Arizona Department of Water Resources
Third Management Plan Stakeholder Meeting Summary
February 17, 2006

Welcome, Introductions, and Overview of Agenda

The meeting opened with stakeholder and ADWR staff introductions.
See "In Attendance" section on the last page.

EcoBA Study Presentation

Val Little (Water CASA) gave a PowerPoint presentation with study results from the Evaluation and Cost Benefit Analysis of Municipal Water Conservation Programs (EcoBA). Water CASA is a nearly decade old water conservation organization composed of southern Arizona providers that conduct joint composition programming. Various utility companies and water conservation organizations in conjunction with the University of Arizona, who provided student research and technical assistance, made the EcoBA study possible. EcoBA seeks to address and quantify water conservation efforts in a uniform manner and to provide an additional management tool. The EcoBA study included data on forty-four water conservation programs throughout eleven states. EcoBA measured direct costs and benefits for a brief time period to evaluate the effectiveness of several types of conservation programs. During the presentation, **Ms. Little** noted that uniform water conservation data from municipal providers was difficult to obtain as reporting and administrative techniques differ. In effect, the same information is recorded, compiled and reported in various ways by water providers. Increasing water conservation costs coupled with scarce funding requires participants to be rigorous when deciding the conservation programs to implement in a service area. A copy of the complete study report is available on the Water CASA website (www.watercasa.org).

Questions

Bill Garfield: Does the cost/saved diagram measure customer level savings or utility savings?
Ms. Little: It represents the cost to utilities to save an acre-foot of water. The data is an aggregate showing cost saved when combining all participants of each individual program (e.g., low-flow toilet rebates) for a particular year. The EcoBA study was specifically designed for the benefit of utility service and conservation decision makers. Furthermore, the amount of water saved is dependent on the lifespan (e.g., 20-years for toilets, 5-years for audits) of the conservation tool adopted. A wide range of water savings (gallons) was achieved for the various conservation measures, especially the audits. Also, the costs associated for saving an acre-foot of water was varied. The variations in water saved and cost to save the water were dependent on auditor quality, program oversight, and the target population being examined. Audits are an excellent customer service tool and water savings were maintained for the two years (the study time limit) after the program was implemented.

Mr. Garfield: Were the post-audit recommendations recorded in the study?
Ms. Little: Yes, the structure, scope, and recommendations of individual water provider audits are found in the EcoBA study.
Question: How many communities in the study had a toilet distribution program?
Ms. Little: We had three utility companies supply data for the toilet distribution program. The data timeframe ranged from a low of one year up to a high of eight years.
Ms. Stinnett: Did the utilities know who received the toilets? If so, were they sent to newer or older homes?
Ms. Little: Toilet distribution varied by location, but was generally random. Older homes, however, usually have greater water savings potential in device distribution programs.
Mr. Larson: Are these water savings values statistically significant?
Ms. Little: I do not believe they are statistically significant. The data was provided by the utility companies, which all have different data collection and records management practices. This study is a general overview of water conservation and should only be viewed as such.
Val Danos: Are water providers reporting water savings in the same way?
Ms. Little: The utilities only provided actual meter readings. The entire data manipulation was done through Water CASA. The methodology incorporated weather changes, public information campaigns, and comparison of participant water use against overall water use for similar customers. This is relative water use not an actual number of gallons.
Cliff Neal: Raised concerns about EcoBA numbers in reference to amount of water (in gallons) saved per device and monetary savings per acre-foot. **Mr. Neal** and **Mr. Garfield** created a brief scenario to illustrate their concern over the numbers.
Example: If savings average 26,000 gallons per distributed toilet per year, approximately twelve toilets are required to save an acre-foot of water. If $181 (EcoBA data) were the cost saved per acre-foot under this device, each toilet would cost only $15.
Ms. Little: Something is obviously incorrect with our numbers. The $181 amount is an annual savings. The lifespan of the device (e.g., twenty years for a toilet) would need to be taken into account.
Mr. Danos: The twenty-year toilet lifespan savings would only be an extrapolation from the two years of data immediately after the water savings device/program is implemented. These extrapolations are quite significant.
Ms. Little: The limited timeframe of the study is one drawback to the findings. Water CASA would have preferred to look at the devices over their entire lifetime.
Ms Stinnett: Thanked **Ms. Little** for her presentation of the EcoBA study. The EcoBA study provides information that might be useful if and when the group discusses specific water conservation methods.

