

2023

Quarterly Report Fourth Quarter

October 1, 2023 - December 31, 2023



Energy
Efficiency
Program

Table of Contents

Portfolio summary _____	3
Residential programs _____	5
Income-eligible programs _____	11
Business programs _____	16
Emerging technology and market transformation _____	22
Administrative Flexibility _____	28
Stipulations _____	29
Impact _____	31
Awards and recognition _____	32

Portfolio summary

Year-to-date results

January 1, 2023-December 31, 2023

15.5M

Net savings
to date

110%

Percent of
planned savings

14.1M

Annual
savings goal

\$45.3M

Spend
to date

99.1%

Percent of
planned spend

\$45.7M

Annual
budget

Key portfolio highlights

- In Q4, the MF Retrofits program completed a 4-phase project at Courtland Square Condominium Community in Des Plaines. The program completed air sealing, attic insulation, and remediated health and safety issues in the attic by installing and insulating bathroom exhaust fans at their 512-unit property. This project saved customers a

total of 6,946 therms and \$24,702 of gas incentives were allocated to the project.

- In Q4, the Public Housing Authority program launched and introduced the furnace tune-up measure to address the heating needs of other public housing building types, such as family and scattered sites. This new offering was met with an overwhelmingly positive response, with five Public Housing Authorities requesting furnace tune-ups. In total, 720 furnaces were tuned and cleaned.
- The Home Energy Efficiency Rebates Program introduced an additional channel for smart thermostat incentives through retail sales, in partnership with ComEd. In the fourth quarter, the Program incentivized over 500 retail smart thermostats, through the new offering.

Residential programs

5

Programs

6.37M

Net therm savings to date

\$11.8M

Spend to date

Key highlights

- The Self-Assessment Portal (SAP), through the Home Energy Savings, was launched in December resulting in participation from over 500 customers to date.
- The Single-Family Air Sealing and Insulation (ASI) portion of HES launched an air sealing and duct sealing bonus in October and resulted in an increase in participation. This increase allowed us to serve over 1,750 single-family customers through the program in 2023.
- The Multi-Family Air Sealing and Insulation offering saw a spike in participation during the 4th quarter, after a bonus was implemented. This allowed us to serve a 500 unit Multi-Family building within Dekalb. Half of the units were completed within 2023, and the rest will be completed in January of 2024.

Program overviews

Home Energy Efficiency Rebates (HEER)

The objective of the Home Energy Efficiency Rebate (“HEER”) Program is to obtain energy savings by overcoming market barriers to the purchase, installation, and maintenance of high-efficiency natural gas space-heating equipment as well as other targeted measures in residential applications.

Home Energy Savings (HES)

The Home Energy Savings (“HES”) program is a whole-house single-family weatherization program with the objective to obtain natural gas savings in existing single-family buildings by overcoming market barriers to the installation of energy efficiency measures. The HES program provides weatherization and shell improvement opportunities using standard, prescriptive, and whole-house approaches. This offering consists of a home energy assessment (HEA) and air sealing and insulation (ASI) components.

Multi-family (MF)

The Multi-Family (“MF”) program addresses residential (living units) and commercial (communal areas, central plants) energy efficiency opportunities available in multi-family buildings. The program aims to overcome market barriers to the installation of energy efficiency measures in multi-family buildings by offering comprehensive assessments, technical assistance and incentives. MF provides property owners with turnkey services to reduce energy and water use in residential living units, communal areas and in the building shell.

Residential New Construction (RNC)

The objective of the Residential New Construction Program (“RNC”) is to obtain energy savings by increasing the energy efficiency of single-family and duplex new construction homes. The program provides participating new home builders and their verifier companies a financial incentive to either a) exceed state and local building code requirements regarding duct and air sealing, along with the installation of specific high-efficiency equipment, or b) install prescriptive high-efficiency equipment only.

Energy Education and Outreach

The energy education and outreach program is intended to enhance residential customers’ understanding of energy usage in their homes and educate these customers.

Residential programs

Home Energy Efficiency Rebates (HEER)

Savings achieved to date – 3,177,573 Net Therms

- In the fourth quarter, the Program incentivized over 3,000 high-efficiency furnaces, boilers, and tankless water heaters, as well as over 6,700 smart thermostats to our customers.
- In the fourth quarter, the Program introduced an additional channel for smart thermostat incentives through retail sales. In the fourth quarter, the Program incentivized 511 retail smart thermostats.
- The most popular measure in 2023 were smart thermostats, with over 20,000 incentivized. The participation success is a direct result of using bill inserts, newsletters and digital ads targeted to both our customers and Trade Allies.

