



**CITIZENS' WATER ADVISORY COMMITTEE
CONSERVATION & EDUCATION SUBCOMMITTEE**

Wednesday, March 11, 2015, 3:30 p.m.
Director's Conference Room
Tucson Water, 3rd Floor
310 W. Alameda Street, Tucson, Arizona

Legal Action Report

1. Call to Order/Roll Call

The meeting was called to order by Chairperson Amy McCoy at 3:36 p.m. Those present were:

Members Present:

Amy McCoy	Chairperson, Representative, Ward 2
Mark Murphy *	Representative, Mayor
Jean McLain	Representative, City Manager
Catlow Shipek	Representative, City Manager
Mark Lewis	Representative, Ward 5

* Member Murphy arrived at @ 3:39 p.m.

Tucson Water Staff Members:

Fernando Molina	Public Information Supervisor
Melodee Loyer	Chief Planner
Andrew Greenhill	Management Coordinator
Daniel Ransom	Water Conservation Supervisor
Joaquim Delgado	Public Information Specialist
Candice Rupprecht	Public Information Specialist
Kris LaFleur	Staff Assistant
Brenda Venegas	Administrative Assistant

Others Present

Brian Wong	CWAC
Betsy Wilkening	AZ Project WET
Tim Steller	Arizona Daily Star
W. Mark Day	Value4H ₂ O

- 2. Announcements** – Mr. Molina announced that the Public Information & Conservation (PICO) office is now fully staffed with the addition of Brenda Venegas as administrative assistant. Ms. Venegas was introduced by Mr. Molina and welcomed by those in attendance.
- 3. Call to Audience** – There were no audience statements.
- 4. Review of February 11, 2015, Legal Action Report and Meeting Minutes** – Member Lewis moved to approve the Legal Action Report and Meeting Minutes of February 11, 2015. The motion was seconded by Member Shipek and carried by a vote of 5-0.
- 5. Monthly Report** – Members and staff discussed Tucson Water's incentive program implementation for FY 2014-15, through the month of February. Mr. Ransom indicated that

Citizen's Water Advisory Committee, Conservation & Education Subcommittee

Legal Action Report

March 11, 2015

changes had been made to the format of the Monthly Report, which now includes figures for cumulative program savings as well as month-by-month figures. Graph layouts were also changed to more clearly show yearly trends in conservation programs. Members generally approved of the updated format, and suggested additional changes.

- 6. Water Conservation Program Mid-Year Report for FY2015** – Ms. Rupprecht presented Tucson Water's Conservation Program Mid-Year Report on behalf of PICO. The report was produced in a narrative format and includes information on PICO's education and outreach efforts, noteworthy event attendance and program participation numbers, details about the reach and scope of current educational programs, and program development information. Ms. Rupprecht, Mr. Ransom, and Mr. Molina fielded and answered members' questions.
- 7. Discussion of proposed new C&E Programs and changes to existing programs** – Mr. Ransom continued the discussion about Tucson Water's Conservation Program plans for FY16, briefly summarizing new programs and changes to existing rebate programs.

Member Lewis introduced a discussion about overall Conservation Program performance and efficiency. Member Lewis presented his analysis of Tucson Water's Conservation Programs, and suggested that the Department focus Conservation Program funds on the replacement of remaining high-flow toilets, specifically in low-income households.

Extensive discussion ensued between members and staff regarding the HET program budget, HET program effectiveness and potential, water resource needs and projections, and the overall effectiveness and reach of conservation programs in low-income communities.

Members and staff discussed the proposed reinstatement of the commercial and multi-family residential irrigation efficiency incentive program. Discussion included potable vs. reclaimed program participation, and inclusion of industrial users in the program.

Member McClain departed at 4:32 and returned at 4:34.

Member Lewis motioned to increase the budget planning for HET rebates from \$200,000 to \$400,000 for FY 2016, and to increase the budget planning for free low-income HET installations from \$300,000 to \$450,000 for the same period. The motion died for lack of a second.

Chairperson McCoy asked staff to review potential improvements to the HET program, particularly to boost participation in the rebate program for customers who are unable to participate in the low-income replacement program. Chairperson McCoy also asked staff to determine the conservation budget levels that would be needed to "deepen" existing programs. Staff's response was requested for presentation at the subcommittee's April meeting.

- 9. * Conservation & Education Strategic Plan Discussion** – Discussion shifted to the topic of a Conservation & Education Strategic Plan. Members asked staff for a status update on the PICO and Tucson Water Strategic Plans. Mr. Greenhill briefly discussed the Conservation component of Tucson Water's draft Strategic Plan, which is intended to address Tucson Water's department-wide priorities. Members and staff continued to discuss the need for a "forward looking," PICO division-level Strategic Plan. Members requested

Citizen's Water Advisory Committee, Conservation & Education Subcommittee

Legal Action Report

March 11, 2015

prioritization of the process; staff indicated that progress was being made on the development and implementation of a PICO Strategic Plan.

Member McClain departed at 4:52.

- 8. 3/3 M&C Rainwater Harvesting Expansion follow-up** – Mr. Ransom reviewed the action summary of item #6 of the March 3 Mayor & Council Study Session, "Progress Report on the Expansion of the Rainwater Harvesting Rebate Program."

Member Lewis asked staff to clarify whether M&C had directed staff and C&E to implement the programs discussed at Study Session, or whether the direction was to consider the programs only. Mr. Molina indicated that TW interpreted the direction as a mandate to implement the programs. Members Lewis, Murphy, and Shipek disagreed, interpreting the M&C mandate as a request to discuss funding for the programs.

Discussion ensued. Staff indicated that efforts would be made to clarify the intent of M&C direction, and to request Ward 1 representation at the April C&E meeting.

