

STATE OF NEW YORK
PUBLIC SERVICE COMMISSION

At a session of the Public Service
Commission held in the City of
Albany on November 12, 2009

COMMISSIONERS PRESENT:

Garry A. Brown, Chairman
Patricia L. Acampora
Maureen F. Harris
Robert E. Curry, Jr.
James L. Larocca

- CASE 08-E-1127 - Petition of Consolidated Edison Company of New York, Inc. for Approval of an Energy Efficiency Portfolio Standard (EEPS) Utility-Administered Electric Energy Efficiency Program.
- CASE 08-E-1129 - Petition of New York State Electric and Gas Corporation for Approval of an Energy Efficiency Portfolio Standard (EEPS) Utility-Administered Electric Energy Efficiency Program.
- CASE 08-E-1130 - Petition of Rochester Gas and Electric Corporation for Approval of an Energy Efficiency Portfolio Standard (EEPS) Utility-Administered Electric Energy Efficiency Program.
- CASE 08-E-1132 - Petition of New York State Energy Research and Development Authority (NYSERDA) for Approval of an Energy Efficiency Portfolio Standard (EEPS) NYSERDA-Administered Electric Energy Efficiency Program.
- CASE 09-G-0363 - Petitions for Approval of Energy Efficiency Portfolio Standard (EEPS) Gas Energy Efficiency Programs.
- CASE 07-M-0548 - Proceeding on Motion of the Commission Regarding an Energy Efficiency Portfolio Standard.

ORDER APPROVING CERTAIN COMMERCIAL AND INDUSTRIAL CUSTOMER
ENERGY EFFICIENCY PROGRAMS WITH MODIFICATIONS AND ADDRESSING
INDEPENDENT PROGRAM ADMINISTRATOR FILINGS

(Issued and Effective November 13, 2009)

BY THE COMMISSION:

INTRODUCTION

In this order the Commission approves, with modifications, selected Energy Efficiency Portfolio Standard (EEPS) electric and natural gas energy efficiency programs designed to serve the commercial and industrial (C&I) customer market segment. The approved programs include the Commercial & Industrial Custom Efficiency Program (electric) and Commercial and Industrial Custom Gas Efficiency Program (gas) to be administered by Consolidated Edison Company of New York, Inc. (Con Edison); the Commercial High-Efficiency Heating and Water Heating Program (gas) to be administered by Niagara Mohawk Power Corporation d/b/a National Grid (Niagara Mohawk); and the Non-Residential Small Business Direct Installation Programs (electric) and Non-Residential Commercial/Industrial Custom Rebate Programs (electric and gas) to be administered by New York State Electric and Gas Corporation (NYSEG) and Rochester Gas and Electric Corporation (RG&E). Action is deferred on the Commercial High-Efficiency Heating and Water Heating Programs (gas) proposed to be administered by The Brooklyn Union Gas Company d/b/a National Grid NY (KEDNY) and KeySpan Gas East Corporation d/b/a National Grid (KEDLI) due to substantial changes recently proposed by KEDNY/KEDLI.

In addition, in this order the Commission addresses certain independent program administrator proposals submitted by 15 organizations to the utilities and/or NYSERDA. After review of these proposals, the Commission concurs with the utility and NYSERDA assessments about disposition of these proposals and

accepts that the majority of programs be rejected as stand-alone programs but, in several cases, the organizations proposing independent program administrator proposals are encouraged to work within the existing NYSERDA and/or utility energy efficiency program framework to pursue approaches that may have a potential for significant energy savings.

BACKGROUND

On June 23, 2008, the Commission created an Energy Efficiency Portfolio Standard (EEPS) program for New York State to develop and encourage cost-effective energy efficiency programs.¹ The Commission initially invited NYSERDA and the six large investor-owned electric utilities to submit electric energy efficiency program proposals. Subsequently, the Commission invited NYSERDA and natural gas utilities with 14,000 or more customers to submit natural gas energy efficiency program proposals. Numerous program proposals were submitted in response to the Commission's invitation. Many of the proposals are in the form of combined electric and gas proposals. To provide for an orderly review of the proposals, they are being considered in phases, divided by customer market segments. This order is focused on program proposals designed for the commercial and industrial customer market segment.

NOTICE OF PROPOSED RULEMAKING

A Notice of Proposed Rulemaking concerning the energy efficiency program proposals under consideration was published in the State Register on September 9, 2009 [08-E-1127SP7]. The minimum period for the receipt of public comments pursuant to SAPA regarding that notice expired on October 26, 2009. The New

¹ Case 07-M-0548, Energy Efficiency Portfolio Standard (EEPS), Order Establishing Energy Efficiency Portfolio Standard and Approving Programs (issued June 23, 2008).

York State Department of Agriculture and Markets (Ag&Mkts) and 18 utility customers submitted comments in support of programs designed for farmers. While many of these comments did not identify a specific program, they are most closely aligned with the proposal made by independent program administrator EnSave. The New York Farm Bureau and EnSave also submitted comments about energy efficiency programs for the agricultural community and specifically identified the EnSave independent program administrator proposal. All of these comments are summarized below.

SUMMARY OF PROGRAM PROPOSALS

Brief summaries of the proposed commercial and industrial programs considered in this order are presented below. More detailed descriptions of the programs are provided in Appendix 1.

