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IN THE SUPERIOR COURT OF THE STATE OF ARIZONA  
IN AND FOR THE COUNTY OF APACHE

IN CHAMBERS ( X ) IN OPEN COURT ( )

SPECIAL MASTER JOHN E. THORSON  
Presiding

IN RE THE GENERAL ADJUDICATION  
OF ALL RIGHTS TO USE WATER IN THE  
LITTLE COLORADO RIVER SYSTEM  
AND SOURCE

DATE: April 20, 1994

CIVIL NO. 6417-033-9005  
(Consolidated)

MEMORANDUM DECISION,  
FINDINGS OF FACT, AND  
CONCLUSIONS OF LAW FOR  
GROUP 1 CASES INVOLVING  
STOCKPONDS, STOCK-  
WATERING, AND WILDLIFE  
USES

CONTESTED CASE NAME: *In re Reporting of Diversion Information and  
Other Objections*

DESCRIPTIVE SUMMARY: The Special Master issues his memorandum  
decision, findings of fact, and conclusions of law on all matters submitted by  
stipulation, evidentiary hearing, and legal argument concerning stockponds,  
stockwatering uses, and wildlife uses (Group 1). Abstracts of water right for  
all the proposed water rights involved in the first group are also set forth in  
the appendix.

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## I. NATURE OF PROCEEDINGS

This memorandum decision addresses the factual and legal issues raised by objections to a selected number of watershed file reports in the Silver Creek watershed where water is used for stockponds, stockwatering, and wildlife purposes. Before explaining the Special Master's decision on these matters, it is necessary to understand the context in which these issues arise.

The HYDROGRAPHIC SURVEY REPORT FOR THE SILVER CREEK WATERSHED (HSR) was filed on November 30, 1990; and the 180-day objection period prescribed by section 45-256(B), ARIZ. REV. STAT. ANN. (1994), ended on May 29, 1991.

In beginning to process the numerous objections filed to the SILVER CREEK HSR, the Master initially organized a series of eight special consolidated cases which were designed to address important legal issues (issues of broad legal importance) that should be decided early in the adjudication allowing participation by interested parties. See RULES FOR PROCEEDINGS BEFORE THE SPECIAL MASTER § 12.00 (1991). Through a laborious series of modifications, this case management strategy was modified by the initial termination or consolidation of some of these cases, eventually leading to the consolidation of all remaining special consolidated cases into *In re Reporting of Diversion Information and Other Objections*, No. 6417-033-9005 (Consolidated).

After this final consolidation, case number 6417-033-9005 has become the vehicle for taking up different groups of watershed file reports (organized by water use) in order to address, litigate, and decide important legal issues, as well as the specific characteristics of the underlying water rights. The first group of watershed file reports, commonly referred to as "Group 1" or the "first group," involves stockponds, stockwatering, and wildlife uses of water. Six watershed file reports were originally designated as part of this first group. These watershed file reports (WFRs) are No. 033-41-012 (ASLD/V. Flake), No. 033-50-001 (USFS/Decker), No. 033-50-007 (USFS/Maxwell), No. 033-51-001 (USFS/Frost, Carlisle & Pearce), No. 033-51-003 (USFS/Adams, Ellsworth & Stock), and No. 033-56-070 (Navajo Co. Parks Comm'n).

Group 1 has progressed in several phases. For the watershed file reports involved in this first group, the litigants are the landowners; any lessees, permittees, or allottees; other claimants to the water; objectors; and persons allowed to intervene. The litigants met to determine what factual and legal issues could be settled and what issues would have to be litigated. Litigants presented the Master with a detailed agreement for adjudicating the characteristics of most of the stockponds, stockwatering uses, and wildlife uses for the watershed file reports. There being no objection to this proposed

agreement, the Master accepted this settlement at trial. Minute Entry at 2 (June 15, 1993). The abstracts of proposed water right, which have been prepared by the Special Master from the settlement materials presented by the litigants (modified as necessary by rulings herein), are set forth in the appendix to this report.

One issue that could not be settled by the litigants is how priority dates will be determined for the water rights described in WFR No. 033-41-012. This question, which was submitted at trial on a stipulated set of exhibits, is addressed along with a more complete discussion of priority dates in part III(G) of this decision.

Another issue that could not be settled by the litigants is the relationship of the adjudication court to the Department of Water Resources (DWR or the Department) when applications and permits under the Public Water Code for water rights in a watershed undergoing active adjudication are pending before the Department. See ARIZ. REV. STAT. ANN. §§ 45-151 to -167. This question was litigated during a short trial on June 15, 1993, after which briefs and proposed findings of fact and conclusions of law were submitted. The Master's decision on this issue is set forth in part V of this decision.

At the time of the June trial, the Master set forth three pages of issues and questions and requested legal memoranda from the litigants to help him determine how water right characteristics for stockponds, stockwatering uses, and wildlife uses should be adjudicated. Final Pretrial Order, Att. A (May 28, 1993). Many litigants provided thorough and helpful briefs on these issues. The Master's decisions on these issues are set forth throughout this decision.

The litigants also could not agree on the ownership of water rights on public land held in trust by the State of Arizona ("state trust lands"). Since no facts were in dispute, the Master asked for briefs and oral arguments on this ownership question. The Master's decision on this issue is set forth in part IV of this memorandum decision. For water rights on federal land, the United States announced a general policy concerning ownership that is described in part IV(A) of this decision. Two watershed file reports were designated to help frame this issue (Minute Entry of August 31, 1993): WFR No. 033-52-034 and WFR No. 033-42-010.

The final evidentiary matter in this first group of cases was whether stockwatering uses and stockponds (including such uses in closed basins) should be adjudicated in a summary fashion based on their possible *de minimis* impact on other water rights. The trial before the Special Master on this *de minimis* question was held on November 15, 1993. While there was no opposition to a summary adjudication for these small water uses, there was disagreement about how a summary adjudication should be

accomplished. The Master's decision on these *de minimis* questions is set forth in parts II and III of this decision.

This memorandum decision approaches these many issues in a more logical sequence than the chronological order in which they were taken up. The decision starts with a discussion of whether stockponds, stockwatering uses, and wildlife uses should be adjudicated in a summary fashion (part II). After reaching an affirmative decision on this question, the Master then determines the characteristics to be adjudicated for these *de minimis* uses (part III). In the process, the Master takes up and decides important issues concerning ownership of water rights, priority date, and the quantity of water use, among other issues. The ownership of water rights on public land is addressed in part IV.

Part V of the report concerns the jurisdictional question concerning water right applications and permits that are pending before the Department of Water Resources.

Part VI sets forth some procedures necessary to implement the determinations made in this decision. The appendix contains the abstracts of proposed water right for the stockwatering, stockpond, and wildlife uses involved in the first group. These abstracts will be included in the catalog of proposed water rights for the Silver Creek watershed.

## **II. SHOULD THERE BE A SUMMARY ADJUDICATION OF CERTAIN USES?**

After an earlier discussion with the litigants involved in Group 1, the Special Master framed the issue of a possible summary or *de minimis* adjudication of Group 1 water uses at a status conference held on July 7, 1993. Minute Entry at 3 (July 7, 1993). Such a summary or *de minimis* adjudication would potentially resolve the objections to many small water uses and remove them from active litigation.

The Master requested that the Department of Water Resources prepare a technical assessment of a possible *de minimis* adjudication of stockpond and stockwatering uses. This report, titled TECHNICAL REPORT ON *DE MINIMIS* ADJUDICATION OF STOCKPOND AND STOCKWATERING USES IN THE SILVER CREEK WATERSHED (hereinafter "TECHNICAL REPORT," introduced into evidence as Ex. No. DWR-001), was filed by the department on September 1, 1993. The pretrial statement on this question was submitted by the parties on October 25, 1993, and a pretrial conference was held on November 2, 1993.

The trial on this issue was held on November 16, 1993, with evidence being submitted by the following litigants: U.S. Bureau of Land Management and the U.S. Forest Service (Apache Sitgreaves National Forest) (the "United

States"); F-Bar Cattle Co., G.L. & S.D. Flake, Marjorie Tweed, Tweed Estate, J. Albert Brown Ranches, Inc., Vincent Flake Family, Jack Carlisle, and Silver Creek Irrigation Dist. (the "Stockwater Group"); Lawrence J. & Jessie A. Slade, trustees for The Family Farm; Aztec Land & Cattle Co., Ltd.; State of Arizona; and the Salt River Project Agricultural Improvement and Power District and Salt River Valley Water Users' Association (the "Salt River Project").

Several of the litigants filed proposed findings of fact and conclusions of law and post-trial briefs on January 13, 1994.

#### A. Terminology

While the court and many of the litigants frequently refer to the *de minimis* concept for adjudicating small water uses, there is confusion about the meaning of this term as well as other terms such as "summary adjudication" and "uniform adjudication." In order to create a better understanding of these concepts and the Master's decision on this issue, the following discussion is offered.

The principal question the Special Master must decide is whether a summary adjudication is appropriate for certain water uses in the general stream adjudication. In answering this question for any watershed, the following preliminary question must be addressed:

Are there categories of water uses in the watershed where the individual and cumulative impact on other uses is so small that the expenditure of judicial, administrative, and litigant resources, which would be necessary to undertake a complete adjudication of these uses, is not warranted?

If the answer to this question is "yes," then these water uses are *de minimis*, a concept which is explained in more detail in the next section. If certain categories of water uses are *de minimis*, then these rights can be determined in an abbreviated, summary fashion setting forth only those characteristics that are necessary for proper water rights administration. Cf. *In re General Adjudication of All Rights to Use Water in Gila River System & Source*, 175 Ariz. 382, 394, 857 P.2d 1236, 1248 (1993).

This leads to several secondary questions:

- What water right characteristics should be determined for *de minimis* water uses that are to be adjudicated in a summary fashion?
- What information will be used to determine these characteristics?



- Can some of these characteristics (such as quantity) be described in a uniform manner so that the same determination is made for all small uses of that category?

These questions are discussed and decided in the context of the Silver Creek watershed although the same methodology will be followed in other Little Colorado River watersheds.

#### B. Concept of *De Minimis* Water Uses

*De minimis* is an abbreviation of a longer Latin phrase, *de minimis non curat lex*, which means "the law does not care for, or take notice of, very small or trifling matters." BLACK'S LAW DICTIONARY 431 (6th ed. 1990). In this adjudication, the concept of *de minimis* does not suggest that small water uses are unimportant. Stockwatering and stockpond rights are crucial to the survival of ranching operations in an arid environment. Wildlife watering rights are important to ecological systems and public recreational facilities.

The possibility of a summary adjudication, based on certain categories of uses being found *de minimis*, only expresses a judicial determination that the costs of a detailed adjudication of these small uses (particularly to the water users themselves) far outweigh any benefits to the owner, other water users, or public and private water managers that would result from a detailed and complete adjudication. For example, the expense of litigating all conceivable objections to a small stockpond may not be warranted if administration of the stockpond is impractical (there usually is no diversionary control) and would not produce any water for other water users due to the infiltration or evaporation of water or other physical factors.

While there has been little academic discussion of *de minimis* uses, the concept has often been used to adjudicate or manage water in the western states. DWR's technical report refers to five Arizona water right decrees that have utilized a form of *de minimis* characterization for stock purposes. TECHNICAL REPORT at 14-15. Additionally, the department cites use of the *de minimis* concept in California, Idaho, Montana, New Mexico, Oregon, Texas, Utah, Washington, Kansas, Nebraska, and Wyoming. *Id.* at 18-22. Also, small water uses are sometimes considered *de minimis* under interstate compacts, such as the Yellowstone River Compact among Montana, Wyoming, and North Dakota, where domestic and stockwatering uses with 20 acre-feet or less of storage are excluded from the compact provisions. Art. V(E)(1), MONT. CODE ANN. § 85-20-101 (1993).

The Arizona Supreme Court has recognized the utility of a summary adjudication of certain *de minimis* uses in a recent adjudication decision. In

addressing what wells are pumping appropriable subflow, the court concluded as follows:

We believe that the trial court may adopt a rationally based exclusion for wells having a *de minimis* effect on the river system. Such a *de minimis* exclusion effectively allocates to those well owners whatever amount of water is determined to be *de minimis*. It is, in effect, a summary adjudication of their rights. A properly crafted *de minimis* exclusion will not cause piecemeal adjudication of water rights or in any other way run afoul of the McCarran Amendment.

175 Ariz. at 394, 857 P.2d at 1248 (1993).

### **C. Determination of Potential Impacts**

This decision now addresses whether stockponds, stockwatering uses, and wildlife uses in the Silver Creek watershed can be considered *de minimis*. A principal purpose of the adjudication is to ensure that water rights are adjudicated in a proper fashion based upon appropriate and necessary prefilings, adjudication filings, and historic beneficial use. If the court is to use a summary procedure for small uses, the court must ensure that the abbreviated adjudication of these uses does not in itself injure other water users. In fact, the United States as trustee (joined by the Navajo Nation, Hopi Tribe, and San Juan Southern Paiute Tribe) has filed many objections to stockponds and stockwatering uses in the Silver Creek watershed based on the alleged interference with downstream Indian reserved water rights.

To determine whether stockponds, stockwatering uses, and wildlife uses are *de minimis* and candidates for summary adjudication, the following discussion addresses the individual impacts of these uses, the cumulative or combined impact of these uses, the feasibility of administration, and the special case of small uses in hydrologically closed basins.

#### **1. Individual Impacts**

For purposes of this decision, an "individual impact" of a stockpond, stockwatering, or wildlife use results when the use affects another valid water right in a manner contrary to law. The prior appropriation doctrine recognizes that water uses on the same stream affect one another but these effects are permissible if the water is used for beneficial purposes and is taken in order of priority. One water use unlawfully affects or impacts another use if the first use was not properly established, the use is not beneficial, or the water is taken out of priority. For instance, a stockpond in the higher reaches of a draw improperly affects or impacts a lower stockpond if the higher

stockpond stores water out of priority resulting in less water for the downstream senior user.

Very few if any objections have been filed in the Silver Creek watershed alleging that stockponds, stockwatering, or wildlife uses improperly impact other nearby water uses. Very few objections would be expected since stock and wildlife consume little amounts of water [see part III(J)(1), *infra*] and most stockponds are constructed along ephemeral second or third order channels. Even if a water user were forced to curtail an improper stock or wildlife use, little of the resulting water would reach a neighboring or downstream user because of carriage losses. See discussion of futile call in A. D. TARLOCK, LAW OF WATER RIGHTS & RESOURCES § 5.08[2][b] (1993).

Whether stockponds, stockwatering, and wildlife uses have been properly established and claimed will be resolved in this adjudication even though these uses are determined to be *de minimis* and subject to summary adjudication.

Allegations that specific wildlife, stockwatering, and stockpond uses interfere with other uses within the same watershed are likely to be infrequent and will be difficult to prove. Objections or allegations that specific wildlife and stock uses interfere with other water rights within the same watershed (for instance, by taking water out of priority) are best resolved in post-decree enforcement proceedings.

## 2. Cumulative Impacts

The "cumulative impact" of stockpond, stockwatering, or wildlife uses refers to the effect all these uses in the Silver Creek watershed will have on water users downstream in other Little Colorado River watersheds. Cumulative impact analysis requires (a) a determination of the amount of water used for stockponds, stockwatering, or wildlife uses in the Silver Creek watershed and (b) a determination of how much of this water would be available to users in lower watersheds if none of these upstream uses existed. Since a *de minimis* determination effectively places stockponds, stockwatering, and/or wildlife uses beyond a priority call by users in lower watersheds, the court must ensure that a *de minimis* determination for these Silver Creek uses will have an insignificant impact on those lower basin users.

An estimate of the cumulative impacts of stockwatering, wildlife, and stockpond uses was the principal purpose of DWR's TECHNICAL REPORT. The question of cumulative impacts was also the subject of the trial on November 16, 1993, although the department's findings on cumulative impacts were not challenged in any significant way by the litigants.

