PUGET SOUND ENERGY

Energy Efficiency Services
Program Results
2007 Annual Report

February 8, 2008

Table of Contents

Executive Summary

This annual report of Puget Sound Energy's (PSE's) current Energy Efficiency Services (EES) activities covers the period January 2007 through December 2007. Additionally, as 2007 marked the end of the two-year tariff period, 2006-2007 results are summarized.

Over the two-year period, PSE achieved 110.8 percent of its electricity savings target and 120.0 percent of its natural gas savings target. In 2007, PSE achieved 116.1 percent of its electricity savings target and 128.2 percent of its natural gas savings target.

Funding was provided by PSE's Electric Rider/Gas Tracker mechanism, Bonneville Power Administration (BPA)—through March 2007— and PSE shareholders. As noted in the Company's semi-annual report of August 2007, BPA's Conservation Rate Credits were suspended on May 9, resulting in a corresponding adjustment to Schedule 120.

Two-year—January 2006 - December 2007 EES Program Summary

	2006-2007 Actuals	2006-2007 Appendix B Figures	% Total
ELECTRIC Costs†	$65,079,284	$63,976,000	101.7%
MWh Savings	388,563	350,628	110.8%
aMW (MWh/8,760)	44.4	40.0	
GAS Costs*	$15,062,158	$12,802,000	117.7%
THERM Savings	5,041,792	4,200,000	120.0%

† Excludes BPA funded renewables.

* Includes Low Income Weatherization shareholder funding of $564,726.

One-year—January 2007 – December 2007 EES Program Summary

	2007 Actuals	2007 Budgets/Targets	% Total
ELECTRIC Costs†	$36,383,430	$38,537,711	94.4%
MWh Savings	222,310	191,452	116.1%
aMW (MWh/8,760)	25.4	21.9	
GAS Costs*	$8,303,096	$6,105,323	136.0%
THERM Savings	2,664,548	2,078,885	128.2%

† Excludes BPA funded renewables.

* Includes Low Income Weatherization shareholder funding of $295,800 in 2007.

Electricity Conservation Incentive Mechanism

2007 marked the implementation of a mechanism designed to place a financial incentive on PSE to achieve maximum energy conservation. That incentive/penalty mechanism is detailed in PSE Electric Tariff G - Rate Schedule 121.

It replaced the two-year penalty-only mechanism originally established by the 2001 Rate Case Settlement Terms for Conservation. A penalty-only mechanism (up to $750,000 annually) was still in effect for failing to achieve natural gas savings target; however PSE exceeded that target.

The electric conservation incentive mechanism is based on the conservation results filed in this Annual Report and compared to the baseline savings target of 160,308 MWhs (18.3 aMW). This target was set through a collaborative process with the Conservation Resource Advisory Group (CRAG) and the Washington Utilities and Transportation Commission (WUTC).

The incentive consists of two parts - the first based on actual savings (222,310 MWhs or 25.4 aMW) compared to the baseline savings target (160,308 MWh). The second based on comparison of PSE's avoided cost ($59/MWh) for acquiring generation resources versus the overall actual Total Resource Cost (TRC) of the portfolio of the conservation programs ($39 MWh) that offset the need to acquire those generating resources.

PSE met the three required criteria for incentive eligibility:

1) At least 75% of the savings targets by Residential and Commercial/Industrial sector were achieved (not including savings from Schedule 258 Large Power User or the Northwest Efficiency Alliance). Actual savings versus target results were: Residential @ 144% and Commerical/Industrial @ 98%.

2) The weighted average measure life of the total program portfolio is greater than the minimum life of nine (9) years. Actual weighted average measure life is 10.6 years.

3) PSE's portfolio of programs, in aggregate, are cost-effective from both the Utility Cost and Total Resource Cost (TRC) perspective - benefit/cost ratio is greater than one (1). Actual Utility Cost is 2.7 and Total Resource Cost is 1.5.

The total incentive is calculated to be $3,452,657 ($2,843,120 based on MWh savings + $609,537 based on TRC shared savings). PSE will collect 75% of that amount as part of the 2008 Schedule 120 Electric Conservation Rider and the remaining 25% in 2009 (subject to review with the CRAG and WUTC).

The detailed incentive calculator and program TRC calculator are provided in Appendix B.

Program Descriptions

Residential Programs

Residential & Commercial Energy Efficiency Information Services, Schedules E200/G206 & E260/G260

These services consist of four components that complement each other to provide information for customers on energy programs and efficiency improvements tailored to their interests and energy-use concerns.

Energy Advisors

Specially trained and dedicated support representatives provide all customer sectors direct access to PSE's array of energy efficiency services through a toll-free phone number. Energy Advisors discuss with customers the potential benefits of various conservation programs, eligible incentives, and introduce related products and services. The Energy Advisors also discuss behavioral measures and low cost no cost methods for customers to reduce their energy use, such as programming their thermostat.

Energy Efficiency Brochures

PSE provides brochures and how-to guides on various energy efficiency opportunities, including behavioral measures, low-cost equipment, weatherization measures, major weatherization improvements, and equipment upgrades. This information includes investment and savings estimates where appropriate. These brochures are available to customers in paper form and online at the PSE Web site. Where required by tariff, brochures are included as bill inserts.

