

MIDAMERICAN ENERGY COMPANY ENERGY EFFICIENCY PLAN

DOCKET NO. 12-0132

2013 ANNUAL RECONCILIATION REPORT¹

Executive Summary

MidAmerican Energy Company's (MidAmerican) 2013 Annual Reconciliation Report summarizes the 2013 Energy Efficiency program results. Beginning this year, additional detailed 2013 program results are being provided in the following exhibits:

- Exhibit A – Detailed program results by measure
- Exhibit B – Comparison of program level savings and expenses to budget
- Exhibit C – Benefit/Cost information by program
- Exhibit D – Annual summaries of energy savings and benefits by program
- Exhibit E – Net savings calculations for electric programs
- Exhibit F – Net savings calculations for gas programs

Background

On June 1, 2008, MidAmerican began offering energy efficiency programs (EE) in its Illinois service territory pursuant to Illinois Commerce Commission (Commission) Order on May 21, 2008, in Docket Nos. 08-0108 and 08-0109 (Consolidated). The Program Year for this Report is January 1, 2013 through December 31, 2013. The EE Programs covered for this Program Year are the EE Programs approved by the Commission in Docket No. 12-0132.

2013 Plan Summary

MidAmerican presents its 2013 annual report on energy efficiency programs and activities.

Overall preliminary electric savings achieved by MidAmerican's Illinois energy efficiency

¹ Beginning in 2010, MidAmerican combined its Annual Reconciliation Report and Annual Report since the two reports are similar and duplicate spending and results.

programs in 2013 were less than projected. Although overall preliminary gas savings achieved by MidAmerican's Illinois energy efficiency programs in 2013 were greater than projected, none of the individual residential programs reach their projected savings and several of the nonresidential programs continue to be challenged by the slow growth and lack of confidence in the economy. Participation in MidAmerican's EnergyAdvantage programs in 2013 has been significantly less than forecasted. During 2013, MidAmerican initiated a Trade Ally outreach pilot to help identify what enhancements to our trade ally outreach service would allow more trade allies to become trusted customer advisors, higher-quality service providers and active program participation advocates. As a result of this pilot, MidAmerican will begin implementing our enhanced trade ally outreach strategies in 2014. Some of the new strategies included in our plan are:

- Development of Trade Ally and Qualified Service Provider Networks to develop relationships with highly qualified, customer service-oriented trade allies in each program and region
- Development of Trade Ally Portal to provide those Trade Allies included in our new networks, one place to find all information, tools and resources related to our EnergyAdvantage program
- Development of "Find A Vendor" tool for customers which will help customers find a qualified trade ally to complete their project and the necessary paperwork to participate in MidAmerican's EnergyAdvantage programs
- Providing additional tools/resources and training events related to how EnergyAdvantage programs can be built into Trade Allies' business models while at the same time increasing program awareness and participation

- Co-branding of Marketing materials to allow trade allies to market their products and our programs at the same time with our mutual customers

Throughout 2014, MidAmerican will collaborate with our implementation contractor to ensure that we continually improve and make desired strategy corrections to strive to meet all customers and trade ally participation goals in the most cost-effective way possible. We believe these enhancements and our partnership with our trade allies will drive customer participation across all of our EnergyAdvantage programs in Illinois in 2014 and going forward.

The residential electric and gas programs savings were 50 percent and 97 percent of budget, respectively. The residential electric equipment program was the biggest driver of the electric results, with savings 32 percent above projections. These results were offset significantly by the other residential programs, which achieved only 12 to 46 percent of budgeted savings. Among the gas residential programs, the residential gas energy audit program was the biggest driver, with savings that were 40 percent under budget. As a result of the approved 2013 plan extension, the gas residential equipment program was discontinued. However, 48,150 kWh of savings were recorded for projects completed in 2012 but incentives not paid until 2013. Savings for the low income program were significantly under budgeted savings 63 percent.

The nonresidential electric and gas programs achieved 48 percent and 183 percent of budgeted savings, respectively. The total savings recognized from nonresidential electric and gas programs significantly decreased compared to 2012. The nonresidential electric energy audit, and commercial new construction programs exceeded budgeted savings by 93 percent, and 65%, respectively. The overall savings for nonresidential gas programs exceeded budgeted savings at 83 percent over projections. The nonresidential gas custom and commercial new construction programs achieved 456 percent, and 330 percent of budgeted savings, respectively. While the

nonresidential gas equipment, small commercial energy audit, and nonresidential energy analysis programs achieved 14 percent, 79 percent and two percent of budgeted savings, respectively.