Stakeholder Discussion: Goals for the Stakeholder Process

Robin Stinnett reviewed the set of ADWR goals for the stakeholder process presented during the first stakeholder meeting held on February 3. They are as follows:

ADWR Goals for a Municipal Conservation Program

- Results in meaningful conservation efforts by water providers.
- Program is applicable to and appropriate for both private water companies and municipal utilities.
- Can be effectively administered by ADWR with existing staff.
- Engenders methodology that provides for tracking and/or measuring whether or not providers have met their conservation requirements.

Ms. Stinnett then asked the group to identify their goals regarding the outcomes of the stakeholder process. The following is a composite listing of comments offered by various stakeholders:

Stakeholder Goals for a Municipal Conservation Program

- Recognized financial component.
- Provides regulatory certainty for providers in how they will be regulated.
- Contains a clearly enforceable standard that can be understood by both water providers and non-water providers.
- Allows for options, recognizing that "one size does not fit all".
- Program is easy for providers to administer.
- Program should be a synthesis of meaningful efforts by providers and realistic expectations being placed upon them, realizing that end users may use more water than expected.
- Program should recognize that end users have a role in water conservation.
- Development of program should consider whether or not a water conservation program should be uncoupled from other water management efforts.
- Conservation program should be uncoupled from other water management efforts.
- Objectives for the conservation program should be defined.
- Development should resolve the question of having program component(s) that require groundwater use reductions.

- Program should not be developed in a way that results in entrance requirements that are impossible to meet.

- Program should be constructed to require all water supply sources to be used efficiently.

- "Beneficial use" of water should not be defined through the water conservation program.

- The result of the program development process should do no immediate harm, allowing for a pilot program that providers can enter by choice.

- The result should allow for a transitional period for providers to ease into a new program if this is necessary. Honor and recognize existing efforts. Wait until the Fourth Management Plan to require a new program

- The program should be linked to the management goals of the AMAs (i.e. achieving / maintaining Safe Yield for the Phoenix, Prescott, Santa Cruz and Tucson AMAs).

- The program should encourage the use of renewable supplies.

Ms. Stinnett: Is everybody satisfied that a complete list of goals has been created?
Warren Tenney: Yes, with a caveat noting the goals are not unanimously supported, but rather suggestions requiring further discussion.

Working Session: Essential Elements of an Alternative Program

Ms. Stinnett asked each stakeholder to create an individual list of essential elements and/or unacceptable elements for inclusion/omission in an alternative municipal conservation plan. These elements ranged from entirely new ideas to incorporating elements already found in the three alternative municipal conservation programs. Stakeholders posted their elements, which were categorized and presented to the group. A composite listing of elements is provided below with the frequency of each comment noted.

Stakeholder Elements to include in a Municipal Conservation Program

Ideology

All stakeholders (not just regulators and utilities) should be represented in the program development process (1). ADWR should determine its goals and objectives for water conservation (1). It should be recognized that municipal water providers are doing conservation now (3). It should be recognized that municipal providers are participating in cooperative regional conservation and/or planning efforts (2). The program should provide regulatory certainty for the provider and address internal issues and the political environment (2). Communication between the regulator and the stakeholder should occur (1).

The program should be more substantial than just monitoring water conservation practices (1). The program should result in all water providers conserving water (synthesis of 4 comments). There should be some action or consequence to not meeting the requirements of the program (synthesis of 2 comments). There should be a measurement tool to communicate success (1). A new program should be implemented only as a pilot program, providing for a transitional period (synthesis of 3 comments).

The program should be neutral to economic development (1) and the economic impacts of not succeeding with conservation should be examined (1).

Administration and Reporting

The program should be administratively easy for both ADWR and the providers, containing definitive, simplified criteria for program reporting and evaluation (synthesis of 8 comments). Utility justification for program design through generally accepted survey/analytical methods (1).

Specifics

The program should contain a numeric measure of water use, possibly GPCD, GPHUD, or provider-specific water use efficiency standard or other measurement tool (synthesis of 4 comments).

Ordinances or community-approved measures, such as limiting turf, through planning and zoning should be goals but not necessarily elements of the program, especially for private water companies (1).

Water users should have some level of responsibility for their water use, and the provider should not be penalized for their use (1).

The program should contain renewable supply incentives (1).

The program should not regulate supplies other than groundwater (1).

Population projections (1) and compilation of providers' reporting (1) should be public.

Possibly outside of the scope of the process

ACC process for expedited approval of conservation program costs outside of a rate case is essential for implementation of programs involving significant cost (1).

