

FINAL AGENDA

ARIZONA WATER BANKING AUTHORITY

Tuesday, December 17, 1996

2:30 p.m. - 4:30 p.m.

Yuma City Council Chambers

180 West First Street

(map on reverse side)

- I. Welcome / Opening Remarks
- II. Adoption of Minutes of November 20 Meeting
- III. Consideration of partner agreements and storage permits
- IV. Discussion of Intergovernmental Agreement between AWBA, ADWR and CAWCD
- V. Yuma area water resource overview
- VI. Discussion on Interstate Water Banking
- VII. Call to the Public
- VIII. Adjournment

FUTURE MEETINGS

Wednesday, January 15, 1996, 9:30 a.m. - 12:30 p.m.

Arizona Department of Water Resources, 3rd floor Conference Room

Wednesday, February 19, 1996, 9:30 a.m. - 12:30 p.m.

Arizona Department of Water Resources, 3rd floor Conference Room

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DRAFT

**ARIZONA WATER BANKING AUTHORITY
Draft Minutes**

**November 20, 1996 Meeting
Arizona Department of Water Resources**



ARIZONA WATER BANKING AUTHORITY

Welcome / Opening Remarks

Chairman Pearson requested the minutes reflect all Authority members present.

Adoption of Minutes of October 16, 1996

Minutes from the October 16 meeting were adopted without any corrections.

**Presentation of comments received on 1997 Plan of Operation /
Presentation of *draft* Position Statements**

Chairman Pearson combined agenda items III and IV for discussion purposes.

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

EX OFFICIO MEMBERS
Senator Stan Barnes
Rep. Bill McGibbon

Mr. Tim Henley, AWBA Manager presented the 1997 Plan of Operation, noting the Plan had been developed over several months in meetings with many entities.

Mr. Henley stated that the Water Banking Authority staff had presented the Plan at public meetings of the Phoenix, Pinal and Tucson Groundwater User Advisory Councils (GUAC's) and noted that all comments and suggested changes in the draft Plan were highlighted in the revised version.

General comments received by Authority:

- Development of a Recovery Plan was important to many entities, including those cities dependent on CAP supplies. Potential recovery mechanisms and costs and the certainty of recovery, especially about credits developed outside of the AMA to receive the benefit.
- A feeling that the Water Banking Authority should expend monies in the AMA/county where generated whenever capacities exist before going to another AMA/county or expending general fund dollars, if possible.
- Allow for maximum flexibility in Plan of Operation to allow for changes in demand and deliveries by Authority to interested parties. (Chairman Pearson requested that AWBA legal counsel examine the legal issues surrounding future modification of the Plan).

Comments received at the three public GUAC meetings included:

Phoenix GUAC meeting:

- An appropriate share of General Fund monies should be spent in Maricopa County because most General Fund monies are generated there.
- All remaining Maricopa property tax monies should be expended to make full use of capacities at GRUSP.
- Water Banking Authority should spread recharge around an AMA whenever possible.

Pinal GUAC meeting:

- Need for some assurity in the issuing of credits from the beginning.
- Need for revision of the method used for allocation of capacities to partners by the AWBA.

Tucson GUAC meeting:

- Delay using Pima County monies until facilities are available for recharge in the Tucson area.
- If Plan continues as is for 1997, use Pima monies last in Pinal County.
- Concern expressed over the inclusion of proposed sites in the Phoenix AMA, while similar facilities were not considered in Pima County.
- The Plan should reflect the number of credits to be accrued on behalf of the Tucson area, reflecting a direct correlation between the generation of monies and the benefits to that area.
- The need of the Tucson area for assistance in the development of recharge facilities.
- The absolute commitment of the Tucson area to the CAP - the CAP is their future.

Written Comments:

Salt River Project (John Sullivan):

According to an SRP economic analyses, SRP has a per/af cost of \$15 per af. SRP has elected not to participate at the in-lieu cost of \$21 per af cost set by the Authority. Mr. Sullivan also emphasized the overlapping of the Salt River Project service area over municipal providers in central Maricopa County and that should be recognized by the Authority.

Pima County (C.H. Huckelberry)

Expressed regret that no recharge in the Tucson AMA was reflected in the draft Plan of Operation. Mr. Huckelberry mentioned that a project being developed by Pima County and Metro Water is expected to be operational in 1997 with available capacity for the Authority. Concern was also expressed over the inclusion of proposed sites in the Phoenix AMA, while facilities in a similar state in Pima County were not considered. Pima County recommended the Authority be afforded sufficient flexibility in the Plan, should potential recharge capacity be developed in Pima County in 97.

Metro Water District (Mark Stratton)

Stated that of an estimated \$1.4 million in Pima County property taxes for 1997 dedicated to the Authority, \$1.2 million is scheduled to be expended to purchase 89,000 af of CAP water for Pinal County farmers. MWD also expressed concern over the planned expenditure of the \$2 million General Fund appropriation in Maricopa and Pinal county, when roughly 20% of the \$2 million is generated in Pima County. Mr. Stratton feels that the statutory requirement to spend the monies "for the benefit of" the Tucson AMA is not adequately addressed in the Plan.

Based on the background information provided concerning the development of the Plan of Operation, the Authority determined interest in participating in the water bank, but attention paid to entities in the Tucson area was cursory at best.

Mr. Stratton went on to compare the \$22 per af cost for recharging water at GRUSP and the potential costs for capacities at the Lower Santa Cruz project and/or an expansion of the Avra Valley Recharge project.

Mr. Henley further elaborated on the modifications of the Plan, referring to the revised Plan of Operation (updated Nov. 19). He noted that the draft Plan was mailed to the interested party list for review. At the time the Plan was developed, CAP was expecting to deliver approximately 900,000 af to its subcontractors in 1997, making approx. 436,000 af available for recharge by the Authority. Authority staff developed a draft Plan to maximize the use of 436,000 af at a cost of \$8.7 million.

Based on comments received through the public process, revisions were made to the Plan. Additional changes were made based on CAP demand increasing by 75,000 af, based on more firm information from their subcontractors. Mr. Henley noted that capacity adjustments were made and that the AWBA and CAP continue to work together on the scheduling of water delivery for the AWBA.

As AWBA Staff visited with potential partners, it was discovered that some entities, such as SRP, did not wish to participate or would participate to a lesser extent at \$21. This fact is reflected in a lesser amount of water being delivered by the Authority in the revised version, where the draft plan indicated there was more interest than could be satisfied. The in-lieu water previously scheduled for SRP will now go to GRUSP.

Additionally, Mr. Henley noted that under the revised Plan, \$2 million in General Fund monies would now be spent for developing approx. 133,000 af of General Fund credits in Pinal County. Adding in a \$100,000 of Pinal County generated monies would generate about 140,000 af of delivery, which is the in-lieu capacity in Pinal at \$21 cost to farmer. In Pima County, \$1.1 million would be expended at 4 direct recharge facilities for development of approximately 19,100 af of credits.

As revised, the Plan is projected to deliver approximately 360,000 af (now 370,000 af) at a cost of \$8.9 million (now \$9 million), leaving approximately 40,000 af of capacity remaining to the Bank.

Tim Henley stated that, based on comments received, the proposed Agua Fria site was taken out of the revised Plan (since added back in), but will be utilized at the end of the year if available. The 4 sites (3 proposed and 1 existing) in Pima County have been included in the final version of the Plan, with a fall back to GRUSP should any of the facilities not have available capacities in 1997.

Mr. Henley discussed the analysis done to address concerns raised by SRP and others regarding the need for "cheaper" water with various scenarios of a 50/50 split or the Bank paying \$21. In Maricopa County, \$18 will increase the amount of water that can be delivered because SRP may participate in the in-lieu program. The trade-off would be less water going to GRUSP. In Pinal County, more potential exists at \$18, but less credits would be generated due to increased costs to Authority.

Mr. Dick Walden inquired about increasing the amount of recharge in Pima County. Mr. Henley stated that approximately \$300,000 of Pima property tax money remained that could be expended in 1997 if additional capacities came available. He further noted that existing in-lieu capacities in Pima County were being utilized by other partners with substantially different pricing structures than the AWBA.

Mr. Walden further asked how the AWBA plans to deal with the issue of partners' pumping costs being significantly less than \$21.00. Tim Henley replied that if the Authority increased their cost, thus dropping the cost to the end user, the Bank would develop less credits. Mr. Walden asked about the relation of monies generated and returned to Pima County. Mr. Henley stated that Pima is contributing approximately 10% of the funds, but their credits will cost more because they are all developed directly. He also noted that General Fund credits will be developed in Pinal County.

Mr. Grady Gammage inquired about the inclusion of the three facilities in Pima County, while not including the CAP Agua Fria site. Mr. Henley felt the Agua Fria facility could be included, but stated that it was not listed in the draft Plan because of concern about whether it will be available in 1997. He went on to state that even though a site was not included, the Plan does not prohibit that site from being utilized by the Authority. On the other hand, capacities will potentially be available in Pima County in calendar year 1997. As a result, the Authority has scheduled 19,100 af of direct recharge in the Tucson area, with a backup at the GRUSP facility.

Mr. Gammage expressed concern about the Authority supplanting capacities that otherwise would have been utilized locally? Mr. Henley stated that the staff had similar concerns, but feels that the Authority is the last increment. In addition, one reason for not dropping the in-lieu cost is that the AWBA does not want to start undercutting existing partners. The Authority wants to maximize all potential capacities in Pima County, while recognizing that fewer credits are developed with direct recharge.

Ms. Pearson asked for a clarification from Tucson that this is capacity that would not otherwise have been utilized by another entity. She stated that the legislation is clear about the AWBA being secondary in use of a facility. Ms. Pearson suggested the following language be included in the revised Plan in relation to the availability of direct facilities - "only facilities available or that are expected to be available in calendar year 1997 have been included in this Plan. If water isn't able to be recharged at a particular facility, then the backup location is GRUSP". This statement would pertain to both the CAP Agua Fria site and those proposed in Pima County. It was noted that this was the same issue raised by Mr. Gammage and would also solve his issue.

Mr. Gammage asked Mr. Henley if the statement "this Plan could be modified" would require a proposed change to be brought back to the Authority? Mr. Henley stated that the question would be addressed in later discussions on the position statements. He also stated that Agua Fria was left

out because the Authority would have the flexibility to utilize the facility if it was available in 1997.

Mr. Chase responded that he agrees sufficient flexibility exists in the Plan to allow Agua Fria to be added back in, but that the Authority might be better served to include Agua Fria in the Plan from the beginning. Mr. Chase stated that Agua Fria coming on-line would achieve the goal in the Phoenix AMA of storing water on both sides of the AMA. He suggested amending the Plan to spend the \$300,000 generated in Pinal County, leaving \$200,00 of the general fund money for the Agua Fria site if ready in 1997.

Mr. Dick Walden feels General Fund monies are appropriated by the legislature for the benefit of the State and the Bank should not get involved in General Fund money being spent in proportion to the area of generation. He further stated that he supports Mr. Chase's position that the Bank should spend county generated tax monies first, but needs additional comfort that the Authority is not being forced to expend General Fund monies where they are collected.

Mr. Chase responded that with the expenditure of \$1.8 million out of the \$2.0 million General Fund monies in Pinal County, the Authority is not concerned where it is generated.

Presentation of *draft* Position Statements

Modification of the Plan

Mr. Mike Pearce, ADWR Chief Counsel stated that the statute clearly allows the Authority to modify the Plan, in accordance with the public meeting laws. The Authority is not required to take the proposed modifications back through the public GUAC meeting process. In contrast, the legislature inserted a specific statutory provision requiring the Authority to take the Inventory back through a public process before final adoption.

Grady Gammage inquired whether the Water Banking Authority could write language into the plan defining what would be deemed a modification of the Plan, making a clear distinction between modification and mere implementation of the Plan.

Ms. Pearson proposed that the Bank incorporate the concept into the Plan of Operation. Mr. Pearce agreed with the suggestion.

Expenditure of Monies in AMA/county of Generation

This issue pertains to the statutory authority of the Water Bank to store water in an AMA or county, outside of where the monies were generated. The statute speaks of storing water for the benefit of a specific AMA or county where the credits are accrued (A.R.S. § 45-2457(B)(7), opposed to the actual physical location of where the credits are generated.

Based on the overall statutory framework, Mr. Pearce stated that it is the belief of ADWR that the Authority does have the discretion to store water in an area for the benefit of another geographic area, as long as the credits are used for the benefit of the area where the monies are generated.

Mr. Pearce concluded that the Authority has considered alternative interpretations of the statute and apply well established rules, such as:

- 1) The language "for the benefit of" in A.R.S. § 45-2457(B)(6) and (7) does not require the Authority to store water that will eventually benefit an AMA or county in that AMA or county;
- 2) That the guiding principle of the AWBA will be to attempt to store the water that is to benefit an area in that area;
- 3) That situations may arise in which the Authority will determine that it is advisable to store water outside of the area it will eventually benefit from the credit and that the Authority will retain the flexibility provided it by the Legislature to do so.

Ms. Pearson called for questions and summarized Mr. Pearce's suggestion to incorporate the second Position Statement in the Plan of Operation.

Mr. Gammage commented that putting more language put in Plan is beneficial and would give greater flexibility in the operation of the Authority.

Mr. Walden reiterated that the Bank is not required to spend the money within the area of origin, but should set as a goal. He felt that the goal would apply to all future plans and that putting that particular goal statement in an individual plan reiterates the Bank's desire to achieve the goal.

Mr. Griffin questioned whether the expenditure of money issue should be treated as a policy statement. He sees the primary goal of the Authority to use all of the Colorado River water in Arizona no matter where it is.

Ms. Pearson stated that she was surprised this issue has come about, but that the Bank is sensitive to this issue. The issue of making sure local monies are spent in the local community first if capacities are available has been discussed at previous meetings. She expressed concern about including it in the Plan of Operation prior to the development of the site criteria where the full discussion really needs to take place. She questioned when a goal or objective is discussed in the future, does that need to be included in the Plan. Chairman Pearson stated that she would like to see the inclusion of the position statement into the storage site discussions.

