



**El Paso Electric**

**ANNUAL REPORT FOR ENERGY EFFICIENCY PROGRAMS  
CALENDAR YEAR 2015**

**NMPRC EFFICIENT USE OF ENERGY RULE 17.7.2 NMAC**

**JULY 1, 2016**

# Table of Contents

SECTION I. EXECUTIVE SUMMARY .....	3
<b>INTRODUCTION</b> .....	3
<b>SUMMARY OF RESULTS</b> .....	3
<b>2015 CUMULATIVE PROGRAM GOALS</b> .....	5
SECTION II. PROGRAM DESCRIPTIONS.....	6
<b>EDUCATIONAL PROGRAM</b> .....	6
<b>LivingWise® Program</b> .....	6
<b>RESIDENTIAL PROGRAMS</b> .....	6
<b>Residential Home Efficiency Program</b> .....	6
<b>Residential High Efficiency Cooling Program</b> .....	6
<b>Residential CFL &amp; LED Program</b> .....	7
<b>Appliance Recycling Program</b> .....	7
<b>ENERGY STAR® New Homes Program</b> .....	7
<b>LOW INCOME PROGRAM</b> .....	8
<b>New Mexico EnergySaver Program</b> .....	8
<b>COMMERCIAL PROGRAMS</b> .....	8
<b>Small Commercial Comprehensive Program</b> .....	8
<b>SCORE Plus Program</b> .....	8
<b>AWARENESS BUILDING CAMPAIGN</b> .....	9
<b>Awareness Building &amp; Trade Ally Campaign</b> .....	9
SECTION III. ENERGY EFFICIENCY RULE REPORTING REQUIREMENTS .....	10
<b>DOCUMENTATION OF PROGRAM EXPENDITURES</b> .....	10
<b>ESTIMATED AND ACTUAL CUSTOMER PARTICIPATION AND SAVINGS LEVELS</b> .....	11
<b>ESTIMATED AND ACTUAL COSTS (EXPENSES) AND AVOIDED COSTS (BENEFITS)</b> .....	12
<b>COST EFFECTIVENESS EVALUATION</b> .....	12
<b>SELF-DIRECTED PROGRAMS</b> .....	13
<b>INDEPENDENT MEASUREMENT AND VERIFICATION REPORT</b> .....	13
<b>PROGRAM EXPENDITURES NOT COVERED IN THE INDEPENDENT M&amp;V REPORT</b> .....	13
<b>ANNUAL ECONOMIC BENEFITS BY PROGRAM</b> .....	13
<b>NON-ENERGY BENEFITS</b> .....	14
<b>TARIFF RECONCILIATION</b> .....	14
<b>ATTACHMENT A: ADM's Evaluation of El Paso Electric Company 2015 DSM Portfolio</b> .....	16

## Section I. Executive Summary

### **Introduction**

El Paso Electric Company (“EPE”) submits its annual report on the performance of EPE’s Energy Efficiency Programs for calendar year 2015 (“2015 Programs”). This 2015 Annual Report for Energy Efficiency Programs (“Annual Report”) provides expenditures and savings resulting from EPE’s energy efficiency programs from January through December 2015. This report relies on the statewide independent evaluator’s report, *Evaluation of El Paso Electric Company 2015 DSM Portfolio* (“M&V Report”) prepared by ADM Associates, Inc. (“ADM”) which is included as Attachment A. The programs evaluated in this Annual Report were approved by the New Mexico Public Regulation Commission (“NMPRC” or “Commission”) in NMPRC Case No. 13-00176-UT on December 18, 2013.

### **Summary of Results**

This is the eighth annual report on EPE’s energy efficiency programs. Results are based upon independent measurement and verification (“M&V”) by ADM. The following 2015 Programs are included in this Annual Report:

- LivingWise<sup>®</sup> Program
- Home Efficiency Program
- High Efficiency Cooling Program
- CFL & LED Program
- Appliance Recycling Program
- ENERGY STAR<sup>®</sup> New Homes Program
- New Mexico EnergySaver Program
- Small Commercial Comprehensive Program
- School and Business Assistance (“SCORE Plus”) Program

The following is a short summary of the overall results:

- The 2015 Programs were cost effective as measured by the Utility Cost Test (“UCT”). The UCT for the portfolio of programs was 2.46.
- The total annual net energy savings was 15,729,342 kWh at the customer meter.
- The total 2015 Program expenditures were \$4,706,247.

