# This presentation premiered at WaterSmart Innovations

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# Austin Water and Energy Efficiency Partnerships

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#### Goals



- Reduce water and energy costs for low income residents, older facilities, multi-family residential owners, and renters
- Increase compliance with water and energy efficiency ordinances
- Leverage water and energy utility resources and incentive programs
- Provide "one touch" customer service



# Current Partnership Programs



- Better Buildings Multi-Family Efficiency Program
- Home Efficiency Assistance Program (HEAP)
- > Partners
  - Austin Energy
  - Texas Gas Services
  - Austin Water Utility



#### **Other Joint Programs**

- WashWise Rebate Program
- Small Business Outreach
- Water/energy facility audits



 Commercial Food Service Equipment Rebate Program (in development)



# **Process for MF and HEAP**



#### Austin Energy

- Manages application process
- Works with third party professionals (energy raters) to conduct water/energy assessments and develop action plan
- Offers assistance and rebates for qualifying energy efficiency upgrades and retrofits

#### Austin Water

- Provides free high efficiency bathroom (0.5 gpm) and kitchen aerators (1.5 gpm) and showerheads (1.5 gpm)
- Offers rebates for qualifying water efficiency upgrades and retrofits, irrigation system inspections
- Assists in the review of qualifying water efficiency measures and savings verification

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# **Multi-Family Program**



- Offered to facilities required to reduce energy use under Energy Conservation Audit and Disclosure Ordinance (ECAD)
  - Facilities with 5 or more units 10 years or older must have independent energy audit
  - Audit results and average monthly energy costs must be posted and provided to existing and prospective tenants
  - Facilities with 150% of average energy use or greater must reduce by 20%

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# **Multi-Family Conservation**



- Energy efficiency measures/rebates
  - Weatherization duct sealing, attic insulation, insulating hot water pipes, solar screens
  - HVAC, programmable thermostats, CFL light bulbs
- Water efficiency measures/rebates
  - Free high efficiency bathroom and kitchen aerators, showerheads
  - High efficiency washing machines, irrigation system upgrades, pressure reduction valves

### **Estimated Savings**



	System	Sector	Program
	Consumption	Consumption	Savings
Energy (kWh)	12,723,303,281 (billed sales) FY 2011	4,561,857,688 (all residential customers)	6,203
Water	52,824	9,478	1,200
(million	pumped in FY	(multifamily	
gallons)	2011	only)	
Electricity Load Peak (Peak kWh)	-	_	0.71 kW

# Annual savings to date



- One-year program upgrading 23 properties, over 1,600 MF units
- 4.7 Million kWh savings
- 10 Million Gallons savings
- Use/savings assumptions
  - REM/Rate energy modeling software
  - AWWA REUS





## Funding



- City of Austin water and electric revenues
  - AWU \$100,000 per annum
  - AE \$2,000,000 per annum
- USDOE Better Buildings Neighborhood Program Grant \$350,000 per annum





### HEAP



- Aimed at low-income residential customers at or below 200% of federally designated poverty income level
- Priority assigned based on date application received and high energy use
- Two levels of service:
  - Tier 1: Basic weatherization and plumbing repairs/retrofit; and
  - Tier 2: Basic weatherization, repair or replacement of HVAC, and plumbing repairs/retrofit

# **Estimated lifetime savings**

- Over 400 applications
- 93 Million kWh
- 56.4 Million Gallons
- Savings Assumptions/Calculations
  - REM/Rate energy modeling software
  - AWWA REUS









# Funding



- Total Commitment \$2.35 Million
- City of Austin water and electric revenues
  - AWU \$250,000
  - -AE \$2,100,000
- Estimated cost per residence:
  - Tier 1 \$1800
  - Tier 2 \$5600



# Challenges

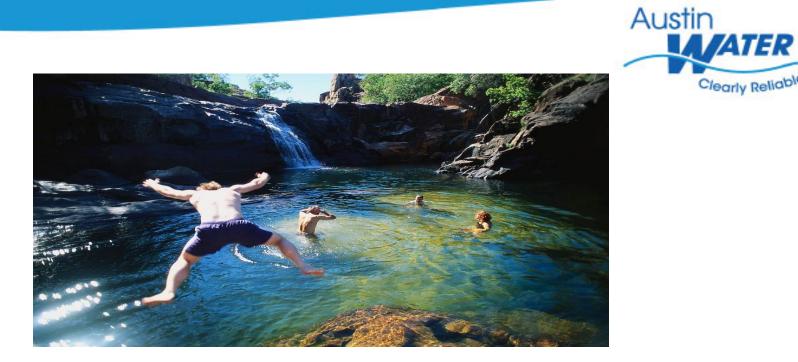


- Prioritizing efficiency efforts
- Processes, data collection, reporting and coordination between utilities
- Coordinating approval from multiple utilities' management and legal departments
- Code change to allow public funding of water waste and plumbing repairs



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