10. Future Meetings/Agenda Items –

- Analysis & discussion of HET low-income program expansion
- Ward 1 presentation: Clarification of March 3 M&C motion
- Summary of Amended UA RCS marketing study IGA
- Anne Marie Wolf / Sonoran Research Group: Working with low-income groups
- Drought Response and Preparedness presentation

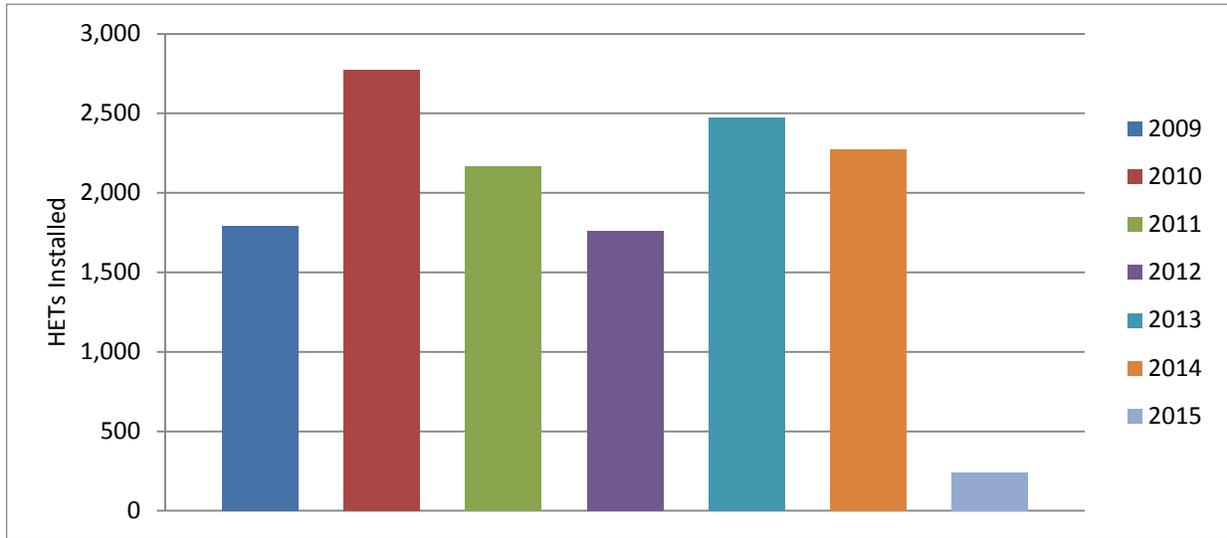
11. Adjournment – The meeting was adjourned at 5:12 p.m.

** Item taken out of turn*

**Tucson Water
Incentive Program Implementation
FY 2014-15 Through February**

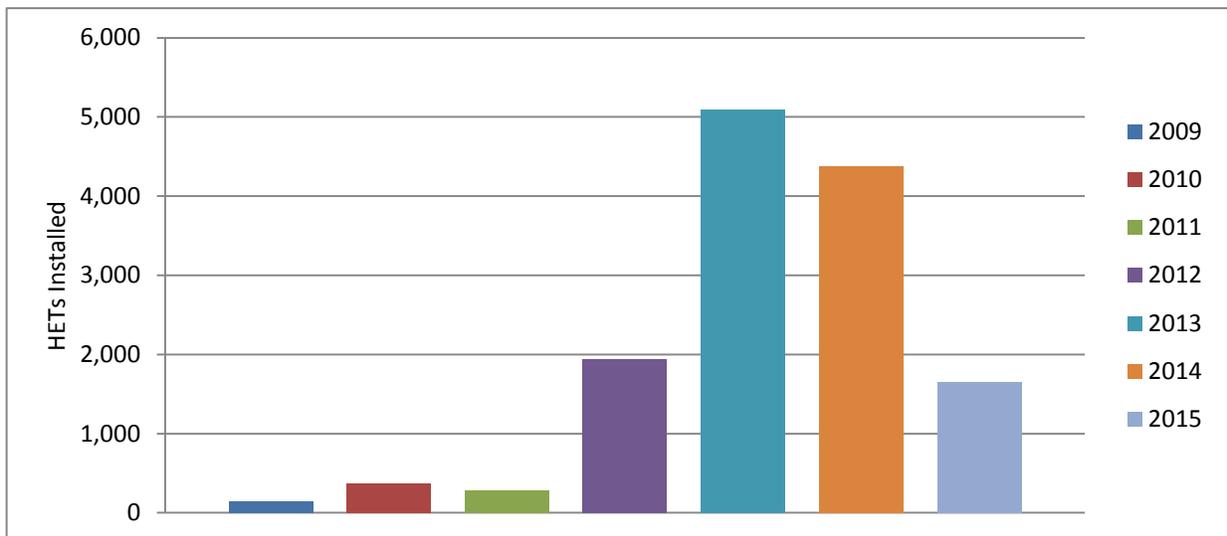
Single-Family HET Rebate

HETs Installed	1,427	Start Date: Jul-08	
Estimated Gallons Saved	10,677,528	Cumulative	13,493
Staff Labor Hours	0	Cumulative Water Saved	
Budget	\$ 200,000	Gallons	392,045,588
Expenditure ¹	\$ 117,341	Ccfs	524,125
Percent of Budget	59%	Acre-Feet	1,203