Table 1 shows the total number of participants or units, the verified annual demand and energy savings, the lifetime energy savings, and the total expenses for the 2015 Programs.

Program	Participants or Units	Annual Savings (kW)	Annual Savings (kWh)	Lifetime Savings (kWh)	Total Program Expenses
<b>Educational</b>					
LivingWise Program	2,832	22.0	638,549	7,662,588	\$ 142,035.39
<b>Residential</b>					
Home Efficiency Program	86	21.3	50,119	894,007	\$ 9,539.61
High Efficiency Cooling Program	1,280	1,599.6	2,567,801	38,517,023	\$ 941,927.49
CFL & LED Program*	35,363	382.1	3,071,698	26,128,586	\$ 410,520.90
Appliance Recycling Program	419	56.4	345,268	1,726,339	\$ 53,273.57
ENERGY STAR New Homes Program	226	78.1	239,227	5,502,221	\$ 234,801.54
<b>Low Income</b>					
New Mexico EnergySaver Program	2,244	279.6	1,395,895	21,181,324	\$ 677,804.19
<b>Commercial</b>					
Small Commercial Comprehensive Program	113	131.5	1,334,855	17,356,334	\$ 442,402.58
SCORE Plus Program	91	1,109.9	6,085,930	89,903,040	\$ 1,619,382.08
<b>Marketing for All Programs</b>					\$ 109,988.10
<b>Awareness Building Campaign</b>					\$ 64,571.55
<b>TOTAL</b>	<b>42,654</b>	<b>3,680.5</b>	<b>15,729,342</b>	<b>208,871,462</b>	<b>\$ 4,706,247.00</b>

\*CFL & LED Program assumes 5 bulbs per participant

Table 2 presents the net present value (“NPV”) of the 2015 Programs’ benefit-cost analysis and the program and portfolio UCT ratios.

Program	NPV of Benefits	NPV of Costs	UCT
<b>Educational</b>			
LivingWise Program	\$ 201,867	\$ 142,035	1.42
<b>Residential</b>			
Home Efficiency Program	\$ 48,897	\$ 9,540	5.13
High Efficiency Cooling Program	\$ 4,222,947	\$ 941,927	4.48
CFL & LED Program	\$ 1,078,426	\$ 410,521	2.63
Appliance Recycling Program	\$ 88,245	\$ 53,274	1.66
ENERGY STAR New Homes Program	\$ 297,888	\$ 234,802	1.27
<b>Low Income</b>			
New Mexico EnergySaver Program	\$ 986,158	\$ 677,804	1.45
<b>Commercial</b>			
Small Commercial Comprehensive Program	\$ 624,271	\$ 442,403	1.41
SCORE Plus Program	\$ 4,008,959	\$ 1,619,382	2.48
<b>Marketing for All Programs</b>			\$ -
<b>Awareness Building Campaign</b>			\$ -
<b>TOTAL</b>	<b>\$11,557,658</b>	<b>\$4,706,248</b>	<b>2.46</b>

## **2015 Cumulative Program Goals**

Table 3 provides the annual and cumulative energy savings achieved from 2008 through 2015. The Efficient Use of Energy Act requires that EPE achieve cumulative savings of 65,815,596 kWh by 2014, which is equal to five percent (5%) of EPE's retail sales in 2005, and 105,304,953 kWh by 2020, equal to eight percent (8%) of 2005 retail sales. EPE achieved 110% of its 2014 goal by the end of 2014. In 2015, EPE achieved an additional 15,729,342 kWh of energy savings bringing the cumulative total to 88,214,558 kWh. This accounts for 83.8% of the 2020 statutory goal.

<b>Year</b>	<b>Annual kWh Savings</b>	<b>Cumulative kWh Savings</b>
2008	855,912	855,912
2009	4,667,928	5,523,840
2010	5,169,908	10,693,748
2011	14,728,590	25,422,338
2012	13,537,655	38,959,993
2013	12,832,995	51,792,988
2014	20,692,228	72,485,216
2015	15,729,342	88,214,558

## Section II. Program Descriptions

### ***Educational Program***

#### LivingWise<sup>®</sup> Program

The LivingWise<sup>®</sup> Program is an educational program that targets fifth grade students. Students receive a kit of energy and water efficient devices for installation at home. Participating teachers are provided with educational material that is presented in the classroom prior to the distribution of the kits. The program teaches students about energy efficiency, renewable and non-renewable natural resources, and how energy is created and delivered throughout the community. EPE promoted this program through contact with local schools and teachers who had participated in the past, as well as media coverage from local television stations during events. EPE contracted with Resource Action Programs to implement and manage this program. As a program enhancement, EPE and Resource Action Programs participated in a successful media event during the school year. At this event, fifth grade teacher Lydia Anaya from Santa Teresa Elementary School was recognized for her devotion to her students' education. Both newspaper and television media were present at the event. EPE distributed 2,832 kits during the 2015 fall semester and achieved a savings of 638,549 kWh.