Home Energy Savings (HES)

Savings achieved to date – 627,195 Net Therms

- In the fourth quarter, the Program provided 1,339 customers with home energy assessments, with 26 being served virtually, 1,056 served in-person and 257 participated in the newly launched Self-Assessment Portal (SAP).
- The Self-Assessment Portal (SAP) offering was launched in December and 257 customers participated. This new market-rate offering asks the customer a series of questions on how their home uses energy, to better understand savings potential through energy efficiency. All offered measures are standard in all other home assessment paths. These free measures are mailed directly to the customer's home for self-installation, except for smart thermostats which require a co-pay.
- In the fourth quarter, the Air Sealing and Insulation offering of HES served 888 single-family homes with weatherization services. An air sealing and duct sealing bonus went into effect this quarter, and it significantly increased participation in duct sealing and air sealing projects.
- The Air Sealing and Insulation (ASI) portion of HES launched an air sealing and duct sealing bonus campaign on 10/1/2023. A bonus amount of \$275 was added for each air seal project, bringing the total rebate to \$500. A \$100 bonus amount was added for duct sealing projects, bringing the total rebate amount to \$600. This bonus campaign was successful and enabled the offering to achieve the stipulated goal of air sealing and insulating 1,850 housing units each year.

Residential programs

Multi-family (MF)

Savings achieved to date – 541,986 Net Therms

- In the fourth quarter, the prescriptive portion of MF has been cost-effective by leveraging pipe insulation and boiler tune-up projects. The offering achieved 28% of the annual savings goal this quarter, while spending 19% of the annual incentive budget.
 - The Central Plant Optimization Program of MF has been cost-effective by leveraging boiler tune-up, pipe insulation and tank insulation projects. The offering achieved 64% of the annual savings goal this quarter, while spending 50% of the annual incentive budget.
 - In the fourth quarter, the Multi-Family Air Sealing and Insulation offering launched a bonus that added an additional \$1 per linear foot that is air sealed through the offering. The bonus increased the total air sealing rebate to \$2 per linear foot. The offering gained notable traction due to this bonus incentivizing a property manager of the 500+ unit University Apartments campus in Dekalb to participate. In 2023, this offering air sealed and insulated 227 multi-family units. That is a 66% increase from last year's total participation.
 - In the fourth quarter, the joint assessment offering saw an increase in participation with the conversion of a smart thermostat installation project. This quarter 274 units were served and 39% of the annual savings goal was achieved while spending 43% of the incentive budget.
- The custom portions of MF have continued to see lower than expected participation, but ongoing marketing and outreach campaigns will raise visibility with customers.

Residential programs

Residential New Construction (RNC)

Savings achieved to date – 502,030 Net Therms

- In the fourth quarter, 371 homes were completed and received incentives.
- We offer three qualifying packages within the RNC program. In the fourth quarter, the Prescriptive Package was most popular, with 208 homes meeting the requirements and receiving incentives. The requirement for this package is to install, at a minimum, an advanced thermostat, and a 95%+ AFUE furnace or boiler.

Energy Education and Outreach

Energy Saving Kits (“ESKs”)

Savings achieved to date – 640,419 Net Therms

- In the fourth quarter of 2023, Nicor Gas distributed 4,365 ESKs to customers, of which 3,155 were water-saving kits and 1,210 were weatherization kits.
- The most popular kit requested by customers was the water saving kit, making up 72% of all kits distributed in the fourth quarter.
- Nicor Gas utilized our Marketing and Outreach teams to drive the success of this program. The Outreach team attended many community events during the fourth quarter, in which kits were presented and handed out to customers.

In the fourth quarter of 2023, Nicor Gas distributed a total of 4,365 ESKs to customers, of which 3,155 were water-saving kits and 1,210 were weatherization kits.

Residential programs

Elementary Energy Education Kits (“EEE kits”)

Savings achieved to date – 440,274 Net Therms

- In the fourth quarter, 11,438 total kits were delivered to schools. 11,426 were Joint Utility kits and 12 were Nicor Gas-only kits.
- In 2023, Nicor Gas introduced a Joint Utility Income Eligible (IE) Elementary Education kit. In the fourth quarter, 1,097 Joint Utility IE kits were delivered to schools.
- School selection is intentional and focuses on enrolling schools from various socioeconomic levels and racially diverse student populations. The program also strives to include up to five schools that focus on students with special needs.

Home Energy Reports (“HER”)

Savings achieved to date – 443,273 Net Therms

- During the fourth quarter of 2023, Nicor Gas has continued delivering emailed and printed Home Energy Reports to customers. The approximate reach for the HERs in 2023 is 475,000 customers.
- The HER program is a behavioral program designed to combine feedback on energy use with contextual information that helps educate and motivate customers to reduce their energy use while increasing customer satisfaction and engagement.

Income-eligible programs



Key highlights

- The SF Retrofits offering has served over 831 single-family customers this year. The success of the SF Retrofits offering is attributed to the partnerships with 28 community-based organizations, which increase the reach of our programs into their communities.
- Through MF Retrofits, we have served 13,409 MF units' year to date, serving over 6,000 units in Q4.
- In Q4, the Public Housing Authority program introduced the furnace tune-up measure to address the heating needs of public housing

building types, such as family and scattered sites. Since the addition of the furnace tune up, over 700 units were cleaned and provided tune ups.