The department's analysis shows that wildlife and stockwatering from streams and springs in the watershed have no measurable impact on surface water outflow from the watershed. TECHNICAL REPORT at 12. The Master has concluded that wildlife watering and stockwatering uses are *de minimis* uses of water; and rights to these uses will be adjudicated in a summary fashion.

The department's analysis of the cumulative impact of stockponds on the watershed was more difficult and required both a calculation of the total capacity of these ponds and an estimate of how much water would be available to users in lower watersheds if the ponds did not exist. This undepleted flow analysis is necessary since some of the water no longer captured by ponds would still be lost due to evaporation, evapotranspiration by plants, and infiltration.

The department estimates the total capacity of all stockponds in the watershed as 2551.6 acre-feet (the total capacity is estimated as 2,374 acre-feet for the stockponds outside three closed basins which are not hydrologically connected to the remainder of the watershed, *see infra*). This amount is 3.6 percent of all cultural diversions in the watershed and 2.2 percent of total water supply in the watershed. *Id.* at 6 & 7.

The department's undepleted flow analysis indicates that very little of the water from stockponds outside the closed basins (703 stockponds holding 2,374 acre-feet) would ever reach downstream watersheds if the ponds were removed. Infiltration into earth and riparian and channel losses would account for 1,990 acre-feet. Only 380 acre-feet would make it to lower watersheds. *Id.* at 10. This potential additional outflow is 0.3 percent of the total water supply of the watershed, 0.5 percent of the total cultural diversions in the watershed, and less than 2.8 percent of the annual surface water outflow of the watershed. Impacts in this range are insignificant and frequently unmeasurable. *Id.* at 7.

While it is difficult from the department's report to determine the number of ponds by increments of size, the average size for these 703 stockponds is 3.38 acre-feet (2,374/703). *Id.* at 6. Thus, the Master concludes that stockponds with a volume not greater than 4.0 acre-feet have an insignificant impact on downstream watersheds and are *de minimis* uses of water. Rights to these uses will be adjudicated in a summary fashion.

### 3. Feasibility of Administration

Even if stockponds, wildlife, and stockwatering uses could not be shown to have a *de minimis* impact on other watersheds, it is unlikely that instream uses or individual stockponds of 4.0 acre-feet or less could be called by senior water users in dry years. The senior appropriator would have to

show that the curtailment of use at an instream location or pond would actually produce water benefiting the senior. This may be difficult and perhaps impossible if the amount of water is small and must flow many miles to reach the senior's diversion. Stockponds generally do not have a water release outlet; to satisfy a call, the full pond would have to be breached. The feasibility of administration is an independent basis for a *de minimis* determination for these uses.

#### 4. Impacts of Water Uses in Closed Basins

The Silver Creek watershed contains three closed drainages that DWR has determined contribute no runoff to the main channel of Silver Creek or its tributaries. These closed basins, which have no surface and no demonstrable underground hydrologic connection with Silver Creek, are the White Lakes, Long Lake, and The Sinks. 1 SILVER CREEK HSR 49.

One of the issues tried before the Special Master on November 16, 1993, was whether water uses in these closed basins should be determined as *de minimis*. See Pretrial Order at 3-4 (Nov. 4, 1993). The State of Arizona, principal supporter of a *de minimis* treatment for stockponds and stockwatering uses in these closed basins, argued that this determination should be made even if the Master did not conclude that these categories of uses are *de minimis* in the remainder of the Silver Creek watershed.

Because of the lack of hydrologic connection with the remainder of the Silver Creek watershed, the Master concludes that stockponds, wildlife uses, and stockwatering in these closed basins have no direct effect on downstream water users outside the closed basin. These uses, regardless of size, should be adjudicated in a *de minimis* fashion on this basis alone.

#### D. Findings of Fact

##### 1. General

Finding of Fact No. 1. The diversions of surface water and groundwater in the Silver Creek watershed total 74,090 acre-feet per year of which 70,070 acre-feet per year are cultural diversions and 4,020 acre-feet per year are natural diversions. Ex. No. DWR-001 at 7.

Finding of Fact No. 2. The total water supply of the Silver Creek watershed is 116,980 acre-feet. Ex. No. DWR-001 at 7.

Finding of Fact No. 3. The total outflow of water from the Silver Creek watershed into lower watersheds is 66,500 acre-feet per year of which 13,350 acre-feet per year is surface water and 53,150 acre-feet per year is groundwater. Ex. No. DWR-001 at 7.

## 2. Wildlife Uses

Finding of Fact No. 4. There are only ten wildlife water uses within the Silver Creek watershed and these uses are negligible. Ex. No. DWR-001 at 12.

## 3. Stockwatering Uses

Finding of Fact No. 5. There are 110 stockwatering uses in the Silver Creek watershed of which fifteen are located in closed basins. Ex. No. DWR-001 at 12.

Finding of Fact No. 6. Each animal unit (1 cow/calf pair combination) consumes approximately 0.011 acre-feet of water per year. Ex. No. DWR-001 at 12.

Finding of Fact No. 7. More than 12,000 animal units would have to drink from surface water sources in the Silver Creek watershed in order to consume one percent of the available surface water outflow (133.5 acre-feet). Ex. No. DWR-001 at 12.

Finding of Fact No. 8. Stockwatering uses have a minimal impact on surface water outflow from the watershed. Ex. No. DWR-001 at 12-13; Trial Tr. at 65 (Erb).

Finding of Fact No. 9. The administration of stockwatering uses is not feasible. Trial Tr. at 151-52 (Ten Eyck).

## 4. Stockpond Uses

Finding of Fact No. 10. The use of a water budget and undepleted flow analysis is an appropriate method for determining the impact of stockponds on watershed production. Ex. No. DWR-001 at 4; Ex. No. ASLD-022; Trial Tr. at 104 (Young); Trial Tr. at 167 (Ten Eyck).

Finding of Fact No. 11. There are 762 stockponds in the Silver Creek watershed. Ex. No. DWR-001 at 6; 1 SILVER CREEK HSR 332 (admitted into evidence, Trial Tr. at 11-13, Special Master Thorson).

Finding of Fact No. 12. Stockponds in the Silver Creek watershed can be deemed to fill one time per year (fill factor of 1.0). Trial Tr. at 74 (Erb).

Finding of Fact No. 13. The 762 stockponds in the Silver Creek watershed have an estimated total capacity of 2,551.6 acre-feet. The 703

stockponds outside closed basins have an estimated total capacity of 2,374 acre-feet with an average capacity of 3.38 acre-feet. Ex. No. DWR-001 at 6.

Finding of Fact No. 14. For a variety of reasons (including evaporation and infiltration), total stockpond capacity is not the cumulative impact of stockpond uses on downstream watersheds. Using undepleted flow analysis, DWR estimated the volume of water that would leave the Silver Creek watershed if these stockponds did not exist and the water were allowed to flow downstream under natural conditions. Ex. No. DWR-001 at 9.

Finding of Fact No. 15. Only 380 acre-feet per year would reach the surface water outflow of the watershed if none of these stockponds existed. This volume is only 0.3 percent of the total water supply of the watershed, 0.5 percent of the total cultural diversions in the watershed, and less than 2.8 percent of the annual surface water outflow of the watershed. This volume is barely measurable utilizing current hydrological methods. Ex. No. DWR-001 at 7, 9-10.

Finding of Fact No. 16. The volume of 380 acre-feet per year is the cumulative impact of all stockpond uses in the Silver Creek watershed on water uses in lower watersheds. Ex. No. DWR-001 at 10.

Finding of Fact No. 17. A reduction in watershed outflow of approximately 2.2 percent is an insignificant amount. Ex. No. ASLD-022 at 168; Trial Tr. at 104-105 (Young); Ex. No. DWR-001 at 10, 13, 36 & 39; Ex. No. ASLD-022; Trial Tr. at 168 (Ten Eyck).

Finding of Fact No. 18. The water retained in stockponds would not reach the watershed outlet if not held in the ponds due to channel losses and evapotranspiration. Trial Tr. at 75-77 (Erb); Trial Tr. at 106-07 (Young).

Finding of Fact No. 19. Stockponds have relatively little impact on total watershed production, even in dry years. Ex. No. ASLD-022 at 171; Ex. No. DWR-001 at 13.

Finding of Fact No. 20. Stockponds have an insignificant hydrologic impact on downstream water users. Trial Tr. at 106-07 (Young).

Finding of Fact No. 21. No stockpond user is known to have made a call on another stockpond user upstream. Trial Tr. at 137-38 (Brophy).

Finding of Fact No. 22. No stockpond user is known to have filed objections to another stockpond user's water right. Trial Tr. at 162 (Ten Eyck); Trial Tr. at 192 (Young).

Finding of Fact No. 23. Most stockponds have no mechanism for releasing water. Trial Tr. at 95-96 (Erb).

Finding of Fact No. 24. Administration of most stockponds is not feasible in terms of making water available to downstream users. Ex. No. SRP-028 at 2 & 5; Trial Tr. at 149-50, 154 (Ten Eyck).

#### 5. Uses in Closed Basins

Finding of Fact No. 25. There are three closed basins within the Silver Creek Watershed, as identified by DWR. They are The Sinks, Long Lake, and White Lakes. Trial Tr. at 185 (Young).

Finding of Fact No. 26. There is no hydrological connection between surface water flowing in these basins and surface water outflow from the Silver Creek watershed. Trial Tr. at 98 (Erb).

Finding of Fact No. 27. Surface water flowing in these closed basins recharges the regional aquifer in the Little Colorado River System. Trial Tr. at 98 (Erb).

Finding of Fact No. 28. Fifty-nine stockponds and fifteen stockwatering uses are located in these closed basins. Ex. No. DWR-001 at 4.

Finding of Fact No. 29. Stockponds and stockwatering uses in the closed basins do not impact surface flow in Silver Creek or Show Low Creek. Ex. No. DWR-001 at 4; Ex. No. ASLD-023; Trial Tr. at 69 (Erb); Trial Tr. at 187-89 (Young).

Finding of Fact No. 30. Stockponds and stockwatering uses in these three closed basins have no direct effect on downstream water users outside the closed basins. Ex. No. ASLD-023 at 3.

#### E. Conclusions of Law

Conclusion of Law No. 1. Individual wildlife uses in the Silver Creek watershed have a *de minimis* impact on other water users and individual wildlife uses can be adjudicated in a summary fashion.

Conclusion of Law No. 2. Wildlife uses in the Silver Creek watershed, taken as a whole, have a *de minimis* impact on downstream watersheds and individual wildlife uses can be adjudicated in a summary fashion.

Conclusion of Law No. 3. Individual stockwatering uses in the Silver Creek watershed have a *de minimis* impact on other water users and individual stockwatering uses can be adjudicated in a summary fashion.



Conclusion of Law No. 4. Stockwatering uses in the Silver Creek watershed, taken as a whole, have *de minimis* impact on downstream watersheds and individual stockwatering uses can be adjudicated in a summary fashion.

Conclusion of Law No. 5. Stockponds in the Silver Creek watershed with a volume of 4.0 acre-feet or less, taken individually or as a whole, have *de minimis* impact on downstream watersheds and can be adjudicated in a summary fashion.

Conclusion of Law No. 6. Stockponds in the Silver Creek watershed with a volume of more than 4.0 acre-feet will not be adjudicated in a summary fashion, and objections to these stockponds will be resolved in the normal course of the adjudication.

Conclusion of Law No. 7. Since stockponds of 4.0 acre-feet or less, stockwatering uses, and wildlife uses in the Silver Creek watershed, taken individually or as a whole, have only a *de minimis* impact on water uses in lower watersheds, these uses in the Silver Creek watershed are not subject to a priority call by water users in lower watersheds.

Conclusion of Law No. 8. Because stockponds of all sizes and stockwatering uses in The Sinks, Long Lake, and White Lakes (which are closed basins) have no direct effect on other water uses in the Silver Creek watershed or in lower watersheds, these uses, regardless of their size, are *de minimis*, will be adjudicated in a summary fashion, and will not be subject to a priority call by water users outside the closed basin.

### III. WHAT CHARACTERISTICS SHOULD BE ADJUDICATED FOR DE MINIMIS USES?

Based on the *de minimis* impact of stockponds, stockwatering, and wildlife uses in the Silver Creek watershed, a summary adjudication will be made of these uses. In this part of the decision, the water right characteristics for these uses, as set forth in individual abstracts of proposed water right, will be discussed and determined.

#### A. Characteristics to be Determined

Unless unusual circumstances warrant, the following characteristics and determinations will be made and set forth in the water right abstracts for all stockpond, stockwatering, and wildlife uses:

- Proposed water right number;

- Statement of claimant associated with proposed water right;
- Basis of the water right;
- Owner of the water right;
- Beneficial use (type of use);
- Priority date;
- Source of water;
- Place of use; and
- Quantity.

The following optional characteristics will be included in a water right abstract if requested by the litigants:

- Lessee name;
- Lease number;
- Facility name; and
- Lessee's right to reimbursement for improvements.

These optional characteristics, however, are provided for informational purposes and will not be subject to objection in the catalog of proposed water rights or in exceptions to the Master's final report.

#### **B. Proposed Water Right Number**

A proposed water right number (PpWR No.) will be created for each water right to be included in the catalog of proposed water rights. For each water right recommended for adjudication, the number will be prepared as follows:

Watershed file report where the water use is described + abbreviation of the type of beneficial use + unique serial number.

For instance, the first proposed water right in the appendix is numbered as follows:

PpWR No. 033-41-012-SP001.

Frequently, the proposed water right will be the same as the potential water right (PWR) reported in the watershed file report.

### C. Statement of Claimant

#### 1. Discussion

In this portion of the water right abstract, the number of the statement of claimant matched to the proposed water right will be listed. A statement of claimant must be filed for a water right to be recognized and adjudicated in the general stream adjudication. Section 45-254(E), ARIZ. REV. STAT. ANN., states as follows:

Any potential claimant properly served who fails to file a statement of claimant in accordance with the requirements of this article shall be barred and estopped from subsequently asserting any right theretofore acquired upon the river system and source and shall forfeit all rights to the use of water in the river system and source theretofore claimed by him.

An objection that a stockpond, stockwatering, or wildlife use has not been claimed will be resolved in this adjudication.

#### 2. Conclusions of Law

Conclusion of Law No. 9. A statement of claimant must be filed in order for each water use to be recognized and adjudicated in this adjudication.

Conclusion of Law No. 10. A statement of claimant must be matched to each of the stockpond, stockwatering, and wildlife uses that will be adjudicated in a summary fashion for inclusion in the Master's catalog of proposed water rights.

### D. Basis of Water Right

#### 1. Discussion

A statement of claimant, however, is not an independent basis for establishing a water right. The general stream adjudication is a determination of pre-existing water rights. ARIZ. REV. STAT. ANN. § 45-254(E) ("Any potential claimant . . . who fails to file a statement of claimant . . . shall be barred and estopped from subsequently asserting any right theretofore acquired upon the river system . . ."). Thus, there must be a separate legal basis for each water right to be recognized in the adjudication.

Over the years, the Arizona Legislature has adopted a comprehensive scheme for establishing a legal basis for each right to use appropriable water in the state. With passage of the 1919 Public Water Code, the legislature provided an administrative process for obtaining new water rights. See discussion at part V(B), *infra*. The legislature has also passed two "savings" laws to enable appropriators to secure their water rights independently of the Public Water Code. Under the 1974 Water Rights Registration Act, ARIZ. REV. STAT. ANN. §§ 45-181 to -190, persons could register their water rights with the state. While the primary purpose of this legislation was to allow holders of pre-1919 water rights to secure recognition of these rights, even persons who had appropriated water after 1919 without complying with the Public Water Code could register their rights. Water rights issued pursuant to a permit or certificate, rights in the mainstream waters of the Colorado River, contractual rights with the United States, and rights established in a prior decree or adjudication were exempt from this registration process. *Id.* § 45-182(B).

