, Regulatory Planning and Review

This proposed rule is a significant regulatory action under section 3(f)(4) of Executive Order 12866 because it raises novel legal or policy issues. Executive Order 12866 requires an assessment of potential costs and benefits under section 6(a)(3) of that Executive Order. Reclamation's benefit-cost analysis determines that the proposed rule does not impose significant or unique impacts upon small governments (including Indian communities), small entities such as water purveyors or associations, or even individual water entitlement holders.

The proposed rule authorizes the distribution of Colorado River water storage credits created by off stream storage on an interstate basis.

California and Nevada are looking for alternative water supplies to satisfy the increasing demands of economic development and population growth. The proposed rule may provide an opportunity for Colorado River water users in Nevada to experience a marginal costs savings in securing alternative supplies. Off stream storage of Colorado River water and interstate distribution of Colorado River water storage credits are voluntary actions. Should the costs of the procedures proposed in the rule to facilitate these transactions be greater than the costs of other alternative water supplies, California and Nevada would probably select the lower cost alternatives.

The benefit-cost analysis estimated net economic benefits of the proposed rule on a State and regional level using different water supply models and discount rates. The different water supply models represent potential water supply conditions on the Colorado River that affect interstate demand for water from an Arizona water bank and the magnitude of economic benefits

obtained from that water. The discount rates used in the analysis were 5.75% (the average rate on municipal bonds in 1996, which is a rate faced by major water purveyors in California and Nevada) and 8.27% (the prime rate in 1996, which more accurately represents the cost of money).

Under a conservative water supply scenario characterized by 19 years of normal conditions on the Colorado River and one surplus year, discounted net economic benefits at the regional level ranged from \$12.8 to \$61.2 million at 5.75% and \$9.5 to \$47.7 million at 8.27%. Under a water supply scenario characterized by 10 years of surplus conditions on the Colorado River, the net economic benefits range from \$550,255 to \$4.8 million at 5.75% and \$350,789 to \$3.1 million at 8.27%. Under the scenario characterized by 10 surplus years, demand for banked water is relatively low because the Lower Division States can meet most of their water needs with diversions from the mainstream.

Reclamation has placed the full analysis on file in the Reclamation Administrative Record at the address specified previously (see **ADDRESSES**).

Author

The principal author of this rule is Mr. Dale E. Ensminger, Boulder Canyon Operations Office, Bureau of Reclamation, P.O. Box 61470, Boulder City, Nevada 89006-1470, telephone (702) 293-8659.

List of Subjects in 43 CFR Part 414

Administrative practice and procedure, Environmental protection, Public lands, Reporting and recordkeeping requirements, Water bank program, Water resources, Water storage, Water supply, Water quality.

Dated: December 22, 1997.

Patricia J. Beneke,
Assistant Secretary--Water and Science.

For the reasons stated in the preamble, the Bureau of Reclamation proposes to add a new part 414 to title 43 of the Code of Federal Regulations as follows:

PART 414--OFFSTREAM STORAGE OF COLORADO RIVER WATER AND INTERSTATE REDEMPTION STORAGE CREDITS IN THE LOWER DIVISION STATES

Sec.

414.1 Purpose.

414.2 Definitions.

414.3 Interstate storage agreements and redemption of storage credits.

- 414.4 Reporting requirements and accounting for storage credits.
- 414.5 Water quality.
- 414.6 Environmental compliance.

Authority: 43 U.S.C. 617; 43 U.S.C. 391; 43 U.S.C. 485; 43 U.S.C. 1501; 5 U.S.C. 553; 373 U.S. 546; 376 U.S. 340.

Sec. 414.1 Purpose.