On Line Services

To assist customers with information and questions, a section of the PSE web site (www.pse.com) is dedicated to energy efficiency and energy management for customers that prefer on-line services. PSE provides "Energy at Home", a quarterly e-newsletter promoting energy efficiency services. This free service contains articles about energy efficiency, timely seasonal tips, links to PSE program information and coupons for energy efficient products. A similar bimonthly "Energy in Business" e-newsletter features case studies of PSE energy efficiency projects, as well as announcements of upcoming training opportunities. Other services include an email box, and links from a customer's Energy Tracker information and graphs to energy efficient tips and ideas.

On-Line Personal/Business Energy Profile

Personal Energy Profile (residential) and Business Energy Profile (small business) are free energy self-audit surveys, with PSE follow-up analysis and a report that provides customers with specific and customized energy efficiency recommendations. These services identify current energy costs and consumption by end-use, and provide a list of specific recommendations for energy efficiency opportunities and their associated savings estimates.

MY PSE Account

Incorporates a customer's billing history and details, with an analyzer tool that explains what is included in their bill. Customers can understand what changes can be made to reduce energy usage. The Business Energy Profile is available only to online users.

Recap: : Information Services sponsored the Zero Carbon Marymoor Concert series with the City of Redmond, participated in outreach events with 17 communities, participated in the spring and fall Seattle Home Show which reached more than 24,000 customers with energy efficiency information. The Energy Advisors answered approximately 50,000 customer calls in 2007.

Residential Low Income Retrofit Programs, Schedules E201/G203 and E209/G209

Description: PSE provides funding of cost-effective home weatherization measures for low-income gas and electric heat customers. Funds are used for single-family, multifamily, and mobile home residences.

Program participation takes place through referrals from low-income and crisis service agencies. PSE customers who are having difficulty paying heating bills are also referred to the appropriate serving agency at the time they apply for energy bill payment assistance. Income qualification for the low-income weatherization program takes place at the local weatherization agency or other designated agency. Local agencies assume responsibility for getting permission from rental property owners to install weatherization measures. The elderly, disabled, and households with very young children receive priority in scheduling of the weatherization work. In addition to the structure audit and measures installation, agencies might provide energy use education to participants.

Recap: Low Income Weatherization met energy savings goals for natural gas & electricity. PSE successfully launched a new on-line LIW data tracking system in April of 2007. The new system allows agencies to track and report (in real-time) measure installations, costs and payments. Working with the agencies, PSE is nearing completion of a comprehensive evaluation and payment schedule for all measures, which will result in an increase in payments per measure—some of which haven't been adjusted in over five years—with the goal to implement these in Q1 2008.

Energy Education, Schedules E202/G207

Description: Powerful Choices is a 4-day school program that empowers PSE service area middle school students with the ability to make informed choices regarding the use of natural resources. This program fills a need for environmental education in Washington State at no cost to schools.

Powerful Choices also helps students achieve Washington's learning standards by aligning the curriculum with Washington State's Essential Academic Learning Requirements (EALRS). Students participate in a variety of activities focusing on energy, water, solid waste, and air quality. PSE partners with school districts, municipalities, the Clean Air Agency and other utilities to deliver this program.

Recap: Energy Education surpassed its electric savings target and was just shy of its natural gas savings target, due to a King County school district not participating in the spring of 2007. Thurston, Kitsap, and Whatcom Counties all added schools in 2007 and the City of Olympia and Thurston County were added as partners. Powerful Choices was promoted at local events in an effort to increase participation in 2008 and 2009. The Komo Kulshan Outdoor School which teaches approximately 600 students each year was added to the educational program. The Cool School Challenge, a pilot program for high school students was also added this year, engaging students in reducing energy consumption and greenhouse gas emissions through behavior modification in the schools and at home.

Manufactured Housing Energy Efficiency, Schedule E203

Description: This program targets residential customers living in existing manufactured homes with ducted electric heating systems. Key stakeholders include homeowners, duct sealing specialists, and qualified HVAC contractors specializing in mobile home heat pump applications.

The program is implemented by trained, certified contractor(s) who follow regionally- accepted protocols for duct leakage testing, sealing and heat pump installation. Contractor(s) may also install qualifying, cost-effective hot water savings and lighting savings measures, and distribute PSE customer energy efficiency information and appliance rebate materials.

Recap: Manufactured Housing Energy Efficiency exceeded savings target. The program became so popular that it was necessary to train and certify additional contractors to ensure all customer inquiries were satisfied. Customers responded positively to the program, the quality service and the energy savings.

Multi-Family Retrofit, Schedule E217

Description: The new multi-family retrofit program proposes to increase the installation of specific measures in existing, multifamily (MF) buildings, consisting of five or more residential units. MF structures typically have both in-unit and common area energy-efficiency opportunities that can include shell, appliance, lighting, HVAC and water heating measures. The program targets installation of energy efficient measures in MF facilities occurring on a retrofit (e.g., planned project) or "replace upon failure" (RUF) basis.

Recap: The Multi-Family Retrofit program exceeded its annual goals for electric savings, however it fell short on its natural gas target due to program restrictions to serve only buildings with boilers. A contract extension was signed in August of 2007 for direct installation measures which resulted in savings of an additional 2.5 million kWh, A primary goal of the 2007 program was to engage key apartment portfolio managers in long term energy efficiency strategies and committing to resources to energy efficient product installation in future years.