Mr. Griffin agreed that the site criteria would be better place because it could be changed over time, but would not be revisited annually.

Ms. Pearson asked for public comment prior to any final decisions being made. She recognized Mr. Larry Dozier from CAP to clarify the operation of the Plan, including monthly amounts and locations. She wanted clarification that adjustments from month to month as requested by the Authority would not be considered a change of Plan, but if they use up the acre feet allotted them before the year is over than that is considered a change of plan that you would have to come back to the Authority for.

Mr. Gammage asked if Mike Pearce, Tim Henley or Jimmy Jayne could come up with precise language to incorporate into the motion to address the issue of how to define modification of the Plan as opposed to changes in implementation of the plan.

Ms. Pearson asked Mike Pearce to meet with Tim Henley and Larry Dozier and try to come up with a concept that reflects the current discussions.

Public Testimony

Karen Smith (Salt River Project)- Ms. Smith stated that SRP has two comments on the 1997 Annual Operating Plan. As the clients recommended for annual storage which she felt Mr. Henley eluded to during 1997 and the availability the underground storage project (GRUSP) for direct storage. They feel that GRUSP is permitted to store 200,000 af and the SRP Ground Water Savings Facility is permitted to store 200,000 af as well. As to the price issue (referring to their letter to the Bank, dated 11/6/96) portions of SRP's costs to pump ground water are fixed costs. Presently for SRP in 1997, that price is \$15.00 an af, therefore SRP can't, in good conscience, agree to pay \$ 21.00 an acre foot to participate in the Bank's new program. That is unfortunate for many reasons, but among them is the recovery of the water after it has been recharged. Ms. Smith stated that she believes SRP's Groundwater Savings Facility will be one of the lowest cost sights if not the lowest cost in the Phoenix AMA. Since a large number of recovery wells already exists, within the SRP water service area, and many of these wells are presently used by the largest CAP M&I subcontractors in the state. The very customers of CAP water for whom the Bank intends to firmly supply, SRP believes it better serves the purpose of the Bank to price the inland water at a level where SRP can participate even

if the price is lower than what the Banking staff initially suggested. SRP has proposed to the Bank staff a long term arrangement for underground storage at that facility, which will provide the Bank price certainty and incentive price in an ideal sight to recharge water in Maricopa County. SRP will also provide SRP and the GRUSP participants security in having a main tenant over a period of years. Well details of such an agreement will need to be worked out, and SRP has suggested to the Bank staff a five year minimum period of time, a 50,000 af of minimum volume each year, as a basis for such an agreement.

Marvin Cohen (City of Tucson)

Mr. Cohen suggested that the Bank consider not having monthly delivery numbers in the Plan itself so they would not have to worry about changing the totals for each entity in the plan and would reduce any potential legal problems. He also asked that the Bank establish a policy that when the considering a modification, it be mailed with the preliminary agenda. This way interested people would be able to attend a particular meeting.

Mr. Cohen went on to mention the coming together of the various Pima County water interests over the past 60 days and that one could believe that this was all planned. In his letter, Mr. John Sullivan of SRP suggested that 88,000 af of credits developed in Pinal County, using Pima County's money for the benefit of Pima County, could be extinguished to satisfy claims of the Gila River Indian Community and the Sif Oidak District of the Tohono O'odham. Pima County thinks they have absolutely nothing to do with those claims and were not aware that either the Sif Oidak District of the Tohono O'odham or Gila River Indian Community thought they did so he would be concerned what to the benefit of means.

Various Tucson area water entities came together after the Tucson GUAC meeting and, through Sharon Megdal and Mark Myers with Metropolitan Domestic Water Improvement District worked very hard over the past three weeks pulling together the details needed to respond to the draft Plan. They were joined by Dennis Rule, Tucson Water staff; Jim Peterson from Oro Valley, and the group developed a unified position. The group's intent was to call to the Authority's attention the recharge opportunities in Pima County and the depth of concern they have about having their money spent to put water outside of Pima County. They noted that they are working diligently to have facilities available in Pima County the near future.

Mr. Cohen proposed three issues; 1) That the \$2.0 million dollar general funds be used for the groundwater savings projects in Pinal County instead of using Pima monies; 2) that the Authority would have access in the Tucson AMA for storage of approximately 19,000 af of Colorado River water at a cost of \$1.1 million; 3) concern over the use of Pinal's money and that the funds be carried over to the following year.

Mr. Cohen went on to say that some long term issues with groundwater savings projects will need to be addressed in the future.

Sharon Megdal - (Pima County Flood Control District) - Ms. Megdal stated that the proposed plan was absent of any demonstration of a benefit to Pima County taxpayers with storage occurring in Pinal County. They see that as a problem and creates a very high risk for Pima County taxpayers. Pima County agrees with some of the issues raised in terms of expending locally generated tax monies first and general fund monies going to Pinal County only.

Ms. Megdal clarified Pima County's position on the Agua Fria and the Lower Santa Cruz site: 1) County Administrator Chuck Huckleberry has questions about what criteria were used for inclusion of proposed sites in the Plan and would look toward consistent treatment of projects in similar phases of development; 2) They have a target date of January 21 to submit their permit and permit applications, but are expecting 30,000 af annually; 3) regarding the proposal to revert to GRUSP,

Ms. Megdal has not yet had the opportunity to address the issue with her client. She would suggest the Bank think about the creation of certain thresholds to clarify when changes come to the Bank for action versus smaller changes that are purely operational on a month-to-month basis. She concluded by stating that she likes the Plan overall.

Dave Dennison (Town of Carefree Councilman) - Mr. Dennison stated that the Plan should focus on areas of water shortage and should consider demonstration and research projects. Such projects could include the Scottsdale micro filtration project to recharge the Carefree/Cavecreek/Scottsdale Aquifer. Expenditure of Bank money at this site, in cooperation with augmentation, Scottsdale and Carefree monies would be a positive thing for the Bank.

Beth Miller (City of Mesa) - Ms. Miller commented that; 1) she would urge the Bank to give consideration to reducing the price for in-lieu water as suggested by SRP and 2) she also stated that Mesa would support Bill Chase's suggestion that some general fund money be transferred into Maricopa County for direct recharge. She stated that this will maximize the amount of water that is stored, while increasing certainty of recovery.

Paul Orme (CAIDD/MSIDD) - Mr. Orme stated that; 1) they support the use of the general fund revenues in Pinal County; 2) commend Authority staff for concerted efforts to meet with his clients, trying to understand the various constraints and capabilities of those districts utilizing AWBA water.

Chairman Pearson moved for the adoption of the 1997 Annual Operating Plan. She read the following new language, as prepared by Mr. Pearce, in conjunction with Larry Dozier from CAWCD and Tim Henley:

"This Annual Plan of Operation is intended to govern the storage water over the course of the entire calendar year. The Authority recognizes that day to date fluctuations in weather, individual delivery works at storage facilities or normal CAP operations may effect the monthly estimates of water actually delivered for the benefit of the Authority. Day to Day fluctuations that do not impact the overall annual projections contained in this plan are not modifications of this Plan and will be addressed by the staff and reported to the Authority on an as needed basis".

"During the course of the year, changing circumstances may present limitations or provide new opportunities not contemplated in this plan that will effect the overall annual projections. In such circumstances, ARS 45-2456 (F) provides that the Authority may modify this adopted plan. If such modifications are required they will be undertaken by the Authority in the course of its normal business. Public comment may be accepted by the Authority at the meetings where proposed modifications are discussed or approved. For such modifications the Authority will not repeat the procedures outlined in ARS 45-2456 (C) for the adoption of an original plan".

Mr. Gammage inquired about the process of using a facility not listed in the Plan and whether the Bank would have to formally bring it before the Authority. Mr. Pearce affirmed the statement. Ms. Pearson reiterated that the Staff has been instructed to include Agua Fria in the Plan.

Mr. Walden asked if staff has given any thoughts to a contingency fund to maximize and opportunity to increase water deliveries in cases of an extremely dry season. Mr. Henley responded that the staff has looked at when funds become available to the Authority in relation to potential opportunities.

Mr. Gammage moved to adopt the amended Plan to include the updated the language. Mr. Chase stated that it was insufficient to simply add Agua Fria without including associated storage capacities. Mr. Henley suggested that the Authority include the fact that public meetings were held and that the staff is going forward. Mr. Henley also suggested inclusion of a statement that the Authority is working on a recovery plan and that it is needed.

Mr. Walden asked if the Authority was going to make any efforts to consider SRP's proposal. Mr. Gammage replied that he was willing to talk about it but not willing to leap at it at this time.

Ms. Pearson asked that the four specific purposes for the Authority and the primary goal of the Authority to recharge unused Colorado River water to firm up CAP municipal subcontracts be incorporated into the Plan. Mr. Henley also suggested a change in Table 3 to recognize general fund monies that would be utilized in both Pinal and Maricopa County. All members were in agreement.

Mr. Gammage again moved that the Authority adopt the 1997 Plan of Operation as presented in the November 19 *draft* with the following modifications: 1) the language, as read by the Chair, and developed by the staff on modifications to the Plan; 2) change Table 1 to add the Agua Fria Site; and reflect Agua Fria or GRUSP be listed as Pima County back-up alternative; 3) modifications to Table 3 in relation to expenditure of General Fund monies in Pinal and Maricopa Counties; 4) reflect the expenditure of the full Pinal County \$300,000; 5) changes to the introduction to incorporate the four purposes of the legislation as stated in the bill itself and an addition to incorporate a public comment section; and 6) mentioning in the narrative that the Bank is in the process of developing a recovery plan and that the recovery plan will address the issue of the position statement.

The 1997 Plan of Operation was adopted unanimously by the Authority.

PRESENTATION OF DRAFT AGREEMENT/AWBA, ADWR AND CAWCD

Mr. Henley stated that the need for an agreement between the three parties has been discussed in previous meetings. Over the last month the Bank has been working with ADWR and CAP to start to craft such an agreement. The following are a few key issues:

- Cost of services - a provision for a payment of services; payments for water deliver.
- Determination of credits by ADWR is recognized in the agreement
- CAP agrees to bill the Authority and the partners directly for their in-lieu share.
- CAP will provide the accounting of water to the Bank
- Inclusion of language to formalize the levy of the \$.04 property tax.
- The Bank will work with CAWCD on the ordering of water.

It was noted that Larry Dozier will make a presentation at the Policy & Planning meeting on November 20, recommending approval of the agreement by the Committee to the CAP Board. A final agreement is hoped to be in place by the December Authority meeting.

Mr. Gammage suggested that, in the event of any potential disputes, Tim Henley sit down with Rita Pearson and the General Manager from CAWCD, not the CAWCD President. Ms. Pearson stated that the Deputy Director of ADWR has the authority to stand in for the Director of ADWR and should replace her in time of a dispute. Mr. Griffin moved for initial adoption of the agreement between the three parties - it was unanimously adopted.

PRESENTATION OF SAMPLE PARTNER AGREEMENTS/ AWBA WATER STORAGE PERMITS

Mr. Henley informed the Authority that AWBA, ADWR and CAP staff has met with all potential partners in the AMA's to start talking about what the agreements might look like and what would be included. Mr. Henley shared the following issues/concerns raised in these meetings:

- 'take or pay' would not be a provision in the partner agreements.
- Sharing of losses. The Plan recognizes that there will be losses getting the water to the actual areas where it's used and that ADWR will calculate credits based groundwater pumping offset. There would be a sharing of the losses
- The process of issuing of credits and related uncertainty raises real concerns with the partners.
- The issue of scheduling flexibility has been talked about in the modification of plan.
- The CAWCD/ADWR agreement anticipates that CAP would collect from in-lieu partners. This

payment scenario would be similar to the ones already have with the customers because most of them have payment responsibility already.

Mr. Henley stated agreements would be ready for distribution in December and would hopefully be signed by the end of December. Ms. Pearson asked that staff provide the standard agreements language when ready to the Authority members.

RECOMMENDED CHANGES FOR INCLUSION IN 1997 ADWR OMNIBUS BILL

Jimmy Jayne reminded the members that potential changes were briefly discussed at the October 16 meeting. All proposed changes have gone through the ADWR the omnibus process.

1. Modification of the Annual Report date to July 1 to reflect the activity of the Water Banking Authority for the previous calendar year.
2. Change Plan of Operation due date to January 1.

Mr. Gammage moved for adoption of proposed changes - passed unanimously.

UPDATES - AWBA RECOVERY SUBCOMMITTEE/AWBA STUDY COMMISSION

Mr. Henley stated that the Recovery Subcommittee was created at the October 20 meeting. The committee has met one time and had some good discussions as far as starting to look at recovery. Subcommittee members requested staff create a working group to begin developing potential recovery scenarios.

A letter was sent out asking for interested participants and dates available hoping more participants outside Maricopa County will show interest to participate. There have been over 12 entities that have showed interest.

The Study Commission has had two meetings. At the first meeting AWBA staff provided an overview of where the Authority was at and Herb provided an overview of water resources and the use of water in the state. At the most recent meeting, Nevada and California both gave overviews of how they could integrate or utilize the Water Banking Authority for their future needs. Mr. Henley thought Nevada gave a good presentation, talking about the potential of utilizing the Authority to the tune of 800,000 af. He mentioned that California was not quite as forthcoming and talked more in political language.

The Study Commission established an Indian Subcommittee, co-chaired by Gary Hanson of the Colorado River Indian Tribes and Mary Ann Antone of the Tohono O'Odham Nation. They are planning to begin meeting at the beginning of the new year.

Ms. Pearson mentioned that the Authority cannot enter into interstate agreements unless the Secretary of Interior has promulgated regulations in support of that program that the Director of ADWR determines are consistent with Arizona statutes and plans for the Water Bank. Nevada is very much supportive of this concept, but the problem is with California who wish to add other items onto the regulatory package.

Mr. Chases commented that California is really trying to slow down the process, by including issues such as third party impacts. Mr. Chase felt they were not at all anxious for the Bank to move forward with the promulgation of any regulations.