### ***Residential Programs***

#### Residential Home Efficiency Program

The Residential Home Efficiency Program offers residential customers rebates on the following measures:

- Ceiling and Floor Insulation
- Duct Sealing
- Air Infiltration
- Solar Screens

EPE promoted this program through various outreach methods including radio and newspaper ads, bill inserts, and targeted outreach to contractors who install the various measures. EPE further expanded its reach by targeting interactive mediums with high viewership including email blasts, Google search words, and targeted newspaper advertising in Las Cruces and Hatch. Frontier Associates administered the rebate process. EPE had 86 participants and saved a total of 50,119 kWh.

#### Residential High Efficiency Cooling Program

The Residential High Efficiency Cooling Program offers residential customers rebates on the purchase and installation of energy efficient evaporative coolers and refrigerated air conditioning ("A/C") units. Rebates of \$300 or \$700, depending upon the efficiency of the unit, are provided to customers that install energy efficient evaporative coolers as an alternative to refrigerated A/C units. Residential customers that purchase energy efficient refrigerated A/C systems can also receive rebates of \$250 to \$700, depending upon the efficiency of the unit. EPE promoted this program through various outreach methods including point-of-purchase ("POP") materials at stores, radio and newspaper ads, and

social media. EPE expanded its marketing utilizing publications that target NM customers with the highest circulation in the region. Frontier Associates administered the rebate process. In 2015, a total of 1,277 rebates were distributed with an annual savings of 2,567,801 kWh.

### Residential CFL & LED Program

The Residential CFL & LED Program offers residential customers CFLs and LEDs at a reduced price through a buy-down process at participating retail locations. EPE promoted this program through various outreach methods including POP materials at stores, radio and newspaper ads, bill inserts and social media. During 2015, there were a total of 35 participating retail locations where EPE offered this buy-down program. There were 31 markdown stores and four coupon stores. Energy Federation Incorporated and CLEARresult provided the outreach and administration for this program. Program field representatives completed 672 store visits and provided training sessions to store associates and customers. They also organized 28 outreach events throughout the year at retail stores and community outreach events. Through this program, there were 176,817 lamps sold at the reduced prices and a total of 3,071,698 kWh was saved. In 2015, LEDs comprised 18.4% of the total sales or 32,513 lamps.

### Appliance Recycling Program

The Appliance Recycling Program offered customers a \$30 rebate per recycled appliance to allow EPE to remove and recycle older refrigerators and freezers from the grid. EPE promoted this program through various outreach methods including radio and newspaper ads, bill inserts, and promotional material in all of the retail outlets that sell new refrigerators and freezers. Program field representatives met with retail sales personnel to train them on this program, as well as provide them with promotional material as needed. EPE contracted with a third party, JACO Environmental, to implement and manage this program; however, JACO was placed into receivership in November 2015. EPE worked to ensure that all of our participants received their rebate checks. The NMPRC terminated the Appliance Recycling Program in April 2016. In 2015, a total of 419 appliances were recycled with an annual savings of 345,268 kWh.

### ENERGY STAR® New Homes Program

The ENERGY STAR® New Homes Program offers incentives to builders for construction of new homes that exceed the current building code standards. EPE contracts with a third party, ICF International, to implement and manage this program. Based on ADM's recommendations, EPE has two incentive paths for this program: the Performance Path and the Prescriptive Path. Under the Performance Path, homebuilders can receive incentives for constructing new, single-family homes that exceed current New Mexico code requirements. In order to participate in this path, the homes must be a minimum of 5% above the code. Each home must also be rated by an independent Home Energy Rating System ("HERS") rater. This path provides tiered incentives of \$0.30/kWh up to \$1,500 maximum per home. Under the Prescriptive Path, builders can receive incentives to install above-code products in newly built homes. A minimum of two measures from air conditioning, CFL or LED lighting, radiant barrier, insulation or refrigerator replacement is required. Incentives are paid on a per measure basis, and incentive rates differ based upon the measure type. EPE promoted this program through informational training sessions for builders and real estate agents in the area. EPE also targeted its

marketing efforts through trade magazines and the Las Cruces Home Builders Association. EPE provided yard signs for homes that participated in the Performance Path advertising that they were more energy efficient than other homes in the area. In 2015, 226 homes participated in this program and a total annual savings of 239,227 kWh was achieved.