Certificate of Assured Water Supply applicants must [show how they will] meet conservation standards [during the approval process] rather than all [conservation] regulations being applied to the water provider after development occurs (1).

Best Management Practices

The program should be flexible, allowing providers to make changes to suit changing needs (synthesis of 4 comments). A Best Management Practices (BMP) program is desirable (synthesis of 8 comments), consisting of a menu of choices (synthesis of 5 comments) that may include:

System audits and leak detection (2)
A public education program (2)
A conservation-based rate structure (2)
Reuse and recycling efforts (1)
A leak detection program (1)
Consumer audits (1)
A rebate and replacement program (1)
Ordinances that strive for regional uniformity (1)
Measures identified by industry as being cost-effective (1).

A BMP program may be voluntary (1) and somewhat self-policing, but allowing ADWR to audit the efforts (1).

Stakeholder Elements to avoid in a Municipal Conservation Program

Annual Reporting and Evaluation

Annual reporting requirements that are unnecessary, burdensome, and result in a long annual report that is arduous for providers to put together and for ADWR to review, although they should be reviewing (synthesis of 6 comments).

GPCD

GPCD should be used as an enforcement tool not as compliance point (1).

Conservation Benefits

Focus should remain on water conservation, not arbitrary measures or administrative minutiae of the program. Just an annual review of the conservation measures or a program that only monitors the conservation measures is not acceptable (synthesis of 4 comments).

Ideology

Program should not impede good water management and achievement of management goals (1) or contain mandates that remove the ability to manage a utility (1). Additionally, mandates that harm the quality of life (1) or undermine Arizona's position on interstate water issues are not acceptable (1).

Specifically unacceptable

Pre-conditions that have to be met for program admission (1).

No transitional period into (new) program (1).
Using provider program staffing and budgeting as a measure of the program (1).

Causing the incurring of costs that cannot be recovered from customers (ACC rate approval) (1).

Not allowing groundwater use above 1980s level of use (1).

Capping groundwater use without alternatives available to providers (1).

Prohibiting certain types of water uses (e.g., water features) (1).

Requiring water providers to enforce zoning and development standards to promote water use efficiency (1).

Essential/Non-essential Element Discussion

Mr. Danos: The laundry list of what comprises a successful BMP program is out there. The issue is not what constitutes a decent program, but rather how much reporting will be required? How do we prove program effectiveness? I believe the question of program management is the unresolved issue not which BMPs should be included.
Mr. Tenney: I'd like to suggest that the process is further along than might have been suggested at the start of the meeting today. From the discussions and working sessions, I am hearing that an alternative program that does not force anyone out of the total GPCD or non per-capita programs can be achieved. We somehow need to require providers to select one of the conservation options. A BMP-styled program with a menu of choices and simplistic reporting and compliance features (similar to the agriculture BMP program) sounds like the direction we are headed. I propose developing a "no harm"

program during the remainder of the TMP as a trial run. I am curious to see what the general consensus of the stakeholders might be.

Mr. Larson: I agree with most things **Mr. Tenney** said except that some people enrolled in the GPCD program (and want to remain as such) can do no conservation measures and remain in compliance. If other providers are required to enter a BMP program there should be a minimum program that all water providers are required to enroll in. When we approach the ACC and ask for expedited rate recovery for conservation programs (agreed upon by the stakeholders and mandated by ADWR), they might inquire about cities not doing anything and complying with GPCD whereas others are forced to adopt new methods.

Mr. Tenney: I think the ACC issue can be worked out during this process. The basic idea is having a presentable alternative program for the ACC, with language describing that water providers must be enrolled in one of the three current conservation programs. I think enrollment should be optional into any new conservation program that comes out of the stakeholder process at this time.

Ms. Sorensen: The cities are supportive and willing to work with private water companies to clear the ACC process. However, it is inaccurate to describe cities as not doing anything with regard to conservation. The City of Mesa has an extensive and successful water conservation program. The fact that Mesa can meet our GPCD targets through our programs should be enough. The City of Mesa (and others) shouldn't be penalized for being successful and forced to move into an alternative program.

Mr. Larson: I don't think people should be forced to make drastic changes to their programs. It is unacceptable, however, if a city or private water company, can meet their GPCD doing nothing or minimal amounts of conservation. Any conservation program needs to be equitable to all water providers.

Ms. Sorensen: If a community is made up of efficient water users and their GPCD is naturally low (high amounts of xeriscaped land, abundant low water use appliances) how does a conservation problem exist.