Many stockpond owners were unclear whether the requirements of the Public Water Code and the Water Rights Registration Act applied to them. The legislature addressed the remaining ambiguity when it enacted the second "savings" measure, the 1977 Stockpond Registration Act, ARIZ. REV. STAT. ANN. §§ 45-271 to -276. Under this statute, stockpond owners were given a window of opportunity to register their uses. If the stockpond was constructed prior to August 27, 1977, it had to be registered with the state.<sup>1</sup> *Id.* § 45-272(C). After August 27, 1977, the stockpond had to be constructed under a permit to appropriate issued by DWR. *Id.* § 45-272(D).

No wildlife, stockwatering, or stockpond uses will be adjudicated without the legal basis for the claimed right having been established. This decision does not address whether a well registration (a "55") under section 45-593, ARIZ. REV. STAT. ANN., is independently a sufficient legal basis for a water right claimed in this adjudication. Since this issue has not been briefed, abstracts have not been prepared (but may be prepared later) for those water uses described in the settlement which are based solely on a well registration. The litigants may suggest to the court how this issue should be addressed.

## 2. Conclusions of Law

Conclusion of Law No. 11. The legal bases for water rights to be recognized in this adjudication include the following: prior court decrees,

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<sup>1</sup>The Stockpond Registration Act required these registrations to be filed by June 30, 1979. Stockpond owners may register their rights after that date, but their rights have a priority date as of the date of filing with DWR. ARIZ. REV. STAT. ANN. § 45-272(C) (1994).

filings pursuant to the Water Rights Registration Act, certificates of water right,<sup>2</sup> and filings pursuant to the Stockpond Registration Act.

Conclusion of Law No. 12. A prior court decree, a filing pursuant to the Water Rights Registration Act, a certificate of water right, or a filing pursuant to the Stockpond Registration Act must be matched to each of the stockpond, stockwatering, and wildlife uses that will be adjudicated in a summary fashion for inclusion in the Master's catalog of proposed water rights.

Conclusion of Law No. 13. The court defers a determination about whether a well registration is a sufficient legal basis for a water right to be recognized in this adjudication.

## **E. Ownership**

### **1. Discussion**

Generally, in preparing abstracts for water uses that will be adjudicated in a summary fashion, the Master will list the landowner, as identified in the watershed file report, as the owner of the water right. Unless otherwise agreed by the litigants, the ownership of water rights on state trust land will be determined in accordance with the principles established in part IV of this decision. Unless an objection to ownership has been filed, the ownership of water rights on federal public land will be adjudicated in the name of the lessee or permittee.

If specific objections have been filed to a watershed file report raising the question of ownership of the stockpond, stockwatering use, or wildlife use, or ownership is ambiguous, the Master will hold further proceedings on the watershed file report and notify the appropriate litigants. This procedure will be available to the owner or lessees of state trust land only if they can present circumstances different from those addressed in part IV of this decision.

### **2. Conclusions of Law**

Conclusion of Law No. 14. Unless an objection has been filed on the basis of ownership or the litigants otherwise agree, the landowner as identified in the watershed file report will be adjudicated as the owner of water uses that will be adjudicated in a summary fashion.

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<sup>2</sup>See discussion at part V, *infra*, about when water uses pursuant to permits will be considered in the adjudication.

Conclusion of Law No. 15. Unless the United States has filed a specific objection concerning ownership, the ownership of water rights on leased federal public land will be adjudicated in the name of the lessee or permittee.

F. Beneficial Use (Type of Use)

1. Discussion

Stockwatering is a beneficial use of water in Arizona, as recognized by section 45-151(A), ARIZ. REV. STAT. ANN. Stockwatering can occur at an unimproved location on a stream; at an improved location on a stream; or at a drinker, tank, or stockpond receiving water from a stream, well, runoff, or other source. For purposes of the Little Colorado River adjudication, a stockwatering (SW) beneficial use will be adjudicated for unimproved and improved instream watering by stock. A stockpond (SP) beneficial use will be adjudicated for a pond having a capacity of not more than 15 acre-feet that is used solely for stock. *Id.* § 45-271. An SP designation will also be made for an artificial storage facility where the use is solely for stockwatering and the capacity is not more than 15 acre-feet. The appropriate type of use will be included as a characteristic in abstracts of proposed water right for these uses.

The watering of wildlife is also a beneficial use of water in Arizona. *Id.* § 45-151(A). A wildlife (WL) beneficial use will be adjudicated for unimproved instream watering, improved instream watering, and watering at a pond or artificial facility with a capacity of not more than 15 acre-feet where the use is solely for wildlife and water has been appropriated for that purpose.

An appropriation of water may be made for the joint watering of stock and wildlife at the same pond. *Id.* § 45-271. The appropriation must be made with the intent to provide water for both purposes. Two beneficial uses, SP and WL, will be adjudicated for those ponds where the intent to appropriate water for both range animals and wildlife can be demonstrated. Similarly, two beneficial uses, SW and WL, will be adjudicated when there has been an intent to appropriate instream flow for both purposes.

Wildlife uses are sometimes claimed as an "incidental use" in association with other water uses such as stockponds and stockwatering. The question arises as to whether incidental wildlife uses are also beneficial uses under Arizona water law.

While the concept of incidental wildlife use recognizes the impracticality of barring wildlife from locations where stock is watered, "incidental use" has no foundation in Arizona water law or in the law of most western states. The use of the concept in some adjudication filings and other court decrees seems designed to secure some protection of an existing

water use while avoiding complete recognition of the right which, some users fear, might restrict their future use of the water.

As a water rights concept, "incidental" evades one important requirement of an appropriation: was there an intent by an appropriator to provide water for wildlife? See A.D. TARLOCK, LAW OF WATER RIGHTS AND RESOURCES §5.14[1] (1993) ("There must be an intent to appropriate manifested by a physical act"). If a person has appropriated water intending to use it for wildlife (and the use is properly claimed in the adjudication), a water right for wildlife uses will be recognized in the adjudication. Where the person has appropriated water intending its use for other purposes, but wildlife begin to use the water, an appropriation has not been made for wildlife and an "incidental" water right will not be adjudicated. Of course, wildlife remain free to use water that is being utilized for other purposes.

## **2. Conclusions of Law**

**Conclusion of Law No. 16.** Stockponds, stockwatering, and wildlife uses are beneficial uses of water.

**Conclusion of Law No. 17.** A stockwatering (SW) beneficial use will be adjudicated for unimproved and improved instream watering by stock.

**Conclusion of Law No. 18.** A stockpond (SP) beneficial use will be adjudicated for a pond or artificial storage facility having a capacity of not more than 15 acre-feet that is used solely for stock.

**Conclusion of Law No. 19.** A wildlife (WL) beneficial use will be adjudicated for unimproved instream watering, improved instream watering, and watering at a pond or artificial facility having a capacity of not more than 15 acre-feet that is used solely for wildlife.

**Conclusion of Law No. 20.** Both a stockpond (SP) beneficial use and a wildlife (WL) beneficial use will be adjudicated for those ponds where the intent to appropriate water for both stock and wildlife can be demonstrated.

**Conclusion of Law No. 21.** Both a stockwatering (SW) beneficial use and a wildlife (WL) beneficial use will be adjudicated where the intent to appropriate instream water for both stock and wildlife can be demonstrated.

**Conclusion of Law No. 22.** An appropriation requires an intent to appropriate; thus, an incidental use is not a beneficial use of water.

## G. Priority Date

### 1. General Discussion

If the information is available, the priority date will be adjudicated as the day, month, and year. If the day is not available, the priority date will be the last day of the month and the year. If neither a day nor month is provided, the priority date will be last day of the year.

### 2. Priority Dates for *De Minimis* Uses

As previously indicated, *de minimis* uses in a watershed will not be subject to call in a post-decree enforcement action to satisfy water uses adjudicated in other watersheds in this river system. This is because the court has determined in this proceeding that the downstream impact of the stockwatering, stockpond, and wildlife uses in the Silver Creek watershed is negligible. To call any of these uses to serve water rights in downstream watersheds would be futile.

Within a watershed, post-decree enforcement actions against *de minimis* stockwatering and wildlife uses will also be barred since these uses have *de minimis* effect, both individually and cumulatively, on other water uses in the same watershed. There is no need to assign a priority date to these rights since there will never be a basis for curtailing a stockwatering or wildlife right on the basis of priority. No priority date will be assigned for these uses in the adjudication.

Post-decree enforcement actions against *de minimis* stockponds in the same watershed are expected to be infrequent. It is not necessary during the adjudication to expend litigant, judicial, and administrative resources in reviewing the priority dates (apparent dates of first use) already established by DWR for *de minimis* stockponds. With the exceptions noted in the proposed conclusions of law, *infra* part III(G)(5), the dates agreed upon by the litigants or the apparent dates of first use established by DWR in the watershed file reports will be adjudicated for these uses.<sup>3</sup> In any post-decree enforcement actions or transfer proceedings concerning *de minimis* stockponds within the watershed, the involved parties will be free to introduce evidence of different priority dates.

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<sup>3</sup>The use of DWR's apparent dates of first use in the preparation of abstracts of proposed water right for *de minimis* use may yield a different result than if the priority date principles adopted by the court in part III(G)(3) of this decision were applied. Since the litigants retain their ability to offer other evidence of priority date in any post-decree enforcement action, the marginal value of a precise priority date determination now is outweighed by the cost of doing so.



### 3. Priority Dates for Stockponds Determined Not to be *De Minimis*

The question remains how the Master will determine priority dates for stockponds that are not *de minimis* and will not be adjudicated in a summary fashion. This issue was submitted at trial on an agreed set of exhibits for Watershed File Report No. 033-41-012 (ASLD/V. Flake) and is relevant to the priority dates for the stockponds described in that watershed file report: SP001, SP002, and SP005.<sup>4</sup>

The litigants have offered a variety of theories for determining priority dates, given Arizona's confusing maze of preadjudication and adjudication filing requirements. Among the sources of information for priority date are the following: historical evidence of grazing in the area, the first act of appropriation, or the first application of water for beneficial use; the date of posting or recording of a notice of appropriation; the priority date established in a prior decree; the date of construction of a stockpond; the priority date set forth in Water Rights Registration Act filings, ARIZ. REV. STAT. ANN. §§ 45-181 to -190 (1987), Stockpond Registration Act filings, *id.* §§ 45-271 to -276, or in permits or certificates of water rights issued by DWR or its predecessors, *id.* §§ 45-151 to -156; the priority date claimed in the statement of claimant filed in this adjudication, *id.* § 45-254; or the apparent date of first use reported in the watershed file report.

While there is little overall guidance for reconciling these often conflicting documents and events, the legislature has established a limited hierarchy. First, priority dates established in prior judgments or decrees are afforded a conclusive presumption: "when rights to the use of water or dates of appropriation have previously been determined in a judgment or decree of a court, the court shall accept the determination of such rights and dates of appropriation as found in the judgment or decree unless such rights have been abandoned." *Id.* § 45-257(B)(1). A question later may be raised about whether the determinations in a prior decree can bind a person who was not a party to the earlier decree.

Second, the legislature has provided that statements of claim filed under the Water Rights Registration Act have presumptive validity. Section 45-185(A) provides that "[e]xcept as to the appropriability of the claimed water, such claim shall be admissible in evidence as a rebuttable presumption of the truth and accuracy of the contents of the claim." A priority date asserted in a properly filed statement of claim is entitled to the rebuttable presumption.

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<sup>4</sup>Where the litigants have agreed on a priority date for stockponds not determined to be *de minimis*, that date has been incorporated in the abstracts of proposed water right set forth in the appendix.

Third, the legislature has also subordinated the priority dates asserted in Stockpond Registration Act filings to priority dates set forth in permits or certificates issued prior to August 27, 1977 (including rights issued pursuant to applications pending on that date); rights to use Colorado River water; rights under contracts with the United States; rights established in a court decree or other adjudication; and pre-June 12, 1919, rights claimed under the Water Rights Registration Act. *Id.* § 45-272(B). The Master interprets this provision as a preference—meaning that, regardless of the nominal priority dates for these various uses, a right claimed solely under the Stockpond Registration Act will always yield in an enforcement action to the other water rights described in section 45-272(B).

Aside from these three provisions, the legislature has not established any presumptive weight or hierarchy for the other filings and events that are relevant to priority date determinations.<sup>5</sup> Surprisingly, the legislature has not given any presumptive weight to permits or certificates although there seems to be little distinction between a pre-1919 right properly claimed under the Water Rights Registration Act and a post-1919 right properly obtained from DWR or its predecessor agencies.

In areas where the legislature has not provided guidance for choosing among various filings and events relevant to a priority date, the Master will rely on the earliest admissible, credible evidence of the first act of appropriation. See Memorandum Decision (Nov. 1, 1993) (relation-back doctrine).

#### 4. Findings of Fact

Finding of Fact No. 31. While there is ample evidence of cattle grazing and watering in the Silver Creek area as early as 1885-86, there is insufficient evidence linking this early use of water to the individual stockponds described in WFR No. 033-41-012 (ASLD/V. Flake). Aztec Land & Cattle Co. Ex. 001 to 028.

Finding of Fact No. 32. The priority dates, as set forth in the Water Right Registration Act filings, for SP001, SP002, and SP005 in WFR No. 033-41-012 (ASLD/V. Flake) are as follows: SP001, Dec. 31, 1885; SP002, Dec. 31, 1919; SP005, Dec. 31, 1918.

Finding of Fact No. 33. The apparent date of first use reported in WFR No. 033-41-012 (ASLD/V. Flake) for SP004, which is a *de minimis* use, is 1920.

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<sup>5</sup>The Stockpond Registration Act does specify that the date of construction is the priority date for stockponds constructed after June 12, 1919, and prior to August 27, 1977, ARIZ. REV. STAT. ANN. § 45-272(A), and that a person failing to file a claim prior to June 30, 1979, will have a priority date as of the date of filing, *id.* § 45-272(C).

## 5. Conclusions of Law

Conclusion of Law No. 23. When provided, a priority date will be adjudicated as the day, month, and year. If the day is not available, the priority date will be the last day of the month and the year. If neither a day nor month is provided, the priority date will be last day of the year.

Conclusion of Law No. 24. *De minimis* stockpond, stockwatering, and wildlife uses in the Silver Creek watershed will not be subject to call to satisfy water uses adjudicated in other watersheds in this adjudication.

Conclusion of Law No. 25. *De minimis* stockwatering and wildlife uses, wherever they may occur in the Little Colorado River system, will not be subject to call to satisfy other water uses adjudicated in this adjudication.

Conclusion of Law No. 26. Priority dates will not be adjudicated for *de minimis* stockwatering or wildlife uses. The abstracts of water right for these uses will indicate "not assigned" for the priority date.

Conclusion of Law No. 27. Priority dates will be included for *de minimis* stockponds only to provide a basis for resolving subsequent interference issues between water users in the same watershed.

Conclusion of Law No. 28. Unless the litigants otherwise agree, the apparent dates of first use determined by DWR for *de minimis* stockponds will be adjudicated as the priority dates for these uses. In any post-decree enforcement action asserted against a *de minimis* stockpond or a transfer proceeding, the involved parties may introduce other evidence of the priority date of the stockpond.

Conclusion of Law No. 29. If the watershed file report (or an objection to the watershed file report) for any *de minimis* stockpond, stockwatering, or wildlife use suggests that the use may have been abandoned, the Master will conduct further proceedings before a water right is recognized and, in the case of stockponds, before a priority date is assigned.

Conclusion of Law No. 30. In cases of stockponds determined not to be *de minimis* (and except for possible circumstances not now before the court), the court will accept priority dates previously determined in a judgment or decree of a court unless such rights have been abandoned.

Conclusion of Law No. 31. In cases of stockponds determined not to be *de minimis*, the priority date claimed in a properly filed statement of claim under the Water Rights Registration Act is entitled to a rebuttable presumption of truth and accuracy.

Conclusion of Law No. 32. In post-decree enforcement actions, water rights properly claimed under the Stockpond Registration Act will always be subordinate to permits or certificates issued prior to August 27, 1977 (including rights issued pursuant to applications pending on that date); rights to use Colorado River water; rights under contracts with the United States; rights established in a court decree or other adjudication; and pre-June 12, 1919, rights claimed under the Water Rights Registration Act.