This part sets forth the procedural framework for approval by the Secretary of the Interior of interstate agreements for the offstream storage of Colorado River water in the Lower Division States by State-authorized entities consistent with State law. In accordance with the Secretary's authority under Article II (B) (6) of the Decree entered March 9, 1964 (376 U.S. 340), in the case of *Arizona v. California*, et al. as supplemented and amended, this part also includes the procedural framework to develop and [redeem storage credits associated with Colorado River water stored offstream](#) by authorized entities consistent with State law. This part does not address intrastate storage or distribution of water not subject to an Interstate Storage Agreement.

Sec. 414.2 Definitions.

The following definitions, listed alphabetically, apply to this part:

Authorized entity means a State water banking authority, or other entity of a Lower Division State holding entitlements to Colorado River water, expressly authorized pursuant to applicable laws of Lower Division States to:

- (1) Enter into Interstate Storage Agreements;
- (2) Develop intentionally created unused apportionment;
- (3) Acquire the right to use intentionally created unused apportionment; or
- (4) [Develop or redeem storage credits for the benefit of an authorized entity in another Lower Division State.](#)

Basic apportionment means the Colorado River water apportioned to each Lower Division State when sufficient water is available for release, as determined by the Secretary of the Interior, to satisfy 7.5 million acre-feet (maf) of annual consumptive use in the Lower Division States. The annual basic apportionment for the Lower Division States is 2.8 maf of consumptive use for the State of Arizona, 4.4 maf of consumptive use for the State of California, and 0.3 maf of consumptive use for the State of Nevada.

Colorado River water means water in or withdrawn from the mainstream.

[Consuming State means a Lower Division State where water made available by redeeming storage credits is or will be used.](#)

Consumptive use means diversions from the Colorado River less such return flow to the river as is available for consumptive use in the United States or in satisfaction of the Mexican treaty obligation. Consumptive use from the mainstream within the Lower Division States includes all consumptive use of water from the mainstream, including water drawn from the

mainstream by underground pumping. The Mexican treaty obligation is set forth in the February 3, 1944, Water Treaty between Mexico and the United States, including supplements and associated Minutes of the International Boundary and Water Commission.

Contractor means any person or entity in the States of Arizona, California, or Nevada who has a valid contract or agreement with the United States for the delivery of Colorado River water.

Decree means the decree entered March 9, 1964, by the Supreme Court in Arizona v. California, et al., 373 U.S. 546 (1963), as supplemented or amended.

Entitlement means an authorization to beneficially use Colorado River water pursuant to:

- (1) A decreed right,
- (2) A contract with the United States through the Secretary, or
- (3) A reservation of water from the Secretary.

Federal entitlement holder means a Federal agency or Indian tribe identified in Article II(D) of the Decree as having an entitlement for the beneficial use of Colorado River water.

Intentionally created unused apportionment means unused apportionment that is created solely as a result of an agreement within a Storing State for the purposes of making Colorado River water available for use in a Consuming State in fulfillment of a request for redemption of storage credits pursuant to an Interstate Storage Agreement.

Interstate storage agreement means an agreement, consistent with this part, that provides for offstream storage of Colorado River water in a Storing State for authorized entities in Consuming States and for the recovery of the stored water. An Interstate Storage Agreement will be among authorized entities of two or more Lower Division States and may include other entities that are determined to be appropriate to the performance and enforcement of the agreement under Federal law and the respective laws of the Storing State and the Consuming State.

Lower Division States means the States of Arizona, California, and Nevada.

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.

Offstream storage means storage in a surface reservoir off of the mainstream or in a groundwater aquifer. Offstream storage also includes indirect recharge when mainstream water is exchanged for groundwater that otherwise would be pumped and consumed.

Present perfected right or PPR means perfected rights defined by the Decree, existing as of June 25, 1929, the effective date of the Boulder Canyon Project Act (45 Stat. 1057, 43 U.S.C. 617) (BCPA). All present perfected rights are listed in the supplemental decrees entered January 9, 1979, and April 16, 1984, by the United States Supreme Court in Arizona v. California, et al., as amended or supplemented.

Secretary means the Secretary of the Interior or an authorized representative.