Residential Energy Efficiency Rebates, Schedules E214, G214

Description: This program implements cost effective, targeted, residential energy savings using a menu of prescriptive energy efficiency measure rebates. Prescriptive rebates are intended to facilitate participation by customers and trade allies, and provide administrative efficiencies for PSE in meeting energy efficiency goals. Rebate amounts are based on regionally accepted energy savings estimates and incremental efficiency measure cost. Rebates may be subject to change in response to revisions in savings estimates, average incremental cost or changes in Federal appliance efficiency standards or State codes.

Recap:

RETAIL CHANNEL:

Energy Efficient Appliances: The Appliances program exceeded electric savings and gas savings targets. Bill inserts and additional staff in the field visiting stores has improved results.

Energy Star® Lighting: The Lighting program substantially exceeded targets through the addition of new retail partners and greater field support for the program. The program added Wal-Mart and increased PSE's allocation to Costco. Fall promotions were enormously successful, with Costco fall sales generating more volume than the first three quarters of 2007 combined.

DEALER CHANNEL:

Energy Efficient Heat Pumps: The program met revised targets and came on strong with 50% of the yearly saving occurring in the last quarter of 2007. Contractor training and education helped to reduce the number of non qualifying units which had stalled the program in its early stages. Product availability improved, which also contributed to positive results.

Efficient Gas Furnaces: The Gas Furnaces program substantially exceeded therms savings goal. The strong results were supported by an agreement with Fort Lewis Army base to install Energy Star products as part of upgrading many of the base's homes.

Efficient Gas Water Heaters: Program results were very close to target. An initiative to ensure that qualifying products were available at the distributor and contractor level resulted in higher numbers of qualifying energy-efficient installations. Part of the initiative to increase the number of energy efficient installations included coordination between the installer and supplier of water heater lease replacements.

CONSUMER CHANNEL:

Efficient Showerheads: PSE, Seattle City Light (SCL), Cascade Water Alliance (CWA) and Seattle Public Utilities (SPU) partnered to implement a Home Energy & Water Saver Kit Distribution Program, offering free water saving showerhead and faucet aerators to King County customers. PSE provided free efficient showerheads to over 65,000 customers through a targeted direct mail and response program. Over 12,000 electric water heat customers and over 55,000 gas water heat customers responded.

Refrigerator Decommissioning: In August of 2007, PSE partnered with Tacoma Power, Seattle City Light and Snohomish County PUD, to launch a refrigerator decommissioning program. During the pilot period, over 800 qualifying units in Pierce County were removed from service.

Residential Heat Pump Maintenance Pilot, Schedule E249

Description: This pilot program will demonstrate the energy savings and market acceptance of heat pump retro-commissioning and minor modifications repairs directed by an advanced diagnostic field protocol with all system adjustments/repairs recorded and centrally reported by a single management contractor. The pilot will also demonstrate the efficacy of providing an incentive to customers with heat pumps performing at very low levels of measured efficiency to replace them with Energy Star® – qualified models (offer of replacement incentive based on initial diagnostics/adjustments and determination that additional repairs cannot cost-effectively restore reasonable efficiency).

Recap: The Heat Pump Maintenance Pilot will be discontinued, due to lack of contractor participation in 2007. Developed in California as the "Check Me" program, the ability to get contractors trained has been challenging.

Multi-Family Fuel Choice Pilot, Schedule E249

Description: This pilot began in 2004-5 to assess the cost effectiveness and market acceptance of choosing natural gas in retrofit and new construction multi-family structures. Market research and technical assessment work has been completed and reported.

Recap: The Multi-Family Fuel Choice Pilot resulted in annual electrical savings estimated at over 8,000 kWh per unit, with total project savings of over 1.3 million kWh. The Multifamily Fuel Choice Pilot project is completed, report finished, and all rebates paid out. One of the report's key finding was that in new construction/multifamily instances where there is a fuel choice, the decision is often based on the "first cost". As gas appliances typically have a higher first cost (versus lower overall costs of ownership), owners/landlords of rental units—or where the owner or tenant is not responsible for the ongoing utility bill—will usually choose to install electric appliances. The complete report is available upon request. The DASH - Summerwood gas conversion project is complete and consisted of the installation of 164 (tankless water heaters and heat-rated fire places).

Residential New Construction, Schedules E215/G215

Description: To implement cost effective, targeted, residential new construction energy savings using a menu of prescriptive efficiency measure rebates. Prescriptive rebates are intended to facilitate participation by builders, owner-builders and trade allies, and provide administrative efficiencies for PSE in meeting energy efficiency goals. Rebate amounts are based on regionally accepted energy savings estimates and incremental efficiency measure cost. Rebates may be subject to change in response to revisions in savings estimates, average incremental cost or changes in Federal appliance efficiency standards or State codes.

Recap: Residential New Construction exceeded electric and gas targets. Electric savings exceeded target in the ENERGY STAR® lighting pilot through showroom/distributor initiatives. Consistent builder outreach via face to face meetings increased the awareness of program offerings and established new and solidified existing builder relationships. A marketing partnership with Northwest ENERGY STAR Homes also increased awareness.