Ms. Pearson concurred and felt that same conclusion has been reached by six of the seven basin states. They are meeting on November 21 with the six member agencies in California and the message being delivered is that the six states will not support surplus declarations in the future until they get a commitment from California that they have a plan in place to live within their 4.4 maf.

CONCLUSION

No public comment was received. Ms. Pearson announced that the next meeting will be December 17 from 2:30 p.m. - 4:30 p.m. in the Yuma City Council Chambers.

Mr. Henley asked for permission from the Authority to go ahead and submit permit applications when appropriate and to pay the fees that are required to submit the applications to the Department. Mr. Walden moved for such approval - motion was passed unanimously.

The meeting was adjourned at 12:20 p.m.

ARIZONA DEPARTMENT OF WATER RESOURCES
Groundwater Mgmt. Support - 500 North Third Street
Phoenix, Arizona 85004
Phone (602) 417-2470

SAMPLE

APPLICATION FOR WATER
STORAGE PERMIT (§ 45-831.01)

APPLICATION FEE \$ 250.00 DUE UPON FILING.

PERMIT FEE OF \$ 100.00, PLUS NOTICE AND
PUBLICATION FEES TO BE DETERMINED,
ARE DUE PRIOR TO ISSUANCE OF PERMIT.

FOR OFFICE USE ONLY

Application No. _____

1. Name of Permittee Arizona Water Banking Authority

500 N. Third Street, Fourth Floor Phoenix Arizona 85004
Mailing Address City State Zip

Contact Person Tim Henley, Manager Telephone 602/417-2418
2. Name and permit number of storage facility where water storage will occur Hohokam Irrigation & Drainage

District Groundwater Savings Facility, Permit No. 72-534489.0001

3. The maximum annual amount of water that may be stored at the facility 40,000 Acre Feet

4. The maximum annual amount of water proposed for storage pursuant to this water storage permit 40,000 Acre Feet

5. Description of type(s) and source(s) of water to be stored Central Arizona Project Water

6. Do you wish this water storage permit to be designated as storing non-recoverable water pursuant to A.R.S. § 45-833.01?

No

7. Proposed duration of the permit December 31, 2006

8. If the water to be stored is appurtenant to a place of use, the legal description of the location of that use _____

Not Applicable

(quarter/quarter/quarter/section, township and range)

9. Please attach the following:

- A description and documentation of the applicant's right to use the proposed source of water.
- Proof that the applicant has applied for any required ADEQ water quality permit
- If long-term storage credits are to be accrued, proof that the water cannot reasonably be used directly by the applicant.
- If storage will occur at a groundwater savings facility, a written agreement to comply with the plan by which the quantity of groundwater saved at the groundwater storage facility will be proved each year.

SAMPLE

10. Legal basis for acquiring and using each source of water proposed to be stored underground (City, agent number, law, court decree, contract or other basis) Contracts with the Central Arizona Water Conservation District for the delivery of Central Arizona Project water to this storage facility that are included with this application or that will be submitted to the Department prior to water storage

I (We), Tim Henley for the Arizona Water Banking Authority, the applicant(s) named in this application, do hereby certify under the penalty of perjury, that the information contained and statements made herein are to the best of my (our) knowledge and belief true, correct and complete.

602/417-2418 Telephone
Signature of owner or authorized agent

Arizona Water Banking Authority Manager
Title

500 N. Third Street, Fourth Floor Mailing Address
Phoenix City Arizona State 85004 Zip

STATE OF ARIZONA)
) §.
County of _____)

Subscribed and sworn to before me this _____ day of _____, 19_____.

Notary Public

My commission expires:

Addendum to Water Storage Permit Application

Response to Question 9.

A description and documentation of the applicant's right to use the proposed source of water:

Pursuant to A.R.S. § 45-2104(B), the Arizona Water Banking Authority is specifically authorized to “obtain for storage Colorado River water delivered through the central Arizona project” and to “store Colorado River water at permitted facilities.” The Authority is in the process of entering into water contracts with the Central Arizona Water Conservation District (“CAWCD”), the operating agency of the Central Arizona Project, for the delivery of water to the storage facility with which this water storage permit will be affiliated.

The contracts between the Authority and CAWCD will be submitted to the Department after they are executed and before any water storage occurs.

Proof that the applicant has applied for any required ADEQ water quality permit:

The water stored pursuant to this permit will be Central Arizona Project water and stored at a groundwater savings facility. Therefore, no ADEQ water quality permit is required. *See* A.R.S. § 49-250(B)(6), (12) and (14).

If long-term storage credits are to be accrued, proof that the water cannot reasonably be used directly by the applicant:

Pursuant to A.R.S. § 45-802.01(21)(e), all Central Arizona Project water acquired by the Arizona Water Banking Authority is “water that cannot reasonably be used directly.”

If storage will occur at a groundwater savings facility, a written agreement to comply with the plan by which the quantity of groundwater saved at the groundwater savings facility will be proved each year:

See Exhibit A, attached.

EXHIBIT A

**Agreement to Comply with
Plan to Prove Groundwater Savings**

I, Tim Henley, Manager of the Arizona Water Banking Authority, agree on behalf of that Authority that in any year in which the Authority stores water at Groundwater Savings Facility, Permit No. 72-534489.0001, the Authority will comply with the plan by which the quantity of groundwater saved at the facility will be proved during that year.

Date

Tim Henley
Manager
Arizona Water Banking Authority

Consent to Water Storage

Pursuant to A.R.S. § 45-871.01(E)(1), I, _____, duly authorized by the Hohokam Irrigation & Drainage District and on behalf of that District, consent to water storage by the Arizona Water Banking Authority at the District's Groundwater Savings Facility, Permit No. 72-534489.0001.

Date

Title:

Addendum to Water Storage Permit Application

Response to Question 9.

A description and documentation of the applicant's right to use the proposed source of water:

Pursuant to A.R.S. § 45-2104(B), the Arizona Water Banking Authority is specifically authorized to “obtain for storage Colorado River water delivered through the central Arizona project” and to “store Colorado River water at permitted facilities.” The Authority is in the process of entering into water contracts with the Central Arizona Water Conservation District (“CAWCD”), the operating agency of the Central Arizona Project, for the delivery of water to the storage facility with which this water storage permit will be affiliated.

The contracts between the Authority and CAWCD will be submitted to the Department after they are executed and before any water storage occurs.

Proof that the applicant has applied for any required ADEQ water quality permit:

The water stored pursuant to this permit will be Central Arizona Project water. Therefore, no ADEQ water quality permit is required. See A.R.S. § 49-250(B)(6) and (12).

If long-term storage credits are to be accrued, proof that the water cannot reasonably be used directly by the applicant:

Pursuant to A.R.S. § 45-802.01(21)(e), all Central Arizona Project water acquired by the Arizona Water Banking Authority is “water that cannot reasonably be used directly.”

If storage will occur at a groundwater savings facility, a written agreement to comply with the plan by which the quantity of groundwater saved at the groundwater savings facility will be proved each year:

Not Applicable.

Consent to Water Storage

Pursuant to A.R.S. § 45-871.01(E)(1), I, _____, duly authorized by the Permittees of Underground Storage Facility Permit No. 71-516371, consent to water storage by the Arizona Water Banking Authority at Underground Storage Facility, Permit No. 71-516371.

Date

Title:

INTERGOVERNMENTAL AGREEMENT (IGA)

AMONG THE

ARIZONA WATER BANKING AUTHORITY (AWBA)
ARIZONA DEPARTMENT OF WATER RESOURCES (ADWR)
CENTRAL ARIZONA WATER CONSERVATION DISTRICT (CAWCD)

The Arizona Water Banking Authority, an agency of the State of Arizona, the Arizona Department of Water Resources, an agency of the State of Arizona, and the Central Arizona Water Conservation District, a political subdivision of the State of Arizona, pursuant to A.R.S. § 11-951 *et seq.*, enter into this Intergovernmental Agreement (IGA).

The purpose of this IGA is to facilitate the goals of the AWBA in purchasing, storing and recovering Colorado River water, in accordance with A.R.S. §§ 45-2401 *et seq.*, by promoting cooperation among AWBA, ADWR and CAWCD. This IGA shall have a term of five years, commencing on the 31st day of December, 1996, or the date this IGA is filed with the Arizona Secretary of State, whichever date is later, and ending on the 31st day of December, 2001, unless sooner terminated according to the provisions set forth below.

CONTRACTUAL OBLIGATIONS

1.1 CAWCD shall treat water delivered under this contract as "Excess Water" delivered pursuant to Subarticle 8.7(e) of the Contract Between the United States and CAWCD for Delivery of Water and Repayment of Costs of the Central Arizona Project, dated December 1, 1988 (Contract No. 14-06-W-245, Amendment No. 1) (the Repayment Contract). For this purpose, "Excess Water" shall mean Central Arizona Project (CAP or Project) water which, in any calendar year, is available for delivery and has not been scheduled for delivery pursuant to a contract with the United States or a subcontract with the United States and CAWCD providing for Project water service for a period of 50 years or more.

TERMINATION OF CONTRACT

2.1 This contract may be terminated upon 60 days written notice by any party.

COSTS OF SERVICES

3.1 ADWR is required by A.R.S. § 45-2424(A) to provide administrative, technical and legal support to AWBA to the extent requested by AWBA. CAWCD is required by A.R.S. § 45-2424(D) to provide technical support to AWBA to the extent requested by AWBA. This agreement establishes the manner in which the services will be requested by AWBA, the manner

in which those services will be rendered, and the manner in which the cost of those services to AWBA shall be determined.

3.2 By May 1 of each calendar year, AWBA shall submit a written Request for Cost of Services to ADWR and CAWCD. ADWR and CAWCD shall respond to the request by June 1 of that calendar year with a detailed estimate of the costs of the services requested, and the manner in which those services shall be rendered, consistent with this IGA. AWBA shall either adopt the proposed costs of services submitted by ADWR and CAWCD, or it shall modify its request for services to add or delete requested services, or modify the manner in which services are provided. Response by the AWBA to the proposals of ADWR and CAWCD shall be specific, and AWBA, ADWR and CAWCD shall meet to reconcile the request and proposal. Upon reconciliation, ADWR, CAWCD and AWBA shall finalize the cost of services no later than July 1. The agreed upon cost of services shall be based upon services to be rendered during the upcoming state fiscal year, July 1 through June 30.

3.3 Administrative support shall be provided by the Arizona Department of Water Resources. All expenses, including office space and support, vehicle expenses, daily supplies, and normal postage will be charged to the Arizona Water Banking Fund by ADWR at an indirect rate of 12% of the personal services budget of the AWBA staff. AWBA staff salaries and employee related expenses, including the Manager, Technical Administrator and Administrative Assistant are charged to the Arizona Water Banking Fund by ADWR at the rate determined by ADWR. In addition to the standard 12%, the Arizona Water Banking Fund account will be charged by ADWR for bulk mailing, including mailing associated with monthly meetings of the AWBA. Bulk mailing shall be defined as any project with a distribution list exceeding 15 addresses. ADWR shall charge AWBA actual postage costs for bulk mailing.

3.4 Legal support of the AWBA shall be provided by the Arizona Department of Water Resources. Legal services will be charged at the rate of ½ of a full-time Attorney IV. Legal services will include but are not limited to: assistance in preparing the written agreements of the AWBA, including intergovernmental agreements, water purchase contracts, water storage contracts and facility leases; preparation of the Storage Site Criteria and Facilities Inventory; review and drafting of any AWBA official business, such as resolutions or issue papers; and general legal guidance and advice as requested by the AWBA members and staff.

3.5 Technical support will be provided by ADWR and CAWCD as requested in the Annual Cost of Services by the AWBA.

3.5.1 The following technical services shall be provided by ADWR at the request of AWBA. ADWR shall provide hydrologic analysis and feasibility studies for storage of water at any facility under consideration by AWBA. ADWR shall also provide investigative analysis of the history of any such facility, including the history of storage credits earned, but shall not be required to provide analysis of any such facility's future

ability to earn credits pursuant to Arizona's Underground Water Storage, Savings and Replenishment Act, A.R.S. §§ 45-801.01 *et seq.*

3.5.2 The following technical services shall be provided by CAWCD at the request of AWBA. CAWCD shall: 1) work with AWBA staff to develop preliminary and final AWBA annual plans of operation; 2) provide long range projections of CAP delivery capacity and water demand and shall update such projections on a yearly basis, as requested; 3) provide hydrologic analysis and feasibility studies to the AWBA for storage of water in any facility for which CAWCD has conducted such analysis; 4) assist in the evaluation of new storage facility sites as requested by the AWBA; and 5) provide special monthly and annual water and financial accounting reports as requested by the AWBA, including reports by counties, by active management areas or by AWBA funding sources.

3.6 ADWR and CAWCD agree that certain technical services shall be made available to AWBA in the normal course of operation, without being included in the annual Cost of Services proposal and without additional charge. These services are recognized as services provided to the general public and/or customers of ADWR and CAWCD and include, without limitation:

3.6.1 ADWR shall assist AWBA in filing applications for water storage permits and shall attend preapplication conferences with AWBA and the storage facility owner, notwithstanding the fact that the AWBA may elect to have its own representative from ADWR staff participate; ADWR shall make its public records available to AWBA in the same manner, and at the same charge, as any other member of the public. ADWR shall issue a determination of credits earned by AWBA for underground water storage projects in the same manner and at the same time as any other facility owner or water storage permit holder. ADWR shall provide historical analysis of groundwater withdrawal fees paid in the Tucson, Pinal and Phoenix Active Management Areas, and shall provide complete accounting to AWBA of all funds collected for the benefit of AWBA by August 1 of each year.

3.6.2 CAWCD will provide full and complete water delivery accounting to AWBA for all contracts relating to the purchase and delivery of water between AWBA and CAWCD, in the same manner and at the same time as other customers of CAWCD.