Multi-Family HET Rebate

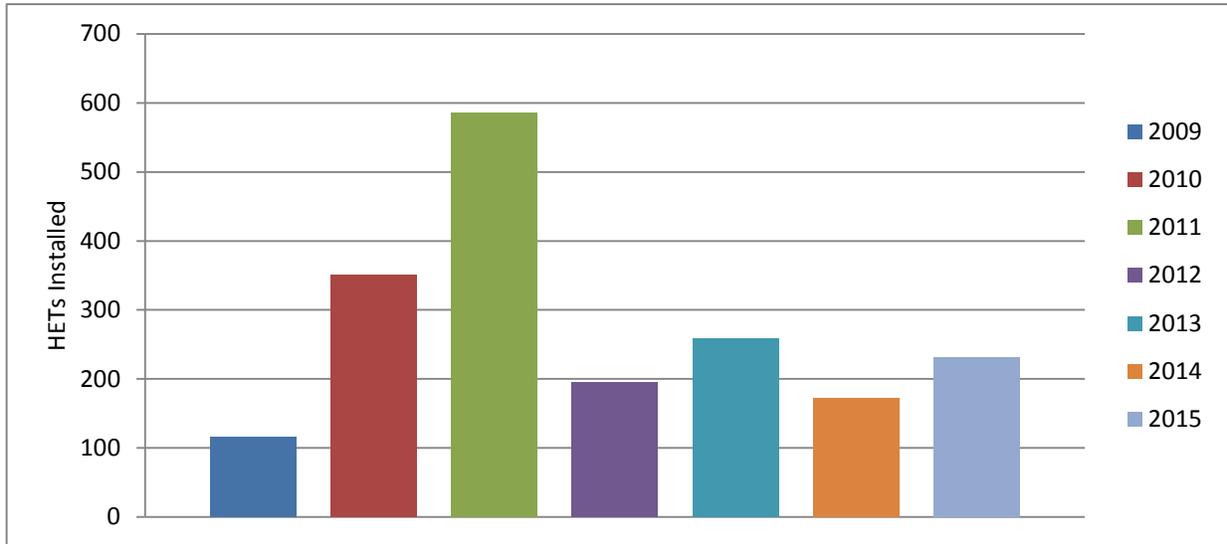
HETs Installed	3,422	Start Date: Jul-08	
Estimated Gallons Saved	25,605,115	Cumulative	13,876
Staff Labor Hours	0	Cumulative Water Saved	
Budget	\$ 350,000	Gallons	245,882,433
Expenditure ¹	\$ 336,841	Ccfs	328,720
Percent of Budget	96%	Acre-Feet	755



**Tucson Water
Incentive Program Implementation
FY 2014-15 Through February**

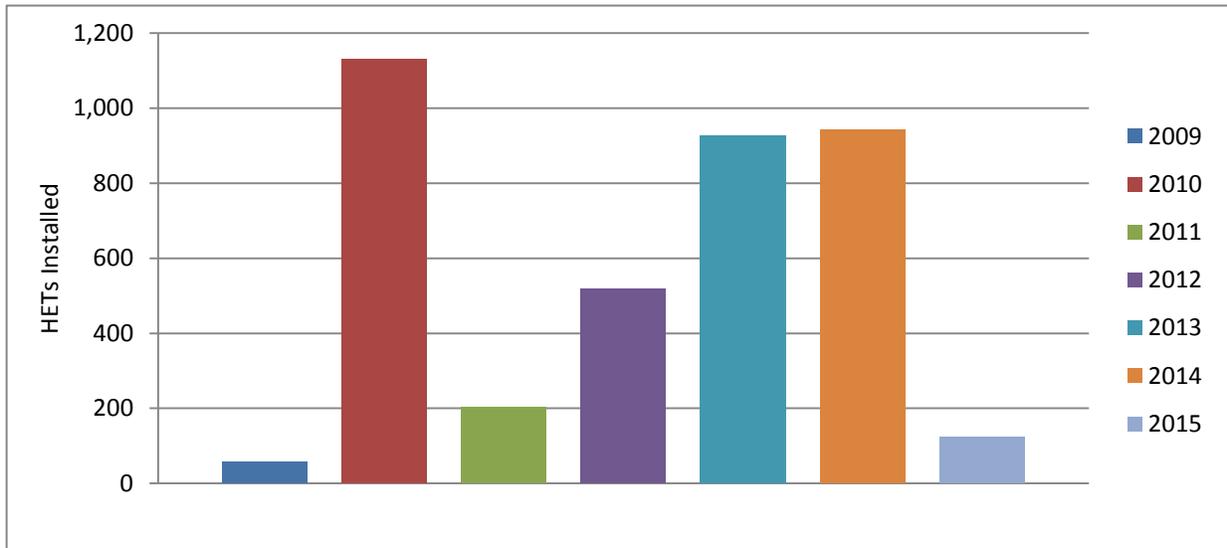
Commercial HET Rebate

HETs Installed	255	Start Date: Jul-08	
Estimated Gallons Saved	2,606,100	Cumulative	1,910
Staff Labor Hours	0	Cumulative Water Saved	
Budget	\$ 30,000	Gallons	74,238,080
Expenditure ¹	\$ 22,482	Ccfs	99,249
Percent of Budget	75%	Acre-Feet	228



Low-Income HET Direct Install

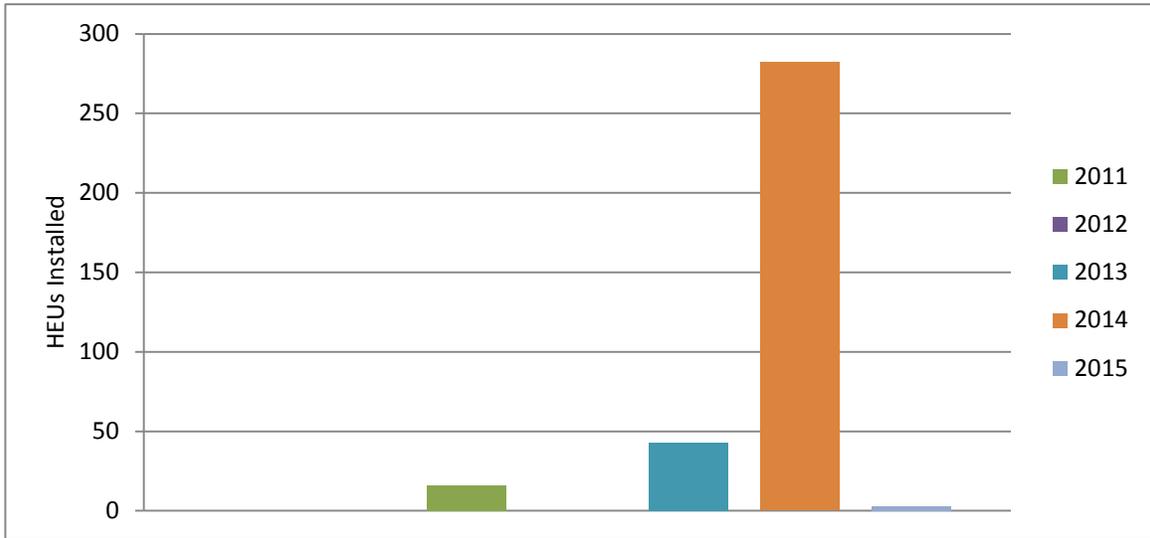
HETs Installed	610	Start Date: Oct-09	
Estimated Gallons Saved	5,232,275	Cumulative	3,901
Staff Labor Hours	0	Cumulative Water Saved	
Budget ²	\$ 272,000	Gallons	111,233,020
Expenditure ¹	\$ 204,661	Ccfs	148,707
Percent of Budget	75%	Acre-Feet	341