Gas Single-Family Weatherization, Schedule G216

Description: Program offers certain weatherization measures for gas-heated single family homes. These measures are targeted to existing gas heated homes typically constructed between the 1950's and mid 1970's that lack floor insulation (above unheated crawl space), heating supply duct insulation (located in unheated spaces of the home) and have inadequate ceiling insulation (R11 or less). Homes may lack one or more of these measures.

PSE offers fixed, per measure rebates to qualifying residential customers who install under floor, heating duct, and wall or attic insulation using the services of a trained and authorized energy services contractor.

- Eligible customers are single family customers using natural gas for space heat. Tenants may participate in the rebate program with written permission from homeowner.

Recap: Gas Single-Family Weatherization exceeded its therms savings goal. A substantial increase in participating contractors and increased incentives in the last half of the year were contributing factors.

Commercial-Industrial Programs

Commercial-Industrial Retrofit, Schedules E250/G205

Description: PSE works with commercial and industrial customers to review energy consumption at the customer's facility, and to assess cost-effective energy savings opportunities from equipment, building shell, industrial process, or O&M improvements. These services are provided on the customer's behalf and, where specified by the customer, will be developed in conjunction with design engineers, contractors, and/or vendors. PSE will review third-party savings estimates and analyses. Where the project meets PSE cost-effectiveness funding criteria, PSE will provide grants toward energy savings projects. PSE works with the customer to make sure financial decision makers at the customer's facility are aware of the cost-savings opportunities, including review of energy saving projections that can help obtain favorable financing rates. Upon notice of installation/implementation, PSE will verify the project as complete and operational and payment will be issued.

Recap: C/I Retrofit activity level remains consistent. Lighting accounted for 55% of kWh savings followed by 25% in grocery sector and refrigeration upgrades. HVAC, motors & drives, compressed air and process systems, and commissioning made up remaining savings. On the gas side, boilers and HVAC improvements made up 58% of savings followed by 37% in heat recovery and 5% in envelope improvements.

Commercial-Industrial New Construction, Schedules E251/G251

Description: PSE works with designers and developers of new C/I facilities, or major remodels, to propose cost-effective energy efficient upgrades that exceed energy codes by 10% or standard practice in industrial facilities. Two paths may be followed to qualify for assistance and/or funding for energy efficiency measures. The first path is a prescriptive measure approach, similar to meeting code using the prescriptive path. PSE recommends and reviews measures beyond what is included in the proposed design. Where the project proposes savings 10% beyond the applicable local Energy Code, PSE provides grant funding.

The second path is similar to meeting the code using a performance path. PSE will work with designers to incorporate measures that produce 10% overall savings beyond the applicable local energy code. Given the time frame of new construction planning to completion, these projects may not be complete in the first year.

All C/I customers are eligible, although larger projects tend to be more cost effective. Customers provide PSE with project costs and estimated savings, and assume full responsibility for selecting and contracting with third-party service providers. Projects must be approved for funding prior to installation/implementation to be eligible.

Recap: New construction projects continue to take a significant amount of engineering time to review for future construction. Lighting upgrades in a variety of sectors accounted for the largest grant and savings amounts followed by hospital HVAC and chiller upgrades. Unitary HVAC improvements in the retail sector were very popular as well as refrigeration system upgrades in the grocery sector.

Resource Conservation Manager, Schedules E253/G208

Description: PSE offers Resource Conservation Manager Services (RCM) to any school district, public-sector government agency, and commercial or industrial (C/I) customer, with a focus on larger customers with multiple facilities. An RCM customer employs or contracts with someone who has designated resource management responsibilities, including accounting for resource consumption and savings.

PSE assists in designing and implementing an RCM program. Salary guarantees are available for RCMs, and training opportunities are available for RCMs and corollary staff such as custodial and maintenance personnel.

In some cases, PSE provides a grant to partially fund a start-up RCM position, provided there is a mutual agreement that if the program generates dollar savings, funding by the customer will continue after "start-up" funding support terminates.

Depending on individual customer needs, PSE may provide additional services or assistance, including resource policy guidelines; a resource accounting system; PSE billing data; informational materials; and a forum for resource conservation managers to exchange information, ideas, and techniques for controlling utility costs. Any grants for retrofits are coordinated through PSE's C/I retrofit or new construction programs.

Recap: The RCM program is seeing increasing activity from local governments and other organizations in response to sustainability initiatives. The program has grown to over 50 organizations representing over 70 million square feet in a variety of sectors including schools, local and state government, grocery chains, libraries, commercial real estate, retail sales and housing authorities.

Small Business Lighting Rebate, Schedule E255

Description: The program offers a variety of lighting fixed-incentives that streamline the delivery of energy-saving measures for a variety of small usage commercial businesses and building types. Eligibility is limited to Schedule 24 and Schedule 8 electric customers. Rebates for small businesses cover efficient incandescent and fluorescent lighting conversions and lighting.

Recap: The Small Business Lighting Rebate program saw somewhat reduced contractor participation from program competition from neighboring utilities as well as other programs within PSE. Program adjustments are underway to increase participation in 2008.