### ***Low Income Program***

#### **New Mexico EnergySaver Program**

The New Mexico EnergySaver Program offers income-qualified customers a variety of energy efficiency measures. Frontier Associates administers and tracks the results of this program and EnergyWorks implements the direct installs. For homes with refrigerated air, the measures included installed CFLs, insulation, air infiltration and duct sealing. For homes with evaporative cooling, CFLs were installed. EnergyWorks conducted extensive outreach to promote this program by directly contacting customers through door-to-door marketing and customer referrals through EPE's Energy Efficiency Hotline. EnergyWorks collaborated with a variety of community organizations including neighborhood associations, church groups, and low-income service providers to identify and qualify customers for energy efficiency services. This program had 2,244 participants and had an annual savings of 1,395,895 kWh.

### ***Commercial Programs***

#### **Small Commercial Comprehensive Program**

The Small Commercial Comprehensive Program provides incentives for energy efficient lighting, refrigerated A/C upgrades, and other energy efficiency measures for small commercial customers whose average annual demand is less than or equal to 100 kW. This program also includes all of the commercial rebates that are offered by EPE including Vending Misers, room A/C controls, and window treatments. EPE contracted with Frontier Associates to administer the rebate process and track the results of the program. Frontier provided field personnel to contact some of the small commercial customers to make them aware of the various energy efficiency incentives. 183 customers were contacted directly and 162 walk-through audits were performed at no cost to the customer. The field personnel identified possible energy efficiency retrofits at each of the facilities. EPE performed outreaches to 58 electrical contractors to promote this program and its benefits. 59 heating, ventilation and air conditioning ("HVAC") contractors were also contacted and EPE met with 38 of them to further promote this program. EPE also promoted the Small Commercial Comprehensive Program through direct customer contact, bill inserts and social media advertising. A two-day training seminar specific to HVAC maintenance and the High Performance HVAC Tune-Up measure was provided for the HVAC contractors who wanted to participate. The Small Commercial Comprehensive Program had 113 participants and saved a total of 1,334,855 kWh.

#### **SCORE Plus Program**

The SCORE Plus Program offers customer incentives, technical support, and outreach services to commercial customers with an average demand of greater than 100 kW, as well as schools, city and county customers. This program offers incentives for a range of



energy efficiency measures, including lighting, refrigerated A/C upgrades, lighting and HVAC controls, and custom projects. EPE contracts with CLEAResult to actively recruit eligible customers and provide them with assistance in identifying energy efficiency improvements that can be made to their facilities. CLEAResult also assists customers in the program application process. In addition, EPE contracted with Frontier Associates to promote this program through direct contact. As Frontier Associates' field personnel encountered customers that qualified for the SCORE Plus Program, they provided them with program and contact information. EPE promoted this program as well through direct customer and contractor contact, bill inserts, and targeted outreaches to engineering and architectural firms. As with the Small Commercial Comprehensive Program, a two-day training seminar specific to HVAC maintenance and the High Performance HVAC Tune-Up measure was provided for the HVAC contractors who wanted to participate. In 2015, a total of 99 participants saved 6,085,930 kWh through various energy efficiency measures.

### ***Awareness Building Campaign***

#### Awareness Building & Trade Ally Campaign

During 2015, EPE continued the Awareness Building & Trade Ally Campaign ("Awareness Building Campaign") to provide contractors and customers with program information including program availability and eligibility requirements. EPE provided contractors with training on various measures, including HVAC maintenance and lighting and insulation best practices during various program kick-off meetings and one-on-one trainings throughout the year. EPE personnel participated in various community events and provided presentations on EPE's energy efficiency programs and energy conservation. EPE also maintained a NM energy efficiency hotline number throughout the year. This hotline allowed customers to contact the Energy Efficiency Department directly and have their energy efficiency questions answered by knowledgeable program coordinators. Customer and contractor feedback on this hotline has been very positive. EPE contracted with Frontier Associates to provide field personnel who mainly focused on commercial customers and contractors, but also provided information on all of EPE's NM energy efficiency programs. They met with HVAC contractors and trained them on how to participate in both the commercial programs and the High Efficiency Cooling Program. They provided customers with an information sheet that showed all of EPE's NM energy efficiency programs and how to get in touch directly with EPE. They also instructed customers and contractors on how to access EPE's energy efficiency website which provides the necessary information and forms to participate in EPE's Programs. This Awareness Building Campaign was instrumental in providing the one-on-one contact necessary to educate contractors and customers about the EPE Programs.