Storage Credit refers to an accounting device to reflect a quantity of Colorado River water that is stored offstream.

Storing State means a Lower Division State in which water is stored off the mainstream.

Surplus apportionment means the Colorado River water apportioned to each Lower Division State when sufficient water is available for release, as determined by the Secretary, to

satisfy in excess of 7.5 maf of annual consumptive use in the Lower Division States.

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

Unused entitlement means any Colorado River water that is made available to but not scheduled and used by an entitlement holder during the year for which it is made available.

Sec. 414.3 Interstate storage agreements and redemption of storage credits.

(a) *Interstate storage agreements.* In accordance with Article II(B)(6) of the Decree, authorized entities of two or more Lower Division States may enter into Interstate Storage Agreements subject to the approval of the Secretary in accordance with paragraph (b) of this section. An Interstate Storage Agreement will allow an authorized entity in a Storing State to store unused entitlement and/or unused apportionment for the credit of an authorized entity located in a Consuming State and will provide for the subsequent redemption of the credit. Such an agreement must:

- (1) Specify the quantity of Colorado River water to be stored, by which authorized entity it will be stored, the Lower Division State in which it is to be stored, and the storage facility(ies) in which it will be stored.
- (2) Specify whether the water to be stored will be basic apportionment from the Storing State or unused basic apportionment or unused surplus apportionment of the Consuming State. If it is to be unused apportionment, it may only be made available from the Consuming State and the agreement must so specify.
- (3) Specify the quantity of storage credits associated with water stored offstream that will be available to the authorized entity in the Consuming State at the time water is actually stored under the agreement.
- (4) Specify that accumulated storage credits may not be redeemed within the same calendar year in which the water that generated those credits was stored offstream.
- (5) Specify that the authorized entity in the Consuming State will provide notice to the Lower Division States and to the Secretary no later than November 30 of its intention to request delivery of a specific quantity of Colorado River water by redeeming accumulated storage credits in the following calendar year.
- (6) Specify that the authorized entity of a Storing State, after receiving a notice of intention to redeem offstream storage credits, will take actions to ensure that the Storing State's consumptive use of Colorado River water will be decreased by a quantity sufficient to develop intentionally created unused apportionment to offset the delivery of Colorado River water for use in the Consuming State in fulfillment of the storage credits.
- (7) Specify which actions the authorized entity will take to develop intentionally created unused apportionment.
- (8) Specify that the authorized entity of the Storing State must certify to the Secretary that intentionally created unused apportionment has been developed that would not otherwise exist and that the authorized entity will request the Secretary to make available that quantity of Colorado River water for use in the Consuming State pursuant to Article

- II(B)(6) of the Decree to redeem storage credits.
- (9) Indemnify the United States, its employees, agents, subcontractors, successors, or assigns from loss or claim for damages and from liability to persons or property, direct or indirect, and of any nature whatsoever arising by reason of the actions taken by the United States in accordance with this part.
 - (10) Identify the extent to which facilities constructed or financed by the United States will be used to store, convey, or distribute water associated with an Interstate Storage Agreement.

(b) Approval by the Secretary. A request for approval of an Interstate Storage Agreement should be made in writing to the Secretary. The request will be acknowledged in writing by the Secretary **within 10 business days of receipt**. The request should include copies of the proposed interstate agreement and any additional supporting data that clearly set forth the details of the proposed transaction. In reviewing the proposed interstate agreement, the Secretary will consider, among other relevant factors: applicable law; applicable contracts; potential effects on trust resources; potential effects on water rights holders, including contractors, Federal entitlement holders, Indian and non-Indian PPR holders, and other Indian tribes; potential effects on third parties; environmental impacts and effects on threatened and endangered species; comments from interested parties, particularly parties who may be affected by the proposed action; and other relevant factors, including the direct or indirect consequences of the proposed Interstate Storage Agreement on the financial interests of the United States. **The Secretary will respond to the request within 120 days. However, if the proposal involves significant environmental compliance activities or other issues such that 120 days is an insufficient period in which to respond, the Secretary will communicate this to all parties to the proposed request and set out a schedule by which such work will be completed or such issues resolved. In that case, the Secretary will render a decision within 90 days of completion of the environmental compliance activities and resolution of other issues (if applicable). Where appropriate to implement the Interstate Storage Agreement, the Secretary will contract for water deliveries under Section 5 of the Boulder Canyon Project Act.**