LED Traffic Lights, Schedule E257

Description: The program educates public-sector customers with traffic control authority (cities, counties, and DOT's) on the benefits of installing red and green LED traffic signals. PSE provides an LED informational packet along with a rebate application by mail or in person. Customers must receive electric service from PSE to qualify for the rebates, and customers with unmetered accounts must document all connected load at the intersection.

Recap: LED Traffic Lights program realized savings from two projects mentioned in the semi-annual report; Oak Harbor and City of Bremerton. The program has reached close to its saturation point. 2007 overall program savings reached over 269 MWh.

Large Power User, Self Directed, Schedule E258

Description: This program solicits electric energy efficiency upgrades through a Request for Proposal (RFP) process. C/I customers receiving electric service under Schedule 40,46,49 or 449 receive a funding allocation based on electric usage and are responsible for proposing cost-effective project to utilize their allocation. Proposals are evaluated by PSE engineering staff for technical soundness, cost-effectiveness and compliance with energy code and tariff requirements. Customers sign a standard PSE Conservation Grant Agreement, defining project cost and PSE incentive amount prior to installation of project measures. All projects are field verified by PSE before grant payments are made. Customer not designating projects to fully utilize their allocation within 30 months of the program start date forfeit their remaining balance to a competitive phase, in which remaining funds are available to all program participants via competitive bid.

Recap: Large Power User savings are on track as expected for midway through four-year program cycle. Activity increasing and pipeline for in-progress projects is substantial for completion in upcoming year.

Commercial Rebates, Schedules E262/G262

Description: PSE offers fixed rebates for select, commonly applied measures to commercial customers. Rebate measures are those with energy-savings that can reasonably be standardized over a wide variety of applications, and that have competitive market pricing to ensure cost-effectiveness. The current list (effective January 2004) of eligible Commercial Rebates is maintained by the Company and made available upon request. Rebate amounts are updated as market conditions change.

Recap: Commercial Rebates electric savings were largely driven by the two direct install programs (Vending Misers and Pre-rinse spray heads) and Variable speed drives. These three measures accounted for about 85% of the total electric savings. Similarly, the vast majority of the gas savings were achieved by the Pre-rinse spray head direct install program.

Commercial/Industrial Gas Boiler Tune-up Pilot, Schedule G259

Description: It has been the experience of PSE Energy Management Engineers, City of Seattle boiler inspectors and mechanical contractors that commercial customers seldom have the air to fuel ratios tuned on their boilers for efficient operation. A boiler that has not been tuned for many years can use as much as 20% more gas fuel. This pilot program will consist of working with mechanical contractors to design a pilot that provides sufficient incentive to persuade customers to have their boilers tuned up for the first time, so that they can see the resulting energy savings on their bills.

All non-transportation PSE gas C/I customers with gas boilers that can be tuned are eligible. Since the last report, PSE has expanded eligibility to interruptible gas customers. Funding is limited to one time per boiler.

Recap: Participation in the Gas Boiler Tune-up program was very much increased in 2006/7. In order to increase confidence in savings achieved the program now has more strict guidelines for boilers to meet in order to participate.

Other Programs

Net Metering, Schedule E150

Schedule 150, Net Metering for Renewable Energy Services, became effective February 11, 1999. Subsequently, Schedule 150 was revised on June 8, 2000 in response to legislative action[1], which modified certain aspects of the net metering program. As revised, the schedule applies to customers who operate fuel cells or hydroelectric, solar or wind generators of no more that 100 kW.[2] Service under this schedule is limited to a total of 4.5 MW of cumulative nameplate generating capacity, of which no less than 2.25 MW of cumulative nameplate generating capacity shall be attributable to net metering systems that use either solar, wind, or hydroelectric power as its fuel. Customer generation can be used to offset part or all of the customer-generator's electricity use under Schedules 7, 24, 25 or 29 of Electric Tariff G.

Recap: The Net Metering program added 113 New Net Metering customers in 2007 bringing the total customer count to 227. Together they represent 784 kW of generating capacity. 96% were Solar PV. The remaining 4% were made up of hybrids (joint solar and wind), micro-hydro, and wind. Of the new Net Metering customers, almost all are electing to participate in the State's Renewable Energy Production Incentive Program. The total number of customers participating in State incentive program is 186. At the beginning of Q4, with the passage of Schedule 248, customers started receiving rebates for the cost of Production Meters, so there is no additional cost from PSE for the customer when interconnecting a renewable energy system. Sector growth promotion will continue in 2008.

Northwest Energy Efficiency Alliance, Schedule E254

Description: Northwest Energy Efficiency Alliance's (NEEA) market transformation initiatives will increase the availability and consumer acceptance of energy-efficient technologies and practices. As a partner with NEEA, PSE contributes funding for regional programs, actively participates on the NEEA Board of Directors, and supports various related initiatives within the PSE service area.

Detailed information on NEEA history, structure, funding, projects, reports, press- releases, proposals and more is available at NEEA's web site at www.nwalliance.org.

[1] On March 27, 2000, Engrossed House Bill 2334 relating to the definition of net metering systems and amending RCW 80.60.010, 80.60.020 and 80.60.040 was signed into law. The revised law became effective June 8, 2000.

[2] Revisions to Schedule 150, including increasing the maximum generator capacity to 100kW became effective June 12, 2006.