Program overviews

The objective of the Income-Eligible Energy Efficiency (“IE”) program is to provide broad and deep energy efficiency opportunities to income-eligible customers living in single-family homes and multi-family buildings, and for the construction of new energy-efficient affordable housing. This program includes:

- Single Family and Multi-Family Weatherization and Retrofits
- PHA/Multi-Family Buildings
- Affordable Housing New Construction (AHNC)

Single-family/Multi-family Weatherization and Retrofits Program overview

Savings achieved to date – 1,350,468 Net Therms

- In partnership with the Community Action Agencies within our territory, we have served 222 single-family homes with direct installs and weatherization through our SF IHWAP offering within 2023. In the 4th quarter, the SF IHWAP offering focused on Nicor Gas only projects and provided \$243,945 in incentives that fully funded 8 projects and saved customers a total of 16,142 therms. The program team focused on recruiting additional agencies to this program, with 9 agencies in our service territory expressing interest in receiving braided utility funds. This quarter Nicor Gas agreed to help co-fund a new IACAA staff position to help build agency capacity, since the agencies expressed a need for more assessors to meet their pipeline. The offering ended the fourth quarter at 101% to our annual incentive goal and 83% to our annual savings goal. There were no MF IHWAP projects completed in 2023, and it has been an area of ongoing focus and discussion with the agencies, IACAA and program staff.
- The SF Retrofits offering has served over 831 single-family customers this year. The success of the SF Retrofits offering is attributed to the partnerships with 28 community-based organizations, which increase the reach of our programs into their communities. The SF Retrofits offering ended the fourth quarter at 100% to our annual incentive goal and 87% to our annual savings goal. Funding for 2023 projects has been fully allocated, and all customers in the current pipeline have their funding fully reserved to be served comprehensively in 2024.
- MF Retrofits closed out the fourth quarter and the year 136% to the savings goal and 100% the incentive budget. The offering is operating cost-effectively and is currently 19% below our planned \$/therm. Through MF Retrofits, we have served 13,409 MF units' year to date, serving over 6,000 units in Q4. In Q4, we completed a 4-phase MF Retrofit project at Courtland Square Condominium Community in Des Plaines. The program completed air sealing and attic insulation and remediated health and safety issues in the attic by installing and insulating bathroom exhaust fans at their 512-unit property. This project saved customers a total of 6,946 therms and \$24,702 of gas incentives were allocated to the project.

Income-eligible programs

Public Housing Authority

Savings achieved to date – 49,953 Net Therms

- Over 1,227 units have been served to date within PHA (Public Housing Authority), with over 700 units being served in Q4 alone. The program has been cost effective, that was realized when the program ended the quarter 9% below the planned \$/therm. Through Q4, we are at 101% of our annual savings goal and 93% of our annual incentive goal. These results were achieved by completing furnace tune-up and A/C cover and gap sealer projects.
- In Q4, the program launched introduced the furnace tune-up measure for public housing customers to address the heating needs of other public housing building types, such as family and scattered sites. This new offering was met with an overwhelmingly positive response, with five Public Housing Authorities requesting furnace tune-ups for the rest of their portfolios. In total, 720 furnaces were tuned and cleaned for an estimated savings of 19,285 therms. Two MFES network contractors completed the work: Greenlink Energy Solutions (VBE) and Nick & Eddie Construction (MBE).

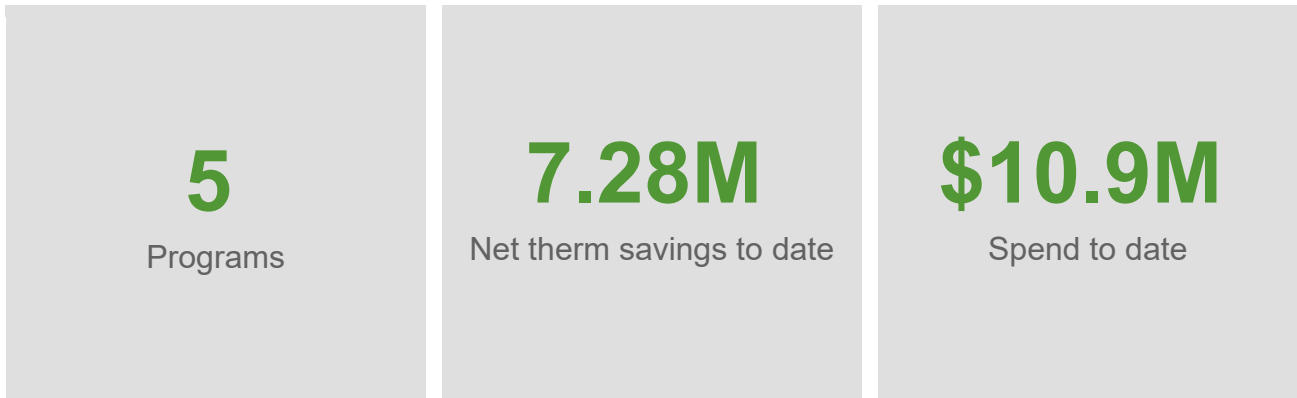
Affordable Housing New Construction

Savings achieved to date – 15,787 Net Therms

- In the fourth quarter, the program incentivized one project in Bellwood for a multi-family independent living for seniors. This project incentivized 80 units.
- During 2023, the program incentivized three projects with 142 units.



