

PGW EnergySense Portfolio Overview





PGW Overview

- Largest Municipal LDC in U.S.
- Customer Base 503,000

478,000 Residential

25,000 Comm./Indust./PHA/Municipal

503,000 Total Customers

- Gas Delivery
 - 75 Bcf (Firm & Transportation)
- Facilities
 - 6,000 Miles of Mains & Services
 - Three LNG Tanks 4 Bcf Storage

Customer Support Programs

- Low-income Payment Assistance
 - ➤ CRP approx. 80,00 Participants
 - ➤ Percentage of Income Program
 - Subsidized by all other PGW customers
- 85 Community Weatherization Workshops
- DSM Portfolio PGW EnergySense



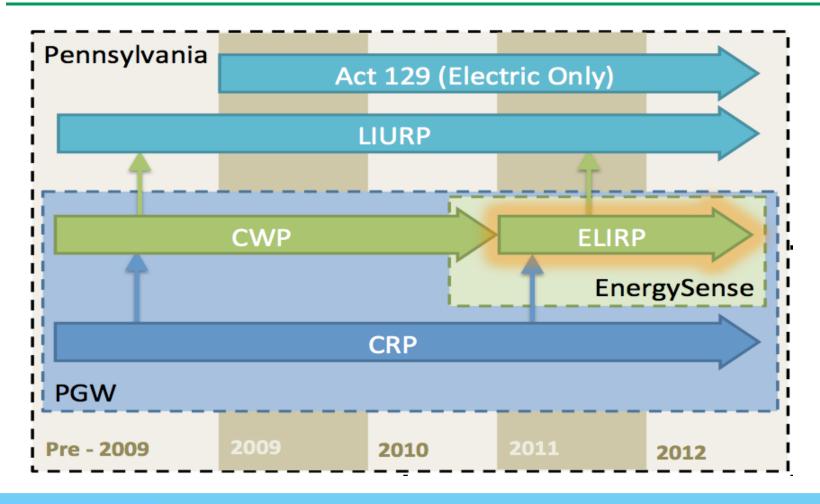
EnergySense Portfolio Overview

- 5 year portfolio approved in 2010 through 2015
- Revised Low-Income program and Six Market-rate Programs

Residential	Commercial & Industrial
Equipment Rebates	Equipment Rebates
 Up \$2,000 for heating equipment 	Up to \$8,400 for heating and cooking equipment
Home Rebates	
 Discounted \$150 energy assessments 	Building Grants
Up to \$3,500 in rebates	■ Up to \$75,000 for improvements
Construction Grants	Construction Grants
 Up to \$750 for new construction 	 Up to \$60,000 for design upgrades beyond code



Low-Income Program Background





Redesigning the PGW Low-Income Program

- Overall Goals:
 - Cost-effective energy savings to low-income customers
 - Reduce overall long-term cost of low-income payment assistance program (90 mcf vs 130 mcf vs 200 mcf)
- Cost-Effective at Program level
- Depth vs. Breadth
 - Increased funding for fewer closed cases
 - Help CSPs high-potential savings opportunities
 - Provide flexibility to go as deep as possible once on-site
- Front-end Rules; Target Goals; Evaluations; Reallocations



EFFICIENT EQUIPMENT REBATES



Residential Sized Heating Equipment Rebates

Rebates for high-efficiency, residential-sized heating equipment



94% AFUE Furnaces \$500



94% AFUE Boilers \$2,000

- Estimated savings of nearly \$350 per-year over standard equipment
- Open to all PGW customers considering residential-sized equipment



Commercial and Industrial Sized High Efficiency Boilers Rebates

85% Thermal Efficiency



\$800 - \$6,300

90% Thermal Efficiency



\$2,900 - \$8,400

Size (kbtu/h)	85% Et	90% Et
300 – 499	\$ 800	\$ 2,900
500 – 699	\$ 1,400	\$ 3,600
700 – 899	\$ 2,000	\$ 4,200
900 – 1,099	\$ 2,600	\$ 4,800
1,100 – 1,299	\$ 3,200	\$ 5,400
1,300 – 1,499	\$ 3,800	\$ 6,000
1,500 – 1,699	\$ 4,400	\$ 6,600
1,700 – 1,999	\$ 5,200	\$ 7,400
2,000 – 2,199	\$ 6,000	\$ 8,100
2,200-2,500	\$ 6,300	\$ 8,400



Commercial Food Service High Efficiency Equipment Rebates

- ENERGY STAR® Equipment
 - \$500 \$1,200





Measure Name	Minimum Efficiency	Rebate Amount
Gas Fryer (Large Vat)	ENERGY STAR	\$1,200
Gas Fryer	ENERGY STAR	\$1,000
Gas Convection Oven	ENERGY STAR	\$500
Gas Steam Cooker	ENERGY STAR	\$500
Gas Griddle	ENERGY STAR	\$500
Pre-Rinse Spray Valve	1.6 Gallons Per Minute (GPM)	\$25