Ms. Rossi: I think there is agreement on what comprises a solid conservation program. The issue becomes: Are we creating an enforcement or conservation program? Are we looking for enforcement alternatives? Does a provider want to be measured against a GPHUD? GPCD? Acre-foot per acre? These options are strictly enforcement based as opposed to linking an enforcement component within a conservation program.

Mr. Garfield: Water providers who easily meet GPCD requirements are sometimes simply lucky. The City of Mesa has conservation components resembling a BMP program. If situations change within a service area (i.e. influx of large industry) you might find that BMP programs in place become unworkable and fall out of GPCD compliance. I am looking for an objective compliance measure that addresses these situations.

Mr. Larson: ADWR still needs to weigh in on managing the GPCD issue. ADWR has stated that staff is not available to maintain and enforce the GPCD program. The concern raised by **Ms. Rossi** is valid, but the problem is ultimately one of administrative resources.

Ms. Stinnett: The administrative issues of reporting and staffing (How often to report? How in-depth are the reports? How much time?) have to be addressed before ADWR could respond fully.

Ms. Little: There is an enormous difference between the City of Mesa being in compliance because of the conservation measures in place and large providers in the Tucson AMA that haven't done a single thing. Every large provider should be questioned about his or her water conservation measures.
Ken Seasholes: A central issue seems to be that a BMP approach measures effort and not outcome. The question remains whether a program suitable to both ADWR and providers can be completed before the end of the TMP. I think this is possible.
Fernando Molina: Utility companies need a BMP or non-GPCD program to be defensible and justifiable. I believe bare minimum of conservation measures should be required of all providers. Each provider should have the ability for internal analysis to justify the conservation measures selected. The burden would be on individual providers to show compliance within the framework of their own unique service area.
Mr. Singleton: Some providers have much more extensive conservation measures in place than others. Perhaps there is a way to quantify the amount of conservation measures versus service area population to measure one providers' effort against another. This quantification would prove difficult for ADWR to implement as a standard.
Ms. Sorensen: I would like to discuss and gain a better understanding on how cities can facilitate ACC concerns of private water companies at future meetings.
Mr. Tenney: I request that ADWR provide an overview of the alternative agricultural BMP at the next meeting.

Next Meeting

Time: 10:00 A.M.
Date: March 3, 2006
Location: ADWR - Phoenix

In Attendance

Andrew Craddock	ADWR
Arturo Gabaldon	Community Water Co.
Bob Prince	Valley Utilities Water Co.
Bruce Hallin	SRP
Carla Consoli	Saguaro Water Co.
Carol Ward-Morris	AMWUA
Christine Nunez	City of Surprise
Cliff Neal	CAGRD
Colette Moore	City of Mesa
Danny Baeza	City of Eloy
Dave Crockett	Flowing Wells Irrigation District
Dave Iwanski	City of Goodyear
Deanna Ikeya	City of Peoria
Donna DiFrancesco	City of Mesa
Elisa Klein	City of Scottsdale
Fernando Molina	Tucson Water
Gordon Wahl	ADWR
Graham Symmonds	Global Water/Santa Cruz Water Co.

Gregg Capps	City of Chandler
Jake Lenderking	ADWR
James Holt	City of Prescott
Joanne Toms	City of Glendale
Jo Miller	City of Glendale
Joe Singleton	ADWR
Kathryn Sorensen	City of Mesa
Karen Young	Town of Gilbert
Keith Larson	Arizona American Water
Ken Slowinski	ADWR
Kenneth Seasholes	ADWR
London Lacy	City of Surprise
Lynne Fisher	Bureau of Reclamation
Marilyn DeRosa	City of Avondale
Marjie Risk	ADWR
Mark Frank	ADWR
Mark Holmes	Town of Chino Valley
Paul Charman	ADWR
Pete Smith	City of Tempe
Ries Lindley	Tucson Water
Robin Stinnett	ADWR
Sally Cascarilla-Wolf	Arizona American Water
Sandy Fabritz-Whitney	ADWR
Shilpa Hunter-Patel	Witney, Anderson & Morris
Steve Olea	ACC
Steve Olson	AMWUA
Stephen Rot	City of Glendale
Terri Sue Rossi	Central Arizona Project
Tom Buschatzke	City of Phoenix
Val Danos	AMWUA
Val Little	Water CASA
Virginia Welford	ADWR
Warren Tenney	Metro Water
William Garfield	Arizona Water Company