Preliminary savings totals for 2013:²

- Annual kWh savings for 2013 were 5,876,038 kWh, which are 49 percent of overall planned 2013 savings.
- Annual peak demand kW savings for 2013 were 17,830 kW, which are 101 percent of overall planned 2013 savings.
- Annual gas therm savings for 2013 were 316,611 therms, which are 137 percent of overall planned 2013 savings.
- Annual gas peak therm savings for 2013 were 2,665 peak therms, which are 82 percent of overall planned 2013 savings.

Spending totals for 2013:

- Electric program spending for 2013 was \$2,254,953, which was 77 percent of overall planned 2013 spending.
- Gas program spending for 2013 was \$1,202,073, which was 102 percent of overall planned 2013 spending.
- Total actual electric and gas program spending for 2013 was \$3,457,026, which was 84 percent of total planned 2013 spending.

General Program Summaries

Residential Program Savings

² The energy savings reporting in this report are preliminary results. MidAmerican will conduct additional analysis to determine final energy savings. If there is a significant difference between the preliminary savings and the final savings, MidAmerican will update the savings.

Total preliminary electric and gas savings for residential programs in 2013 were 1,766,289 kWh and 119,129 therms respectively. These figures are 50 percent of total 2013 planned electric savings and 97 percent of total 2013 planned gas savings. Total spending for residential programs was \$1,350,696, which is 77 percent of the 2013 plan.

Nonresidential Program Savings

Total preliminary electric and gas savings for nonresidential programs in 2013 was 4,109,749 kWh and 197,482 therms respectively. These figures are 48 percent of total 2013 planned electric savings and 183 percent of total 2013 planned gas savings. Total spending for nonresidential programs was \$2,106,330, which is 90 percent of the 2013 plan.

Key Non-Program Related Activities

Key activities on non-program related initiatives for 2013 include the following:

- A trade ally meeting was held November 16, 2013. Local heating and cooling, lighting, motor and variable speed drive, insulation, home construction and other interested contractors serving MidAmerican's Illinois customers were in attendance to learn about MidAmerican's programs and had a chance to visit in person with the energy efficiency product managers.
- MidAmerican continues to be associated with the Midwest Energy Efficiency Alliance (MEEA) and the Consortium for Energy Efficiency (CEE) and to review with those organizations the International Energy Conservation Code 2012, ASHRAE 90.1-2009, the Energy Independence and Security Act (EISA 2007) and other appliance and equipment standards established by the Environmental Protection Agency's ENERGY STAR[®] program and the U.S. Department of Energy. This allows MidAmerican to keep current with changes to technology and codes/standards. Regular board and committee

meetings and conference calls are held by these organizations and state and federal governments regarding energy efficiency end uses including HVAC and water heating equipment, motors and variable speed drives, water and waste water treatment, residential and commercial lighting, data centers, customer-owned distribution transformers, commercial kitchen equipment and industrial process equipment and systems. These activities have aided MidAmerican in program planning and implementation.

Detailed Program Summaries

Residential Equipment

Total preliminary electric and gas savings for the Residential Equipment program in 2013 were 258,227 kWh and 48,150 therms respectively. These figures are 132 percent of total 2013 planned electric savings. The gas portion of the Residential Equipment program was discontinued in 2013. The therm savings reflect 2012 projects processed in 2013. Spending for the electric measures was \$202,702 which is 56 percent of planned spending. Total spending, including gas spending, for the Residential Equipment program was \$387,550, which is 108 percent of the 2013 plan.

Residential Equipment program highlights for 2013 include the following:

- During 2013 MidAmerican processed:
 - 579 air conditioner rebates, compared to 673 for 2012.
- MidAmerican promoted the program in the *At Your Service* newsletter in May and November.
- MidAmerican promoted the program in print advertising in the Illinois Quad City Times newspaper in April, June, July, September and October.
- MidAmerican promoted the program through radio advertisements in March, May,

September and November.

- MidAmerican promoted the program through social media including Facebook and Twitter in August and September.

Residential Audit

Total preliminary electric and gas savings for the Residential Audit program in 2013 were 1,462,116 kWh and 64,040 therms respectively. These figures are 46 percent of total 2013 planned electric savings and 60 percent of total 2013 planned gas savings. Actual electric results are affected by a change in CFL savings based on a change in assumed burn hours recommended by MidAmerican's impact evaluation consultant. Total spending for the Residential Audit program was \$654,209, which is 72 percent of the 2013 plan.

Residential Audit program highlights for 2013 include the following:

- MidAmerican completed 630 in-home audits during 2013, compared to 844 in 2012.
- 363 customers accessed the residential online energy audit during 2013, compared to 83 in 2012.
- MidAmerican processed 776 insulation rebates, compared to 702 in 2012.
- MidAmerican rebated 22,220 compact fluorescent lamps through the retail CFL campaign in 2013, compared to 25,578 in 2012.
- MidAmerican promoted the program in the *At Your Service* newsletter in May, August, and November.
- MidAmerican promoted the program with bill inserts in February, June, September, and November.
- MidAmerican promoted the program through radio advertising in March, April, September and October.