Business programs



Key highlights

- In Q4, the Business Energy Efficiency Rebates program achieved a remarkable milestone by completing 135 projects, including 10 projects in the public sector.
- In the fourth quarter of 2023, Nicor Gas incentivized 3 private commercial/industrial new construction projects.
- Through our Small Business program, we collaborated with Cook County to help enhance their Businesses Reducing Impact on the Environment (“BRITE”) Program. It has not only brought in valuable customer leads but highlights our strength in establishing strategic partnerships that enhance the program performance.

Program overviews

Business Energy Efficiency Rebates

The Business Energy Efficiency Rebates (“BEER”) program’s goal is to produce natural gas energy savings in the business and public sectors by promoting the purchase and installation of energy efficiency measures such as: high-efficiency space heating, water heating, food service technologies, tune-ups, and upgrades. This is accomplished by providing the direct installation of free energy-saving products, completing free energy assessments of customers’ facilities, and providing tailored energy efficiency project recommendations.

Business New Construction

The objective of the Business New Construction (“BNC”) Program is to obtain energy savings during the design and construction of new buildings, major renovations of existing buildings, and tenant buildouts in the commercial, public sector and industrial market. The Business New Construction offering provides education, financial incentives, and technical assistance to help building owners and design teams exceed current energy codes.

Custom Incentives

The purpose of the Custom Incentives (“Custom”) program is to assist medium-to-large commercial, multi-family, public sector, and industrial customers in identifying and implementing cost-effective natural gas energy efficiency measures that are not otherwise addressed in Nicor Gas’ BEER, MF or SB Programs. Participation is driven through the program’s free energy assessments, which inform the customer of ways to be more efficient. These assessment recommendations can spill over into other commercial and industrial program participation. Additionally, the Custom program offers a Retro-Commissioning (RCx) offering, assisting participants with low-cost and no-cost tune-ups and adjustments to their operating systems, building controls, energy management systems and HVAC (Heating, Ventilation, Air Conditioning) systems in existing buildings. The aim of the retro-commissioning offering is to optimize operation and improve facility efficiency by returning equipment to its intended operation or design specifications. The Custom program also includes a Combined Heat and Power (CHP) offering.

Small Business Energy Savings

The Small Business Program’s (“SB”) objective is to obtain long-term natural gas energy savings from small business gas customers, including public sector customers, with energy efficiency retrofits and financial incentives to influence the installation of highly efficient natural gas equipment.

Strategic Energy Management

The objective of the Strategic Energy Management (“SEM”) program is to obtain long-term energy savings by focusing on improving and optimizing commercial, industrial and public-sector operations, processes, and energy equipment through improved behavioral methods.

Business Energy Efficiency Rebates

Savings achieved to date – 2,736,709 Net Therms

- Surpassed the 1M therms milestone in Q4, fueled by an aggressive end-of-year outreach effort that effectively engaged customers as well as trade allies.
- The targeted outreach effort organized by the program team in the final quarter capitalized on untapped energy saving opportunities in the healthcare sector, driving substantial efficiency improvements across our service territory.
- In Q4, the program team achieved a remarkable milestone by completing 135 projects, including 10 projects in the public sector.

Business programs

Business New Construction

Savings achieved to date – 132,552 Net Therms

- In the fourth quarter of 2023, Nicor Gas incentivized 3 private commercial/industrial new construction projects.

TYPE (*public sector)	SQ. FEET	ANNUAL GROSS THERM SAVINGS	MEASURES
Prospect Place	112,178	1,534	<ul style="list-style-type: none">• Window Assembly U-value• Condensing DHW Heaters• ENERGY STAR® Appliances• Smart Thermostats
Candlewood Suites Joliet	46,671	4,125	<ul style="list-style-type: none">• Windows• Low-flow Plumbing Fixtures• Efficient Heating System• ENERGY STAR® Appliances
Woodmans Market Warehouse	66,587	2,691	<ul style="list-style-type: none">• Direct-fired Make-up-air Units

Custom Incentives

Savings achieved to date – 2,220,220 Net Therms

- Achieved an exceptional 2M therms, a direct result of the streamlined engineering approval process which allowed faster processing time of measures implemented across various industrial sectors.
- The engineering team in partnership with outreach allowed the program to close and execute final approval of high-impact large industrial projects
- In the final quarter the program team successfully closed 5 large projects each exceeding 150,000 therms, highlighting the program's expertise in executing high-impact initiatives.
- 41 public sector projects were completed in the final quarter, showing our robust engagement and impact within the public sector.

Small Business Energy Savings

Savings achieved to date – 1,171,045 Net Therms

- The program's ability to exceed its therm goal can be attributed to targeted outreach and comprehensive reach back campaign of past assessments to identify projects which resonated well with small businesses across the service territory.