Conclusion of Law No. 33. Except for situations covered by Conclusions of Law 30 to 32, the Master will rely on the earliest admissible, credible evidence of the first act of appropriation to determine the priority date for stockponds determined not to be *de minimis*. This evidence may include a notice of appropriation, permit, certificate of water right, or a claim or certification under the Stockpond Registration Act.

Conclusion of Law No. 34. The priority dates for SP001, SP002, and SP005 in WFR No. 033-41-012 (ASLD/V. Flake) are as follows: SP001, Dec. 31, 1885; SP002, Dec. 31, 1919; SP005, Dec. 31, 1918.

Conclusion of Law No. 35. The priority date for SP004 in WFR No. 033-41-012 (ASLD/V. Flake) is Dec. 31, 1919.

Conclusion of Law No. 36. No priority dates are determined for SW001 and SW003 in WFR No. 033-41-012 (ASLD/V. Flake), which are *de minimis* uses.

## H. Source

### 1. Conclusions of Law

Conclusion of Law No. 37. Unless otherwise agreed by the involved litigants, the "drainage area/water source name" information listed in a watershed file report for a stockpond, stockwatering, or wildlife use will be set forth as the description of the source in the abstracts of proposed water right for these uses.

Conclusion of Law No. 38. If an objection has been filed concerning the source and no agreement has been reached, the department will reexamine the basis for its description of the source and report the results to the Master for inclusion in the abstract of proposed water right. No hearing will be held on the objection.

## **I. Place of Use**

### **1. Discussion**

The purpose of the place of use characteristic is to provide a legal description adequate for the court, Department of Water Resources, and water users to monitor whether a certain water use has actually been adjudicated in this proceeding. In the context of stockwatering, stockpond, and wildlife uses, the place of use description will be a composite of the traditional point of diversion and place of use. For most stock and wildlife uses, the actual watering takes place at the same location as any diversion.

### **2. Conclusions of Law**

Conclusion of Law No. 39. For wildlife and stockwatering uses, the place of use will be described to the quarter-quarter (1/4 1/4) section in which the use occurs. In cases of two or more stockwatering uses or two or more wildlife uses within the same quarter-quarter section, the rights will be adjudicated to the nearest quarter-quarter-quarter (1/4 1/4 1/4) section. Unless the litigants otherwise agree, the information set forth in the watershed file report under the "uses" section will be utilized for determining this characteristic.

Conclusion of Law No. 40. For stockponds, the quarter-quarter (1/4 1/4) sections in which the surface area of the stockpond extends will be utilized for the legal description of the place of use. In the case of two stockponds in the same quarter-quarter section, each stockpond will be located to the nearest quarter-quarter-quarter (1/4 1/4 1/4) section. Unless the litigants otherwise agree, the information set forth in the "reservoir" section of the watershed file report will be utilized to provide the legal description of the place of use for stockponds.

Conclusion of Law No. 41. If an objection has been filed concerning the place of use and no agreement has been reached, the department will reexamine the basis for its description of the place of use and report the results to the Master for inclusion in the abstract of proposed water right. No hearing will be held on the objection.

## **J. Quantity**

### **1. Stockwatering and Wildlife Uses**

As previously discussed, the consumptive use of stock and wildlife who drink water from undiverted surface water is negligible--whether considered individually or cumulatively throughout the watershed. DWR has reported that the consumptive use by one animal unit of a calf and cow is

only 0.011 acre-feet per year. Deer, antelope, and elk consume between 0.0005 and 0.0034 acre-feet per year. TECHNICAL REPORT at 16.

While it might be possible to determine a uniform figure that could be used to specify and adjudicate the quantity for stock and wildlife, there is no reason to do so since it would be highly impractical to measure such uses and difficult to enforce. Thus, the Master will adopt one of DWR's recommendations and quantify stockwatering and wildlife uses as "reasonable use." *Id.* at 24.

## 2. De Minimis Stockponds (SPs ≤ 4 Acre-Feet)

The determination of the quantity for stockpond uses that are entitled to summary administration is a more difficult problem. While it is technically possible to survey and thereby determine the quantity for each of the stockponds, the methodology is time-consuming and expensive and defeats the whole purpose of a summary determination of these small uses.

The court could rely upon the quantity asserted in statements of claimant for stockponds; but the Master's own experience has demonstrated wide variability in the volume claimed in these statements--apparently due to the inability of many lay people to calculate the volume of small ponds and reservoirs.<sup>6</sup> The Department of Water Resources has approached this problem by recommending that stockponds be quantified on the basis of surface acreage ("maximum controlled capacity") rather than volume. Remote sensing would be used to determine the original acreage of these ponds and to monitor any enlargements. TECHNICAL REPORT at 34-35.

DWR has statistically demonstrated that stockponds of 2 surface acres or less in the Silver Creek watershed all have less than 15 acre-feet of volume, which is also less than the 15 acre-foot threshold recognized in the Stockpond Registration Act, ARIZ. REV. STAT. ANN. §§ 45-271 to -276.

Some of the litigants have opposed a uniform quantification scheme in general because they believe it would result in an exaggerated amount of water being awarded to appropriators, which amount might be unrelated to actual beneficial use. See ARIZ. REV. STAT. ANN. § 45-141(B) ("Beneficial use shall be the basis, measure and limit to the use of water"). Other litigants oppose DWR's specific recommendation because they fear appropriators will enlarge their stockponds in order to capture more water for their own use or to sell or transfer to others.

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<sup>6</sup>The State Land Department's statements of claimant, which are based on actual field surveys, usually provide reliable information about volume.



While the court believes that surface area is an efficient and effective way to monitor stockponds for compliance with the adjudication decree, the court does not believe that surface acreage should be the unit of quantification. Water rights have historically been quantified on the basis of volume or flow. A surface acreage quantification is likely to be misunderstood by many water users. The court believes that volume, based on the maximum storage capacity of the existing structure and expressed in acre-feet, is the appropriate quantification unit for stockponds.

The court is convinced that, for most stockponds in the Silver Creek watershed, adjudicating a uniform volume not to exceed ( $\leq$ ) 4 acre-feet, with continuous fill, will result in a quantity determination that will be reasonably related to actual beneficial use (DWR estimates the average capacity of Silver Creek stockponds to be 3.35 acre-feet, TECHNICAL REPORT at 6; *see also* part II(C)(2), *supra*), easy to apply in the first instance, and easy to monitor. Using aerial photography, satellite imagery, or field measurements, the department may determine those stockponds which, based on its statistical methods (*i.e.*, regression analysis; *see id.* 35), have a capacity of  $\leq$  4 acre-feet. *Cf. In re General Adjudication of All Rights to Use Water in Gila River System & Source*, 175 Ariz. 382, 392, 857 P.2d 1236, 1246 (1993) ("If DWR uses the proper test and relies on appropriate criteria . . . its determination . . . constitutes clear and convincing evidence"). These stockponds will be adjudicated uniformly with a volume of  $\leq$  4 acre-feet. Stockponds determined to have a volume in excess of 4 acre-feet will be processed under the procedure described in part III(J)(3), *infra*. The court requests the assistance of DWR in preparing abstracts of proposed water right for all stockponds with capacities less than 4 acre-feet in the Silver Creek watershed.

The court is not convinced applying a uniform volume of  $\leq$  4 acre-feet will provide an incentive for stockpond owners to expand their storage to that limit. Testimony at the trial has shown that stockponds are usually constructed originally to provide the maximum storage capacity given the surrounding terrain and gradient. Thus, it is unlikely that existing stockponds will be enlarged. Trial Tr. at 133-134 (S. Brophy) ("Just enlarging it for the purpose of hoarding water or something does not make sense in my mind anymore than getting a bigger billfold in hopes that you'll have more money"). Even if these expansions occurred, the court has already determined that there would be no adverse effect on downstream watersheds. *See* part II(C), *supra*.

The court will remove one plausible incentive for stockpond expansion by limiting the ability of owners to sever or transfer these rights. As a precondition for applying to the department for permission to sever or transfer a *de minimis* stockpond right under section 45-172, ARIZ. REV. STAT. ANN., the owner must first request further proceedings by the adjudication

court (or the post-decree Superior Court) for an adjudication of the actual priority date and actual quantity of the stockpond right.

The court requests that the department provide the adjudication court with a biennial report of any stockponds that appear to have been constructed without permission or that appear to have been enlarged beyond 4 acre-feet in capacity. These reports should continue after the final river system decree so that the parties to the decree may initiate any necessary enforcement actions. The court believes that remote sensing by aerial photography or satellite imagery does present a practical method for the department to enforce the provisions of the adjudication decree.<sup>7</sup>

### 3. Larger Stockponds (4 Acre-Feet < SPs ≤ 15 Acre-Feet)

While the Special Master has determined that stockponds having a capacity greater than 4 acre-feet are not *de minimis*, the Master does believe that the capacity of even these larger ponds can be estimated reliably using the statistical method developed by DWR that correlates surface acreage (as determined from aerial photography or satellite imagery) to volume. Even

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<sup>7</sup>While not material to his decision to utilize a uniform volume for *de minimis* stockponds, the Master has reviewed the professional literature supporting the practicality of enforcing stockpond volumes by remote sensing. While aerial photography at the scale of 1:24,000 makes it difficult for an analyst to detect a one-acre change (there are about 90 acres per square inch of aerial photography), see T.E. AVERY, *INTERPRETATION OF AERIAL PHOTOGRAPHS*, (3rd Ed. 1977), satellite imagery does provide a means to detect surface area modifications. Versions 4 and 5 of Landsat give pixel resolution to 30 by 30 meters, or 0.25 acre. The French Spot Image Company (Spot) achieves color resolution of 20 by 20 meters and black and white imagery with a pixel resolution of 10 by 10 meters (0.02 acre). See L. J. Steele, *The View From on High: Satellite Remote Sensing Technology and the Fourth Amendment*, 6 HIGH TECH. L.J. (Fall 1991); H. DeSaussure, *Remote Sensing Satellite Regulation by National and International Law*, 17 RUTGERS COMPUTER & TECH. L.J. (1989).

DWR mainly uses Spot satellite imagery. With its ten meter resolution, it can detect features more than 33 feet by 33 feet. Some conclusions based on generalized calculations will reveal that it is perfectly acceptable for monitoring stockpond enlargements.

Suppose a rancher increases a perfectly square two-acre pond by 50 percent. Assuming uniform slopes above ground as well as below water level, the additional acre would occupy a band around the square pond which would be about 33 feet in width (the distance is coincidental). The Spot satellite should be able to recognize this areal increase though it looks borderline. Theoretically, the Landsat device with its resolution of only 100 feet would not be able to register the change.

If the pond were perfectly circular in area and the same assumptions were applied, the extra acre would occupy a concentric band 37 feet in width. Again, the Spot satellite should cope with this distance, but not Landsat.

In practice, the surface configuration of ponds is not like this. One factor which reinforces the claim that changes can be "sensed" is the fact that surface area change will be zero at the dam wall or the berm and considerably greater at some other point on the perimeter of the stockpond. Most ponds in the Silver Creek watershed are located in the channel of washes. Any expansion would occur at the upstream end of the pond to an obovate or teardrop configuration. Consequently, the calculations mentioned above are likely to be conservative.



more reliable capacity information is available for stockponds on state land that were surveyed in the field by the State Land Department.

To expedite the adjudication of these larger stockponds in the Silver Creek watershed, the Master requests the assistance of DWR in preparing abstracts of proposed water right for all stockponds with capacities greater than 4 acre-feet but not exceeding 15 acre-feet in the Silver Creek watershed. The quantity for these ponds will be determined using DWR's statistical techniques or the claimed information of the State Land Department for surveyed stockponds on state land; and all other water right characteristics will be determined in accordance with the rulings made in this memorandum decision.

If there has been no objection to a stockpond, the abstract will be incorporated into the catalog of proposed water rights. If there has been an objection, the abstract will be served on the landowner, claimant, and objector with a notice offering the objector the choice of accepting the characteristics set forth in the abstract or of requesting a hearing on the objection.

For three of the stockponds specifically involved in the Group 1 proceeding, the litigants have volumes agreed on volumes greater than 4.0 acre-feet; these ponds are PpWR No. 033-50-007-SP008, PpWR No. 033-51-003-SP007 and PpWR No. 033-41-012-SP005. These volumes will be set forth in the abstracts of proposed water right.

#### **4. Findings of Fact**

Finding of Fact No. 34. Stock and wildlife utilize a negligible amount of water from unimproved surface water sources. Ex. No. DWR-001 at 12 & 16.

Finding of Fact No. 35. The capacity of stockponds can be estimated reliably using the statistical methods developed by DWR that correlates surface acreage (as determined from field measurements, aerial photography, or satellite imagery) with volume. Ex. No. DWR-001 at 6.

Finding of Fact No. 36. The average volume of all stockponds in the Silver Creek watershed is estimated to be 3.35 acre-feet. Ex. No. DWR-001 at 6.

Finding of Fact No. 37. After deducting 36 of the largest stockponds in the Silver Creek watershed, the average volume of all remaining stockponds is estimated to be 2.73 acre-feet. Ex. No. DWR-001 at 6.

Finding of Fact No. 38. The average capacity of 100 measured stockponds on state trust land was 1.95 acre-feet. Ex. No. ASLD-022 at 168.

capacity greater than 4 acre-feet (unless those objections have already been addressed by this decision). An abstract of proposed water right based on this memorandum decision will first be served on the landowner, claimant, and objector with a notice offering the objector the choice of accepting the characteristics set forth in the abstract or of requesting a hearing on the objection.

Conclusion of Law 50. The capacity of stockponds on state land greater than 4 acre-feet can be estimated reliably from the field surveys conducted by the State Land Department for these ponds.

#### **K. Water Rights for New Uses**

Under sections 45-141 to -167, ARIZ. REV. STAT. ANN., the Department of Water Resources has the authority to issue permits and certificates in the future for stockpond, stockwatering, and wildlife uses. The department is urged to consider the foregoing method of summary adjudication for these uses so that future certificated rights may be incorporated into the river system decree, or at least administered in a coordinated fashion with the decree, as effectively as possible.

#### **L. Summary of Characteristics**

Figures 1, 2, and 3, summarize the characteristics to be adjudicated for wildlife, stockwatering, and stockpond uses. These figures also describe how any objections will be processed and how these rights will be administered after a decree is entered.