3.7 Services provided by either ADWR or CAWCD under this IGA are subject to adjustment as needed, with notification of the AWBA within a reasonable amount of time. In the event that a dispute arises over the provision of services, or the cost therefor, such dispute shall be resolved in accordance with Paragraph 12 of this IGA.

PAYMENT FOR SERVICES

4.1 Payment for services rendered to AWBA under the terms of this IGA shall be made on a quarterly basis, in accordance with the financial provisions of this IGA set forth in Paragraph 7. Unless otherwise agreed in advance, each quarterly payment shall be an equal one-fourth of the total cost of services agreed upon for the fiscal year, plus incidental costs incurred during the preceding quarter, such as the bulk mailing costs described in this IGA.

PAYMENT FOR WATER DELIVERED

5.1 All monies owed to CAWCD from AWBA for water delivered or to be delivered under the terms of this agreement and any other agreement to which AWBA is a party shall be paid in advance in accordance with standard CAWCD billing practices. The invoice for the upcoming month shall be mailed no later than the first day of the current month. Payment for the upcoming month shall be due by approximately the 20th day of the current month, and shall be past due on the first day of the upcoming month.

5.2 AWBA and CAWCD agree that the monthly installments due for water delivered shall be invoiced and paid on a levelized basis. By November 15 of each calendar year, CAWCD shall provide AWBA with an estimated cost for all water to be delivered for AWBA's benefit in the upcoming year. The total estimate shall be divided by 12, yielding an equal sum to be paid by AWBA as a levelized monthly payment for the upcoming calendar year. At the end of each calendar year, and no later than March 1 of the next year, CAWCD shall provide AWBA with a year end account reconciliation showing water delivered in excess of the levelized payments, if any, and any payment in excess of the amount owed for water delivered in the calendar year. If additional funds are owed to CAWCD, they shall be paid within 30 days of the date an invoice is submitted by CAWCD. If funds are due to AWBA, they may be applied to AWBA's account for the current calendar year and reduce the monthly levelized payments at the direction of AWBA, or, at AWBA's option, be paid to AWBA by negotiable instrument no later than 30 days after the AWBA has notified CAWCD of the preferred option.

DETERMINATION OF CREDITS

6.1 Issuance of long-term storage credits by ADWR to the AWBA shall be accomplished in a reasonable amount of time, so as to not infringe on the operations of the AWBA. AWBA shall not be entitled to preferential treatment from ADWR either in the timing of issuing credits or in the method by which entitlement to such credits are analyzed, but ADWR shall bear in mind the goals of the AWBA at all times when considering the credits due AWBA.

6.2 AWBA recognizes that long-term storage credits are limited to the amounts allowed by state statute (A.R.S. § 45-851.01 *et seq.*). AWBA shall reserve the right, in all contracts for the storage of water on behalf of AWBA, to terminate delivery of water under such contract if it appears, in the sole discretion of AWBA, that the operator of the underground

storage facility or groundwater savings facility is operating the facility in a manner contrary to law, or in a manner likely to jeopardize the ability of AWBA to earn long term storage credits for the water delivered to the facility for the benefit of AWBA.

6.3 For deliveries to groundwater savings facilities, AWBA shall have the right to confer with ADWR and determine, at any time, whether the groundwater savings facility is operating in accordance with its approved plan of operation for reductions in groundwater usage. AWBA may terminate the incentive pricing arrangement established under this IGA between AWBA and CAWCD if AWBA believes, in its sole discretion, that the groundwater savings facility is being operated in a manner likely to jeopardize the ability of AWBA to earn long term storage credits for the water delivered to the facility for the benefit of AWBA. This right of termination shall be reserved to AWBA in the terms of the individual contracts between AWBA and the groundwater savings facility owner. If AWBA elects to exercise the power of termination described in this paragraph, CAWCD agrees that all water delivered to the recipient after the effective date of such termination shall be charged to the recipient, and AWBA shall no longer be responsible for payment for such water under the terms of this IGA. CAWCD further agrees that it shall not deliver any additional incentive priced water to the groundwater savings facility without consultation between CAWCD and ADWR and notification by ADWR to the potential participants in the incentive pricing concerning the ability to earn long term storage credits at the groundwater savings facility. The power of termination provided in this paragraph may be exercised by AWBA by written notice of termination to CAWCD identifying the recipient that is the subject of the termination. The termination shall be effective 10 business days after completion of the notice in accordance with Paragraph 13 of this agreement.

FINANCIAL ACCOUNTING

7.1 CAWCD agrees to maintain separate financial accounts for AWBA for water purchased for delivery to underground storage facilities and for water purchased for delivery to groundwater savings facilities. Within each account, CAWCD agrees to maintain individual sub-accounts for each contract entered into between AWBA and a recipient. CAWCD shall present AWBA with an itemized statement for water delivered during the preceding month as soon as possible, with the intent of providing such report at least 5 business days before the monthly meeting of the AWBA board. Such statement shall also include the amount of water delivered in the calendar year to the end of the preceding month.

7.2 For purposes of determining whether water purchased by AWBA with money from the state general fund is subject to the Water Protection Fund in-lieu tax, AWBA agrees that it shall notify CAWCD 30 days before it reserves any particular water delivery for an entity that would be required to pay the fee in lieu of property tax described in A.R.S. § 48-3715(B). CAWCD agrees that it shall consult with AWBA before charging AWBA such an in lieu fee.

7.3 Payment for water delivered by CAWCD for the benefit of AWBA shall be made by warrant drawn by the AWBA and made payable to CAWCD.

INTERRUPTIONS AND/OR REDUCTIONS IN DELIVERIES

8.1 In addition to the right of the United States under Subarticle 8.3(a)(iv) of the Repayment Contract to discontinue or reduce the quantity of Project water to be delivered to CAWCD in any year, CAWCD may discontinue or reduce the quantity of Project water to be furnished pursuant to this agreement or for purposes of inspecting, constructing, maintaining, repairing, or replacing any Project facilities or portion thereof. CAWCD may also discontinue or reduce the quantity of water to be delivered pursuant to this agreement if there is insufficient Project water or Project delivery capacity available to deliver all water scheduled for delivery by AWBA and other contractors of Project water service. So far as feasible, CAWCD shall attempt to coordinate such discontinuance or reduction with AWBA and to give due notice in advance of such discontinuance or reduction. In case of emergency, no notice need be given. Neither the United States nor CAWCD shall be liable for damages when, for any reason, any interruption, discontinuance, or reduction in Project water delivery occurs.

8.2 Neither the United States nor CAWCD warrants the quality of any Project water furnished pursuant to this agreement. The AWBA waives any right it may have to make a claim against the United States, CAWCD, or any other contractor or subcontractor of Project water service on account of the quality of Project water or any changes in water quality caused by the commingling of Project water with other water.

8.3 All Project water delivered pursuant to this agreement shall be delivered at such points on the Project water supply system as are agreed upon among AWBA, CAWCD, and the actual recipient of such Project water (hereinafter, the recipient's Project delivery point). The actual recipient shall be solely responsible for the control, carriage, handling, use, disposal, and distribution of water beyond the recipient's Project delivery point and for any damages or claims of damages arising out of the recipient's control, carriage, handling, use, disposal or distribution of water beyond the recipient's Project delivery point.

LEVY OF *AD VALOREM* PROPERTY TAX (A.R.S. § 48-3715.03)

9.1 During the month of May of each year, AWBA and CAWCD shall jointly develop a budget and tentative delivery schedule for the upcoming calendar year. Such budget shall show how the proceeds of the ad valorem tax provided for in A.R.S. § 48-3715.02, subsections B and C, would be used, if levied by CAWCD pursuant to A.R.S. § 48-3715.02, subsections B and C, and determined by CAWCD to be available for water storage pursuant to A.R.S. § 48-3715.03.

9.2 On or before the second Monday in August of each year, CAWCD shall determine the amount to be raised by direct taxation in the respective tax year for the purpose of carrying out A.R.S. § 48-3715.03 and shall levy a tax sufficient to raise that amount. CAWCD shall also annually determine by resolution whether all or any part of such tax shall be applied to the repayment of the construction costs of the CAP or to the annual operation, maintenance, and

replacement costs of the Project and shall deliver such resolution to the State Treasurer with a copy to be delivered to the AWBA. Any part of such tax which CAWCD determines shall not be applied to the repayment of the construction costs of the CAP or to the annual operation, maintenance, and replacement costs of the Project shall be deposited in the Arizona Water Banking Fund for use by AWBA as provided in A.R.S. §§ 45-2401, *et seq.*

ORDERING WATER BY AWBA FROM CAWCD

10.1 As a part of the technical services provided pursuant to Paragraph 3.5.2, CAWCD shall, as part of the development of the AWBA annual plan of operation, determine the amount of water available for delivery for the benefit of AWBA. By November 15 of each year, the AWBA and CAWCD shall have developed a complete water delivery schedule for deliveries for the coming year. CAWCD shall make deliveries of AWBA water scheduled in accordance with this IGA.

10.2 AWBA agrees that CAWCD shall not be required to make long-term commitments for delivery of water for the benefit of AWBA, and AWBA acknowledges that water delivered for the benefit of AWBA is intended to be only excess water after all other customer orders have been placed.

10.3 Notwithstanding any other provision of this IGA, AWBA shall not be liable for payment for any water not actually delivered for the benefit of AWBA, nor shall AWBA be required to take delivery of water not actually ordered by AWBA, or approved for delivery by AWBA.

WATER STORAGE ANNUAL REPORT

11.1 AWBA agrees that it shall timely file reports with ADWR of all water purchased and delivered by CAWCD for the benefit of AWBA in each calendar year by March 31 of the following year. AWBA and CAWCD shall cooperate in the preparation of such reports, and shall agree upon the accuracy of the report before it is filed.

DISPUTES UNDER THIS IGA

12.1 AWBA, CAWCD and ADWR acknowledge that this IGA is a cooperative agreement, and each of the parties owes the duty of good faith and fair dealing to each of the other parties in carrying out the terms and intent of this agreement. In the event of a dispute over the terms of this IGA or the obligations arising under those terms, the parties agree that they shall forthwith meet and discuss their differences and attempt to resolve them informally. If the dispute cannot be resolved informally, the manager of the AWBA, the director of ADWR and the general manager of CAWCD shall meet at least once to discuss the dispute and attempt resolution.

12.2 In the event that a dispute arises over the payment of money under the terms of this IGA, the parties agree that, to the extent possible, payment should be made in timely fashion, but may be made under protest. That protest shall then be resolved according to this IGA dispute resolution process.

NOTICE

13.1 All notice required or allowed under the terms of this agreement may be given in the following manner:

13.1.1 Notice may be given by facsimile transmission from AWBA or ADWR to CAWCD at facsimile number 870-2332 and shall be deemed complete upon occurrence of two conditions: AWBA or ADWR shall call the administrative offices of CAWCD and advise the staff that such transmission is being sent; and AWBA or ADWR shall transmit the written message and shall obtain a receipt from the sender's facsimile machine indicating that the transmission was satisfactorily completed.

13.1.2 Notice may be given by facsimile transmission from CAWCD to AWBA at facsimile number 417-2401 and shall be deemed complete upon the occurrence of two conditions: CAWCD shall call the administrative offices of AWBA and advise the staff that such transmission is being sent; and CAWCD shall transmit the written message and shall obtain a receipt from the sender's facsimile machine indicating that the transmission was satisfactorily completed.

13.1.3 Notice may be given by facsimile transmission from CAWCD to ADWR at facsimile number 417-2415 and shall be deemed complete upon the occurrence of two conditions: CAWCD shall call the administrative offices of ADWR and advise the staff that such transmission is being sent; and CAWCD shall transmit the written message and shall obtain a receipt from the sender's facsimile machine indicating that the transmission was satisfactorily completed.

13.1.4 Notice between AWBA and ADWR shall be accomplished by hand delivery within the Phoenix offices of the agencies.

IN WITNESS WHEREOF, AWBA, CAWCD and ADWR enter into this IGA by signing below.

ARIZONA DEPARTMENT OF WATER RESOURCES

by: _____
Rita P. Pearson, Director

Attest:

ARIZONA WATER BANKING AUTHORITY

Secretary

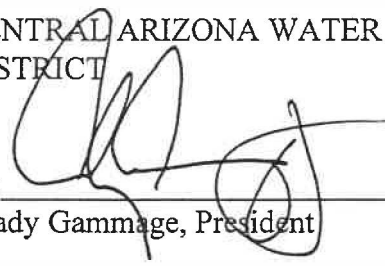
by: _____
Rita P. Pearson, Chairman

Attest:

CENTRAL ARIZONA WATER CONSERVATION
DISTRICT



Secretary


by: _____
Grady Gammage, President

LEGAL DETERMINATION

Pursuant to A.R.S. § 11-952, the foregoing Intergovernmental Agreement has been submitted to the legal counsel of the Arizona Water Banking Authority. The undersigned counsel has determined that said Agreement is in proper form and is within the powers and authority granted under the laws of the State of Arizona and to the Arizona Water Banking Authority

Dated this ____ day of _____, 1996.

Arizona Water Banking Authority
Michael J. Pearce, Chief Counsel

By: _____

Title: _____

LEGAL DETERMINATION

Pursuant to A.R.S. § 11-952, the foregoing Intergovernmental Agreement has been submitted to the legal counsel of the Arizona Water Banking Authority. The undersigned counsel has determined that said Agreement is in proper form and is within the powers and authority granted under the laws of the State of Arizona and to the Arizona Water Banking Authority

Dated this _____ day of _____, 1996.

Arizona Water Banking Authority
Michael J. Pearce, Chief Counsel

By: _____

Title: _____

LEGAL DETERMINATION

Pursuant to A.R.S. § 11-952, the foregoing Intergovernmental Agreement has been submitted to the legal counsel of the Central Arizona Water Conservation District. The undersigned counsel has determined that said Agreement is in proper form and is within the powers and authority granted under the laws of the State of Arizona and to the Central Arizona Water Conservation District.

Dated this ____ day of _____, 1996.