Energy Efficient Technology Evaluation, Schedules E261/G261

PSE reviews available literature to find information on new, energy efficient technologies and products. PSE draws on the experience and research of others; e.g. E-Source, NEEA, WSU and other utilities. "New" measures must be significantly different from measures already qualifying for grants on the PSE program.

The focus of the research is on practical, cost effective technologies and measures that can be immediately implemented. Technologies must be based on generally accepted engineering or scientific principles. Savings must be quantifiable, using generally accepted engineering calculations.

Recap: Gas-fired On-Demand Tankless Water Heater Data Collection Project - Evaluation will continue into 2008, due to limited sample size to-date. Incentives will be offered to more customers, and Oregon Energy Trust's evaluation results will be evaluated.

Conservation Voltage Reduction (CVR) – Results of Phase I data collection show positive savings and no customer issues related to lower operating voltage. Phase II work will focus on market transfer of this technology to the State Utility Commissions, electric utility engineers and decision makers, Public utility policy makers, engineering consultants, and BPA.

Other - Currently evaluating two technologies with somewhat controversial energy savings potential: water treatment, and pressure independent valves.

E-Source - Some of the budget for this program is used to support a portion of the company's E-Source membership, which is an important resource for technology evaluation.

Local Infrastructure & Market, Schedules E270/G270

PSE participates with or utilizes the services of many organizations to support the local delivery, management, and promotion of a broad range of energy efficiency programs. Measures to be delivered are developed on a project by project basis, primarily dealing with education about energy efficiency and information about Puget Sound Energy's energy efficiency services. Measures can include participation in conferences and energy efficiency trade shows aimed at reaching a broad array of customers and trade allies. The company may provide support or fees to energy efficiency industry, trade ally and customer associations with interest in education and promotion of energy efficiency benefits.

Program Evaluation and Research

PSE is committed to the verification of claimed energy savings and the continual improvement of energy efficiency service delivery to customers.

Recap: A C&I Lighting Savings Verification Study, a Resource Conservation Manager Program Evaluation, a Residential Gas Weatherization Savings Estimation study, and the Puget Sound Region CFL Saturation Study have been completed. A summary of work done is available upon request.

Appendix A: January – December 2007 Results by Rate Schedule

Elec Sch #	Gas Sch #	Service	kWh Savings	Therm Savings	Electric Costs	Gas Costs	Total Costs
200	206	Res. Energy Effic. Information	N/A	N/A	$ 794,870	$ 399,652	$ 1,194,522
260	260	Com'l Energy Effic. Information	N/A	N/A	$ 60,205	$ 56,587	$ 116,792
201	203	Low-Income Retrofit	1,293,529	30,249	$ 1,822,706	$ 409,565	$ 2,232,271
202	207	Energy Education	1,107,255	63,374	$ 292,816	$ 175,436	$ 468,252
214	214	Res. Energy Eff. Rebates Tariff	86,429,980	958,163	$ 8,067,845	$ 1,827,176	$ 9,895,021
		BPA Funded Energy Eff. Rebates	7,204,844	N/A	$ 1,130,678	-	$ 1,130,678
203	na	Manufactured Housing Energy Eff.	2,056,707	N/A	$ 1,038,281	-	$ 1,038,281
217	217	Multi-Family Retrofit	6,772,646	21,853	$ 2,134,162	$ 157,449	$ 2,291,611
249	na	Res. Heat Pump Maintenance Pilot	2,606	N/A	$ 10,274	-	$ 10,274
250	205	C/I Retrofit	59,651,443	389,106	$ 10,728,806	$ 1,930,706	$ 12,659,512
251	251	C/I New Construction	3,871,480	28,425	$ 915,282	$ 182,991	$ 1,098,273
253	208	Resource Conservation Manager	11,449,667	215,231	$ 532,965	$ 272,863	$ 805,828
255	na	Small Business Lighting Rebate	7,970,978	N/A	$ 1,848,264	-	$ 1,848,264
257	na	LED Traffic Lights	311,317	N/A	$ 13,603	-	$ 13,603
258	na	Large Power User/Self Directed	3,954,570	N/A	$ 1,320,261	-	$ 1,320,261
262	262	Commercial Rebates	12,613,397	467,184	$ 1,236,931	$ 143,588	$ 1,380,519
na	259	Gas Boiler Tune-up Pilot	N/A	104,729	-	$ 153,298	$ 153,298
249	na	Multi-Family Fuel Choice Pilot	753,765	N/A	$ 212,766	-	$ 212,766
215	215	Residential New Construction	2,198,499	96,284	$ 1,186,861	$ 540,240	$ 1,727,101
		BPA Energy Star Dishwashers	118,176	N/A	$ 46,600	$ -	$ 46,600
		BPA Low Income weatherization	48,921	N/A	$ 197,149	$ -	$ 197,149
na	249	Gas Single Family Weatheriz. Pilot	N/A	282,600	-	$ 1,239,359	$ 1,239,359
261	261	Energy Efficient Technology Eval.	N/A	7,350	$ 82,334	$ 37,424	$ 119,758
	na	Demand Response Pilot Programs	N/A		$ 102,059	$ -	$ 102,059
	na	C/I Load Control Pilot	N/A		$ 129,652	$ -	$ 129,652
270	270	Local Infrastructure&Mkt Trans	N/A	N/A	$ 50,429	$ 4,807	$ 55,236
na	na	Program Evaluation & Research	N/A	N/A	$ 542,056	$ 138,037	$ 680,093
na	na	Conservation Market Research	N/A	N/A	$ 372,364	$ 338,118	$ 710,482
150	na	Net Metering	N/A	N/A	$ 105,105	-	$ 105,105
254	na	NW Energy Efficiency Alliance	14,500,000	N/A	$ 1,288,935	-	$ 1,288,935
na	na	Electric Conservation Support	N/A	N/A	$ 62,078	-	$ 62,078
na	na	Electric Efficiency RFP	N/A	N/A	$ 8,681	-	$ 8,681
		Renewable Generation Incentives	N/A	N/A	$ 48,412	-	$ 48,412
na	209	Low Income Customers	N/A	N/A	-	$ 295,800	$ 295,800
		Total	**222,309,780**	**2,664,548**	**$ 36,383,430**	**$ 8,303,096**	**$ 44,686,526**