Type of Use	Characteristics Determined Individually	Characteristics Determined Uniformly	Disposition of Any Objections	Post-Decree Administration
Wildlife (WL)	<ul style="list-style-type: none"> <li>• No wildlife use will be adjudicated unless a statement of claimant has been filed and a legal basis established (regardless of whether or not objections raising these issues have been filed).</li> <li>• Ownership of water right will be determined from WFR. If objection filed or WFR ambiguous, Master will hold further proceedings. Unless otherwise agreed, ownership of rights on state trust land will be adjudicated in name of state as trustee.</li> <li>• Source will be determined from WFR. If objection has been filed to the source, DWR will review basis for WFR finding. No hearing will be held on objection.</li> <li>• Place of use will be determined from WFR. If objection has been filed concerning location, DWR will review basis for WFR finding. No hearing will be held on objection.</li> </ul>	<ul style="list-style-type: none"> <li>• Priority date - "not assigned."</li> <li>• Quantity - adjudicated as "reasonable use."</li> <li>• Type of use - adjudicated as "wildlife use;" no incidental wildlife uses will be adjudicated.</li> </ul>	<ul style="list-style-type: none"> <li>• Objections concerning ownership, source, location of place of use will be heard and resolved by Master.</li> <li>• Objections concerning ownership of water rights on state trust land will be heard and resolved only if the objection raises circumstances not addressed by the Master's decision.</li> <li>• Objections concerning lack of due diligence, discontinued use, priority date, quantity, and interference have been resolved as part of the Master's <i>de minimis</i> determination. No further proceedings will be held on these objections.</li> </ul>	<ul style="list-style-type: none"> <li>• No enforcement in favor of water users in same or different watersheds. Wildlife uses have been adjudicated <i>de minimis</i> in all instances.</li> <li>• Any application to DWR to sever, transfer or change use need not be preceded by adjudication court proceeding.</li> </ul>

Figure 1: Summary Adjudication of *De Minimis* Wildlife Water Rights

Type of Use	Characteristics Determined Individually	Characteristics Determined Uniformly	Disposition of Any Objections	Post-Decree Administration
Stockwatering (SW)	<ul style="list-style-type: none"> <li>No stockwatering use will be adjudicated unless a statement of claimant has been filed and a legal basis established (regardless of whether or not objections raising these issues have been filed).</li> <li>Ownership of water right will be determined from WFR. If objection filed or WFR ambiguous, Master will hold further proceedings. Unless otherwise agreed, ownership of rights on state trust land will be adjudicated in name of state as trustee.</li> <li>Source will be determined by agreement or from WFR. If objection has been filed to the source, DWR will review basis for WFR finding. No hearing will be held on objection.</li> <li>Place of use will be determined by agreement or from WFR. If objection has been filed concerning location, DWR will review basis for WFR finding. No hearing will be held on objection.</li> </ul>	<ul style="list-style-type: none"> <li>Priority date - "not assigned."</li> <li>Quantity - adjudicated as "reasonable use."</li> <li>Type of use - adjudicated as "wildlife use;" no incidental wildlife uses will be adjudicated.</li> </ul>	<ul style="list-style-type: none"> <li>Objections concerning ownership will be heard and resolved by Master.</li> <li>Objections concerning ownership of water rights on state trust land will be heard and resolved only if the objection raises circumstances not addressed by the Master's decision.</li> <li>Objections concerning source and place of use will be resolved based on further DWR examination. No hearing will be held.</li> <li>Objections concerning lack of due diligence, discontinued use, priority date, quantity, and interference have been resolved as part of the Master's <i>de minimis</i> determination. No further proceedings will be held on these objections.</li> </ul>	<ul style="list-style-type: none"> <li>No enforcement in favor of water users in different watersheds. Stockwatering uses have been adjudicated <i>de minimis</i>.</li> <li>Any application to DWR to sever, transfer or change use need not be preceded by adjudication court proceeding.</li> </ul>

Figure 2: Summary Adjudication of *De Minimis* Stockwatering Water Rights

Type of Use	Characteristics Determined Individually	Characteristics Determined Uniformly	Disposition of Any Objections	Post-Decree Administration
Stockponds (SP) ≤4 ac-ft	<ul style="list-style-type: none"> <li>No use will be adjudicated unless a statement of claimant has been filed and a legal basis established (regardless of whether or not an objections raising these issues have been filed).</li> <li>Ownership of water right will be determined from WFR. If objection filed or WFR ambiguous, Master will hold further proceedings. Unless otherwise agreed, ownership of rights on state trust land will be adjudicated in name of state as trustee.</li> <li>Source will be determined by agreement or from WFR. If objection has been filed to the source, DWR will review basis for WFR finding. No hearing will be held on objection.</li> <li>Place of use will be determined by agreement or from WFR. If objection has been filed concerning location, DWR will review basis for WFR finding. No hearing will be held on objection.</li> </ul>	<ul style="list-style-type: none"> <li>Priority date - in case of objection, assigned in following sequence: (1) date agreed upon by litigants; (2) WFR date of apparent first use; (3) if WFR ambiguous, the (a) earliest date set forth in decree or Water Rights Registration Act filings; or (b) earliest date set forth in any other preadjudication or adjudication filing.</li> <li>Priority date - in case of objection, assigned in following sequence: (1) date agreed upon by litigants; (2) earliest date set forth in decree or Water Rights Registration Act filings; or (3) earliest date set forth in any other preadjudication, adjudication filing, or other admissible credible evidence.</li> <li>Quantily - adjudicated as "≤4 ac-ft." DWR may determine and enforce by surface-acre equivalent determined by reliable methodology.</li> <li>Type of use - adjudicated as "stockpond use."</li> </ul>	<ul style="list-style-type: none"> <li>Objections concerning ownership, lack of due diligence, and discontinued use will be heard and resolved by Master.</li> <li>Objections concerning ownership of water rights on state trust land will be heard and resolved only if the objection raises circumstances not addressed by the Master's decision.</li> <li>Objections concerning source and place of use will be resolved based on further DWR examination. No hearing will be held.</li> <li>Objections concerning priority date, quantity, and interference with water rights outside the watershed have been resolved as part of the Master's <i>de minimis</i> determination. No further proceedings will be held on these objections.</li> <li>Objections concerning interference with water rights inside the watershed are dismissed in favor of specific post-decree enforcement actions.</li> </ul>	<ul style="list-style-type: none"> <li>No enforcement in favor of water users in downstream watersheds. Stockponds ≤4 ac-ft have been determined as <i>de minimis</i>, both individually and cumulatively, on water rights in downstream watersheds.</li> <li>Post-decree enforcement possible in favor of water rights in same watershed. In such an action, litigants may offer additional evidence of priority date and quantity (unless litigants previously agreed to date).</li> <li>DWR may use periodic remote sensing to detect unauthorized new uses, and discontinued uses.</li> <li>Any application to DWR to sever, transfer or change use must be preceded by adjudication court proceeding to determine actual priority date and quantity of right.</li> </ul>

Figure 3: Adjudication of Stockponds ≤4 acre-feet of Capacity

#### IV. OWNERSHIP OF WATER RIGHTS ON PUBLIC LAND

##### A. Background

Since the watershed file reports in this first group and elsewhere in the Silver Creek watershed typically list both the landowner and lessee for public land, the Special Master is faced with the question of which person should be adjudicated as the owner of these water rights. This is true even though no specific objection concerning ownership has been filed to a watershed file report.

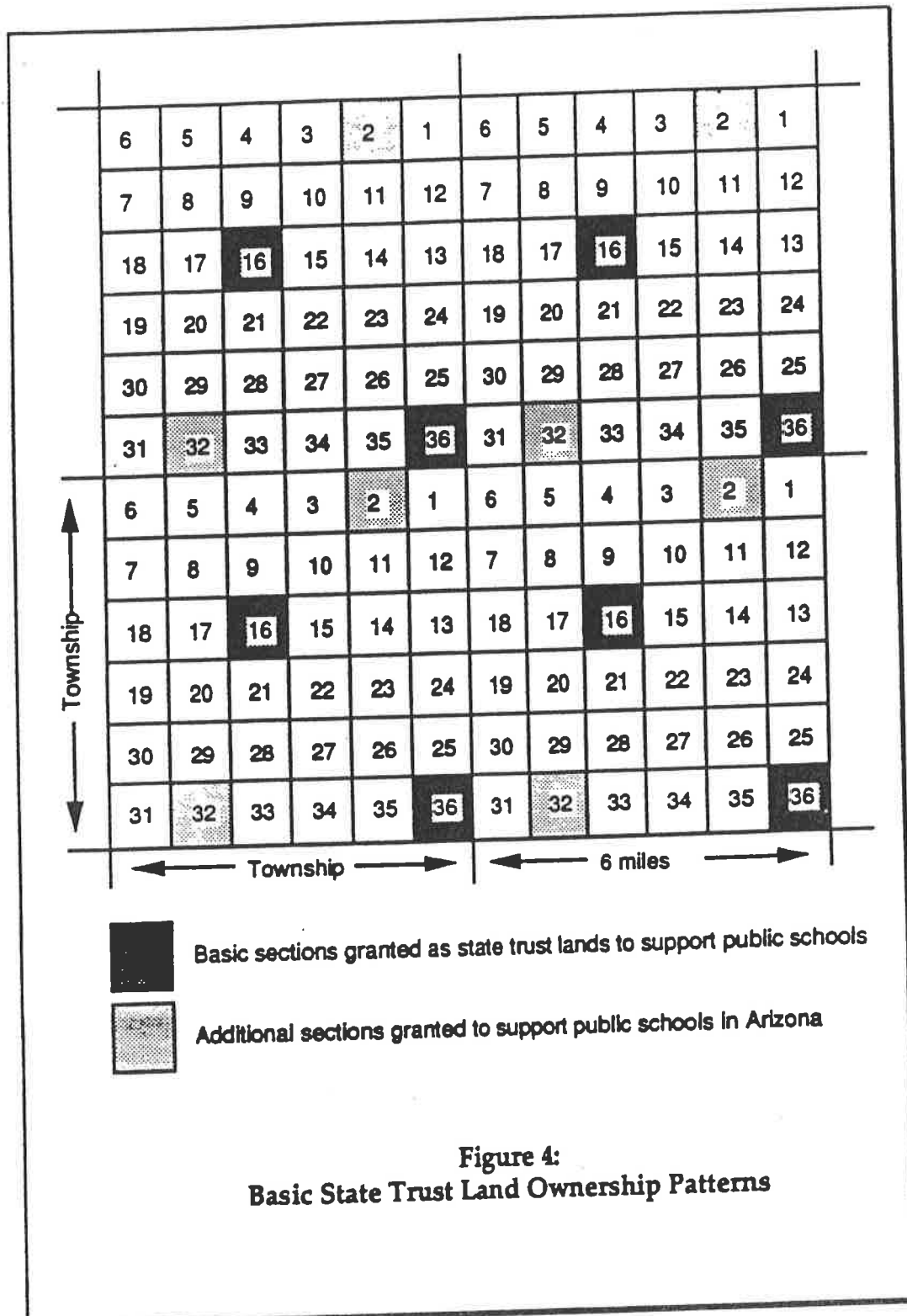
During the pretrial proceedings in this case, the United States represented to the court that lessees and permittees on federal land (Bureau of Land Management and Forest Service) can be adjudicated as the owners of water rights on those lands unless the United States has filed a specific objection to a watershed file report contesting the lessee's ownership of the water right. Minute Entry at 3 (Nov. 3, 1993). The United States' position disposes of a major issue concerning water right ownership on leased federal land.

The remaining issue, concerning water right ownership on state trust land, was designated as an issue of broad legal importance. Minute Entry at 3 (July 7, 1993). Briefs on this question were submitted on September 8, 1993, and oral argument occurred on September 14, 1993.

##### B. State Trust Lands

Since the Land Ordinance of 1785, Congress has made a series of land grants to each new state in order to provide special support for public education and other public functions. Starting with the admission of Ohio in 1803, Congress gave each new state (either at or before statehood) two sections of land (section 16 and 36) of each township within the state still remaining in the federal public domain. With the organization of the New Mexico Territory (including Arizona) in 1863, Congress also set aside two additional sections (sections 2 and 32) for the support of public education. See Figure 4. These additional two sections per township were given in recognition of the arid conditions in the Southwest that made these lands less productive. A total of 8,093,237 acres was granted to Arizona as common school lands.

States such as Arizona could not always be conveyed sections 16, 36, 2, and 32 of each township. This was because Congress had already granted many of these sections to other grantees, such as the railroads, or had reserved them for Indian reservations, forests, parks, or other federal enclaves. In these circumstances, Congress allowed the states to select in lieu or indemnity land to substitute for the sections not available for conveyance. In Arizona, the state was entitled to select 3.3 million acres of these lands.



**Figure 4:  
Basic State Trust Land Ownership Patterns**

In order to place Arizona on the same footing as other states, an additional 2,450,516.17 acres were granted by Congress as "quantity" or "institutional" grants for the support of thirteen specified state institutions. Thus, a total of 10,543,753 acres was granted to Arizona. These lands are held in a series of trusts by the State of Arizona and managed through the state's agent, the Arizona State Land Department (ASLD). The beneficiaries of these trusts are the common schools, universities, and other institutions for which the trusts were created by Congress.

### C Nature and Terms of the Trusts

The New Mexico and Arizona Enabling Act, 36 Stat. 557, ch. 310 (June 20, 1910), which provided the terms and conditions for the admission of these two states, is the basic trust instrument for these land trusts. Specifically, section 28 of the Enabling Act sets forth terms and conditions for the lands previously granted to the Territory of Arizona and other lands granted in trust upon statehood.

The U.S. Supreme Court was called upon at an early date to interpret and construe public land trusts such as those created for Arizona. In *Trustees of Vincennes University v. State of Indiana*, 55 U.S. (14 Howard) 268 (1852), and *Springfield Township v. Quick*, 63 U.S. 53 (1859), the following principles were established:

1. The Enabling Acts create trusts similar to private charitable trusts which states cannot unilaterally abridge;
2. The Enabling Acts are to be strictly construed according to fiduciary principles; and
3. The Enabling Acts preempt contrary state constitutions or laws.

As recently as 1980, in *Andrus v. Utah*, 446 U.S. 500 (1980), the Supreme Court reaffirmed these principles and emphasized the binding and perpetual obligation of the states to adhere to the terms of the trust. Also, numerous federal and state court decisions have asserted that the terms of the Enabling Acts are to be construed strictly against the fiduciary and most favorably to protect the assets of the trust. See, e.g., *United States v. New Mexico*, 536 F.2d 1324 (10th Cir. 1976) (provision of general health care for miners with trust funds violated New Mexico Enabling Act which provided for establishing and maintaining a "miners hospital"); *Skamania County v. Washington*, 685 P.2d 576 (Wash. 1984) (forgiveness of logging contracts on state trust land due to depressed economic conditions violates fiduciary obligations).



Thus, section 28 of the Arizona Enabling Act must be carefully studied to ascertain the terms and conditions of the state's public land trusts and for guidance as to the ownership of water rights on these lands. The most essential provision of section 28 is the following:

[A]ll lands hereby granted, including those which, having been heretofore granted to said territory, are hereby expressly transferred and confirmed to the state, shall be by the said state held in trust, to be disposed of in whole or in part only in manner as herein provided and for the several objects specified in the respective granting and confirmatory provisions . . . .

Other language in this section indicates that the trust includes the land and also "the natural products and money proceeds of any of said lands." *Id.*

While "natural products" is nowhere defined in the Enabling Act, other language in section 28 indicates that the term was meant to be inclusive: "disposition of any of said lands, or of any money or thing of value directly or indirectly derived therefrom . . . shall be deemed a breach of trust." *Id.* The Arizona Supreme Court has held that groundwater under a lease of state land is such a "thing of value" and should be protected as a trust asset. *Farmers Investment Co. v. Pima Mining Co.*, 111 Ariz. 56, 58, 523 P.2d 487, 489 (1974). In a later case, the court held that mineral deposits underlying state trust land were "other products of land" under section 28 and "subject to the trust dispositional restrictions." *Kadish v. Arizona State Land Dep't*, 155 Ariz. 484, 489, 747 P.2d 1183, 1188 (1987), *aff.*, 490 U.S. 605 (1989). See also Opinion of the Arizona Attorney General No. 59-57 (Apr. 9, 1959) ("thus, 'other products' as used in A.R.S. § 37-481 [providing authority to State Land Department to conserve and administer products of state land] includes a 'natural product' such as water"); *Department of State Lands v. Pettibone*, 702 P.2d 948 (Mont. 1985).

Section 28 goes on to specify that trust lands, timber, or other natural products cannot be sold except after advertisement and to the highest and best bidder.

Section 28 has been modified two times since 1910. Both modifications should be construed as amendments to the terms and conditions of the public land trust by the settlor of the trust, the United States government. In 1936, Congress amended the Enabling Act to make the lease restrictions less onerous and to authorize the state to exchange trust lands. 49 Stat. 1477, ch. 517 (June 5, 1936).

The major amendment, however, occurred in 1951 in order to give the state even more flexibility in the leasing of trust lands for oil and mineral development. In introducing the legislation in April of that year, Arizona's

Senator McFarland indicated that "it has been found that the Enabling Act is too restrictive in regard to the making of long term leases of land for exploration for oil." 97 CONG. RECORD 3628-29 (1951). By June 2 of that year, the amendment to section 28 had been approved by Congress and signed by the President.