Business programs

- The Field Team has continued introducing the program to Farm Bureaus adding Lake, McHenry, and Lee counties, all were excited to learn about the program, and would love to work with Outreach next year to promote the Agriculture Rebates directly to the farmers.
- Collaborating with Cook County to help enhance their Businesses Reducing Impact on the Environment (“BRITE”) Program has not only brought in 10 customer leads, within the fourth quarter, but highlights our strength in establishing strategic partnerships that enhance the program performance.

Strategic Energy Management

Savings achieved to date – 1,022,396 Net Therms

- In Q4, an additional 496,520 gross therms submitted for the full year total of 1.054M gross therms, 96% of target 1.09M therms. The 3 largest customer savings were from PQ Corp Joliet (289k therms) formerly Philadelphia Quartz, Diageo (126k therms), and Capron Mfg (123k therms). 21 other customers reported savings averaging about 24k therms.
- About 75% of SEM savings came from the Industrial & Manufacturing sector, 20% from Education, 5% from healthcare.
- SEM in Q4 signed 2 new customers - Abbott (Oct 435k therms), PrintPack (Nov 1.02m therms).

Emerging technology and market transformation

Program overviews

The primary mission of the Nicor Gas Emerging Technology Program (“ETP”) is to seek out new or unproven technologies that may be suitable for inclusion in the Nicor Gas Energy Efficiency Program and verify their natural gas savings through field tests and pilot demonstrations.

ETP continues work on ongoing field pilot projects. The continued active projects are as follows:

DHW Electronic Master Mixing Valves

- DHW Electronic Master Mixing Valves (EMMV) incorporate electronic components including temperature sensors that can be programmed to control the inlet valves and accurately deliver tempered water temperature from a domestic water heater.
- ETP is preparing an action plan for pilot project execution.
- ETP engaged with the manufacturer for product options.
- ETP connected with a university site to be a potential pilot host site.

Residential Energy Modeling Decision Making Tool

- ETP discussed with the vendor on their software tool that utilizes an energy modeling-based approach for making energy efficiency improvement decisions in homes.
- ETP is reviewing the information provided by the vendor for consideration and next steps.

1175- Fume Hood Control Valves

- Add or retrofit airflow control valve in laboratories. Consists of fume hood valves, supply duct, exhaust duct valves and sensors, all integrated with digital controls.
- Precise control of fume hood air flow based upon open sash area thus minimizing ventilation heating load, saving energy.
- ETP discussed with three Universities for host site selection. ETP discussed with the ET manufacturer for action plan development.
- ETP finalized a university site and performed a detailed site assessment for the pilot study.
- ETP aims to have the field test agreement in place for project commencement.

1166- Emerson Sensi Field Study

Emerging Technology and Market Transformation

- A sensor suite from Emerson to monitor existing furnace and air conditioner. If the system is newly installed, then it will verify proper/optimal installation while on an older system, it will monitor based on target performance.
- Lab study completed. Field study is ongoing at 30 test sites. We are currently monitoring HVAC system operation data and are interfacing with the end users to provide insight on their HVAC system operation.
- The manufacturer decided to terminate the product offering and support for this technology and opted not to share project specific datasets for final analysis.
- ETP reached out to the homeowners for a study conclusion with the option of either keeping the Emerson Sensi equipment or having the equipment decommissioned.
- ETP is currently working with a contractor to decommission the Sensi system from interested sites.
- ETP will reach out to homeowners with close out documentation for study conclusion.

1167- Phase Change Ceiling Tile

- New engineered dual-temperature phase change material (PCM) technology that positively impacts HVAC energy consumption, improves HVAC cycling profiles, and extends HVAC lifespan during both summer and winter seasons.
- PCM technology installed, and data collection is currently ongoing and is planned to continue till 2023-2024 heating season.
- Data collection started for the 2023-2024 heating season. PCM retrofit performance data is being collected and ongoing analysis is being performed.
- ETP plans to conclude the data monitoring by the end of Q1 2024.

1165- Smart Fuel Switching Control - Hybrid Residential HVAC

- Cloud-based technology is designed to reduce utility costs and GHG (Green House Gas) emissions in residential space heating by optimizing the operation of a hybrid heating system, consisting of a natural-gas furnace (or mini boiler) and an electric air source heat pump (ASHP). Preliminary lab testing based GHG emission and cost-based switching for cold climate operation was completed.
- ETP worked with the manufacturer to fix the fuel-switching algorithm for both emissions and operating cost reduction operating modes.
- ETP started laboratory testing in the 2023-2024 heating season with Improved fuel switching algorithm.

1176- Cloud Based Building Optimization Platform

- Predictive, self-adapting Artificial Intelligence used to control and optimize Description building HVAC systems.
- ETP had discussion with manufacturer to onboard them onto pilot study. Ongoing discussion on Action Plan and site recruitment.
- ETP reviewing manufacturer provided potential customer list in Illinois for site selection.

1157- Small Commercial Boiler Manufacturer Controller

- Remote monitoring of central boiler-based heating and domestic hot water systems to identify operational inefficiencies and proactively maintain systems in real-time.
- Project is currently on hold.