## Section III. Energy Efficiency Rule Reporting Requirements

Section III of the Annual Report provides detailed information on the performance of EPE's 2015 Programs as required by the NMPRC Energy Efficiency Rule, Section 17.7.2.14. NMAC.

### Documentation of Program Expenditures

Table 4 shows the 2015 expenses by program and category. The Commission approved the 2015 Program budget in Case No. 13-00176-UT. All 2015 Program expenses were tracked through a specific account number and a unique work order number. Likewise, all revenue collected through the EUERF was booked to the same account using a separate work order number. The expenses and revenue were balanced against each other. To ensure there was no cross-subsidization or impact on EPE's rate of return, these energy efficiency expenses and revenues were kept separate from EPE rate-base accounting. EPE spent \$4,706,247 of the \$5,535,546 approved budget.

**Table 4: 2015 Program Expenditures**

Programs	2015 Budget	Customer Incentive	Administrative	Marketing	M&V	Total Expenses
<b>Educational</b>						
LivingWise Program	\$ 146,251.00	\$ 141,430.08	\$ 605.31	-	-	\$ 142,035.39
<b>Residential</b>						
Home Efficiency Program	\$ 155,000.00	\$ 9,013.36	\$ 526.25	-	-	\$ 9,539.61
High Efficiency Cooling Program	\$ 721,718.00	\$ 888,487.58	\$ 52,519.27	\$ 920.64	-	\$ 941,927.49
CFL & LED Program	\$ 498,435.00	\$ 261,761.90	\$ 143,261.50	-	\$ 5,497.50	\$ 410,520.90
Appliance Recycling Program	\$ 109,375.00	\$ 12,360.00	\$ 34,649.31	\$ 6,264.26	-	\$ 53,273.57
ENERGY STAR New Homes Program	\$ 287,500.00	\$ 102,664.14	\$ 125,577.40	-	\$ 6,560.00	\$ 234,801.54
<b>Low Income</b>						
New Mexico EnergySaver Program	\$ 559,226.00	\$ 600,300.08	\$ 77,504.11	-	-	\$ 677,804.19
<b>Commercial</b>						
Small Commercial Comprehensive Program	\$ 1,208,094.00	\$ 312,643.12	\$ 94,257.11	-	\$ 35,502.35	\$ 442,402.58
SCORE Plus Program	\$ 1,678,610.00	\$ 921,638.73	\$ 671,199.60	-	\$ 26,543.75	\$ 1,619,382.08
Marketing for All Programs	\$ 110,337.00	-	\$ 52,149.07	\$ 57,839.03	-	\$ 109,988.10
Awareness Building Campaign	\$ 61,000.00	-	\$ 59,102.28	\$ 5,469.27	-	\$ 64,571.55
<b>TOTAL</b>	<b>\$ 5,535,546.00</b>	<b>\$ 3,250,298.99</b>	<b>\$ 1,311,351.21</b>	<b>\$ 70,493.20</b>	<b>\$ 74,103.60</b>	<b>\$ 4,706,247.00</b>

Table 5 shows the breakdown of participant incentives by rate class, as required in the Final Order of Case No. 13-00176-UT.