While the bill was pending in the House Interior Committee, however, one additional provision was proposed and incorporated in the final legislation. This provision granted authority to the Arizona legislature to provide,

by proper laws for the protection of lessees of said lands, whereby such lessees shall be protected in their rights to their improvements (including water rights) in such manner that in case of lease or sale of said lands to other parties the former lessee shall be paid by the succeeding lessee or purchaser the value of such improvements and rights placed thereon by such lessee.

65 Stat. 51, ch. 120 (June 2, 1951). There is nothing in the available legislative history to indicate why this particular amendment was made.

#### D. Ownership of Water Rights on State Trust Lands

With this legislative scheme in mind, what follows is a discussion of the ownership of water rights on state trust land in the three basic situations: (1) where water rights were established on land before it was granted to the State of Arizona; (2) where water rights were established on in lieu or indemnity lands; and (3) where water rights were established on trust lands after the lands had been granted to the State of Arizona.

##### 1. Water Rights Established on Lands Later Granted to Territory or State

The General Mining Act of 1866, 43 U.S.C. § 661 (1988), and the Desert Land Act of 1877, 43 U.S.C. § 321 (1988) were manifestations of a congressional policy to recognize water rights that had been established on the federal public domain according to local customs, laws, and the decisions of the local courts. This policy, interpreted by *California Regional Park Co. v. Portland Beaver Cement Co.*, 295 U.S. 142 (1935), allowed water uses to be established on federal public land even though the appropriator did not hold fee title or a lease to the underlying property. Thus, persons in the Territory or State of Arizona could establish water rights on the public domain prior to the land being conveyed to the territory or state.

Even when Congress made common school trust and quantity grants to the Territory or State of Arizona, this legislative action alone was not enough to curtail the ability of persons to establish water rights in their own names on public land soon to be conveyed to the state. The surveying of these lands was the crucial step for determining which lands were to be conveyed to the territory or state. See 1A SCOTT ON TRUSTS § 76 (4th ed. 1987) (where settlor declares himself trustee of property not yet ascertained, no trust is created); *Heydenfeldt v. Daney Gold & Silver Mining Co.*, 93 U.S. 634, 640 (1876) ("Until the *status* of the lands was fixed by a survey, and they were capable of identification, Congress reserved absolute power over them . . ."). Before these lands were surveyed, specific sections had not been designated as trust assets. Potential appropriators, not having notice of the actual common school or quantity grant sections, could continue making appropriations pursuant to the general policies for the public domain.

Thus, so long as beneficial use has continued, water rights in this adjudication will be adjudicated in the name of the appropriator where that person can show that the appropriation was validly made before the land was surveyed for conveyance to the Territory or State of Arizona.

## 2. Water Rights on In Lieu or Indemnity Lands

The determination of the ownership of water rights on in lieu or indemnity lands follows the previous analysis. Potential appropriators must have had notice that specific lands were being selected and conveyed to the State of Arizona as in lieu or indemnity selections. Again, the determinative moment was when the lands were surveyed for conveyance to the state in trust. If a person had established an appropriation on these lands prior to surveying, the person will be adjudicated a water right in this adjudication so long as the appropriation was otherwise validly made and beneficial use has continued.

## 3. Ownership of Water Rights Established on Trust Lands After Surveying But Before 1952

Once lands were surveyed as common school trust sections, quantity or institutional grant selections, or in lieu or indemnity selections, potential appropriators had notice that these lands would be conveyed to the territory or state. If they entered state trust lands as lessees, could these persons now appropriate water and acquire the water rights in their own names?

Several of the litigants (the Stockwater Users) advance various arguments in support of their conclusion that lessees of state trust land could appropriate water in their own names. One argument is that Congress never intended to include water rights as a natural product of the land; rather, Congress sought to continue on state trust lands the same policy of

acquiescence in private water development that had developed for federal lands under such statutes as the General Mining Act, Desert Land Act, and Taylor Grazing Act, 43 U.S.C. § 315 (1988). These advocates have also cited Arizona cases that have recognized the ability of lessees to acquire water rights on federal lands. See, e.g., *Hamblin v. Woolley*, 64 Ariz. 152, 167 P.2d 100 (1946).

Federal acquiescence in private water development on the federal domain and the series of land grants to new territories and states were components of the same national policy to settle the West. The federal government allowed private water rights to be established on federal lands to nurture new mining, ranching, and other economic endeavors. Congress made land grants to the territories and states so that a public infrastructure would be established for the growing western population.

It makes no sense that Congress would allow the most significant attribute of most of this property, the potential development of water, to be stripped away from these lands which were meant for the support of common education and other public purposes. Indeed, Congress was ceding two additional sections in each township in recognition of the arid environment of Arizona. The Arizona Enabling Act can be seen as a specific congressional policy overriding, for the trust lands, the more general federal policy of allowing miners and settlers to develop water resources on the public domain. While the Enabling Act makes no specific mention of water, it is reasonable to conclude that Congress desired to protect water as a natural product of trust lands conveyed to the state. Congress had included "thing[s] of value directly or indirectly derived" from the land in its section 28 definition of the trust estate, and trust provisions must be read conservatively in order to protect the purposes and corpus of the trust. *United States v. New Mexico*, 536 F.2d 1324, 1326-27 (10th Cir. 1976).

The Stockwater Users also argue that the recognition of state ownership of water rights on trust land would violate a basic tenet of the prior appropriation doctrine that ownership of the underlying land is not necessary in order to make a diversion. The result, they say, would be an impermissible application of riparian law which has been barred in this state.

This argument ignores many Arizona cases that have held that appurtenancy of water rights to land is generally a hallmark of the state's water law. See, e.g., *In re Determination of Relative Rights to Use of Waters of Pantano Creek*, 45 Ariz. 156, 41 P.2d 228 (1935). The appurtenancy policy was meant to ensure that water rights benefited the underlying land and not become a "floating right" for speculation. See *Salt River Valley Water Users' Ass'n v. Kovacovich*, 3 Ariz. App. 28, 411 P.2d 201 (1966); *Tattersfield v. Putnam*, 45 Ariz. 156, 41 P.2d 228 (1935); *Slosser v. Salt River Valley Canal Co.*, 7 Ariz. 376, 65 P. 332 (1901). While the appurtenancy requirement has been

criticized as an impediment to modern water management, see R.T. SMITH, TRADING WATER 16-27 (1988), it is a doctrine that is protective of state land trust assets. Also, the recognition of state ownership of water rights on trust land does not prevent water in all cases from being sold or leased for distant purposes under Arizona's severance and transfer provisions, ARIZ. REV. STAT. ANN. § 45-172; it only requires that the statutory requirements be met and that fair compensation be paid for the privilege.

A third argument of the Stockwater Users is that the case authority from Arizona and other states supporting state ownership of these water rights can be distinguished. The statement in *Kadish v. Arizona State Land Dep't*, the Arizona Supreme Court's most recent examination of section 28 of the Enabling Act, is dismissed as dicta. Although *Kadish* concerned a mineral lease issued on a flat royalty basis, the fundamental policy affirmed by the supreme court, protection of school trust assets, is quite relevant to the pending matter:

We conclude from the foregoing that the Enabling Act is intended to protect the school trust land from dissipation by the state government. To curb such dissipation, Congress imposed severe restrictions on the methods by which the state could sell or lease such lands.

155 Ariz. at 495, 747 P.2. at 1194.

The Stockwater Users argue that *Farmers Investment Co. v. Pima Mining Co.*, 111 Ariz. 56, 523 P.2d 487 (1974), is limited to a situation where groundwater on state trust land was improperly disposed and, in any event, the result has been changed by the Groundwater Management Act. ARIZ. REV. STAT. ANN. § 45-401. While *FICO* is a groundwater case, the Arizona Supreme Court did not distinguish between types of water when it held that:

This language of Congress used in § 28 of the Enabling Act does not permit the exclusion of water from the term "products of the land" . . . . Water is a thing of value directly derived from the land to be considered as a product of the land within the meaning of the Constitution and Enabling Act.

111 Ariz. at 58, 523 P.2d. at 489. Since this holding is based on an interpretation of the Enabling Act, which preempts contradictory state law provisions, passage of the Groundwater Management Act could do nothing to change the character of groundwater as a trust asset.

The Stockwater Users distinguish *Department of State Land v. Pettibone*, 702 P.2d 948 (Mont. 1985), on the basis that Montana's Enabling Act and 1889 Constitution do not include provisions protecting lessees in their



improvements including water rights. While that is true, Arizona's Enabling Act also did not contain such provisions until 1951 (*see discussion supra*). Since the relevant portions of Montana's Enabling Act, 25 Stat. 676 (Feb. 22, 1889) ("the proceedings from the sale and other permanent disposition of any of the said lands and from every part thereof, shall constitute permanent funds for the support and maintenance of the public schools . . . .") are comparable to Arizona's, *Pettibone* can be considered as persuasive authority.

A fourth argument of the Stockwater Users is that the state, both through the State Land Department when it administered the Public Water Code and the Department of Water Resources, has for many years granted water rights certificates to lessees on state lands. If this was once true, the practice has now been changed. *See* ARIZ. ADMIN. CODE R12-15-301 *et seq.* (1982); Ariz. Dep't of Water Resources, Statement of Policy (Aug. 12, 1992). In instances where lessees received certificates, it is a very unfortunate occurrence; but "[t]he essence of a finding that property is held in trust, school, public, or otherwise, is that anyone who acquires interests in such property do so subject to the trust . . . . The State has no power, absent adequate consideration, to grant the lessees the permission to develop" such rights. 702 P.2 at 956-57. *See also* Enabling Act § 28 ("Every sale, lease, conveyance, or contract of or concerning any of the lands hereby granted or confirmed, or the use thereof of the natural products thereof, not made in substantial conformity with the provisions of this Act shall be null and void, any provisions of the constitution or laws of the said State to the contrary notwithstanding").

Finally, these litigants argue that lessees can establish and own water rights on state trust lands since the Arizona Enabling Act, the Arizona Constitution, and state statutes all provide that "lessees of said lands, shall be protected in their rights to their improvements (including water rights) . . . ." Enabling Act § 28; ARIZ. CONST. art. X, § 10; ARIZ. REV. STAT. ANN. § 37-322(A). Thus, there seems to be an apparent tension between these provisions, which gives some support to the lessee's ownership of water rights, and the interpretation that water rights are among the natural products held in trust under the Enabling Act.

Since Enabling Acts are the basic trust instruments and preempt contradictory state constitutions or laws, *Murphy v. State*, 65 Ariz. 338, 345, 181 P.2d 336, 340 (1947) (the Enabling Act is the "fundamental and paramount law in Arizona"), this apparent tension must be resolved solely with reference to section 28 of the Arizona Enabling Act. As previously discussed, section 28 was amended by Congress *only in 1951* to authorize the legislature to protect lessee's improvements including water rights. The Arizona Legislature passed such legislation in 1952. Since the basic provisions of the trust were unaltered from 1910 to June 25, 1952 (the effective date of the state legislative provisions), this court concludes that prior to June 25, 1952, water

rights were "natural products" of the land. This interpretation is compelled by the general principle that the trust document must be interpreted conservatively to protect the purposes and corpus of the trust. *United States v. New Mexico*, 536 F.2d 1324, 1326-27 (10th Cir. 1976).

Between the time lands were surveyed for conveyance to the state in trust and June 25, 1952, lessees, permittees, or third parties had no legal ability to appropriate water in their own name. To the extent that they did develop water on these lands during this period, the water right belongs to and will be adjudicated in the name of the state as trustee. While there are provisions for a lessee to receive reimbursement for improvements<sup>8</sup> made during a lease, the issue of whether reimbursement can be claimed for a pre-1952 water right need not be decided by this court.<sup>9</sup>

#### 4. Ownership of Water Rights Established on Trust Lands After 1952

As previously discussed, Congress changed the terms of the public land trusts in 1951 by amending section 28 of the Enabling Act. While the reason for this modification does not directly appear in the legislative history, the result is that Congress allowed the state to provide greater protection to lessees for improvements made to trust land; and water rights were specifically mentioned as an improvement that could be so protected. In 1952, the Arizona legislature enacted provisions in response to the congressional changes made in section 28 of the Enabling Act the previous year. 1952 Ariz. Sess. Laws, ch. 117, § 2.

In fact, the 1952 state legislation restricted the ability of lessees to make improvements on state trust land without the permission of the State Land Department. ARIZ. REV. STAT. ANN. § 37-321(A) ("Upon expiration or cancellation of the lessee's lease or permit, improvements placed on the land without approval shall be forfeited and become the property of the state"). Arguably, this section gives the State Land Commissioner authority to determine by the lease provisions how water rights will be acquired. The Arizona Supreme Court, however, has determined that a lessee need not comply with section 37-321 when "the improvements are reasonably necessary for the purposes provided for in the lease." *State Land Dep't v. Painted Desert Park, Inc.*, 102 Ariz. 272, 281, 428 P.2d 424, 433 (1967). Whether water rights are these types of improvements has not been addressed.

<sup>8</sup>Section 37-101(14), ARIZ. REV. STAT. ANN., adopted in 1952, defines "improvements" as "anything permanent in character which is the result of labor or capital expended by the lessee or his predecessors in interest on state land in its reclamation or development, and the appropriation of water thereon, and which has enhanced the value of the land."

<sup>9</sup>Section 37-322(A), ARIZ. REV. STAT. ANN., indicates that "[i]mprovements placed on state lands prior to June 25, 1952 [the date of enactment], shall be appraised in accordance with the law in effect at the time the improvements were made."

Once again, it is the Enabling Act--not state statutes--which determines whether water rights were still included in the definition of "natural products" of the land after the 1951 congressional amendment. Since all trust terms must be read restrictively to protect the assets of the trust, particular attention should be paid to the last phrase of the 1951 congressional amendment. The amendment to section 28 did not say that title to water rights on trust land would now be in the name of the lessee. Congress only allowed the state to adopt legislation requiring subsequent lessees or purchasers to reimburse the former lessee for the value of improvements and water rights. Also, absent a positive statement of congressional intent, the amendment to section 28 cannot automatically be read to have retroactive effect.

This court concludes that the 1951 amendment to section 28 of the Enabling Act did nothing to change the ownership of water rights established on state trust land after the land was surveyed for conveyance to the state as trustee. These water rights remain "natural products" of the land and title to the rights remains with the state as trustee. To allow lessees to strip water rights from state trust land without the trustee's permission would significantly diminish the value of the trust assets by allowing the former lessees to effectively control the subsequent use of the land, thereby interfering with the State Land Department's ability, as trustee, to manage the land and maximize income. *Pettibone*, 702 P.2d at 955-56.

Thus, water rights established on or after June 25, 1952, on state trust land will also be adjudicated in the name of the state as trustee. The abstract of the water right may indicate a claim for reimbursable improvements if the landowner and lessee agree.<sup>10</sup> If they do not agree, the 1951 and 1952 changes provide a much stronger basis for lessees to argue that they have an equitable interest in post-1952 water rights; but claims for reimbursement on that basis are properly determined in proceedings before the State Land Department or another court.

#### E. Conclusions of Law

Conclusion of Law No. 51. Unless the United States has filed a specific objection concerning the ownership of a water right on leased federal land, the water right can be adjudicated in the name of the lessee, permittee, or allottee.

<sup>10</sup>Section 37-322(A), ARIZ. REV. STAT. ANN., indicates that "improvements placed on state lands after June 25, 1952, including water rights, when the owner thereof is entitled under law to reimbursement for the improvements shall be appraised as follows. . . ." There follows a series of criteria for making such appraisal including a provision that allows reimbursement for irrigation or other district assessments and levies to be limited to proper assessments for project construction cost. Specially designed pumps are also reimbursable. *Id.* § 37-322(B).



Conclusion of Law No. 52. In cases where the United States has not filed a specific objection concerning the ownership of a water right on leased federal land, any statement of claimant or previous filing filed by the United States is deemed filed in behalf of the lessee, permittee, or allottee.