**Tucson Water
Incentive Program Implementation
FY 2014-15 Through February**

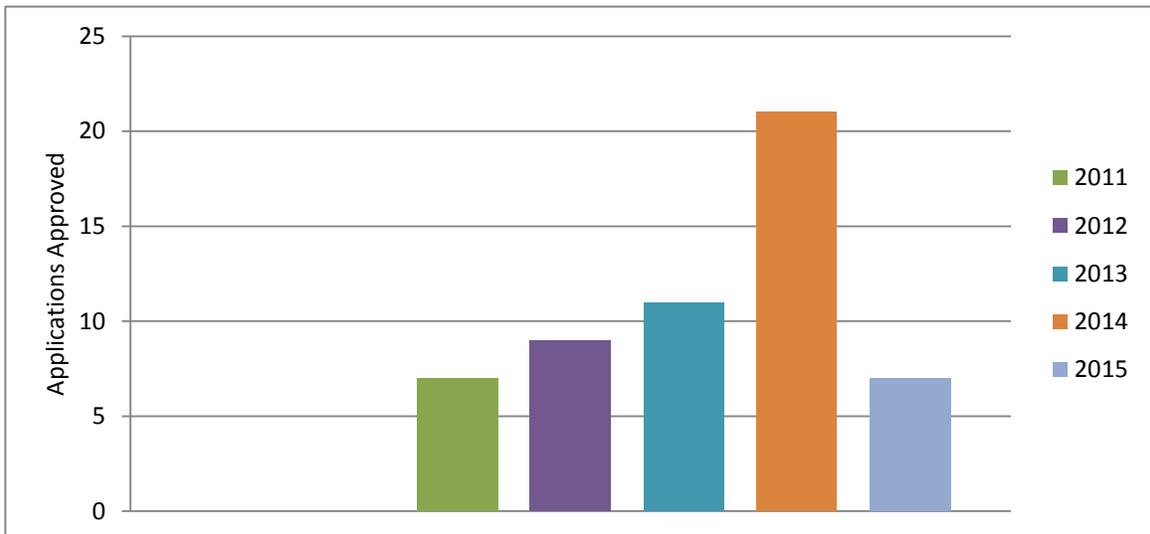
High-Efficiency Urinal Rebate

HEUs Installed	217	Start Date: Jan-11	
Estimated Gallons Saved	3,881,045	Cumulative	344
Staff Labor Hours	0	Cumulative Water Saved	
Budget	\$ 115,000	Gallons	9,228,660
Expenditure ¹	\$ 108,500	Ccfs	12,338
Percent of Budget	94%	Acre-Feet	28



Gray Water Rebate

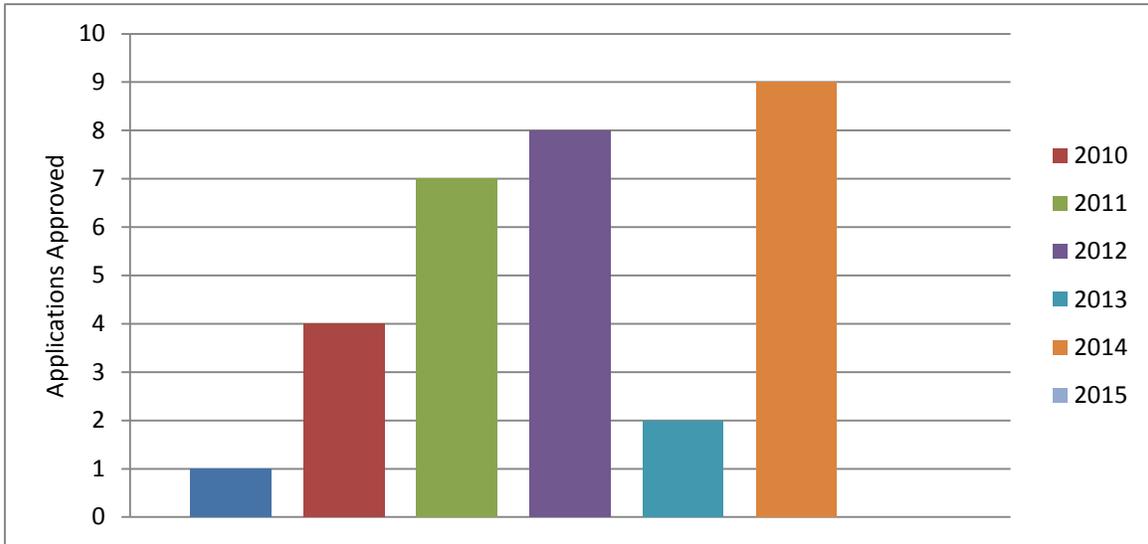
Applications Approved	23	Start Date: Jan-11	
Estimated Gallons Saved	299,713	Cumulative	55
Staff Labor Hours	0	Cumulative Water Saved	
Budget	\$ 10,000	Gallons	1,589,782
Expenditure ¹	\$ 9,819	Ccfs	2,125
Percent of Budget	98%	Acre-Feet	5