**Table 5 - Participant Incentives by Rate Class**

Program	Residential NMRT01	Small Commercial NMRT03	General Service NMRT04	City and County NMRT07	Large Commercial NMRT09	Municipal Street Lighting NMRT11	State University NMRT26	Interruptible NMRT29	Total Participant Incentives
<b>Educational</b>									
LivingWise Program	\$ 141,430.08	\$ -	\$ -	\$ -	\$ -		\$ -	\$ -	\$ 141,430.08
<b>Residential</b>									
Home Efficiency Program	\$ 9,013.36	\$ -	\$ -	\$ -	\$ -		\$ -	\$ -	\$ 9,013.36
High Efficiency Cooling Program	\$ 888,487.58	\$ -	\$ -	\$ -	\$ -		\$ -	\$ -	\$ 888,487.58
CFL & LED Program	\$ 261,761.90	\$ -	\$ -	\$ -	\$ -		\$ -	\$ -	\$ 261,761.90
Appliance Recycling Program	\$ 12,360.00	\$ -	\$ -	\$ -	\$ -		\$ -	\$ -	\$ 12,360.00
ENERGY STAR New Homes Program	\$ 102,664.14	\$ -	\$ -	\$ -	\$ -		\$ -	\$ -	\$ 102,664.14
<b>Low Income</b>									
New Mexico EnergySaver Program	\$ 600,300.08	\$ -	\$ -	\$ -	\$ -		\$ -	\$ -	\$ 600,300.08
<b>Commercial</b>									
Small Commercial Comprehensive Program	\$ -	\$ 244,791.16	\$ 52,411.96		\$ -		\$ 15,440.00	\$ -	\$ 312,643.12
SCORE Plus Program	\$ -	\$ 96,672.76	\$ 331,680.58	\$ 71,490.10	\$ 18,384.19	\$ 26,221.97	\$ 227,877.55	\$ 149,311.58	\$ 921,638.73
<b>TOTAL</b>	<b>\$ 2,016,017.14</b>	<b>\$ 341,463.92</b>	<b>\$ 384,092.54</b>	<b>\$ 71,490.10</b>	<b>\$ 18,384.19</b>	<b>\$ 26,221.97</b>	<b>\$ 243,317.55</b>	<b>\$ 149,311.58</b>	<b>\$ 3,250,298.99</b>

Table 6 shows the budgeted amounts, the actual expenditures, and the variances for each program during 2015. The variances in individual program costs from the budgeted amounts were primarily due to customer participation being lower or higher than projected. The Home Efficiency, Appliance Recycling, and Small Commercial Comprehensive Programs had lower than expected participation. The High Efficiency Cooling Program had higher than anticipated participation.

<b>Program</b>	<b>2015 Budget</b>	<b>2015 Program Expenses</b>	<b>Variance %</b>
<b>Educational</b>			
LivingWise Program	\$ 146,251	\$ 142,035.39	-2.88%
<b>Residential</b>			
Home Efficiency Program	\$ 155,000	\$ 9,539.61	-93.85%
High Efficiency Cooling Program	\$ 721,718	\$ 941,927.49	30.51%
CFL & LED Program	\$ 498,435	\$ 410,520.90	-17.64%
Appliance Recycling Program	\$ 109,375	\$ 53,273.57	-51.29%
ENERGY STAR New Homes Program	\$ 287,500	\$ 234,801.54	-18.33%
<b>Low Income</b>			
New Mexico EnergySaver Program	\$ 559,226	\$ 677,804.19	21.20%
<b>Commercial</b>			
Small Commercial Comprehensive Program	\$ 1,208,094	\$ 442,402.58	-63.38%
SCORE Plus Program	\$ 1,678,610	\$ 1,619,382.08	-3.53%
<b>Marketing for All Programs</b>	\$ 110,337	\$ 109,988.10	-0.32%
<b>Awareness Building Campaign</b>	\$ 61,000	\$ 64,571.55	5.86%
<b>TOTAL</b>	<b>\$5,535,546</b>	<b>\$4,706,247.00</b>	<b>-14.98%</b>

### Estimated and Actual Customer Participation and Savings Levels

Table 7 presents the estimated and actual customer participation levels, annual energy savings and annual peak demand savings for each program.

<b>Program</b>	<b>Estimated Participants or Units</b>	<b>Actual Participants or Units</b>	<b>Estimated Savings (kWh)</b>	<b>Actual Savings (kWh)</b>	<b>Estimated Savings (kW)</b>	<b>Actual Savings (kW)</b>
<b>Educational</b>						
LivingWise Program	3,100	2,832	656,047	638,549	34	22.0
<b>Residential</b>						
Home Efficiency Program	249	86	247,585	50,119	153	21.3
High Efficiency Cooling Program	1,488	1,280	1,235,366	2,567,801	788	1,599.6
CFL & LED Program*	37,593	35,363	3,116,781	3,071,698	316	382.1
Appliance Recycling Program	805	419	817,730	345,268	132	56.4
ENERGY STAR New Homes Program	200	226	247,239	239,227	102	78.1
<b>Low Income</b>						
New Mexico EnergySaver Program	1,206	2,244	1,112,378	1,395,895	134	279.6
<b>Commercial</b>						
Small Commercial Comprehensive Program	620	113	4,034,146	1,334,855	844	131.5
SCORE Plus Program	72	91	9,230,681	6,085,930	2,167	1,109.9
<b>TOTAL</b>	<b>45,333</b>	<b>42,654</b>	<b>20,697,953</b>	<b>15,729,342</b>	<b>4,670</b>	<b>3,680.5</b>

\*CFL & LED Program assumes 5 bulbs per participant

## Estimated and Actual Costs (Expenses) and Avoided Costs (Benefits)

Table 8 presents the net present value of estimated and actual monetary expenses and benefits for each program. The estimated expenses and benefits were included in Case No. 13-00176-UT.