Conclusion of Law No. 53. Rights to water appropriated on land before the land was surveyed for conveyance in trust to the State of Arizona by the United States will be adjudicated in the name of the appropriator or successor-in-interest.

Conclusion of Law No. 54. Rights to water appropriated on land before the land was surveyed for conveyance in trust to the State of Arizona by the United States, as in lieu or indemnity selections, will be adjudicated in the name of the appropriator or successor-in-interest.

Conclusion of Law No. 55. Rights to water appropriated on land after the land was surveyed for conveyance in trust to the State of Arizona by the United States, but before June 25, 1952, will be adjudicated in the name of the State of Arizona as trustee. A notation indicating the lessee is entitled to reimbursement for improvements may be included in the abstract of the proposed water right if the trustee and the lessee agree.

Conclusion of Law No. 56. Rights to water appropriated on land after the land was surveyed for conveyance in trust to the State of Arizona by the United States, and on or after June 25, 1952, will be adjudicated in the name of the State of Arizona as trustee. A notation indicating the lessee is entitled to reimbursement for improvements may be included in the abstract of the proposed water right if the trustee and the lessee agree.

Conclusion of Law No. 57. Abstracts of proposed water right for *de minimis* uses will be prepared in accordance with these ownership principles. Preliminary abstracts for larger stockponds, to be offered to the litigants, will also be prepared in accordance with these principles. See discussion at part III(J)(3), *supra*. Further proceedings will be held in cases where the United States has specifically objected on the basis of ownership or where these ownership principles do not resolve the question of ownership of a water right.

V. WHAT ARE THE RESPECTIVE JURISDICTIONS OF THE COURT AND THE DEPARTMENT OF WATER RESOURCES?

A. Background

The trial of June 15, 1993, concerned pre-filing No. 33-0094120 which is a Department of Water Resources' permit reported in Watershed File Report No. 003-51-001 listing the U.S. Forest Service as the landowner and Carlisle, Frost, and Pearce as lessees. The specific factual issue to be determined is whether a stockpond has actually been constructed pursuant to the permit. This matter has been tried and extensively briefed because it raises the issue of how unperfected water rights should be treated in the adjudication. Should the adjudication court allow the department to continue processing applications and permits when they have been objected to in the adjudication? Or should the adjudication court stay the administration process and require that these water uses be perfected under the auspices of the court? How the adjudication court treats unperfected rights (applications and permits) pending before the Department of Water Resources has important implications for the department's ongoing administrative responsibilities.

As discussed more fully in the following, an appropriation of surface water in Arizona commences with an application to DWR. If statutory criteria are satisfied, the director issues a permit to allow the appropriation and development of the water. Once the water has been appropriated and fully developed in accordance with the application and permit, the department can issue a certificate of water right (CWR) which constitutes perfection of the application.

Because the adjudication proceeds on the hydrographic survey reports (HSRs) prepared by DWR, the court is presented with a "one-time" inventory of water right filings in each watershed where an HSR has been prepared. Applications filed and permits issued before the completion of the HSR are frequently reported in the watershed file reports. After the HSR is filed, the department continues to accept applications and issue permits and certificates; but there is no formal mechanism for the department to report to the court changes in the status of these administrative filings or of new applications received or permits or CWRs issued since the HSR was filed (DWR does make informal reports to the Special Master).

The department's administrative filings are reported in the "Previous Filings" section of the watershed file report. These documents are identified numerically with a "4A" prefix for applications, a "3R" prefix for permits, and a "33" prefix for certificates of water right. The HSR reports applications that have not been permitted or have been contested, permits that have not

proceeded to a certificate of water right, and certificates of water right that are associated with existing water uses.

The court is presented with three related problems in handling these pending administrative matters. They are:

1. How should the adjudication court consider applications and permits that are reported in the HSR but have not culminated in a certificate of water right?
2. How should the adjudication court consider (if at all) applications received and permits and certificates issued after the HSR has been filed but while the adjudication is underway?
3. How should applications, permits, and certificates be handled by the adjudication court after final watershed or river system decrees have been entered?

There are also three principal ways of addressing these problems:

1. Applications and permits reported in an HSR that had not matured into a CWR, along with applications received and permits and certificates granted after the HSR has been filed, could be left entirely out of the adjudication.
2. The court could implement some method to incorporate these water uses into the adjudication even when the applications were received or the permits and certificates were issued after the HSR had been filed.
3. As is urged by the Salt River Project, the adjudication court could stay DWR's administrative process and transfer the applications and permits to the adjudication court for consideration along with other water rights.

In the following, the department's administrative processes are discussed in more detail and both state and federal law are examined for guidance about handling new water uses while a general stream adjudication is underway.

#### **B. DWR's Permitting and Certificating Responsibilities**

The 1919 Public Water Code substituted a centralized method of establishing new water rights for the previous system that relied on the posting of individual notices of appropriation and the possible recording of

new appropriation notices with county recorders. 1919 Ariz. Sess. Laws ch. 164. The Department of Water Resources, through a series of legislative changes, has succeeded in the administration of this centralized process.

An application for a permit to appropriate water begins with the applicant providing the information required by section 45-152, ARIZ. REV. STAT. ANN. The director of DWR is required to consider an application under the criteria set forth in section 45-153(A). The criteria, whether a "proposed use conflicts with vested rights, is a menace to public safety, or is against the interest and welfare of the public," is ambiguous; but the department has provided virtually no elaboration of the criteria in its administrative rules. See ARIZ. ADMIN. CODE tit. 12, ch. 15 (Supp. 93-1, Mar. 31, 1993) (*but see* problem of applicable rules discussed *infra*).

If an application is granted by the director, a permit is issued and the applicant "may construct the necessary works, take steps to apply the water to a beneficial use and perfect the appropriation." ARIZ. REV. STAT. ANN. § 45-158. On the other hand, "[i]f the application is rejected, the applicant shall take no steps toward construction of the proposed work or diversion of the water." *Id.*

The final stage of the administrative process occurs when the director reviews the progress made by the applicant in appropriating and developing the water. In particular, the director must be satisfied that the "appropriation has been perfected and a beneficial use completed . . ." *Id.* § 45-162. If so, the certificate of water right is issued to the applicant.

The application carries the least legal protection of the three documents (application, permit, certificate). Water cannot be appropriated or used until the permit has been granted. *Id.* § 45-158. The application establishes a priority date that will be protected so long as the water is diligently developed. Cf. ARIZ. REV. STAT. ANN. § 45-154; see also Memorandum Decision, *In re Reporting of Diversion Information & Other Objections*, No. 6417-033-9005 (Nov. 1, 1993). Thus, the application is as the statute speaks: a request for permission "to make an appropriation of the water." ARIZ. REV. STAT. ANN. § 45-152.

Once the application has been granted and a permit issued, the applicant's legal protection increases. The applicant then has the authority to actually divert and use water in accordance with the permit. The applicant's priority date will date from the filing of the application. The applicant will continue to hold a water right so long as the water development is in accordance with the permit. *Id.* § 45-158.

The issuance of the certificate of water right results from the department's determination that "an appropriation has been perfected and a

beneficial use completed . . . ." *Id.* § 45-162. Once the certificate has been issued, the applicant has a completed water right which will continue so long as water is used beneficially and is not successfully challenged in the adjudication.

This administrative process proceeds much better in theory than in practice, and there are several significant functional and legal problems with the administrative process. One major problem is that there is great uncertainty whether there *are* any administrative rules which govern this process and, if so, where they are. If one goes to the part of the ARIZONA ADMINISTRATIVE CODE pertaining to the Department of Water Resources, one finds large blank sections, headed as "reserved," and no surface water permitting rules.

But the vigilant citizen should beware! For in the portion of the ARIZONA ADMINISTRATIVE CODE pertaining to the State Land Department, surface water rules do reside! These rules are relics of the era when the State Land Department administered the Public Water Code. Are these rules still effective? Does the department use them?

When the Arizona Legislature transferred the State Land Department's authority over surface water to the Arizona Water Commission in 1979, it provided that "[a]ny rules and regulations adopted by the state land department shall have full force and effect until superseded by the rules and regulations adopted by the Arizona water commission." 1979 Ariz. Sess. Laws ch. 139, § 79. Then, when surface water responsibilities were transferred to the Department of Water Resources a year later, the legislature provided that "[r]ules and regulations adopted by the Arizona water commission have full force and effect until superseded by rules and regulations adopted by the department of water resources." 1980 Ariz. Sess. Laws ch. 1, § 169 (4th Special Sess.). There is no indication that either the Arizona Water Commission or Department of Water Resources ever adopted the State Land Department rules. Did they survive the interagency reshuffling of the surface water program? The department does not improve the situation by an ambiguous position about whether or not the rules are effective and bind the agency.<sup>11</sup>

A second major problem of the surface water permitting process is notice. Neither the statute nor the rules (even the rules found in the ARIZONA ADMINISTRATIVE CODE under the State Land Department) provide what type of notice of a pending application is to be provided to other water users to enable them to comment or object to the application. The

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<sup>11</sup>The department has supported legislation, unsuccessful to date, to update the Public Water Code. *See, e.g.*, H.B. 2404, 40th Leg., 2d Sess. Also, the department is now developing its own set of surface water rules.

determination of adequate notice seems to be in the sole discretion of the director (or designee).

Adequate notice is an indispensable constitutional requirement if the resulting certificates of water rights are to be afforded any presumptive or conclusive weight in a McCarran Amendment proceeding. *In re Rights to the Use of the Gila River*, 171 Ariz. 230, 240, 830 P.2d 442, 452 (1992) ["[W]e reiterate that due process requires that interested parties be given notice 'reasonably calculated, under all the circumstances, to . . . afford them an opportunity to present their objections,'" quoting *Mullane v. Central Hanover Bank & Trust Co.*, 339 U.S. 306, 314 (1950)]. While the department does publish and send notices of pending applications to some water users, the department, when recently requested by the Special Master, could not point to a specific written rule or policy specifying the type of notice that must be given.

These weaknesses diminish the weight that can be given in the adjudication to permits and certificates issued by the department.<sup>12</sup>

With this explanation of DWR's permitting processes, we now turn to a discussion of whether water appropriated pursuant to a recent permit or certificate must, as a matter of federal or state law, be included in the general stream adjudication.

### C. Comprehensiveness Requirements of the McCarran Amendment

General stream adjudications are made possible by the congressional waiver of federal sovereign immunity so that the federal government and the water rights of Indian tribes may be joined in a state court proceeding. 43 U.S.C. § 666(a) (1976). One of the conditions of this waiver of sovereign immunity is comprehensiveness in the adjudication—that the suit be for "the adjudication of *rights to the use of water of a river system* or other source . . . ." *Id.* (emphasis added). This language does not dispose of the question of whether recently established uses should be incorporated into a stream adjudication in order to ensure comprehensiveness. While the federal government and tribes could appear in state administrative processes to contest new applications, the department's ambiguous and unwritten notice policy may well result in notice not being provided to these and other water users. As a practical matter, new water uses on a river system will be junior in priority to most of the claimed water rights of the federal government and

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<sup>12</sup>There appear to be other problems as well. Because of insufficient resources, contested applications can await hearings for many years. Once permits have been issued, there is an additional delay until water development under the permit is reviewed to determine whether a certificate of water rights should be issued. Moreover, there is only a scant record of decisions by the department's hearing officers or directors that would allow an applicant or objector to study the agency's past rulings or decisions.



Indian tribes. In most instances, the federal government and tribes will be hard pressed to demonstrate injury as a result of these new uses which they will be able to call with their senior rights.

While the McCarran Amendment does not explicitly answer the question of how new uses are to be handled in the adjudication, the legislative history and U.S. Supreme Court interpretations of the amendment indicate that comprehensiveness is to be emphasized. The United States Senate report on the amendment indicated as follows: "[B]y reason of the interlocking of adjudicated rights on any stream system, any order or action affecting one right affects all such rights. Accordingly, all water users on a stream, in practically every case, are interested and necessary parties to any court proceedings." S. Rep. No. 755, 82d Cong., 1st Sess. 5 (1951).

The U.S. Supreme Court, in upholding Colorado's system of adjudication, spoke approvingly of a proceeding that "reaches all claims, perhaps month by month, *but inclusively in the totality.*" *United States v. District Court for Water Div. No. 5*, 401 U.S. 527, 529 (1971) (emphasis added). Justice Douglas further described an adjudication in which "[t]he whole community of claims is involved . . . ." *Id.* Justice Douglas also reported a statement by Senator McCarran during congressional debate: the amendment is to be used to "allow the United States to be joined in a suit wherein it is necessary to adjudicate all the rights of various owners on a given stream. This is so because unless all the parties owning or *in the process of acquiring water rights* on a particular stream can be joined as parties defendant, any subsequent decree would be of little value." *Id.* (emphasis added), quoting S. Rep. No. 755, 82d Cong., 1st Sess. 9 (1951) (letter from Sen. McCarran to Sen. Magnuson).

This last quotation manifests a congressional policy, if not a federal law requirement, that general stream adjudications include recently established water uses.

#### **D. Requirements Under State Law**

The Arizona statute defines a general stream adjudication as a "judicial determination or establishment of the extent and priority of the rights of all persons to use water in any river system or source." ARIZ. REV. STAT. ANN. § 45-251(1). At the initiation of the adjudication, service of process is effected upon "all known potential claimants," *id.* § 45-253(A)(2), and these persons are defined as "all persons claiming water rights or on whose behalf claims to water rights are asserted," *id.* § 45-251(3). Finally, the definition of river system and source, set forth at section 45-251(4) emphasizes "all water appropriable" and "all water subject to claims based upon federal law." The basic adjudication statute makes no distinction between appropriable water

that is subject to an application or a permit and other forms of appropriable water.

Here also, the Arizona legislature intended a very inclusive adjudication--no doubt in part to satisfy the McCarran Amendment's comprehensiveness requirement. Thus, as a matter of state law, it is incumbent for the court to take reasonable steps to ensure that the adjudication is inclusive of new uses of water.

#### **E. Practical Reasons for Including New Uses in Adjudication**

In addition to the federal and state requirements for a comprehensive adjudication, there are practical reasons why new water uses should be reported, processed, and adjudicated. The most important practical reason for including new uses in the adjudication is to improve post-decree water management. Administration of water in the same river system or source is difficult when the administration is done under differing legal authority--in this case, a judicial decree and a series of post-decree certificates of water right. The problem of this split authority is significantly heightened if priority dates in permits and CWRs predate the priority dates of water rights recognized in the adjudication decree. The adjudication court should ensure that all water rights predating the most junior right adjudicated in its decree are also included in the decree. Integration of these water rights is important for sound management and post-decree enforcement.

Still, there are both legal and policy reasons for the adjudication court to be careful in displacing or significantly affecting the department's legitimate administrative role. The department is vested by statute with the permitting function. While the adjudication court has jurisdiction over all appropriable water, ARIZ. REV. STAT. ANN. § 45-251(4), the court does not have the time, resources, or expertise necessary to administer the permitting criteria set forth in section 45-153(A) or to consider ongoing requests to extend or modify permits. The adjudication court's job is to adjudicate existing uses; not to determine whether new appropriations should be allowed.

#### **F. Procedure for Adjudicating Recent Uses**

While the Little Colorado adjudication continues and unless otherwise directed by the Superior Court, the Special Master will include recent uses of water but will do so in the last phase of the river system adjudication. The Master will cast a final "net" to identify all recent uses of water and include them (if warranted) in the final decree. Figure 5 illustrates the procedure that will be used.