25.4 aMW

Appendix B: 2007 Electric Incentive

ELECTRIC EE INCENTIVE WORKSHEET for 2007 -- FINAL

2/4/2008

Incentive starts at 100% of Baseline Target, capped at 150% of Baseline
Deadband is 90% - 99.9% of Baseline Target, no incentive or penalty

Penalty is less than 90% of Baseline Target, no cap on maximum

Shared Savings Calculation			
Avoided Cost	$	0.059	*Same as "current Avoided Cost value" in Sch 121 Based on 2007 actual costs & svgs. as well as est. measure life, est. cust. Costs.*
TRC Conservation	$	**0.039**	
Net Shared Incentive	$	0.020	*This shows $/kWh. Multiply by 1000 to convert to $/MWh*

Incentive Range	**$/MWH Incentive**	**Shared Savings Incentive**	MWh by Band	Per MWh Incentive	Shared Savings Incentive	**Total Incentive**
140.0 - <150.0%	**$ 20**	**100%**	-	$ -	$ -	**$ -**
130.0 - <140.0%	**$ 20**	**80%**	14,070	$ 281,398	$ 225,119	**$ 506,517**
120.0 - <130.0%	**$ 20**	**40%**	16,031	$ 320,616	$ 128,246	**$ 448,862**
110.0 - <120.0%	**$ 20**	**20%**	16,031	$ 320,616	$ 64,123	**$ 384,739**
100.0 - <110.0%	**$ 20**	**10%**	15,870	$ 317,410	$ 31,741	**$ 349,151**
100% Baseline Target	**$ 10**	**5%**	160,308	$ 1,603,080	$ 160,308	**$ 1,763,388**
			222,310	$ 2,843,120	$ 609,537	**$ 3,452,657**
90.0% Deadband	**$ -**					

Penalty Range	**$/MWH Penalty**	MWh by Band	MWh Shortfall	**Total Penalty**
80.0 - <90.0%	**$ 75**	-	0	$ -
70.0 - <80.0%	**$ 80**	-	0	$ -
60.0 - <70.0%	**$ 85**	-	0	$ -
50.0 - <60.0%	**$ 90**	-	0	$ -
<50.0%	**$ 95**	-	0	$ -

	MWH	aMW	
Achieved Savings	**222,310**	25.4	*2007 actual reported savings of 222,309,780 kWh rounded to nearest MWh*
% of baseline	139%		
Baseline Target	160,308	18.3	*Per Sch. 121*
Penalty Level	144,277	16.5	*Bottom of Deadband. Penalty starts below this value.*