	<b>Estimated NPV of Monetary Expenses</b>	<b>Actual NPV of Monetary Expenses</b>	<b>Estimated NPV of Monetary Benefits</b>	<b>Actual NPV of Monetary Benefits</b>
<b>Educational</b>				
LivingWise Program	\$ 146,251	\$ 142,035	\$ 186,619	\$ 201,867
<b>Residential</b>				
Home Efficiency Program	\$ 155,000	\$ 9,540	\$ 611,971	\$ 48,897
High Efficiency Cooling Program	\$ 721,718	\$ 941,927	\$ 1,939,193	\$ 4,222,947
CFL & LED Program	\$ 498,435	\$ 410,521	\$ 861,580	\$ 1,078,426
Appliance Recycling Program	\$ 109,375	\$ 53,274	\$ 213,531	\$ 88,245
ENERGY STAR New Homes Program	\$ 287,500	\$ 234,802	\$ 420,474	\$ 297,888
<b>Low Income</b>				
New Mexico EnergySaver Program	\$ 559,226	\$ 677,804	\$ 640,374	\$ 986,158
<b>Commercial</b>				
Small Commercial Comprehensive Program	\$ 1,208,094	\$ 442,403	\$ 5,551,495	\$ 624,271
SCORE Plus Program	\$ 1,678,610	\$ 1,619,382	\$ 3,933,849	\$ 4,008,959
<b>Marketing for All Programs</b>	\$ 110,337	\$ 109,988	\$ -	\$ -
<b>Awareness Building Campaign</b>	\$ 61,000	\$ 64,572	\$ -	\$ -
<b>TOTAL</b>	<b>\$ 5,535,546</b>	<b>\$ 4,706,248</b>	<b>\$ 14,359,087</b>	<b>\$ 11,557,658</b>

## Cost Effectiveness Evaluation

Table 9 presents the UCT ratio for each program, as well as the total portfolio UCT. All of the 2015 programs met the UCT standard. See Table 2 for more details on the UCT calculations.

<b>Program</b>	<b>UCT</b>
<b>Educational</b>	
LivingWise Program	1.42
<b>Residential</b>	
Home Efficiency Program	5.13
High Efficiency Cooling Program	4.48
CFL & LED Program	2.63
Appliance Recycling Program	1.66
ENERGY STAR New Homes Program	1.27
<b>Low Income</b>	
New Mexico EnergySaver Program	1.45
<b>Commercial</b>	
Small Commercial Comprehensive Program	1.41
SCORE Plus Program	2.48
<b>TOTAL</b>	<b>2.46</b>

## Self-Directed Programs

El Paso Electric did not receive any applications for customer self-directed programs in 2015.

## Independent Measurement and Verification Report

EPE contracted with ADM to conduct the independent evaluation of its 2015 energy efficiency programs. The M&V Report is included as Attachment A of this report and includes:

- Documentation of expenses at both the individual and total portfolio program levels
- Measured and verified energy and demand savings
- Cost-effectiveness of all of EPE's 2015 Programs
- Deemed savings and other assumptions used by ADM
- Description of the M&V process used by ADM

## Program Expenditures Not Covered in the Independent M&V Report

All program-related expenditures are included in the M&V Report. EPE spent a total of \$4,706,247 for all of the 2015 Programs.

## Annual Economic Benefits by Program

Table 10 presents the annual and lifetime energy savings, estimated useful life, and annual economic benefits for the 2015 Programs.