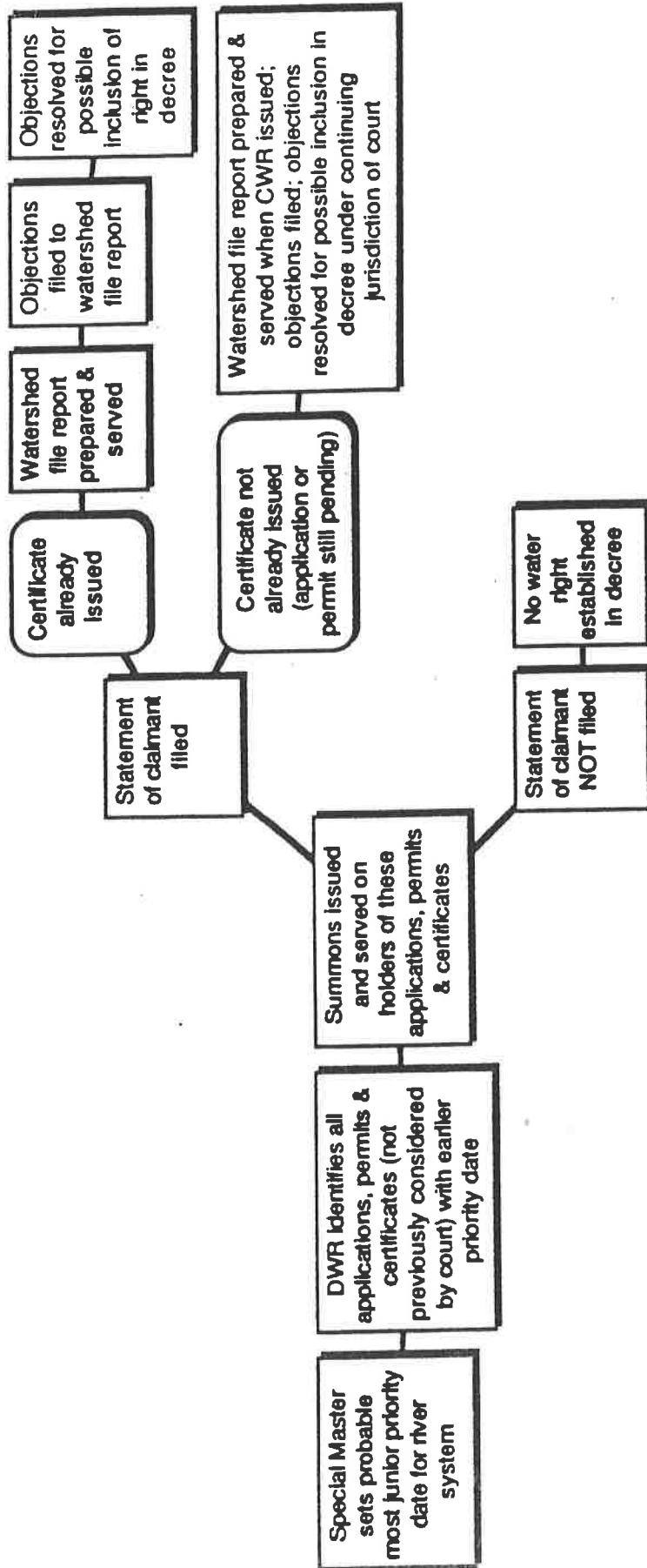


Figure 5: Procedure for Adjudicating Water Uses Not Previously Considered by Court

Specifically, as the Little Colorado River adjudication nears completion, the Master will determine the most junior water right likely to be adjudicated in the river system decree. The priority date of this most junior water right will be known as the "terminal priority date." DWR will then be asked to identify all applications, permits, or certificates of water right in the river system which have not already been considered in the adjudication and which may have priority dates earlier than the terminal priority date that the Master has determined. These recent uses have the potential of being incorporated in the final river system decree, and the court will exercise continuing jurisdiction over them until they have completed the administrative and judicial processes.

### 1. Certificates of Water Right

After identifying any certificates of water right with priority dates earlier than the terminal priority date, DWR and the Clerk of the Court will serve summons on the holders of these certificates directing them to file statements of claimant within sixty days. For any statements of claimant so filed, DWR will prepare watershed file reports for these claimed uses; match them to existing watershed file reports; or, in the case of uses determined by the adjudication court to be *de minimis*, prepare abstracts of proposed water right. If no statement of claimant is filed for a recent use represented by a certificate, no water right will be established in the adjudication; and the department will be requested to cancel the certificate. See ARIZ. REV. STAT. ANN. § 45-254(E).

DWR will serve the new watershed file reports, matched watershed file reports, and abstracts of *de minimis* uses on the Court-approved mailing list for the Little Colorado River adjudication. A sixty-day objection period will be allowed for objections to these watershed file reports and abstracts,<sup>13</sup> and any objections will be resolved by the Master. These uses, if not successfully challenged during the objection and hearing process, will be incorporated into the final decree for the Little Colorado River adjudication.

### 2. Applications and Permits

The court will exercise continuing jurisdiction over any applications and permits identified as having a priority date earlier than the terminal priority date for the Little Colorado River adjudication. As any of these applications and permits mature into certificates of water right, the procedure set forth in the preceding part V(F)(1) will be followed. If any applications are withdrawn or denied or permits canceled, no adjudication proceedings will be necessary.

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<sup>13</sup>As previously discussed, there is a limited basis for objecting to *de minimis* water rights. See Figures 1, 2, and 3.

The court's jurisdiction will continue even though it may take months or years for these applications and permits to be acted on administratively and processed judicially. Any water rights recognized as a result of this process will be incorporated as amendments to the final river system decree. After allowing a reasonable period for the processing of these applications and permits, the court reserves the authority to finalize the river basin decree--thereby preventing these uses from being incorporated in the decree or having a priority date senior to any decreed right.

When DWR issues permits or certificates of water right while the Little Colorado River adjudication is pending, DWR should indicate on the permit or certificate that the water use must be claimed in the adjudication pursuant to this procedure and that the water use is subject to final determination in the adjudication.

### **3. Applications, Permits, and Certificates in Silver Creek HSR**

Certificates of water right described in the Silver Creek HSR will be considered during the Silver Creek watershed proceedings. If an objection has been filed to a water use represented by a certificate, the objection will be processed by the court. If no objection has been filed, the water use will be incorporated in the catalog of proposed water rights for the Silver Creek watershed.

Water uses pursuant to applications or permits reported in the Silver Creek HSR will not be considered by the court at this time. If these filings have progressed into certificates of water right when the Master's final "net" is cast, these uses will be processed as set forth in the part V(F)(1). If there has been no change in the status of these applications and permits when the final "net" is cast, the court will retain continuing jurisdiction over these applications and permits as described in part V(F)(2).

In future HSRs, the department should not report water uses represented by applications or permits that have not matured into certificates of water right when the HSR is filed. As previously discussed, these uses will be identified and processed during the last phase of the Little Colorado River adjudication.

### **4. Other Circumstances**

There may be occasions where it is necessary for the court to consider water uses represented by an application or permit. This may be necessary when these administrative filings relate to another contested matter, *e.g.*, ownership. In these cases, the court reserves the authority to examine the basis for these filings.

### G. Implications for Long-Term Post-Decree Management

The previous procedure will ensure that all water uses before a certain date are incorporated in the river system decree. This procedure does not, however, answer the long-term question of how post-decree permits and certificates of water right will be incorporated in the final river system decree, if at all. The Master does not make any recommendation but only identifies some alternatives that may provoke thinking and discussion.

One alternative for the future is to consider the river system decree to be closed. If water is available and new appropriations are allowed, these post-decree uses would be processed administratively and would be evidenced only by the permits and CWRs.

While this alternative would result in two sets of water right records, the uses represented by permits and CWRs would all be junior to the rights established in the decree (assuming the previously described procedure has been implemented). Furthermore, so long as enforcement is by the same agency, coordination would be relatively easy.

On the other hand, a procedure similar to that used in Colorado could be implemented. *See* COLO. REV. STAT. ANN. § 37-92-401 (West 1990). Under this approach, DWR would be directed to report on a periodic basis (such as every five years) both the uses that appear to be abandoned in the river system and all new uses junior to those in the decree that are represented by permits and CWRs. The court would then employ a notice, objection, and hearing process to update the final river system decree to eliminate abandoned uses and to incorporate new ones.

This approach would have the disadvantage of making DWR's administrative determinations conditional; but it would have the advantage of producing a unified river system decree and complete integration of water rights that will satisfy the McCarran Amendment.

There may be other approaches to this problem and the court would welcome academic discussion or formal comments on this problem. Ultimately, the solution should come from the legislature.

### H. Findings of Fact

Finding of Fact No. 42. Application to appropriate No. 33-0094120 was filed on November 10, 1987, by the U.S. Forest Service. The location requested in the application is SWSE § 35, T. 11N, R. 21 E in the Silver Creek watershed. The application is reported in Watershed File Report No. 033-51-001.

Finding of Fact No. 43. On May 9, 1988, the Department of Water Resources issued permit No. 33-0094120 granting permission to appropriate water by constructing a stockpond. By a letter dated June 19, 1992, the Department of Water Resources extended the permit to construct the stockpond until May 9, 1996.

Finding of Fact No. 44. The stockpond contemplated by the application and permit to appropriate No. No. 33-0094120 has not been constructed.

## **I. Conclusions of Law**

Conclusion of Law No. 58. An application to appropriate water under section 45-152, ARIZ. REV. STAT. ANN., does not give the applicant permission to appropriate or use water. A water use represented solely by an application to appropriate will not be decreed in the Little Colorado River adjudication. Objections to such applications will not be heard by the court and are ORDERED dismissed without prejudice.

Conclusion of Law No. 59. While a permit gives the applicant permission to appropriate water, the Department of Water Resources must still determine whether an appropriation has been perfected and a beneficial use completed in accordance with ARIZ. REV. STAT. ANN. tit. 45, art 5. A water use represented solely by a permit to appropriate will not be decreed in the Little Colorado River adjudication. Objections to such permits will not be heard by the court and are ORDERED dismissed without prejudice.

Conclusion of Law No. 60. A certificate of water right represents the Department of Water Resources' determination that an appropriation has been perfected and a beneficial use completed in accordance with ARIZ. REV. STAT. ANN. tit. 45, art 5. A water use represented by a certificate of water right may be decreed in the Little Colorado River adjudication, and objections to such a water use will be heard by the court.

Conclusion of Law No. 61. During the last phase of the Little Colorado River adjudication, the court (with the assistance of the Department of Water Resources) will identify all applications, permits, and certificates of water right in the river system (not previously considered by the court) which appear to assert priority dates equal to or senior to the most junior priority date likely to be established in the river system decree. The court will exercise continuing jurisdiction over these water uses. Once these uses have matured into certificates of water right, the court will cause summons to be issued, statements of claimant to be filed, watershed file reports or abstracts of water right (in case of *de minimis* uses) to be prepared and served, objections to be filed and served, and any objections heard and processed (all in accordance with the procedure set forth in part V(F), *supra*).

Conclusion of Law No. 62. The United States, as the appropriator under permit No. 33-0094120, does not have a water use which is now before the adjudication court. If the permit matures into a certificate of water right, the water use will be considered during the last phase of the Little Colorado River adjudication. The objection to this water use is ORDERED dismissed without prejudice. The United States need not file its statement of claimant for the stockpond until the final summons for recently established uses is issued for the Little Colorado River system.

**VI. IMPLEMENTING PROCEDURES AND ORDERS**

**A. Proposed Findings of Fact and Conclusions of Law**

All requested findings of fact and conclusions of law, unless incorporated into this decision, are denied.

**B. Opportunity to Comment on Abstracts**

The litigants may submit written comments or suggested corrections to the abstracts of proposed water right set forth in the appendix to this decision. These comments or suggestions should address any mistakes made in describing the characteristics of the water rights; they should not be requests for reconsideration of the basic rulings set forth in this decision. These written comments and suggested corrections must be filed with the Clerk of the Court on or before June 1, 1994.

**C. Further Proceedings and Requests of the Department**

1. Further proceedings will be held before the Special Master for a *de minimis* use if it appears that there is no legal basis for the use, a statement of claimant has not been filed for the use, ownership of the use is uncertain, or there is an objection not resolved by this decision.

2. Further proceedings will be held before the Special Master on the objections to stockponds that are not *de minimis* in accordance with part III(J)(3).

3. The Department of Water Resources is requested to assist the Special Master in the preparation of the abstracts of proposed water right for the *de minimis* water rights in the Silver Creek watershed recognized in this decision and for the larger stockponds to be processed in accordance with part III(J)(3). The abstracts will be prepared in conformity with the rulings set forth in this decision.

4. In future hydrographic survey reports for Little Colorado River watersheds, the department is requested to prepare abstracts of proposed water right for all wildlife and stockwatering uses in each watershed. These abstracts should be prepared in conformance with the principles established in this decision. These abstracts will be a part of the hydrographic survey report and may be objected to for the limited reasons allowed by this decision (detailed instructions will be set forth in the objection booklet served by the court at the commencement of the objection period).

5. In future hydrographic survey reports for Little Colorado River watersheds, the department is requested to include a section on the hydrologic impacts of stockponds in each watershed (similar to chapter 2 in DWR's TECHNICAL REPORT). This will enable the Master to conduct *de minimis* proceedings soon after the objection period has closed for that watershed.

6. In future hydrographic survey reports for Little Colorado River watersheds, the department is requested to prepare abstracts of proposed water right for all stockponds less than or equal to 4 acre-feet and for those stockponds greater than 4 acre-feet but no more than 15 acre-feet. These abstracts should be prepared in conformance with the principles established in this decision. These abstracts will be a part of the hydrographic survey report and may be objected to for the reasons allowed by this decision (detailed instructions will be set forth in the objection booklet served by the court at the commencement of the objection period). At the conclusion of the *de minimis* proceedings in each watershed (*see* previous paragraph), the court will determine whether categories of these stockponds will be adjudicated in a summary fashion and what volume will be assigned for individual stockponds.

DATED this 20th day of April 1994.



JOHN E. THORSON  
Special Master

The original of the foregoing mailed this 20th day of April 1994 to the Clerk of the Apache County Superior Court for filing; also, copies of the foregoing delivered to the Distribution Center, Maricopa County Superior Court Clerk's Office, for mailing to those parties who appear on the Court-approved mailing list for Case No. 6417-033-9005 (Consolidated) dated March 2, 1994. There is no service by fax of this document.



Kathy Dolge

Finding of Fact No. 39. It is unlikely that existing stockponds will be enlarged. Trial Tr. at 133-134 (S. Brophy).

Finding of Fact No. 40. Allowing smaller stockponds to be filled on a continuous basis results in efficient utilization of water. Ex. No. SRP-028 at 2.

Finding of Fact No. 41. The capacity of stockponds on state land greater than 4 acre-feet can be estimated reliably from the field surveys conducted by the State Land Department for these ponds. The statements of claimant are the source for this information.

## 5. Conclusions of Law

Conclusion of Law 42. The quantity of water for stockwatering and wildlife uses will be adjudicated as "reasonable use."

Conclusion of Law 43. Volume, based on the maximum storage capacity of the existing structure and expressed in acre-feet, is the appropriate quantification unit for stockponds.

Conclusion of Law 44. The capacity of stockponds can be estimated reliably using the statistical methods developed by DWR that correlates surface acreage (as determined from field measurements, aerial photography, or satellite imagery) with volume.

Conclusion of Law 45. The Department of Water Resources may use its statistical methods as the basis for determining those stockponds having a capacity not exceeding 4 acre-feet. The quantity for these stockponds will be adjudicated as "not to exceed ( $\leq$ ) 4 acre-feet" with continuous fill.

Conclusion of Law 46. A uniform volume not to exceed ( $\leq$ ) 4 acre-feet, with continuous fill, will result in a quantification reasonably related to actual beneficial use for most stockponds in the Silver Creek watershed.

Conclusion of Law 47. Surface area is an efficient and effective way to monitor stockponds for compliance with the adjudication decree.

Conclusion of Law 48. As a precondition for applying to the department for permission to sever or transfer a *de minimis* stockpond right under section 45-172, ARIZ. REV. STAT. ANN., the owner must first request further proceedings by the adjudication court (or the post-decree Superior Court) for an adjudication of the actual priority date and actual quantity of the stockpond right.

Conclusion of Law 49. The Master will hear and resolve all objections to stockponds determined by the Department of Water Resources to have a