**Tucson Water
Incentive Program Implementation
FY 2014-15 Through February**

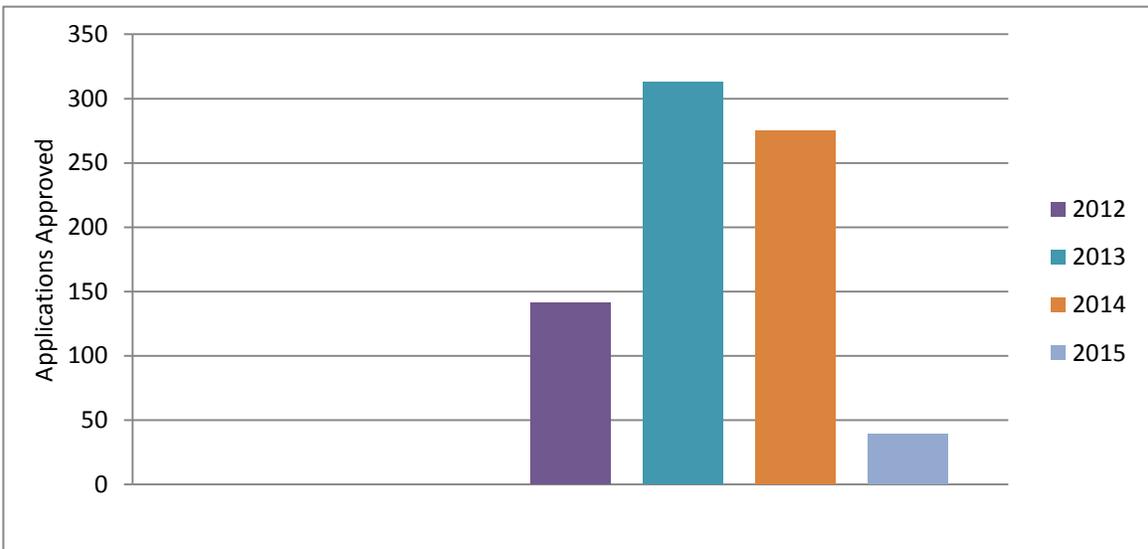
Irrigation Efficiency Rebate

Applications Approved	0	Start Date: Jul-08	
Estimated Gallons Saved	0	Cumulative	31
Staff Labor Hours	0	Cumulative Water Saved	
Budget	\$ 50,000	Gallons	25,064,550
Expenditure ¹	\$ -	Ccfs	33,509
Percent of Budget	0%	Acre-Feet	77



Rainwater Harvesting Level 1 Level 2

Applications Approved	27	173	Start Date: Jun-12	
Estimated Gallons Saved	0		Cumulative	768
Staff Labor Hours	0		Cumulative Water Saved	
Budget	\$ 350,000		Gallons	0
Expenditure ¹	\$ 233,056		Ccfs	0
Percent of Budget	67%		Acre-Feet	0



**Tucson Water
Incentive Program Implementation
FY 2014-15 Through February**

High-Efficiency Clothes Washer Rebate

Applications	0	Start Date: TBD	
Estimated Gallons Saved	0	Cumulative	0
Staff Labor Hours	0	Cumulative Water Saved	
Budget	\$ 65,000	Gallons	0
Expenditure ¹	\$ -	Ccfs	0
Percent of Budget	0%	Acre-Feet	0



Commercial Efficiency Upgrade Rebate

Applications	0	Start Date: TBD	
Estimated Gallons Saved	0	Cumulative	0
Staff Labor Hours	0	Cumulative Water Saved	
Budget	\$ 65,000	Gallons	0
Expenditure ¹	\$ -	Ccfs	0
Percent of Budget	0%	Acre-Feet	0



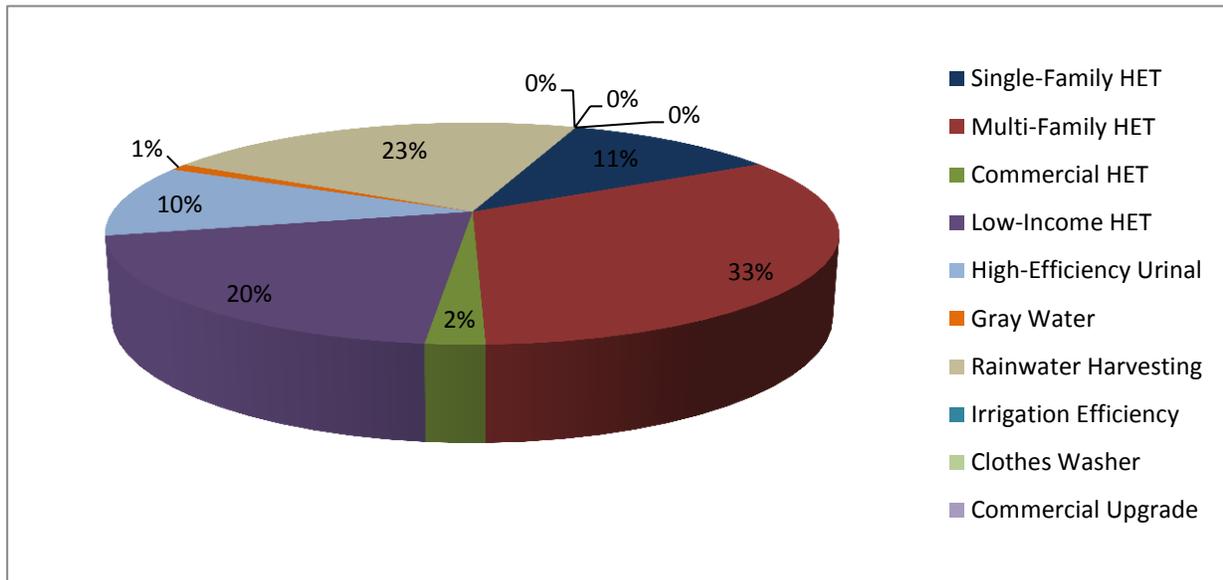
**Tucson Water
Incentive Program Implementation
FY 2014-15 Through February**