(c) Stored water. The authorized entity of the Storing State will account for the water diverted and stored offstream under an Interstate Storage Agreement, and prior to any redemption of storage credits will certify to the Secretary that water associated with storage credits has been stored.

(d) Redemption of storage credits. The Secretary must be satisfied that necessary actions have been taken to develop intentionally created unused apportionment for redemption of storage credits. Once this determination has been made, the Secretary will make available a quantity of Colorado River water to redeem those credits consistent with the BCPA, Article II(B)(6) of the Decree, and all other applicable laws. Intentionally created unused apportionment that is developed by the authorized entity of the Storing State will be made available to the authorized entity of the Consuming State and will not be made available to other contractors or Federal entitlement holders.

(e) Assignment. Interstate Storage Agreements may be assigned in whole or in part to authorized entities upon the agreement of the parties to the Interstate Storage Agreement and upon the approval by the Secretary consistent with the requirements of paragraph (b) of this

section.

Sec. 414.4 Reporting requirements and accounting for storage credits.

Each authorized entity will annually report to the Secretary, by January 31, the quantity of water it diverted and stored on behalf of authorized users in other Lower Division States and the balance of storage credits remaining in interstate storage for each entity as of December 31 of the prior calendar year. This water will be accounted for, in the records maintained by the Secretary under Article V of the Decree, as a consumptive use in the Storing State for the year in which it is stored. The Secretary will maintain individual balances of storage credits established by the offstream storage of water under Interstate Storage Agreements. The balances will be reduced when intentionally created unused apportionment is developed by the authorized entity in a Storing State and made available for use in a Consuming State. In the records maintained by the Secretary under Article V of the Decree, the taking of unused apportionment for use in a Consuming State by an authorized entity in redemption of its storage credits will be accounted for as consumptive use by the Consuming State of unused apportionment in the year the water is used, the same as with any other unused apportionment taken by that State.

Sec. 414.5 Water quality.

(a) No guarantee of water quality. The Secretary does not warrant the quality of water released or delivered under interstate agreements, and the United States will not be liable for damages of any kind resulting from water quality problems. The United States will not be under any obligation to construct or furnish water treatment facilities to maintain or improve water quality standards.

(b) Water quality standards. All contractors or Federal entitlement holders, in diverting, using, and returning Colorado River water, must comply with all relevant water pollution laws and regulations of the United States, the Storing State, and the Consuming State, and must obtain all applicable permits or licenses from the appropriate Federal, State, or local authorities regarding water quality and water pollution matters.

Sec. 414.6 Environmental compliance.

(a) Ensuring environmental compliance. The Secretary will ensure that environmental compliance is completed. The Secretary will be responsible for ensuring compliance with the National Environmental Policy Act of 1969, as amended, and the Endangered Species Act of 1973, as amended, and will integrate the requirements of other statutes, laws, and executive orders as required for Federal actions taken under this part.

(b) Responsibility for environmental compliance work. Authorized entities requesting Secretarial approval of an interstate transaction pursuant to this part may prepare the appropriate documentation and compliance document for a proposed Federal action such as approving a proposed interstate transaction. Such compliance documents must meet the standards set forth in Reclamation's National Environmental Policy Act Handbook before they

can be adopted. All costs incurred by the United States in evaluating, processing, and/or approving transactions entered into under this part must be funded by the parties that propose the transaction.