1119- Venturi Steam Trap – Field Evaluation Study

- Venturi steam traps are an energy efficient condensate removal technology for steam systems, and they have lower failure rates than traditional steam traps.
- ETP completed the field evaluation of the Venturi steam traps and collected in-depth end user feedback to validate the performance and effective useful life of the technology. The final project report has been drafted and is currently under internal review.

Two ETP workpapers are planned to be proposed for inclusion in the Illinois Technical Reference Manual version 13 for the following emerging technologies.

1179- Residential Gas Heat Pumps

- ETP is planning to develop a technical workpaper on residential gas heat pumps for inclusion in Illinois Technical Reference Manual version 13.
- ETP has prepared a draft workpaper template based on an energy modeling approach with required engineering input and assumptions.
- ETP to perform energy modeling based on actual performance data from commercially market ready residential gas heat pump equipment. ETP is waiting for Gas Heat Pump performance data from lab testing.
- Technical workpaper methodology development based on energy modeling results to be performed in Q1/Q2 2024.

Commercial Secondary Windows

- Envelope retrofit technology in commercial buildings that improves thermal performance of poorly performing existing windows.
- The technology involves one or more transparent panes in a frame that attaches to the interior or exterior of existing windows without replacing the original glass or frame.
- ETP developed an action plan for development of a prescriptive TRM measure for this technology. ETP is currently performing due diligence for setting up the energy model for TRM workpaper development.

ETP Webpage Updates

ETP is planning to update publicly available information like program webpages, application webpages and other program related flyers to reflect current branding information, new terms and conditions and to add clarity. ETP team and legal team review completed for materials to be updated. Materials are reviewed by Nicor gas marketing and are ready to be published. ETP will publish the updated webpages online.

ETP is writing and completing final pilot project reports for the following completed pilot projects.

Emerging Technology and Market Transformation

Draft report finalized and QA/QC done by both GTI Energy and Nicor Gas. Reports to be published on ETP website in Q1 2024.

#1123 Thermostatic Radiator Valves

#1147 SmartDry

#1115 On Demand Boiler Array

#1119 Venturi Steam Trap Field Evaluation Study

Draft report to be QA/QC'd

#1166 Emerson Sensi Lab Study Memo Report

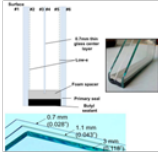


#1008 RE - Gradient Thermal (Draft ready)

Market Transformation

The MT program's goal is to accelerate the adoption of energy efficient products and/or services to maximize energy savings for Nicor Gas' Energy Efficiency Program. The MT program focuses on specific MT initiatives targeting technologies and services. This includes recruiting partners to bring these technologies forward, development of the MT logic and framework, and implementing activities to support the adoption of the targeted technologies and services. The MT program also focuses on expanding MT activities locally in Illinois including at the SAG, regionally, and internationally to leverage cross cutting opportunities with other utilities and organizations pursuing MT.

- In the 4th quarter of 2023, Nicor Gas continued to work on the market transformation initiatives listed below. This included continued the development of the TRM MT Savings Protocols for the initiatives, in collaboration with some of the other IL utilities and Guidehouse. Nicor Gas also presented at the October 25 MT SAG Working Group meeting to share the High-Performance Window MT Initiative Logic Model and Market Progress Indicators with the working group for comments and feedback. No comments or additional feedback was provided for finalizing.