Central Arizona Water Conservation District
Douglas K. Miller, General Counsel

By:  _____

Title: _____



YUMA COUNTY WATER USERS' ASSOCIATION

MAILING ADDRESS:
POST OFFICE BOX 5775
YUMA, ARIZONA 85366-5775
OFFICE: (520) 627-8824

SHIPPING ADDRESS:
3800 WEST COUNTY 15TH STREET
SOMERTON, ARIZONA 85350
FAX: (520) 627-3065

ARIZONA WATER BANKING AUTHORITY OVERVIEW BRIEFING ON

YUMA WATER RESOURCES HISTORY, ENTITLEMENTS, ISSUES AND AREA ECONOMICS

**AT THE
YUMA CITY HALL AND COUNCIL CHAMBERS
180 WEST FIRST STREET, YUMA, ARIZONA
TUESDAY, DECEMBER 17, 1996**

**BY
DONALD R. POPE, P.E., MANAGER**

TABLE OF CONTENTS

- 1. MAPS - YUMA AREA IRRIGATION PROJECTS & DISTRICTS**
- 2. MAP - YUMA AREA DRAINAGE FACILITIES**
- 3. YUMA VALLEY GROUND WATER: MAPS - 1978 & 1992 /
GRAPH OF GROUND WATER LEVELS & PUMPING**
- 4. COLORADO RIVER WATER ENTITLEMENTS, ACREAGE,
DIVERSIONS, CONSUMPTIVE USE AND PRESENT PERFECTED
RIGHTS - YUMA COUNTY, ARIZONA**
- 5. AGRICULTURE LAND USE 1988-89**
- 6. CROP REPORT SUMMARY, YUMA VALLEY, 1985-1992**
- 7. SUMMARY OF COLORADO RIVER WATER ENTITLEMENTS &
AG VALUES, YUMA COUNTY, ARIZONA**
- 8. YUMA WATER ISSUES AND THREATS**
- 9. GRAPH - LOWER COLORADO RIVER WATER USE - BY STATE**
- 10. LOWER COLORADO RIVER WATER SUPPLY REPORT - 12/5/96**
- 11. 1994 FLOW DIAGRAM WITH FLOWS AND SALINITY
IMPERIAL DAM TO SOUTHERN INTERNATIONAL BOUNDARY**
- 12. IRRIGATION DISTRICT COSTS FOR DRAINAGE
AND CROP VALUE COMPARISONS**
- 13. ASSOCIATION 1995 ANNUAL REPORT**

CALIFORNIA

IMPERIAL COUNTY

COLORADO RIVER FRONT WORK AND LEVEE SYSTEM

ALL-AMERICAN CANAL SYSTEM

YUMA PROJECT RESERVATION DIVISION BARD UNIT

YUMA PROJECT RESERVATION DIVISION INDIAN UNIT

GILA PROJECT YUMA MESA DIVISION NORTH GILA VALLEY UNIT

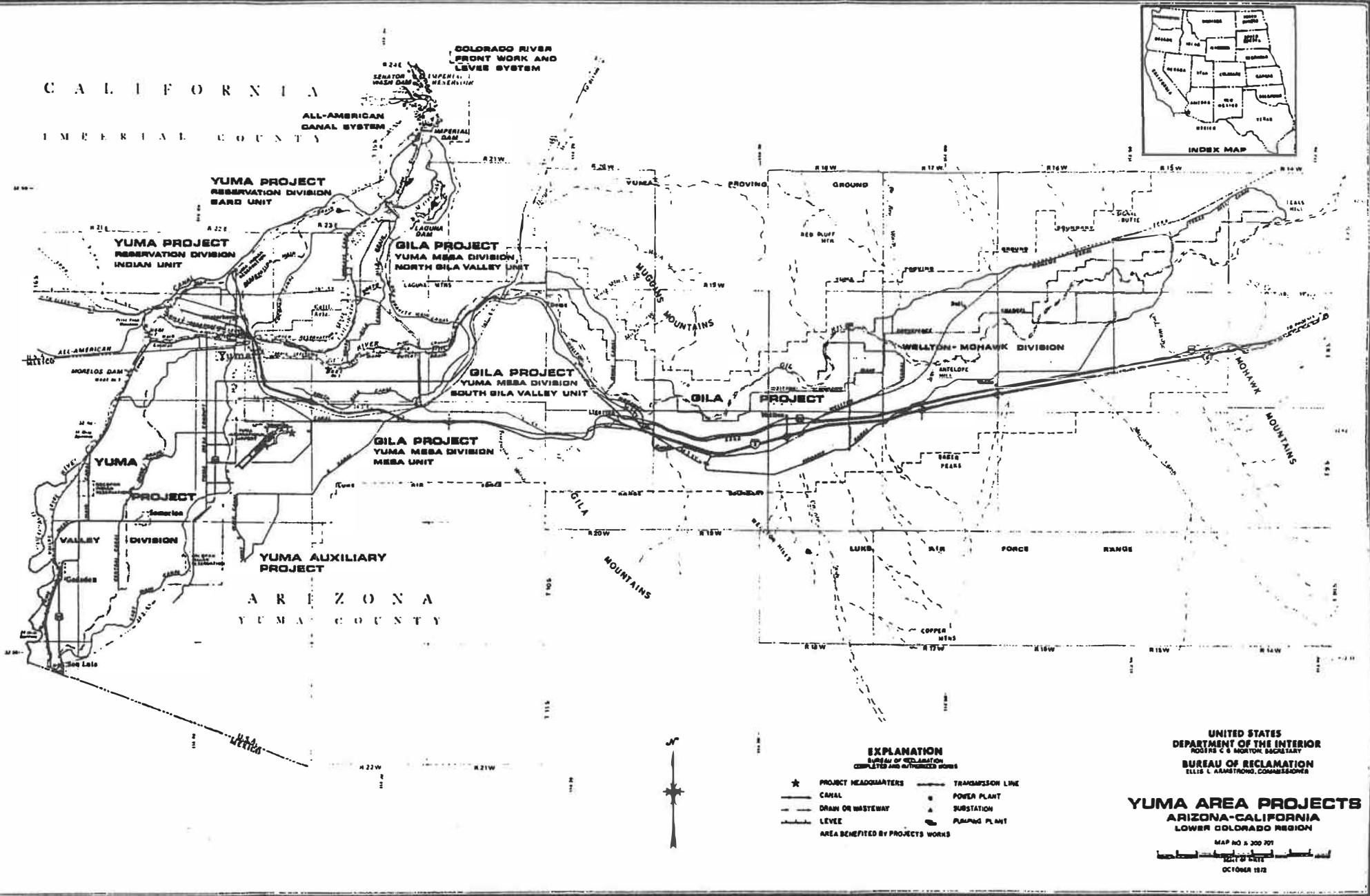
GILA PROJECT YUMA MESA DIVISION SOUTH GILA VALLEY UNIT

GILA PROJECT YUMA MESA DIVISION MESA UNIT

YUMA PROJECT VALLEY DIVISION

YUMA AUXILIARY PROJECT

ARIZONA YUMA COUNTY



EXPLANATION

- ★ PROJECT HEADQUARTERS
- CANAL
- - - DRAIN OR WASTEWAY
- LEVEE
- AREA BENEFITED BY PROJECTS WORKS
- TRANSMISSION LINE
- ⊙ POWER PLANT
- ⊠ SUBSTATION
- ⊡ PUMPING PLANT

UNITED STATES
 DEPARTMENT OF THE INTERIOR
 ROBERTS C. & MORTON, SECRETARY
 BUREAU OF RECLAMATION
 ELLIS L. AARSTRON, COMMISSIONER

YUMA AREA PROJECTS
 ARIZONA-CALIFORNIA
 LOWER COLORADO REGION

MAP NO. 2, 300 201
 OCT. 1912
 OCTOBER 1912

FACTUAL DATA ON THE YUMA AREA PROJECTS—Arizona-California

YUMA RESERVOIR
 The project is a reservoir to be constructed on the Colorado River, about 10 miles from the mouth of the Colorado River in the State of California. The reservoir is to be 100 feet deep and will have a capacity of 1,000,000 acre feet. It will be used for irrigation and for the storage of water for the Yuma area.

YUMA CANAL
 The Yuma Canal is a canal to be constructed from the Colorado River to the Yuma area. It will be 100 feet deep and will have a capacity of 1,000,000 acre feet. It will be used for irrigation and for the storage of water for the Yuma area.

YUMA IRRIGATION DISTRICT
 The Yuma Irrigation District is a district to be organized to manage the Yuma Canal and the Yuma Reservoir. It will be responsible for the construction and maintenance of the canal and reservoir, and for the distribution of water to the irrigators in the district.

YUMA WATER USERS' ASSOCIATION
 The Yuma Water Users' Association is an association of water users in the Yuma area. It is responsible for the management of the water in the area and for the construction and maintenance of the irrigation system.

WATER SUPPLY
 The Yuma area is a semi-arid region and has a low annual precipitation of about 5 inches. The water supply for the area is derived from the Colorado River. The Yuma Canal and the Yuma Reservoir are the main sources of water for the area.

WATER RIGHTS
 The water rights in the Yuma area are derived from the Colorado River. The Yuma Canal and the Yuma Reservoir are the main sources of water for the area.

WATER DISTRIBUTION
 The water is distributed to the irrigators in the Yuma area through the Yuma Canal and the Yuma Reservoir. The Yuma Irrigation District is responsible for the distribution of water to the irrigators.

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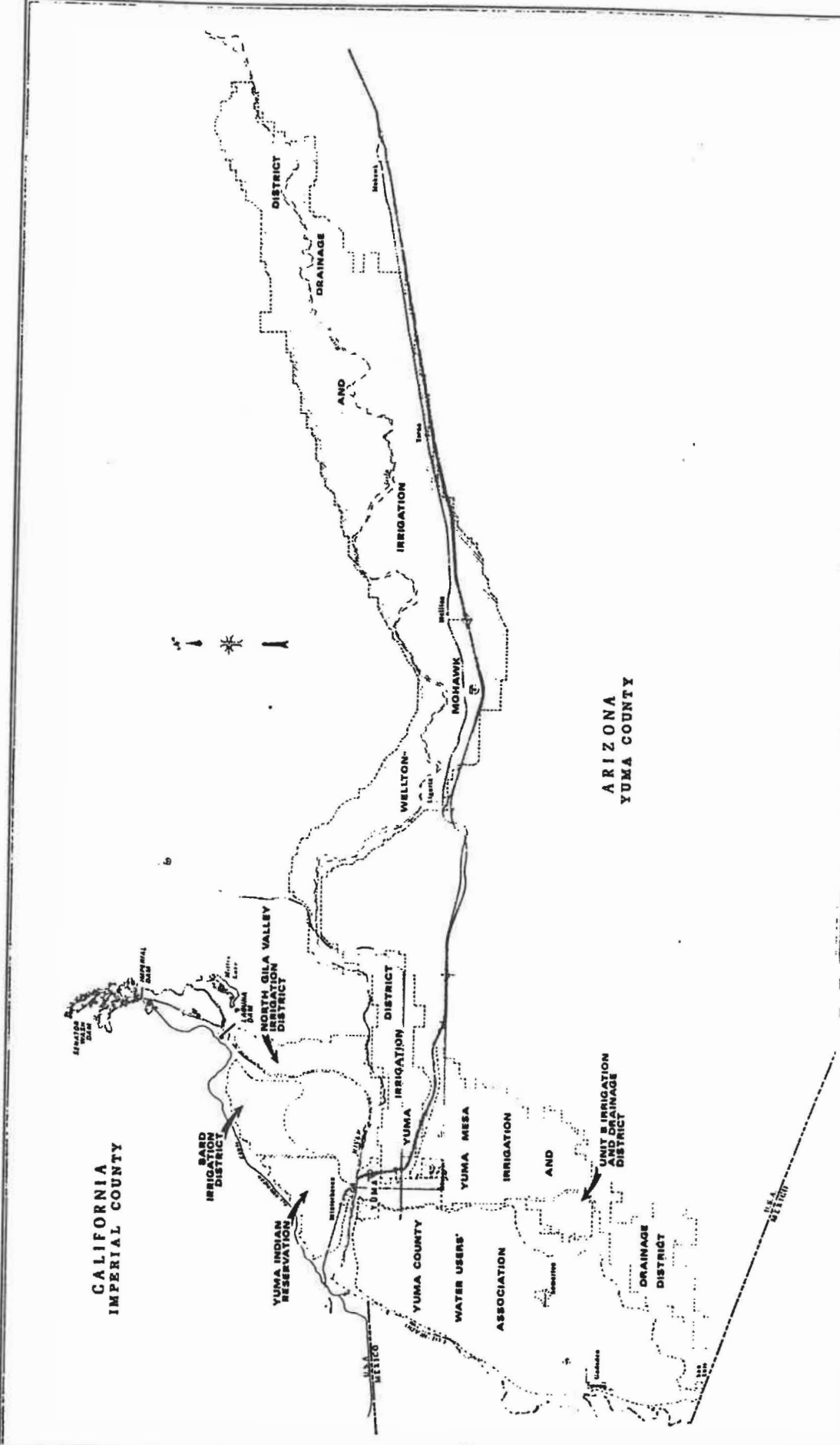
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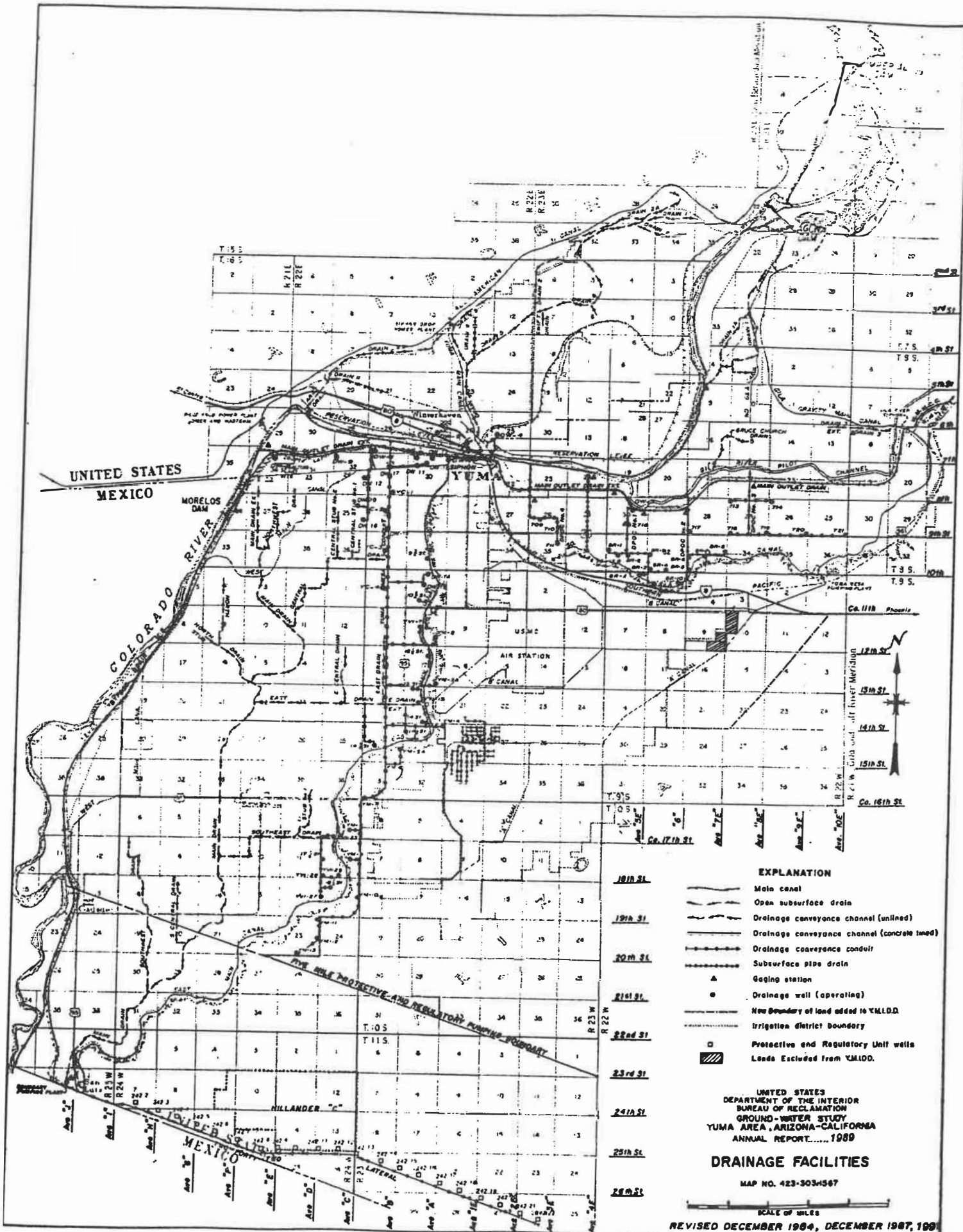
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CALIFORNIA IMPERIAL COUNTY