Electric Cost Effectiveness

2007 Electric Energy Efficiency Services Cost Effectiveness

Sch.	Electric Programs	Meas. Life	End-use Category	kWh Savings	Utility Expenditures	Customer Cost	Other Contributions	Quantified Non-Energy Benefits	Levelized UC per kWh	Levelized TRC per kWh	Cost Eff. Standard per kWh	UC B/C Ratio	TRC B/C Ratio
	Residential Programs:												
E200	Residential Energy Efficiency Information	na	na	-	$ 794,870	$ -	$ -	$ -	$ -	$ -	$ -	na	na
E201	Residential Low-Income Retrofit	30	SHR	1,293,529	$ 1,822,706	$ -	$ -	$ -	$ 0.114	$ 0.114	$ 0.086	0.76	0.76
E202	Powerful Choices for the Environment	10	LIGHTING	1,107,255	$ 292,816	$ -	$ 57,654	$ -	$ 0.038	$ 0.045	$ 0.059	1.57	1.31
E203	Manufactured Housing Energy Efficiency	20	SHR	2,056,707	$ 1,038,281	$ -	$ -	$ -	$ 0.048	$ 0.048	$ 0.079	1.66	1.66
E217	Multi-Family Retrofit	19	SHR	6,772,646	$ 2,134,162	$ 2,674,785	$ -	$ -	$ 0.031	$ 0.071	$ 0.077	2.47	1.10
E214	Residential Energy Efficient Rebates	9	LIGHTING	93,634,824	$ 9,198,523	$ 4,255,339	$ -	$ -	$ 0.015	$ 0.022	$ 0.058	3.86	2.64
E249	Residential Heat Pump Maintenance Pilot	10	SHR	2,606	$ 10,274	$ 11,000	$ -	$ -	$ 0.562	$ 1.163	$ 0.072	0.13	0.06
E249	Multi-Family Fuel Choice Pilot	30	SHR	753,765	$ 212,766	$ 146,896	$ -	$ -	$ 0.023	$ 0.038	$ 0.086	3.78	2.23
E215	Residential New Construction	13	LIGHTING	2,198,499	$ 1,174,767	$ 2,007,472	$ -	$ -	$ 0.067	$ 0.182	$ 0.060	0.89	0.33
C&RD	*Energy Star Dishwashers*	*9*	*APP*	*118,176*	*$ 58,694*	*$ 156,082*	*$ -*	*$ -*	*$ 0.076*	*$ 0.279*	*$ 0.057*	*0.74*	*0.20*
C&RD	*Low Income Weatherization, C&RD*	*30*	*SHR*	*48,921*	*$ 197,149*	*$ -*	*$ -*	*$ -*	*$ 0.325*	*$ 0.325*	*$ 0.086*	*0.26*	*0.26*
	Subtotal Residential Programs	**11**	**WTD**	**107,986,928**	**$ 16,935,008**	**$ 9,251,574**	**$ 57,654**	**$ -**	**$ 0.021**	**$ 0.032**	**$ 0.060**	**2.89**	**1.86**
	BEM - Commercial Programs:												
E250	C/I Retrofit	12	CINONHVAC	59,651,443	$ 10,728,806	$ 12,725,715	$ -	$ -	$ 0.023	$ 0.050	$ 0.056	2.49	1.14
E251	C/I New Construction	15	CINONHVAC	3,871,480	$ 915,282	$ 644,037	$ -	$ -	$ 0.026	$ 0.044	$ 0.058	2.24	1.32
E253	Resource Conservation Manager	3	CIHVACR	11,449,667	$ 532,965	$ 441,636	$ -	$ -	$ 0.018	$ 0.032	$ 0.058	3.26	1.79
E255	Small Business Lighting Rebate	12	CINONHVAC	7,970,978	$ 1,848,264	$ 1,319,021	$ -	$ -	$ 0.029	$ 0.050	$ 0.056	1.93	1.13
E257	LED Traffic Signals	7	CINONHVAC	311,317	$ 13,603	$ 50,641	$ -	$ -	$ 0.008	$ 0.038	$ 0.053	6.52	1.36
E258	Large Power User - Self Directed	12	CINONHVAC	3,954,570	$ 1,320,261	$ 220,047	$ -	$ -	$ 0.042	$ 0.049	$ 0.056	1.34	1.15
E260	Commercial Energy Efficiency Information	na	na	na	$ 60,205	$ -	$ -	$ -	$ -	$ -	$ -	na	na
E262	Commercial Rebates	10	CINONHVAC	12,613,397	$ 1,236,931	$ 2,561,889	$ -	$ -	$ 0.014	$ 0.043	$ 0.055	3.97	1.29
	Subtotal Commercial Programs	**10**	**WTD**	**99,822,852**	**$ 16,656,317**	**$ 17,962,986**	**$ -**	**$ -**	**$ 0.024**	**$ 0.049**	**$ 0.056**	**2.38**	**1.14**
	Other Programs:												
E254	NW Energy Efficiency Alliance	9	LIGHTING	14,500,000	$ 1,288,935	$ 1,288,935	$ -	$ -	$ 0.014	$ 0.027	$ 0.058	4.27	2.13
E261	Energy Efficient Technology Evaluation			-	$ 82,334	$ -	$ -	$ -	$ -	$ -	$ -	na	na
E270	Local Infrastructure, Mkt Transformation			-	$ 50,429	$ -	$ -	$ -	$ -	$ -	$ -	na	na
	Program Evaluation and Research- Elec			-	$ 542,056	$ -	$ -	$ -	$ -	$ -	$ -	na	na
	Conservation Market Research- Electric			-	$ 372,364	$ -	$ -	$ -	$ -	$ -	$ -	na	na
	Program Support			-	$ 62,078	$ -	$ -	$ -	$ -	$ -	$ -	na	na
	Electric Efficiency RFP			-	$ 8,681	$ -	$ -	$ -	$ -	$ -	$ -	na	na
	Subtotal Other Programs	**9**	**LIGHTING**	**14,500,000**	**$ 2,406,877**	**$ 1,288,935**	**$ -**	**$ -**	**$ 0.025**	**$ 0.039**	**$ 0.058**	**2.28**	**1.49**
	All EES Programs												
	Wtd Overall Electric Energy Efficiency Programs	**11**	**WTD**	**222,309,780**	**$ 35,998,202**	**$ 28,503,495**	**$ 57,654**	**$ -**	**$ 0.022**	**$ 0.039**	**$ 0.059**	**2.71**	**1.51**
				25.4 aMW									

10.6 year weighted average measure life rounds to 11 years for look-up in LFCR and Elec CE Std tables

222,310 MWh

$39/MWH TRC for portfolio of programs

$59/MWh Avoided Cost

2.7 Utility Cost B/C Ratio

1.5 Total Resourc Cost B/C Ratio