Emerging Technology and Market Transformation

Market Transformation Initiative	Initiative Details	Utility Participation	2023 Brief Status Update
<p>High Performance Windows (HPW)</p> 	<p>Accelerate the adoption of next generation of high performance window products, to improve building envelope thermal performance. A new version of high performance windows provides a U-factor of 0.22 or better roughly the same insulation value (~R-5) of conventional triple pane windows without the added frame thickness and weight; uses the same glazing unit dimensions as double-pane windows; 40% more efficient than typical double-pane windows.</p>	<p>Ameren Illinois, ComEd, Nicor Gas</p>	<p>Engagement with NEEA and PAWS group to build coalition of market actors supporting advanced windows.</p> <p>Presented the logic model and associated market progress indicators to the SAG MT Working Group on October 25, 2023. No Comments or additional feedback was provide for finalizing.</p> <p>High performance window measure updated in the IL TRM for v12 for 2024.</p> <p>Drafting Natural Market Baseline for independent evaluators for review.</p> <p>Coordinating with operations team to review program design strategies and pilot designs.</p>
<p>Code Advancement - Energy Stretch Codes and Building Performance Standards</p>	<p>Stretch Codes & Building Performance Standards</p> <p>Contracted 2023 activities to continue municipality engagement, stretch code and BPS program design considerations, finalizing the logic model and market progress indicators for each approach, and IL natural market baselines for stretch codes and BPS.</p>	<p>ComEd, Nicor Gas, Peoples Gas, Northshore Gas</p>	<p>Ongoing municipality engagement through Advanced Building Energy Efficiency Policy Task force, partnering with Municipal Mayors Caucus. 13+ communities engaged, several with 1 on 1 meetings. In-depth interviews and surveys to gather feedback, quarterly ABEEP meetings.</p> <p>Developed support strategy recommendations based off municipality feedback.</p> <p>Drafted logic model, market progress indicators, natural market baseline and savings estimation methodology for stretch codes.</p> <p>Drafted logic model and market progress indicators for building performance standards.</p>
<p>Gas Heat Pumps</p> 	<p>Next generation of highly efficiency gas technology achieving great than 100% efficiency levels. Nicor Gas efforts are to help Accelerate the market adoption of the next generation gas heat pump technologies for water heating and space conditioning. Currently participating in the North American Gas Heat Pump Collaborative with 17 total Utilities in North America including Canada.</p> <p>Conducted manufacturer engagement with GHP manufacturers to coordinate on future activities. Developing collateral to build awareness and a residential TRM workpaper. Developing adoption rates for GHPs in Nicor's service territory.</p>	<p>Nicor Gas, Peoples Gas, Northshore Gas</p>	<p>Participation in the North American Gas Heat Pump Collaborative (NAGHPC) as a board member.</p> <p>Continued conducting manufacturer engagement with GHP manufacturers to coordinate on future activities. Developing collateral to build awareness and a residential TRM workpaper. Developing adoption rates for GHPs in Nicor Gas' service territory.</p> <p>Drafted logic model, market progress indicators, read for MT Working Group review.</p> <p>Drafting natural market baseline for review with independent evaluators.</p> <p>Coordinated effort with Nicor Gas, Peoples and Northshore Gas, the NAGHPC, GHP manufacturers, and IL distributors to present to the IL Capital Development Board to include the GHP technology in the IL Stretch Codes for municipalities if they choose to adopt.</p> <p>Approved launch to explore commercial gas heat pumps as a MT Initiative.</p> <p>Pilot for small scale installations planned with a first to market manufacturer for residential sized GHPs.</p> <p>Collaboration with operations teams on developing program design recommendations for residential GHPs in EEP.</p>
<p>Efficient Rooftop Units</p> 	<p>Researching efficiency of rooftop units through product differentiation and ultimately standards. Performing quantitative market research for developing IL natural market baseline and logic model development.</p> <p>Partnering with GTI and NEEA to further document understanding of market dynamics and align on market approach and strategy.</p>	<p>Nicor Gas, NEEA, GTI</p>	<p>Partnering with NEEA and GTI on: quantitative market research, developing IL natural market baseline, and logic model development.</p> <p>Drafted logic model and market progress indicators. Circulating with independent evaluators for review.</p>

Emerging technology and market transformation

Administrative Flexibility

Administrative Flexibility

- **Administrative Flexibility.** Any Program Administrator-initiated proposed budget shift of fifty percent (50%) for Programs with budgets under \$5 million or twenty percent (20%) for Programs with budgets over \$5 million shall be brought to the SAG when practicable, but no later than the next quarterly SAG meeting. It shall also be reported to the Commission in the quarterly reports.
- **Actions.** Nicor Gas has not exceeded the flexibility provisions authorized by the Commission in its Final Order.

Responses to evaluator recommendations (Refer to Appendix B)

Program Activities: Nicor Gas shall summarize the following:

Program activities

Implementation modifications

Additions or discontinuations of specific measures or programs.

Spending and savings amounts compared to the Plan filing

How the Company responds to past evaluators' recommendations and changes in the IL-TRM, NTG ratios, market research findings, and other relevant information the Company relies upon in making its decisions

Pilots completed and the results

Actions:

Please see the above section on the Second Quarter's highlights.

Please see the above section on the Second Quarter's highlights.

Please see Section C below and Appendix A for a discussion and list of new measures added to Nicor Gas' programs.

Spending and savings by program are shown in the attached Statewide Quarterly Report Template.

Please see Appendix B for actions taken in response to evaluators' recommendations.

Please see the above section on the Second Quarter's highlights.

New measure cost-effectiveness

Cost Effectiveness of New Measures (table by measure) Cost-effectiveness screening results for new measures.

- **Actions.** There are no new measures included in programs shown in Appendix A.

Cost-Ineffective Measures (explanation of why they were included) Explain reasons for including new cost-ineffective measures in programs.

- **Actions.** There are no new measures included in programs shown in Appendix A.

Stipulations

**Weighted Average
Measure Life**

13.33yrs

Stipulation: ≥ 11.91 years

**Public Sector Spend as a % of
Overall Portfolio Spend**

10.26%

Stipulation: Minimum of 10%

**Average Income-Eligible
Spend to Date**

\$ 13.2M

Stipulation: At least \$13M per year

**% of IE Spending in
Multi-Family Housing Units**

35.31%

Stipulation: At least 30% of units treated

Supplier Diversity

The Nicor Gas Energy Efficiency Program will continue to align ourselves with professional organizations and industry groups that support business diversity and inclusion amongst underutilized areas of our business. We will partner with various advocacy organizations, our peer utilities that make up the Illinois Utility Business Development Council (IUBDC), and our diverse partners to host and/or attend diversity-related summits and events that are geared toward the advancement of diverse business enterprises. Furthermore, we will continue to leverage our diverse partners to support the development and increased utilization of diverse businesses.