ARIZONA YUMA COUNTY

10 MILES



UNITED STATES
MEXICO

MORELOS DAM
COLORADO RIVER

YUMA

AIR STATION

FIVE MILE PROTECTIVE AND REGULATORY PUMPING STATION

MEXICO

- EXPLANATION**
- Main canal
 - - - Open subsurface drain
 - Drainage conveyance channel (unlined)
 - Drainage conveyance channel (concrete lined)
 - Drainage conveyance conduit
 - - - Subsurface pipe drain
 - ▲ Gaging station
 - Drainage well (operating)
 - - - New boundary of land added to Y.I.D.
 - - - Irrigation district boundary
 - Protective and Regulatory Unit wells
 - ▨ Loads Excluded from Y.I.D.

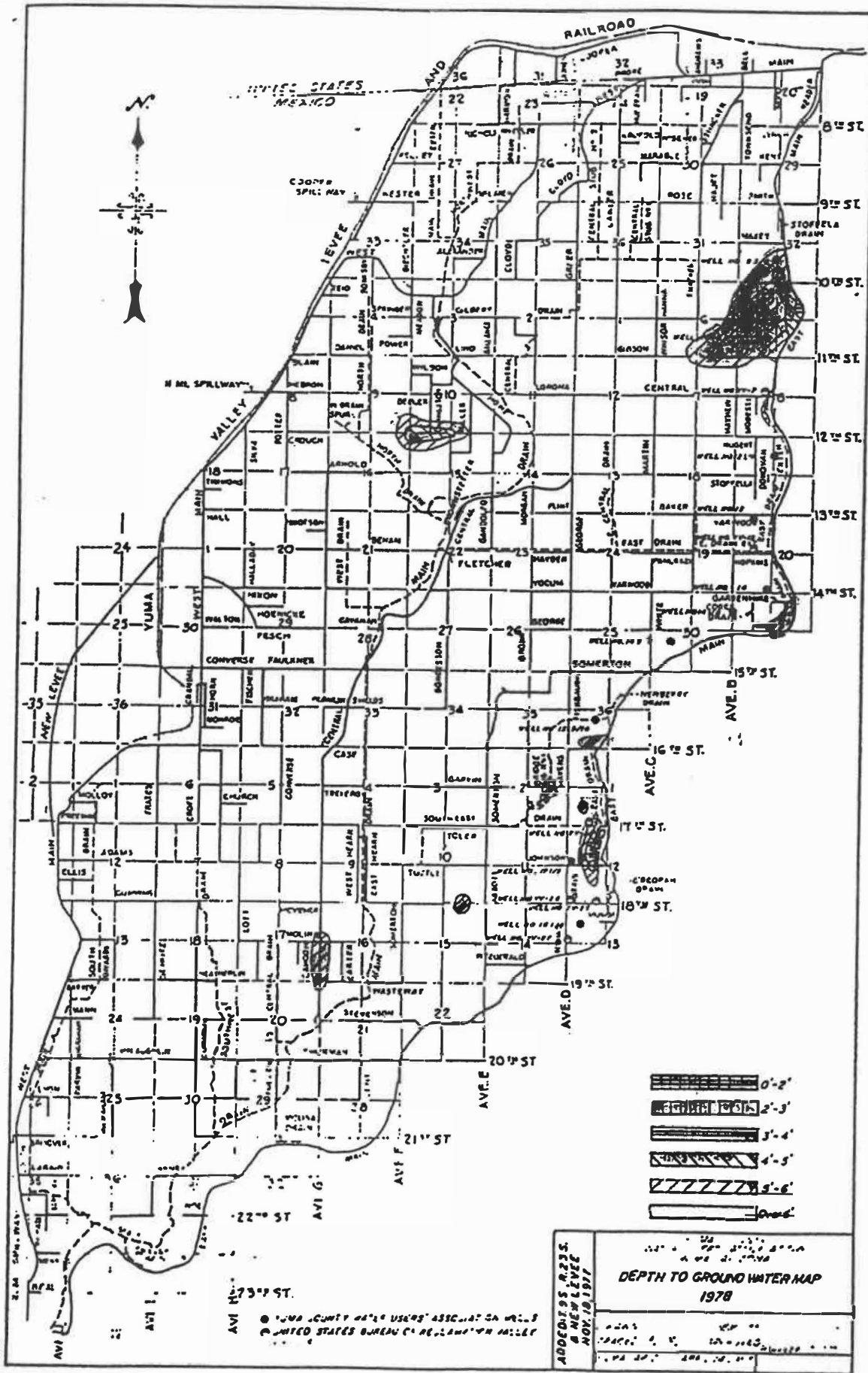
UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF RECLAMATION
GROUND-WATER STUDY
YUMA AREA, ARIZONA-CALIFORNIA
ANNUAL REPORT... 1989

DRAINAGE FACILITIES

MAP NO. 423-303-4567



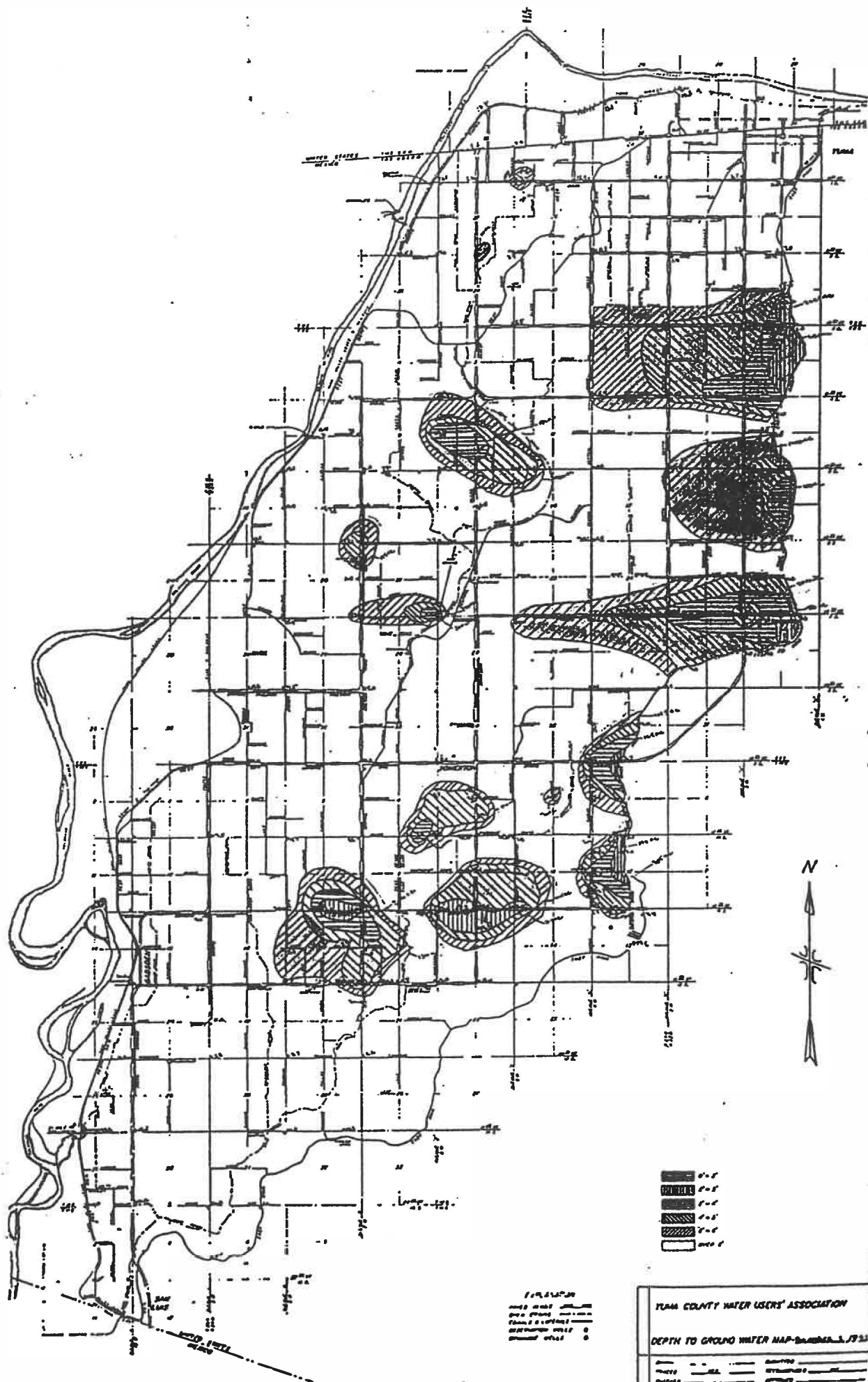
REVISED DECEMBER 1984, DECEMBER 1987, 1989