- MidAmerican promoted the program with gas pump signage from April through September.

Residential New Construction

The program was discontinued in 2013. Total preliminary electric and gas savings for the Residential New Construction program in 2013 were 21,261 kWh and 1,056 therms respectively. These figures represent projects completed in 2012 and processed in 2013. Total spending for the Residential New Construction program was \$18,160.

Residential Load Management

Total preliminary electric savings for the Residential Load Management program in 2013 were 2,893 kW of system peak demand and 12,238 kWh. These figures represent 97 percent of total 2013 planned peak demand kW savings and 32 percent of total planned kWh savings. Total spending for the SummerSaver[®] program was \$192,679, which is 51 percent of the 2013 plan.

Residential Load Management program highlights for 2013 include the following:

- 3,012 customers participating in the SummerSaver[®] program
- Participating customers received approximately \$92,272 in rebates in the form of bill credits on their October utility bills for participation in 2013.
- 238 new LCRs were installed, bringing the year-to-date net gain total to 312.
- MidAmerican utilized the program on two occasions during 2013 on the following dates: July 18th and August 27th.

Nonresidential Equipment

Total preliminary electric and gas savings for the Nonresidential Equipment program in 2013 were 711,600 kWh and 4,986 therms respectively. These figures are 26 percent of total 2013 planned electric savings and 24 percent of total 2013 planned gas savings. Total spending for the

Nonresidential Equipment program was \$152,565, which is 73 percent of the 2013 plan.

Nonresidential Equipment program highlights for 2013 include the following:

- 108 Light emitting diode (LED) lamps and fixtures were rebated in 2013.
- 2,416 T-8 and T-5 high-bay linear fluorescent lighting fixtures replacing HID lighting, occupancy sensors and low-bay T-8 / T-5 retrofits were installed in 2013, compared to 2,418 in 2012.
- 42 HVAC cooling measures including central air conditioners, air-source heat pumps and thermostats were installed in 2013, compared to 56 for 2012.
- 14 natural gas forced air furnaces were rebated, compared to 51 for 2012.
- Two natural gas boilers were installed 2013, compared to five boilers installed in 2012.

Nonresidential Custom

Total preliminary electric and gas savings for the Nonresidential Custom program in 2013 were 50,917 kWh and 166,973 therms, respectively. These figures are 17 percent of total 2013 planned electric savings and 456 percent of total 2013 planned gas savings. Total spending for the Nonresidential Custom program was \$436,350, which is 333 percent of the 2013 plan

Nonresidential Custom program highlights for 2013 include the following:

- Six custom project applications were received in 2013; five commercial and one industrial.
- Six customers completed custom projects during 2013 totaling \$334,128 in incentives. Electric savings resulted from a fluorescent lighting redesign project, LED lighting measures and a compact fluorescent lamp project. Natural gas savings resulted from a steam optimization project completed throughout the campus of a college.

Small Commercial Energy Audit

Total preliminary electric and gas savings for the Small Commercial Energy Audit program in 2013 were 933,164 kWh and 13,585 therms respectively. These figures are 193 percent of total 2013 planned electric savings and 79 percent of total 2013 planned gas savings. Total spending for the Small Commercial Energy Audit program was \$243,727 which is 95 percent of the 2013 plan.

Small Commercial Energy Audit program highlights for 2013 include the following:

- 229 electric and gas audits were completed.
- 2,867 direct install measures were installed during audits.
- 3,011 customer-installed measures were completed consisting of T-5 and T-8 retrofits and high-bay installations, compact fluorescent lamps, light emitting diodes, lighting controls, variable speed drives, insulation projects, air-source heat pumps, boilers, furnaces and custom measures.
- MidAmerican promoted the program in *At Your Service* in February, August and November.
- MidAmerican promoted the program in print advertising in the Iowa Quad Cities newspaper in June and September, promoting space and water heating equipment, central air conditioning and lighting for commercial and industrial buildings.
- MidAmerican promoted the program in radio advertising over an eight week period during March, May, September and November promoting energy efficiency for businesses buying energy-efficient appliances and equipment.

Nonresidential Energy Analysis

Total electric and gas savings for the Nonresidential Energy Analysis program in 2013 were 1,807,669 kWh and 564 therms respectively. These figures are 41 percent of total 2013 planned

electric savings and two percent of total 2013 planned gas savings. Total spending for the Nonresidential Energy Analysis program was \$617,392, which is 60 percent of the 2013 goal.

Nonresidential Energy Analysis program highlights for 2013 include the following:

- Two walkthrough audits were completed in 2013.
- Six customers completed 12 projects during 2013 totaling \$305,144 in incentives.