Tier 1 Diverse Spend

\$27.49M

Tier 2 Diverse Spend

\$6.13M

% of Total Eligible Spend


90.3%

Key highlights


- Nicor Gas Energy Efficiency Program has displayed continuous diverse spend growth year over year (YOY) since we began tracking in 2015. Total diverse spend has increased over 30% in 2023 from 2022.
- Tier 2 diverse spend has increased 49% YOY.
- Engaged 18 diverse contractors (9 MBE, 8 WBE, and 1 VBE) and 36 diverse sub-contractors (17 MBE and 19 WBE) in 2023.
- Non-profit spend increased from \$1.14M in Q3 to \$1.54M in Q4.

VENDOR TYPE	% SPEND	PRIME	SUB	TRADE ALLIES
MBE certified	11.2%	\$1,794,720	\$1,635,014	\$704,257
WBE certified	70.9%	\$17,234,692	\$4,328,380	\$5,742,995
VBE certified	3.1%	\$953,070	\$0	\$0
Non-profit vendors	5.1%	\$1,384,031	\$152,806	N/A

Impact

 **258M+**
in incentives since 2011

- Residential and multi-family customers: energy-saving kits and home assessments
- Commercial and public sector customers: building system optimization, energy-saving projects
- Income-qualified customers: comprehensive energy upgrades at no cost
- Rebates for energy-efficient products and improvements

 **226M+**
first year therms saved since 2011

- Avoids more than 1.20M metric tons of CO2 emissions
- Equivalent to the CO2 emissions generated by 267K passenger vehicles over the course of a year

 **1.35M+**
customers in 643 communities have participated

- \$191 average incentive per customer
- Engaged 212K elementary school students in energy efficiency education

 **\$2.25B**
Economic activity spurred since 2011

- 10.4K jobs supported since 2011
- \$118M spent with diverse suppliers
- \$857M wages supported since 2011

Awards and recognition

Since launching in 2011, the Nicor Gas Energy Efficiency Program has received 21 awards from local, regional, national, and international organizations. The program has been recognized for excellence in evaluation, innovation, marketing, program design and research.

Marketing awards

- 2022 Inspiring Efficiency Marketing Award
Awarded for the Care Package effort
- 2020 Gold Stevie Award
Awarded for the Unexpected Love Story campaign from the American Business Awards
- 2020 Inspiring Efficiency Marketing Award
Awarded for the Unexpected Love Story campaign
- 2019 Gold Stevie Award for Women in Business
Awarded for the Unexpected Love Story campaign in its marketing for women, created by a woman-led team.
- 2017 Inspiring Efficiency Marketing Award for Multicultural Marketing Strategy
Awarded for multicultural marketing strategy including demographic research, event outreach, hyper-local print publication placements and digital ads.
- 2015 Inspiring Efficiency Marketing Award for Customer Journey Strategy
Awarded for marketing & communications strategy including customer journey-mapping, overhauling communications with energySMART rebranding, and Customer Stories campaign
- 2015 Inspiring Efficiency Education Award
Awarded for "What's in the Box" campaign focused on understanding how a furnace works
- 2014 Bronze Stevie Women in Business Award for Consumer Marketing Campaign of the Year
Received bronze placement for energySMART "Customer Stories" campaign
- 2014 AESP Energy Award for Outstanding Achievement in Non-Residential Marketing
Presented for "6 million therms" steam trap infographic campaign
- 2013 E Source Ad Awards Crowd Pleaser Award
Presented for peer recognition for "6 million therms" steam trap infographic campaign
- 2013 Inspiring Efficiency Marketing Award
Presented for Nicor Gas Energy Efficiency Program's "Summer Staycation" campaign
- 2013 Gold Stevie Award for Utility Marketing Campaign of the Year
Presented for Nicor Gas Energy Efficiency Program's "Liberate" campaign

Awards and recognition

Other awards

- 2019 AESP Energy Award for Outstanding Achievement in Market Research and Evaluation
Awarded for Nicor Gas's Market Research and Evaluation Initiatives through the Market Transformation program.
- 2018 ISTC Sustainability Award
Awarded to the Emerging Technology Program for its efforts to reduce environmental impact and contribute to the growth of a more sustainable economy.

Program awards

- 2014 Inspiring Efficiency Impact Award for Business New Construction Program
Presented jointly to Nicor Gas and ComEd for providing technical assistance on more than 200 business new construction and renovation projects
- 2013 ENERGY STAR Awards Special Recognition
Received special recognition for active collaboration with other Illinois utilities to provide customer-centered energy efficiency solutions
- 2013 ACEEE Honorable Mention for the Economic Redevelopment Program
Received Honorable Mention for leading program designs and practices
- 2013 ACEEE Exemplary Programs Award for the Home Energy Efficiency Rebate Program
Received Exemplary status based on program performance during Summer Staycation marketing campaign
- 2013 ENERGY STAR Homes in Leadership Award
Presented to outstanding partners who have made important contributions to energy-efficient construction and environmental protection
- 2013 ENERGY STAR Special Recognition Energy Efficiency Program Delivery
Received special recognition for energy efficiency program delivery at the ENERGY STAR awards.