Depth to Ground Water Map, December 1978

ADDITIONAL DATA
 & NEW LEVELS
 NOV. 19 1977

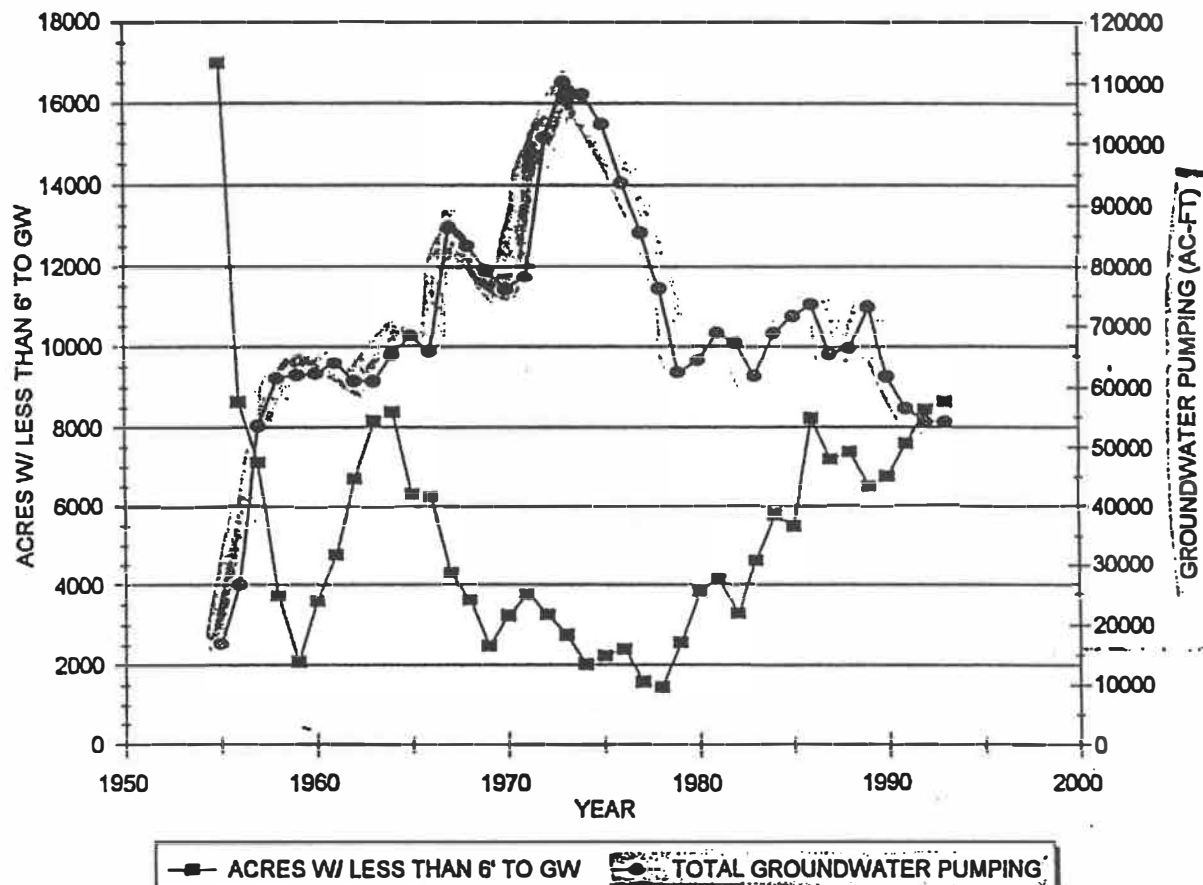
**DEPTH TO GROUND WATER MAP
 1978**



Depth to Ground Water Map, December 1992

YEAR	ACREAGE WITH LESS THAN 6' TO GROUNDWATER	TOTAL ACRE-FEET PUMPED
1950		
1951		
1952		
1953		
1954		11063
1955	17000	16868
1956	8640	26921
1957	7140	53572
1958	3740	61483
1959	2080	62027
1960	3800	62246
1961	4800	64009
1962	6713	61086
1963	8157	60952
1964	8380	65432
1965	6324	68512
1966	6239	65869
1967	4320	86465
1968	3636	83475
1969	2475	79450
1970	3233	76135
1971	3763	78333
1972	3267	100974
1973	2756	110149
1974	2013	108140
1975	2229	103257
1976	2398	93664
1977	1587	85848
1978	1455	76159
1979	2550	62490
1980	3855	64450
1981	4140	69030
1982	3290	67385
1983	4835	61797
1984	5790	68917
1985	5515	71746
1986	8224	73547
1987	7221	65609
1988	7393	66548
1989	6535	73204
1990	6787	61765
1991	7614	56486
1992	8455	54269
1993	8628	54332

YUMA VALLEY GROUNDWATER GROUNDWATER LEVELS & TOTAL PUMPING



**COLORADO RIVER WATER ENTITLEMENTS
ACREAGE, DIVERSIONS AND CONSUMPTIVE USE
PRESENT PERFECTED RIGHTS
YUMA COUNTY, ARIZONA**

<u>ENTITY</u>	<u>ACRES</u>	<u>ACRE-FEET</u>		
	<u>(PPR ACRES)</u>	<u>DIVERSIONS</u>	<u>CONSUMPTIVE USE</u>	<u>PPR</u>
<u>YUMA PROJECT</u>				
YUMA COUNTY WATER USERS'	52,318 (43,562)	320,304	226,000	(254,000)
<u>YUMA AUXILIARY UNIT 'B' ID</u>	3,406 (1,225)	34,142	34,142	(6,800)
<u>GILA PROJECT</u>				
<u>YUMA MESA DIV</u> NORTH GILA I&DD	6,587 (4,030)	49,273		(24,500)
YUMA ID (SOUTH GILA)	10,600	66,364		
YUMA MESA I&DD	20,000	243,799		
TOTAL MESA DIV	-37,187-	-359,436-	250,000	-(24,500)-
<u>WELLTON-MOHAWK DIVISION</u>	62,775	437,962	278,000	
<u>TOTAL GILA PROJECT</u>	-99,962- (4,030)	-797,398-	528,000	-(24,500)-
CITY OF YUMA	NA	75,000	50,000	(2,333)
OTHERS	NA	13,644	13,644	(10,879)
TOTAL YUMA COUNTY	155,686 (48,817)	1,240,488	851,786	(298,512)

TABLE 9

SUMMARY OF COLORADO RIVER WATER RIGHTS
IN YUMA COUNTY ARIZONA

TYPE OF CONTRACT	Annual Diversions (a)	Annual Consumptive Use, (a)	Priority Date
FEDERAL RECLAMATION PROJECTS			
<u>Yuma Project, Valley Division</u>			
Present Perfected Rights (43,562 acres)	320,304 (c)		1901
Other Rights (9,888 acres)			pre-1968 (b)
<u>Yuma Auxiliary Project</u>			
Present Perfected Rights (1,225 acres)	34,142 (c)		1905
Other Rights (2,181 acres)			pre-1968 (b)
<u>Gila Project, Yuma Mesa Division</u>			
<u>North Gila Unit</u>			
Present Perfected Rights (4,030 acres)	49,273 (d)		1905
Other Rights (2,557 acres)			1947
Subtotal			
<u>South Gila Unit</u>			
Other Rights (10,600 acres) ^(f)	66,364 (e)		1947
<u>Yuma Mesa Unit</u>			
Other Rights (20,000 acres) ^(f)	243,799 (e)		1947
Total for Yuma Mesa Division (37,187 acres) ^(f)	359,436 (w)	250,000 (g)	
<u>Gila Project, Wellton-Mohawk Division</u>			
	437,962 (w)	278,000	
SPECIAL PURPOSE CONTRACTS (h)			
Southern Pacific Co.	48	48	1953
Yuma Mesa Fruitgrowers Association	15	15	1956
City of Yuma (cemetery)	60	60	1956
Yuma County (airport)	12	12	1957
Desert Lawn Memorial Park Association	200	200	1956
Desert Lawn Memorial Park Association	360	360	1975
Kryger Land & Cattle (S.R. Blake)	10	10	1967
Desert Hills Golf Course & Yuma Convention Center	1,065	1,065	1981
Yuma Union High School	80	80	1953
City of Yuma (Smucker Park)	165	165	1969

(a) This is the average annual diversion from 1987-1990, based on USBR record. Diversion includes 254,000 acre-feet of present perfected rights for 43,562 acres. $\frac{254,000}{43,562} = 5.83$

(b) By individual farms based on dates of water right applications and putting water to beneficial consumptive use.

(c) This is the average annual diversion from 1987-1990, based on USBR record. Diversion includes 6,800 acre-feet of present perfected rights for 1,225 acres.

(d) This is the average annual diversion from 1987-1990, based on USBR record. Diversion includes 24,500 acre-feet of present perfected rights for 4,030 acres.

(e) This is the average annual diversion from 1987-1990, based on USBR record.

(f) As provided by Act of July 10, 1947 (61 Stat. 628), as modified by Act of October 19, 1984 (P.L. 98-530).

(g) No limit on diversions is provided for in authorizing a limit on beneficial consumptive use. This is an average annual diversion from 1987-1990, based on USBR record. The Wellton-Mohawk Division Diversions reflect the proportional reduction in consumptive use associated with P.L. 100-512 (102 Stat. 2551).

(h) On these small diversions there is no identifiable return flows.

TABLE 9 (continued)

SUMMARY OF COLORADO RIVER WATER RIGHTS
IN YUMA COUNTY ARIZONA

TYPE OF CONTRACT	Annual Diversions (af)	Annual Consumptive Use, (af)	Priority Date
BOULDER CANYON PROJECT ACT (Pumping from River or wells)			
Rayner Ranches (Jack Rayner, Jr.)	4,500		1984
Ansel Hall	510		1988
Pete Auza (Auza Farms)	962		1984
Arlin Dulin (Dulin Farms)	216		1984
Jamar Produce (Arizona Produce)	480		1984
Arman Curtis (Curtis Farms)	300		1983
BOULDER CANYON PROJECT ACT			
City of Yuma	47,667		1959
MEMORANDUM OF UNDERSTANDING BETWEEN FEDERAL AGENCIES			
Marine Corps Air Station	2,070 ⁽¹⁾		1959
Department of Army (Yuma Proving Grounds)	55		1951
WARREN ACT CONTRACTS			
Gila Project			
Ruth B. Thomas	782		1952
Vesta Thomas	668		1951
Yuma Auxiliary Project			
Yuma Mesa Grapefruit Co. (Assigned to Camille Allec, Jr.)	120		1953
University of Arizona	1,088		1954
PRESENT PERFECTED RIGHTS (Not listed above)			
Cocopah Indian Reservation	7,681		1917
Powers	960		1915
United States	1,140		1915
Molina	318		1928
Sturges	780		1925
City of Yuma	2,333		1893
TOTAL ANNUAL DIVERSIONS, (af):	1,226,489		

⁽¹⁾ This is an average annual diversion for 1987-1990. However, the Memorandum of Understanding provides for deliveries up to 8 cubic feet per second, which could total over 5,000 acre-feet per year.

AGRICULTURAL LAND USE 1988-89(a)

CROP TYPE	Yuma Subarea ^(b)							Wellton-Mohawk Subarea ^(c)		County Total (acres)
	Yuma Project	Yuma Auxiliary Project	Gila Project				Yuma Subarea Subtotal (acres)	Wellton-Mohawk Oila Project	Dateland-Hyder Subarea ^(d) (acres)	
	Valley Division (acres)	Unit "B" (acres)	Yuma Mesa Division			Subtotal (acres)		Wellton-Mohawk Division (acres)		
			Mesa Unit (acres)	North Oila Valley Unit (acres)	South Oila Valley Unit (acres)					
Alfalfa/hays	11,613	1,349	4,100	1,950	3,099	9,149	22,111	23,266	1,500	46,877
Broccoli	2,899	0	0	122	150	272	3,171	0	0	3,171
Cabbage	311	0	0	0	5	5	316	0	0	316
Carrots & Celery	60	0	0	0	0	0	60	0	0	60
Cauliflower	4,293	0	0	250	1,181	1,431	5,724	0	0	5,724
Citrus (unspecified)	0	0	0	0	0	0	0	0	2,500	2,500
Corn	0	0	0	0	0	0	0	0	0	0
Cotton/Pasture	10,111	0	0	663	774	1,437	11,548	12,380	16,610	40,538
Dates	15	0	0	0	0	0	15	0	0	15
Grapefruit	937	146	422	0	0	422	1,505	81	0	1,586
Grapes	0	0	0	0	0	0	0	0	1,700	1,700
Grass Seed	1,220	0	0	140	382	522	1,742	3,247	500	5,489
Jojoba	0	0	0	0	0	0	0	0	5,420	5,420
Lemons & Limes	2,087	515	7,010	20	0	7,030	9,632	553	0	10,185
Lettuce	24,992	10	0	4,569	7,808	12,377	37,379	11,315	0	48,694
Melons/Tomatoes	354	26	0	0	75	75	455	881	0	1,336
Onion Seed	424	0	0	0	0	0	424	0	0	424
Oranges/Tangerine	332	239	4,220	16	0	4,236	4,807	755	0	5,562
Pecans	0	0	545	0	0	545	545	0	0	545
Safflower	0	0	0	0	0	0	0	320	0	320
Wheat & Cereals	17,625	210	140	2,321	5,208	7,669	25,504	13,708	0	39,212
Other	0	99	292	0	143	435	534	8,932	2,600	12,066
TOTALS:	77,273	2,594	16,729	10,051	18,825	45,605	125,472	75,438	30,830	231,740
Multi Cropped	32,524	0	0	3,732	9,170	12,902	45,426	N/A	N/A	N/A
Total Acreage Harvested	44,749	2,594	16,729	6,319	9,655	32,703	80,046	N/A	N/A	N/A

(a) Based on 1988-89 data except for the Dateland-Hyder subarea which is based on estimates of maximum year agricultural land use, from Red Mountain Farms.

(b) Based on 1988 USBR data.

(c) Based on 1989 USBR data.

(d) Based on estimates of maximum year agricultural land use, from Red Mountain Farms.

N/A Data not available.

YUMA COUNTY WATER USERS' ASSOCIATION - VALLEY DIVISION, YUMA PROJECT
 CROP REPORTS: ACREAGES IN THOUSAND ACRES, VALUES IN MILLION DOLLARS

'CROPREPORTS'

YEAR	CROPS									TOTALS			
	WHEAT	HAY	COTTON	CITRUS	BERMUDA SEED	BROCCOLI	CALI- FLOWER	LETTUCE	OTHERS	CROP ACREAGE	CROP VALUE (DOLLARS)	IRRIGATED ACREAGE	CROP VALUE PER ACRE
1985	21.0 \$6.3	4.0 \$2.5	9.5 \$8.8	3.3 \$18.0	1.8 \$2.8	0.8 \$1.7	4.5 \$21.2	13.3 \$35.3	6.8 \$2.9	65,021 -	- \$99,471,700	46,443 -	- \$2,142
1986	19.3 \$5.5	5.5 \$2.8	7.9 \$7.3	3.3 \$15.4	2.7 \$2.8	1.0 \$2.5	5.7 \$29.7	17.0 \$56.3	5.7 \$2.5	68,065 -	- \$124,759,300	46,195 -	- \$2,701
1987	12.4 \$3.5	9.6 \$4.0	11.9 \$12.8	3.3 \$16.1	2.6 \$3.2	2.2 \$5.2	6.4 \$31.2	18.0 \$62.0	3.8 \$2.1	70,194 -	- \$140,094,900	45,921 -	- \$3,051
1988	14.5 \$7.3	11.4 \$5.3	13.5 \$15.5	3.3 \$16.6	1.8 \$1.7	2.7 \$6.8	5.9 \$31.9	21.9 \$184.1	3.2 \$2.1	78,220 -	- \$274,414,600	45,924 -	- \$5,975
1989	17.2 \$6.7	10.0 \$4.8	10.0 \$9.7	3.3 \$11.6	0.8 \$0.6	2.9 \$6.5	4.3 \$22.5	25.0 \$105.0	4.8 \$5.0	78,252 -	- \$172,444,900	45,840 -	- \$3,762
1990	18.2 \$6.4	11.0 \$5.2	8.8 \$7.7	3.3 \$27.8	0.6 \$0.5	3.4 \$6.4	3.7 \$14.9	23.2 \$57.1	4.0 \$6.2	76,193 -	- \$132,154,500	45,661 -	- \$2,888
1991	14.6 \$5.7	14.1 \$5.5	7.1 \$7.3	3.3 \$11.8	0.5 \$0.5	4.3 \$9.7	3.5 \$10.4	22.8 \$45.5	4.9 \$13.2	75,069 -	- \$109,573,032	45,616 -	- \$2,404
1992	18.0 \$5.7	12.3 \$4.9	4.2 \$3.5	3.3 \$10.6	1.1 \$0.9	4.6 \$11.2	3.5 \$14.0	23.6 \$70.5	5.5 \$17.8	76,085 -	- \$139,112,982	45,634 -	- \$3,054