Custom Equipment Rebates

- For equipment upgrades not covered by PGW's rebates
- Rebates cover 80% of high efficiency equipment cost premium, up to \$75,000 or max value of gas savings
- Project Example: Infrared Heater Installation
 - \$336,000 efficient project premium
 - Rebate offered: \$75,000
 - Estimated Annual Savings: \$60,800



COMPREHENSIVE PROJECTS REBATES & GRANTS



Efficient Home Rebates Program Overview

Custom Rebates for comprehensive residential energy efficiency upgrades

- 1. Connections to certified & trained home performance contractors
- 2. Comprehensive Energy Assessments discounted to \$150 from typical \$500 market rate
- 3. Custom rebates up to \$3,500 based on project scopes
- 4. Automatic connection to low-interest EE financing (as low as 0.99%)



Efficient Building Grants Program Overview

Grants for existing buildings for comprehensive energy efficiency upgrades

- Up to \$75,000 available per-project
- Grants cover up to 33% of the incremental project cost, but not to exceed the value of gas savings
- All energy conservation measures are eligible



Efficient Building Grants Example Project

- 196 unit multi-family housing facility
- Project Cost: \$387,900
 - High-efficiency DHW
 - Low-flow faucet aerators & showerheads
 - Air-seal & repair existing windows
 - 95% AFUE Furnaces
- Annual savings of: \$96,500

Incentive: **\$104,491**



Efficient Construction Grants Program Overview

Project grants for the **new construction** and **gut rehab** markets.

• Commercial, Industrial & Multi-Family: Up to \$60,000 per property, based on the volume of gas conserved

Gas Usage Below Code	Incentive Per First-Year MMBtu Saved
10% to 19%	\$13.00
20% to 29%	\$24.00
30%+	\$40.00

Single-Family Residential:

- \$750 for homes built to conserve gas at 20% or more below code
- \$1,250 or \$2,750 per-home with 94% AFUE furnace or boiler, respectively



Efficient Construction Grants Example Project

Gut-Rehab 28 Unit Apartment Building

Incentive: **\$27,210**

- Extra Cost for 20% Savings: \$48,550
 - High efficiency furnaces
 - Solar thermal pre-heat system
 - High-efficiency DHW storage heaters
 - Better insulation
- Estimated Annual Savings: \$11,100



PGW EnergySense

PROGRAM PERFORMANCE & LESSONS LEARNED



Program Performance Key Factors

1. Impact of falling commodity costs

Average Annual Percentage Change in Avoided Costs

Year	Space Heating	Baseload	Water Heating		
March 2011 to March 2012					
2012 - 2016	-12.0%	-22.3%	-19.4%		
2017 - 2021	-16.7%	-24.4%	-22.2%		
2022 - 2031	-14.8%	-19.9%	-18.5%		
September 2009 to March 2012					
2012 - 2016	-29.3%	-38.7%	-36.1%		
2017 - 2021	-26.4%	-33.8%	-31.7%		
2022 - 2031	-26.7%	-31.8%	-30.4%		

- 2. Impact of under-spending & low program participation
- 3. Impact of lower savings and higher costs (\$ spent / MMbtu saved)

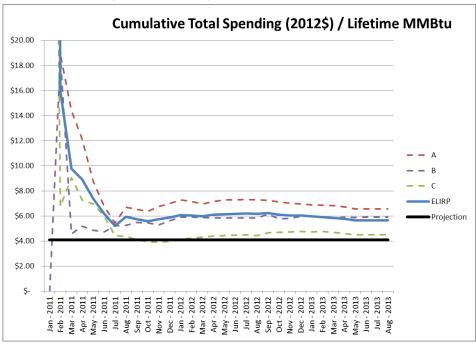


Program Performance Contractor Cost-Effectiveness

Issue: Contractors spending too much on average per lifetime MMBtu saved.

Solution:

- Shifting funding.
- Continuing contractor mentoring and training.





Program Performance Customer Subscription

Issue: Lower than anticipated rebate volumes shifts the mix of costs and savings towards the more "expensive" Low-Income program

Solution:

- Doubled incentive levels
- Ramping up marketing efforts found to be most effective (contractor outreach, direct mailers)
- Increased Consumer Marketing Activities
- Streamlining the process to reduce resubmissions (redesigning applications and website)



Program Performance Rejection Rates

- Low-Income program
 - Utilizing appropriate metrics and reinforcing through ongoing QA & mentoring
 - Addressing customer refusals
 - Addressing on-site rejections
- Market-rate programs
 - Contractor education & training
 - Improved collateral & applications
 - Improved processes



Conclusions

- Clear goals, guidelines, and controls can allow programs to empower CSPs with greater flexibility to "go deep"
- Importance of communications between all parties
- CSP competition model for driving both short- and long-term performance improvements
- Ongoing training & mentoring
- Ongoing Analytics Continuous Improvement



Thank You

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For more information, please visit:

www.PGWEnergySense.com