Program Totals

HETs/HEUs Installed	5,931
Estimated Gallons Saved	48,301,776
Staff Labor Hours	0
Budget	\$ 1,507,000
Expenditure ¹	\$ 1,032,699
Percent of Budget	69%

Cumulative Water Saved	
Gallons	859,282,112
Ccfs	1,148,773
Acre-Feet	2,637

Expenditures by Program for FY 2014-15



The numbers and expenditures in this report reflect when the rebate or expenditure is approved and not when paid. This report is an operational report and not intended to reconcile with financial reports.

¹The expenditure does not include the cost of staff time

²The budget for the low-income HET direct install program is combined from two object codes. Toilet installation is categorized in professional services and the cost of the toilet and misc. materials is categorized in materials. All other rebate program expenditures are in the object code for efficiency programs.

Tucson Water Public Information & Conservation Office Water Conservation Program Mid-Year Report for FY 2015

This report describes the activities of the Tucson Water Conservation Program from July 1, 2014 through December 31, 2014. The program is funded through a conservation fee that began in 2008 and is currently set at seven cents per hundred cubic feet assessed to all potable water users. The Conservation and Education Subcommittee of the Citizens' Water Advisory Council is charged with overseeing the Conservation Fee Fund and works with staff to review and provide feedback on staff recommendations related to water conservation programming. This report contains updates on our main program components and the recommendations presented in the 2014 annual report.

Education

Tucson Water continues to support three contracts that provide educational services to K-12 audiences and landscape professionals throughout our service area. All numbers reported by our education partners are for the time period of July 1, 2014 through December 31, 2014.

Arizona Project WET (APW)

APW continues to deliver a variety of educational programs including 3rd Grade Groundwater Flow Model presentations, 3rd Grade Sweetwater Wetlands Festivals, 6th Grade Groundwater Flow Model presentations, Water Scene Investigation presentations and the School Water Audit Program. During this time period, 119 classroom presentations were delivered reaching 3,611 students. APW continues to conduct pre and post learning assessments of each student they reach through their formal instruction (i.e. 3rd 7 6th grade presentations) and significant learning is being demonstrated through these assessments. All of these programs have resulted in 881 instructional face-hours. The School Water Audit Program retrofits for FY2014 are saving a projected 2.05 million gallons of water annually. APW has also provided hands-on demonstrations at 36 community events, reaching 1,073 adults and 3,057 students. APW continues to pilot an engineering design, process-driven rainwater harvesting curriculum and is working to develop a smartphone-based Discovery Program using QR codes at Sweetwater Wetlands. APW is also preparing for their spring and summer professional development opportunities.

Environmental Education Exchange (EEExchange)

EEExchange delivered a total of 157 *Da Drops* presentations for grades K-3, 101 *Our Water, Our Future* presentations for grades 3-5, and 46 *El Tour de Agua* presentations to middle school students. In total, 7,665 students in 88 schools were reached by the three outreach programs. EEExchange utilizes a



web-based scheduling system providing teachers with an easy way to sign-up. In addition, one Family Science Night event was attended. *Da Drops* and *Our Water, Our Future* presentations are both up from 2013 numbers and the new *El tour de Agua* has been delivered more than the old *Tucson Toolkit* presentation it replaced, as compared to the same time period last year. As reported by EEExchange, the programs continue to receive extremely positive feedback on evaluation forms and from direct communication with teachers.

SmartScape

SmartScape continues to train landscape professionals and homeowners on water efficiency and proper landscape care through 51 workshops that reached 1,221 people. Currently SmartScape is developing new programming including a webinar/seminar for property managers to address irrigation efficiency and Tucson Water's new Irrigation Efficiency Incentive Program and a Professional Training Module for individuals that have received a Certificate of Completion from "SmartScape Training for Landscape Professionals." This class is titled "Landscape Irrigation – Introduction to Basic Design, Maintenance and Management" and is an important addition to the SmartScape offerings to increase the ability and knowledge of our local professionals to incorporate water efficiency practices into their work.

PICO Outreach

Tucson Water participated in several community outreach events in the second half of 2014, as well as making multiple professional presentations at technical conferences.

Professional Presentations

Several staff members attended the WaterSmart Innovations conference, which is the premier urban water efficiency conference. In addition to networking and sitting in on excellent sessions, PICO staff had a poster on our Low-Income Toilet Replacement Program and a presentation titled "Long-Term Partnerships Provide One-of-a-Kind Water Education Programs for Tucson Youth" and our education partner, Arizona Project WET, presented a poster titled "Students Drive the use of Water Efficient Technology" and presented "Teachers Work with Professionals to Understand Tucson's Water Distribution System."

PICO staff also attended the Irrigation Association conference to keep up on emerging technologies and irrigation approaches to improve the design of our soon-to-be-released irrigation efficiency incentive program. Staff also delivered a presentation titled, "Partnering with Water Purveyors" to share examples of how Tucson Water invests in landscape water efficiency through education (SmartScape) program and incentives.

SAHBA Home Show

Tucson Water has participated in the SAHBA Home Show since 2008, providing attendees opportunities to ask questions and receive Tucson Water promotional and educational materials. Working with our marketing contractors, we designed an improved set of displays to emphasize the Water Reliability message our utility is focused on. Many individuals took information on our rebate programs and people primarily had questions about recycled water, water rates and hard water solutions.



Southern Arizona Construction Career Days

Tucson Water was invited to participate with 30 other area organizations in the 2014 Southern Arizona Construction Career Days held on November 13th and 14th. Four hundred high school students attended the event each day and Tucson Water was reputed to have one of the more exciting booths with hands-on displays of pipes, valves and assembly kits.