Electric savings resulted from the installation of vending machine controls, a variable speed drive, an energy efficient battery charging system, fluorescent lighting and light emitting diodes – additional electric savings resulted from set-point changes to the supply temperature of a chilled water system and a reduction in the temperature of a hotel’s pool water. Natural gas savings resulted from the addition of roof insulation and the previously mentioned pool water temperature reduction project.

Commercial New Construction

Total electric and gas savings for the Commercial New Construction program in 2013 were 606,398 kWh and 11,374 therms respectively. These figures are 165 percent of total 2013 planned electric savings and 330 percent of total 2013 planned gas savings. Total spending for the Commercial New Construction program was \$134,044 which is 67 percent of the 2013 plan.

Commercial New Construction program highlights for 2013 include the following:

- One new construction project was enrolled in 2013, compared to zero in 2012.
- Construction incentives were processed for two construction projects completed in 2013.

Both projects had electric and natural gas savings.

Nonresidential Load Management

Total electric savings for the Nonresidential Load Management program in 2013 were 12,658 kW of system peak demand. This figure is 106 percent of total 2013 planned peak demand kW

savings (meter level). Total spending for the Nonresidential Load Management program was \$522,252, which is 101 percent of the 2013 plan.

Significant notes for 2013 for the Nonresidential Load Management program include the following:

- Customers were each called once for curtailment events in the 2013 season.
- Incentive payments were distributed to participants by December 2013; participants earned 100 percent of contract incentives.
- Participants achieved an overall realization rate of 111 percent (actual curtailed load vs. contract) for the season.

Residential Low Income

Total electric and gas savings for the Low Income program in 2013 were 12,446 kWh and 5,883 therms respectively. These figures are 12 percent of total 2013 planned electric savings and 37 percent of total 2013 planned gas savings. Total spending for the Low Income program was \$98,098, which is 90 percent of the 2013 plan.

Low Income program highlights for 2013 include: 90 homes received weatherization services during 2013, compared to 76 in 2012. 100 Energy Wise kits were distributed to Energy Wise participants during 2013, compared to 130 in 2012. The distribution of Energy Wise kits was hindered in 2013 due to unexpected long-term absence of a staff member at Project Now. The distribution of kits has been restarted in 2014 and a total of 56 Energy Wise kits have already been distributed in Illinois in 2014. Additional Project Now staff members are completing training associated with the distribution of Energy Wise kits to meet future needs.

Reasonableness and Prudence of Costs

The costs associated with MidAmerican's Illinois energy efficiency programs in 2013 are reasonable and prudent. While MidAmerican exceeded the planned 2013 budget for its gas Residential Low Income, Nonresidential Custom and electric Nonresidential Custom and Small Commercial Energy Audit programs, MidAmerican was significantly under the planned 2013 budgets for all other programs due to low customer participation. MidAmerican indicated in its initial plan filing, it will manage total budgets rather than individual program budgets and continue program operation, even if program spending in a given year exceeds the estimates provided in the initial filing. (*See* MidAmerican Exhibit 3.0, Direct Testimony of Fredrick A. Leuthauser, page 11, lines 245-247). Exceeding the 2013 planned spending for the gas Nonresidential Custom and electric Custom and Small Commercial Energy Audit programs reflects MidAmerican's efforts to continue program operation and ensure that MidAmerican customers can continue to take advantage of the energy efficiency programs. Most importantly, 2013 spending for the gas Nonresidential Custom and the gas and electric Small Commercial Energy Audit programs correlated to the greater than expected energy savings from the programs.

As MidAmerican also indicated in its initial EE Plan filing, fees; charges; billing; costs and expenses associated with equipment, devices, or services, including contracted services and/or consultative services, are based on competitive bidding processes and procedures developed and consistently administered by the Company's procurement and supply chain department.

MidAmerican's procurement and supply chain processes and procedures include a requirement to re-bid contracts at regular intervals. Several energy efficiency contracts impacting MidAmerican's Illinois programs were re-bid in 2013. The process of regularly re-bidding contracts ensures that fees and charges related to EE programs and costs and expense related to equipment and services for the EE programs are competitively priced and, therefore, cost effective for Illinois customers.

MidAmerican also regularly monitors and examines its expense for wages, salaries and benefits of all employees, including those engaged in energy efficiency activities. Additionally, MidAmerican followed its internal accounting procedures and ensured that “incremental costs [will] not include any expenses for wages, salaries and benefits of Company employees, employed wither before or after the effective date of Section 8-408 of the Act, that are otherwise recovered under other approved tariffs.

MidAmerican continues to monitor its Illinois EE programs as they mature, and the Company will take appropriate steps to improve program performance. Monitoring and evaluation is a key aspect for the EE programs and help ensure that the EE expenditures are reasonable and prudent.