<b>Program</b>	<b>Annual Energy Savings (kWh)</b>	<b>Lifetime Energy Savings (kWh)</b>	<b>Estimated Useful Life</b>	<b>Annual Benefits</b>
<b>Educational</b>				
LivingWise Program	638,549	7,662,588	12.00	\$ 16,822
<b>Residential</b>				
Home Efficiency Program	50,119	894,007	17.84	\$ 2,741
High Efficiency Cooling Program	2,567,801	38,517,023	15.00	\$ 281,530
CFL & LED Program	3,071,698	26,128,586	8.51	\$ 126,725
Appliance Recycling Program	345,268	1,726,339	5.00	\$ 17,649
ENERGY STAR New Homes Program	239,227	5,502,221	23.00	\$ 12,952
<b>Low Income</b>				
New Mexico EnergySaver Program	1,395,895	21,181,324	15.17	\$ 65,007
<b>Commercial</b>				
Small Commercial Comprehensive Program	1,334,855	17,356,334	13.00	\$ 48,021
SCORE Plus Program	6,085,930	89,903,040	14.77	\$ 271,426
<b>TOTAL</b>	<b>15,729,342</b>	<b>208,871,462</b>	<b>13.28</b>	<b>\$ 842,873</b>

## Non-Energy Benefits

Table 11 shows the estimated emissions savings and Table 12 shows the estimated water savings associated with the 2015 Programs. The annual and lifetime avoided emissions are determined by multiplying the emission rates times the annual and lifetime MWh saved. The water savings are determined by multiplying EPE's average portfolio water consumption per MWh times the annual and lifetime energy savings.

Emission Type	Avoided Electric Emission Rate (lbs/MWh)	Annual Avoided Emissions (tons)	Lifetime Avoided Emissions (tons)
SO <sub>2</sub>	0.0066	0.05	0.69
NO <sub>x</sub>	1.56	12.29	163.15
CO <sub>2</sub>	1,269.00	9,982.00	132,554.00
Particles	0.1035	0.81	10.80

Water Impact	EPE Portfolio Water Consumption (gal/MWh)	Annual Water Saved (gal)	Lifetime Water Saved (gal)
Water Saved	618	9,720,625	129,081,120

## Tariff Reconciliation

Table 13 presents the calculation for EPE's cumulative cost recovery balance based on the 2014 over-recovery balance, the 2015 Program expenditures, the approved 2015 utility incentive, and the cost recovery through EPE's Rate No. 17 - Efficient Use of Energy Recovery Factor ("EUERF") from January through December 2015. The costs recovered through the EUERF are not otherwise recovered through EPE's base rates.

Description	Program Expenses	7% Utility Incentive	EUERF Recovery	Cumulative Balance
2014 Over Recovery Balance				\$ (2,805,259)
2015 Energy Efficiency Activity	\$ 4,706,247	\$ 329,437.29	\$ 3,556,634	\$ (1,326,209)
<b>Ending Balance</b>				<b>\$ (1,326,209)</b>

EPE's cumulative over-recovery balance at the end of 2015 was \$1,326,209 for the expenses associated with the implementation of its energy efficiency programs and the overall recovery through the EUERF.

Table 14 presents the month-by-month reconciliation of EPE's cost recovery balance.

<b>Month</b>	<b>Program Expenses</b>	<b>7% Utility Incentive</b>	<b>EUERF Recovery</b>	<b>Under (Over) Recovery Balance</b>
Beg. Bal.				\$ (2,805,259)
Jan 2015	\$ -	-	\$ 246,248	\$ (3,051,507)
Feb 2015	\$ 80,321	\$ 5,622	\$ 228,533	\$ (3,194,097)
Mar 2015	\$ 335,337	\$ 23,474	\$ 202,136	\$ (3,037,421)
Apr 2015	\$ 427,714	\$ 29,940	\$ 209,299	\$ (2,789,066)
May 2015	\$ 565,078	\$ 39,555	\$ 226,707	\$ (2,411,140)
Jun 2015	\$ 442,898	\$ 31,003	\$ 303,983	\$ (2,241,222)
Jul 2015	\$ 484,749	\$ 33,932	\$ 405,764	\$ (2,128,306)
Aug 2015	\$ 322,379	\$ 22,567	\$ 383,799	\$ (2,167,158)
Sep 2015	\$ 515,434	\$ 36,080	\$ 366,070	\$ (1,981,715)
Oct 2015	\$ 394,138	\$ 27,590	\$ 419,251	\$ (1,979,238)
Nov 2015	\$ 268,496	\$ 18,795	\$ 275,669	\$ (1,967,616)
Dec 2015	\$ 869,704	\$ 60,879	\$ 289,176	\$ (1,326,209)
<b>Total</b>	\$ 4,706,247	\$ 329,437	\$ 3,556,634	