ROADS, CANALS, DRAINS, FARMSTEADS
 URBAN (SUBDIVISIONS)
 IRRIGABLE ACRES NOT FOR SERVICE
 TOTAL ACREAGE

1,968
 5,813
 35
 53,450

SUMMARY OF COLORADO RIVER WATER ENTITLEMENTS & AG VALUES YUMA COUNTY, ARIZONA

- O TOTAL DIVERSIONS 1.2 MAF**
- O CONSUMPTIVE USE ONE-THIRD OF
ARIZONA'S ENTITLEMENT OF 2.8 MAF**

AVERAGE AGRICULTURE VALUE IN IRRIGATION DISTRICTS:

LAND ACREAGE 150,000

CROP ACREAGE 200,000

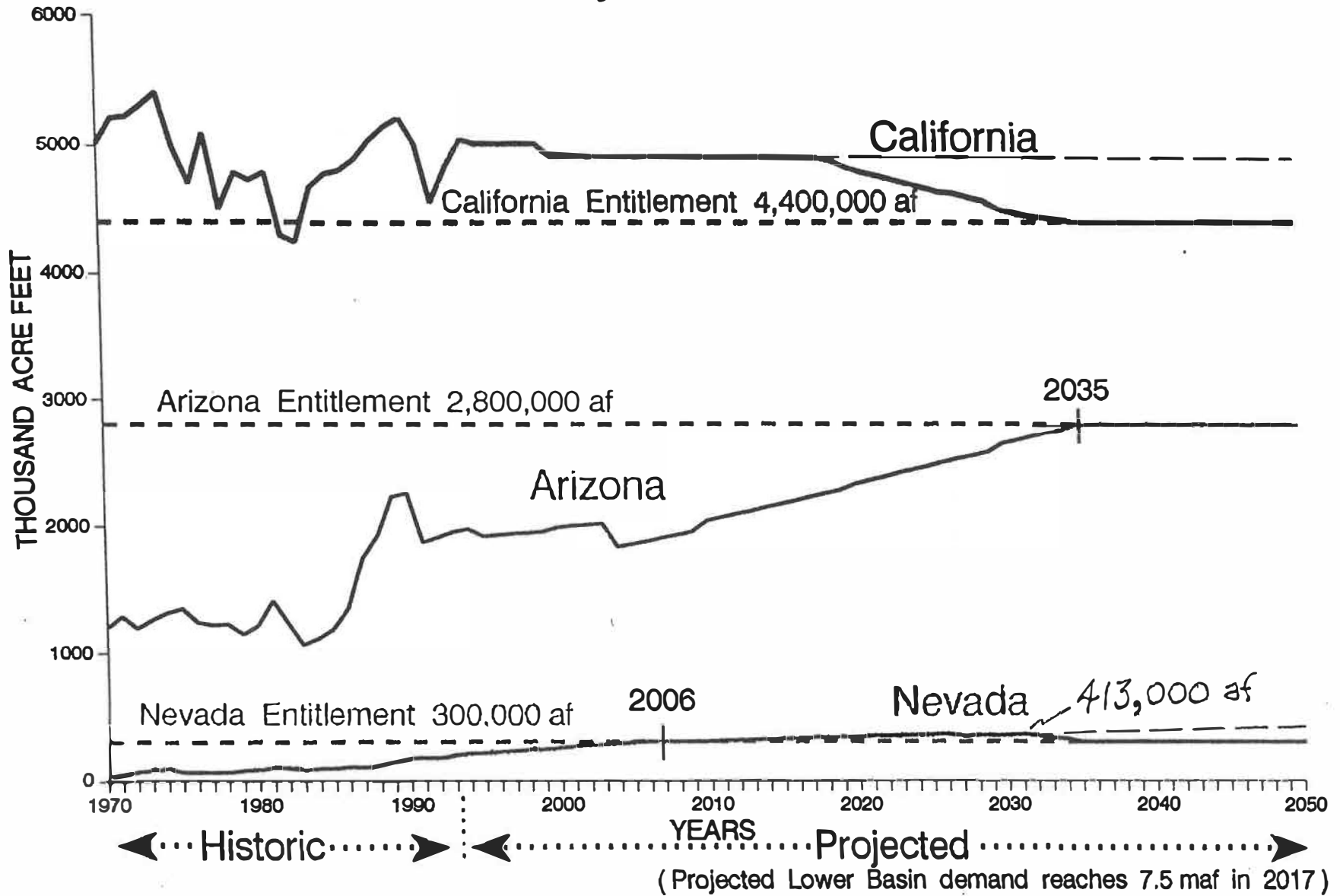
ANNUAL CROP VALUE \$800 MILLION

**AG VALUE \$1 BILLION+++
(WITH VALUE ADDED)**

YUMA WATER ISSUES AND THREATS

- O CALIFORNIA AND NEVADA THIRSTY**
ARIZONA WATER BANK / VIGILANCE
- O MEXICO WANTS MORE WATER**
SALINITY ISSUE
- O THREATS ON THE LAW OF THE RIVER**
ENVIRONMENTAL (ESA, etc)
- O COLORADO RIVER RULES AND REGS**
FAIRNESS ISSUE FOR YUMA
- O RECLAMATION DIMINISHING BUDGET**
FLOODING ISSUE FOR YUMA
- O NEED FOR AG TO M&I WATER USE**
- O RETAIN LOW COST HYDRO POWER**

LOWER COLORADO RIVER WATER USE By State



05DECec96
 LOWER COLORADO WATER SUPPLY REPORT
 Bureau of Reclamation
 River Operations
 L.Siano/J.Smith
 (702)2938539/8541

CURRENT STORAGE	PERCENT CAPACITY	1000 ACRE- FEET	ELEVATION (FEET)
LAKE POWELL - GLEN CANYON DAM	86%	20,852	3677.19
LAKE MEAD - HOOVER DAM	85%	21,875	1192.70
LAKE MOHAVE - DAVIS DAM	85%	1,540	637.07
LAKE HAVASU - PARKER DAM	89%	551	446.46
LOWER COLORADO BASIN CONTENTS	85%	23,966	
TOTAL SYSTEM CONTENTS	83%	50,287	

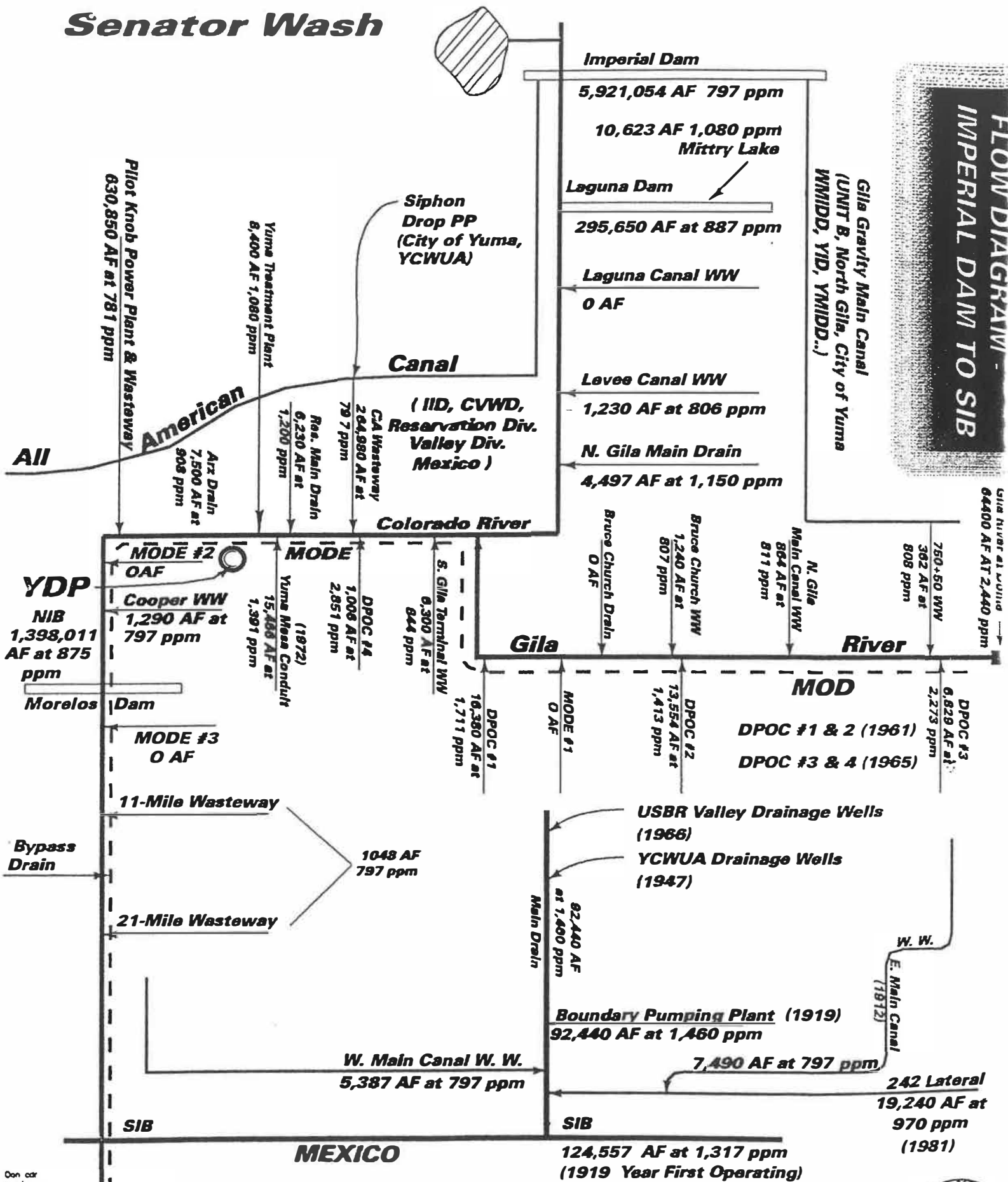
PROJECTED USE FOR CALENDAR YEAR 1996 as of 11/18/96	1000 ACRE- FEET
NEVADA	246
SOUTHERN NEVADA WATER SYSTEM	204
OTHERS	42
BANK	0
CALIFORNIA	5214
METROPOLITAN WATER DISTRICT OF CALIFORNIA	1,248
IRRIGATION DISTRICTS	3,934
OTHERS	32
BANK	0
ARIZONA	2600
CENTRAL ARIZONA PROJECT	1,249
OTHERS	1,351
BANK	0
TOTAL LOWER BASIN USE	8,060
DELIVERY TO MEXICO	1,502

CURRENT 7-DAY AVG RELEASE	CUBIC FEET PER SECOND
GLEN CANYON DAM	12,600
HOOVER DAM	8,500
DAVIS DAM	6,800
PARKER DAM	5,000

OTHER SIGNIFICANT INFORMATION		
INFLOW ABOVE LAKE POWELL - DECEMBER PRELIMINARY FORECAST	DEC 2, 1996	
	MILLION ACRE- FEET	PERCENT OF NORMAL
OBSERVED WATER YEAR '96	10.784	92%
OBSERVED APRIL-JULY '96	7.322	95%
NOVEMBER OBSERVED INFLOW	0.557	106%
DECEMBER INFLOW FORECAST	0.400	93%

BASIN SNOWPACK AND PRECIP INFORMATION	
	PERCENT OF NORMAL
WATER YEAR PRECIP TO DATE	127%
CURRENT BASIN SNOWPACK TO DATE	149%

Senator Wash



Don Orr
son Lewis
2/21/85



* Diversions, Returns, & Salinities are 1994 Figures
 --- = MOD, MODE, Bypass Drain
 () = Date facility put in operation



**IRRIGATION DISTRICT COSTS ASSOCIATED WITH
US BUREAU OF RECLAMATION COST-SHARING REQUIREMENTS FOR
OPERATION AND MAINTENANCE EXPENSES FOR YUMA AREA DRAINAGE FACILITIES**

TOTAL COST IN \$
(COST IN \$ PER ACRE IRRIGATED)

	YCWUA	YUMA MESA IR & DR DIST	UNIT B IR DIST	YUMA IRRIGATION DISTRICT	TOTAL
PROJECT ACRES	53,450 AC	20,000 AC	3,400 AC	10,600 AC	
ACRES IRRIGATED	45,349 AC IR	18,058 AC IR	2,930 AC IR	9,643 AC IR	
US BUREAU OF RECLAMATION WELLFIELDS IN YUMA VALLEY, YUMA MESA & SO. GILA VALLEY	\$152,105 (\$3.35)	274,867 (15.22)	54,317 (18.54)	211,062 (21.89)	1,384,702
YCWUA WELLS, DRAINS AND BOUNDARY PUMPING PLANT - YUMA VALLEY	\$217,393 CR (\$4.79 CR)	183,545 (10.16)	33,848 (11.55)	0 0	786,621 WU=569,222
TOTALS:					
COST INCREASE	\$65,288	458,412	88,165	211,062	
PER ACRE COST INCREASE	(\$1.44 CR)	(25.38)	(30.09)	(21.89)	
CROP VALUES: (1992 CROP YEAR)					
\$ VALUE	\$139,113,452	34,111,147	3,728,079	29,233,270	
ACRES	45,556	17,327	2,487	9,643	
\$ PER ACRE	\$3,054 *	1,969	1,499	3,031	
* Not a good year	* \$5,488 in 1994				