Other Community Events

Tucson Water also had booths at the El Rio Health & Safety Fair, the Senior Health Fair, the Davis-Monthan Air Force Base National Night Out, the Home Depot Safety Event for Kids, the Sunnyside Neighborhood National Night Out, the City/County G.I.S Fair and Science Night at Rattlesnake Ridge Elementary School. In addition to hosting a booth, Tucson Water provided sponsorship for the following events: Family Festival in the Park at Reid Park, the Envision Tucson Sustainable Festival at the YWCA and the Boo Bash at the Clements Center.



Social Media



Tucson Water has become more active on social media in the last year. Our office has been contributing to the City of Tucson Facebook and Instagram pages on a regular basis and is moving in the direction of creating unique water department accounts for Facebook, Instagram and Twitter. Although connected, each of these social media platforms provides different opportunities for engaging with our customers, providing important information about water outages, repairs, etc. and interesting information on the many facets of a water utility. SeeClickFix is an app already being utilized by the City of Tucson to report potholes, graffiti and other municipal problems. Water waste has been added to the list and these violations, which will go directly to our Water Conservation Inspectors to address. This tool provides our customers with another way to report water waste in our community. Our social media strategy should be fully launched by the end of FY15.

Regional Collaboration

Tucson Water PICO staff hosted an Arizona Water Conservation InfoShare on December 9th at the Randolph Golf Complex. This quarterly meeting brings together water conservation professionals from around the state to exchange ideas, identify opportunities for collaboration and learn about research and new technology in the field. The morning featured a presentation from Gary Woodard of Montgomery and



Associates who presented on “Changing Preferences, New Development and Passive Conservation: What’s Driving Down Domestic Demand?” After lunch the attendees were taken on a tour of the new Advanced Oxidation Process Water Treatment Plant and the Southern Avra Valley Storage and Recovery Project (SAVSARP).

Updates on FY 2014 Annual Report recommendations:

- Streamline and create more equitable high-efficiency toilet rebate programs by setting two rebate prices. \$75 for gravity-tank type and pressure assist-tank type toilets and \$150 for flushometer-valve type toilets (flushometer-valve types only for commercial sector).
 - *Update: Rebate changes will go into effect March 1st.*
- Reduce high-efficiency urinal rebates back to \$200 to be consistent with commercial HET rebate and evaluate progress next year.
 - *Update: Rebate changes will go into effect March 1st.*
- Gray water and rainwater harvesting rebates will continue to be evaluated for water savings and customer equity.
 - *Update: Tucson Water staff is currently working to address the expansion of the rainwater harvesting rebate program, as directed by City of Tucson Mayor & Council.*
- Offer a new high-efficiency washing machine rebate of \$100, available to residential, multi-family, and commercial customers.
 - *Update: Rebate language has been drafted and promotional materials are being developed, with a plan to “go live” at the beginning of FY 2016.*
- Offer a new, customized commercial rebate that will calculate a customer rebate amount based on potential water savings determined from a facility water audit.
 - *Update: The RFP has been drafted and a review committee assembled for selection of a contractor to conduct the necessary commercial water audits for this program. We hope for this program to “go live” at the beginning of FY 2016.*



Update on Incentive Program Changes

February 6, 2015

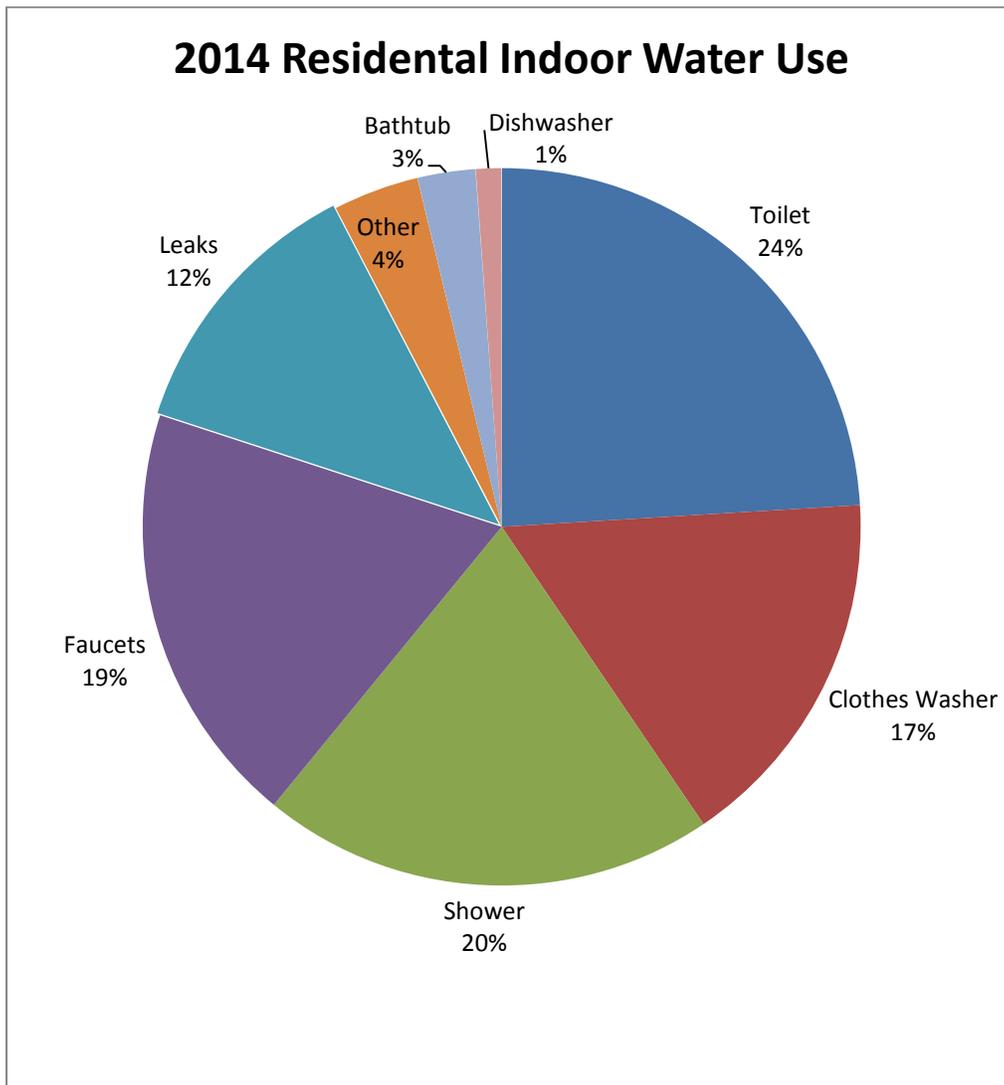
New Planned Programs:

- Residential Clothes Washer Rebate Program
 - Timeline: The plan for this program is to launch at the beginning of FY 2016.
 - Update: Rebate language has been drafted and promotional materials are being developed. This rebate was initially to be available for residential, commercial and multi-family customers, however given that the Flexible Commercial rebate program may include clothes washers if they are identified as an efficiency opportunity during an audit, the specific clothes washer rebate program will only apply to residential customers. A \$100 rebate will be available for all clothes washers that meet the Consortium for Energy Efficiency Tier 3 standard for washing machines. Initial contact has been made with many of the retailers that sell clothes washers and 23 retail locations have been identified in the service area. Signage and training will be provided to all of these locations in advance of the rebate launch.
- Commercial Rebate Program
 - Timeline: The plan for this program is to launch at the beginning of FY 2016.
 - Update: The RFP has been drafted and a review committee assembled for selection of a contractor to conduct the necessary commercial water audits for this program. This program may be marketed in collaboration with the EPA WaterSense “H2Otel Challenge” campaign. The Commercial Rebate Program will be linked to the WaterSmart Business Program and to the Drought Preparedness and Response Plan. Commercial customers using more than 325 Ccf/month must conduct an audit of their facility and develop a water management plan. This program is designed to assist them with meeting that requirement. To qualify for a commercial rebate, participants will participate in the WaterSmart Business Program and have Tucson Water staff or a professional auditor under contract with Tucson Water conduct an audit of the property. The results of the audit will determine the potential for saving water, and the rebate will be based on the amount of water saved. Rebate amounts will be calculated based on estimated water savings to ensure program cost-effectiveness.

Existing Program Changes:

- Single-Family High-Efficiency Toilet Program
 - Timeline: Rebate changes will go into effect March 1st.
 - Update: New rebates will be \$75 for each WaterSense-certified high-efficiency toilet, up to two per household. Home must be built in 1991 or older. Rebates submitted after March 1st with receipts for toilets purchased before March 1, 2015, will qualify for the old rebate policy of 50% of the cost, up to \$120 per toilet or \$200 per household.
- Multi-Family & Commercial High efficiency Toilet Program
 - Timeline: Rebate changes will go into effect March 1st.
 - Update: New rebates will be \$75 for each WaterSense-certified high-efficiency toilet (gravity-tank type and pressure assist-tank type) and \$150 for flushometer-valve type toilets (flushometer-valve types only for commercial sector). Rebates submitted after March 1st with receipts for toilets purchased and installed before March 1, 2015, will qualify for the old rebate policy of 75% of the cost, up to \$100 per toilet.
- Multi-Family & Commercial High-Efficiency Urinal Program
 - Timeline: Rebate changes will go into effect March 1st.

- Update: New rebates will be \$200 for each WaterSense-certified high-efficiency urinal. Rebates submitted after March 1st with receipts for urinals purchased before March 1, 2015, will qualify for the old rebate policy of \$500 per urinal.
- Multi-family & Commercial Irrigation Efficiency Incentive Program (formerly the Irrigation Upgrade Rebate Program)
 - Timeline: This program is planned to “go live” at the beginning of FY 2016, with a soft roll out this spring.
 - Details: Over 50 commercial and multi-family customers are on a waiting list to be informed about the launch of this program. The contractors who will conduct irrigation audits as a part of this program are engaged and TW staff is working on final edits to the program language. Participation will begin with an irrigation system evaluation including recommendations that customers should adopt to qualify for the rebate. Equipment rebates are based on fixed costs and technology rebates will be 50% of the cost. Customer rebate cap for retrofits will be \$10,000 and considering an additional annual incentive to be available for customers who meet the water budget designed for them by TW staff. This program may be marketed in collaboration with the EPA WaterSense “Sprinkler Spruce Up” campaign.



Water Research Foundation Project 4309, Single Family Residential End Uses of Water Study
Update from the WaterSmart Innovations Conference, 2014.

CWAC Conservation & Education Subcommittee
March 11, 2015, Agenda Item #8

6. Progress Report on the Expansion of the Rainwater Harvesting Rebate Program (City Wide and Outside City) SS/MAR03-15-38

This item was taken out of order.

Introductory comments were provided by Martha Durkin, City Manager.

Information was provided by Alan Forrest, Water Department Director, and Fernando Molina, Tucson Water Public Information Officer, who fielded and answered questions.

Discussion ensued.

It was moved by Council Member Romero, duly seconded and CARRIED by a voice vote of 7 to 0, to direct staff and the Citizens' Water Advisory Committee's (CWAC) Conservation and Education Subcommittee to discuss allocating \$300,000 to a low income assistance fund from the conservation fund to provide loans to low income customers to install water conservation systems or other ways to assist with water conservation costs and to allocate \$350,000 from the conservation fund to fund neighborhood or arterial rainwater harvesting demonstration projects.

Michael Rankin, City Attorney, stated his office would work with Tucson Water to examine the legal issues and restrictions related to setting up the loan program