Con Edison - Commercial & Industrial Custom Efficiency Program (Electric)

This program would provide incentives for energy efficiency measures in existing buildings and for new construction that are not offered through other programs. Incentives would be offered to participants for any measure, process, or operational improvement that provides cost-effective energy savings. C&I customers would be offered financial incentives for upgrading equipment or systems and improving processes (e.g., lean manufacturing, retro-commissioning,² or monitoring-based commissioning) not covered specifically by other Con Edison C&I programs. Initially, the program would

² "Commissioning" is the process of ensuring that a building and its systems perform as designed, systematically optimizing building systems so that they operate efficiently and effectively, often eliminating the need for costly capital improvements.

place special emphasis on data centers and healthcare facilities. Con Edison plans to offer a rebate to cover up to 50% of the cost of a technical survey to identify potential cost-effective measures in a facility. The total survey rebate amount would be capped at \$50,000. In addition to the technical survey rebate, Con Edison plans to offer program participants a tiered kWh buyback rebate structure. These buyback kWh rebates would be based on avoided or reduced kWh energy savings and reward participants for increasing the energy efficiency of systems and equipment. The tiered rebates would be capped at \$250,000 per project. Con Edison expects to serve 78 participants through this program with a budget of \$10,660,000 through 2011. The proposed program is expected to achieve 15,980 MWh in annual savings through 2011 and have 6.57 MW coincident peak savings.

NYSEG/RG&E - Non-Residential Small Business
Direct Installation Program (Electric)

These electric direct installation programs are similar to "fast track" programs of this type previously approved for all the electric utilities except NYSEG/RG&E. NYSEG/RG&E did not propose electric "fast track" programs. These programs are proposed for the non-residential customer segment with electric load of less than 100 KW. The programs are designed to identify cost-effective efficiency improvement opportunities and encourage customers to implement energy-efficiency improvements by providing a free assessment of a customer's facilities and direct installation of the measures selected by the customer on a cost-shared basis. Eligible measures would include, but are not limited to: lighting retrofits, incandescent exit signs, occupancy sensors, light emitting diode (LED) refrigeration case lights, and vending machine controls. NYSEG/RG&E propose an incentive of 70% of

installed measure costs, with a customer obligation for 30% of the costs. NYSEG's proposed overall program budget is \$20,228,000 through 2011. NYSEG's projected participation level is 2,200 customers in each of 2010 and 2011 (4,400 total through 2011) and projected annual electric savings is 35,276 MWh through 2011. RG&E's proposed overall program budget is \$9,174,000 through 2011. RG&E's projected participation level is 1,000 customers in each of 2010 and 2011 (2,000 total through 2011) and projected annual electric savings is 16,034 MWh through 2011.

NYSEG/RG&E - Non-Residential Commercial/
Industrial Custom Rebate Program (Electric and Gas)

These proposed programs are directed toward commercial, industrial, institutional, and municipal customers with an electric load of less than 2 MW, although customers with load greater than 2 MW would also be eligible to participate. The programs are designed to encourage customers to identify and implement energy efficiency improvements in their facilities. NYSEG/RG&E propose general categories of eligible measures for rebates that may include, but are not limited to: energy management systems, building thermal envelope upgrades, energy recovery systems and economizers, variable-speed air compressors, energy efficient process improvements, geothermal heating and cooling, day-lighting systems, infrared radiant heaters, steam traps, grain dryers, and heat-recovery systems. Rebates would be paid on the basis of either 50% of the incremental difference between the cost of a standard equipment measure and the comparable energy-efficient equipment option or the amount necessary to reach a two-year equipment payback period in energy consumption savings, whichever is less. NYSEG and RG&E propose no cap on the total rebate amount afforded to a single customer.

NYSEG proposes a cumulative electric program budget of \$5,862,000 and total cumulative savings of 15,634 MWhs for program years 2010 and 2011. NYSEG estimates that 130 customers would participate in the electric program component through 2011. For the gas component of the custom rebate program NYSEG proposes a total program budget of \$1,064,000 and total cumulative savings of 23,760 Dth. NYSEG estimates that 40 gas customers would participate through 2011.

RG&E proposes a cumulative electric program budget of \$3,712,000 and total cumulative savings of 9,586 MWhs for program years 2010 and 2011. RG&E estimates that 70 customers would participate in the electric program component through 2011. For the gas component of the custom rebate program RG&E proposes a total program budget of \$1,066,000 and total cumulative savings of 23,220 Dth. RG&E estimates that 40 gas customers would participate through 2011.

Con Edison - Commercial and Industrial
Custom Gas Efficiency Program (Gas)

The proposed program would provide a delivery channel for natural gas efficiency measures that are not available through Con Edison's other programs.³ It would offer performance-based financial incentives to customers installing non-traditional or emerging technologies that result in cost-effective energy efficiency savings. Tiered incentives would be offered for an extensive list of eligible measures in the following general categories: space and water heating; heating, ventilation, and air conditioning (HVAC) controls; space conditioning; cooking; building envelope; and commercial laundries. Tier 1 would pay incentives for projects that

³ Con Edison has too few large industrial customers to merit a separate program, so all of its industrial customers would be served by this program.

provide up to 20% energy reduction (\$1/first year therm savings); Tier 2 would pay a higher incentive for projects that provide greater than 20% energy reduction (\$2/first year therm savings). Total technical study incentives would be capped at \$50,000 for gas-only projects and \$67,000 for combined gas and electric measures projects. Financial incentives would be capped at \$100,000 per project/participant for natural gas measures. The proposed program budget is \$5,359,000. Anticipated cumulative annual savings are 113,400 Dth through 2011. Con Edison projects a total of 132 participants through 2011 (approximately 20 industrial and 112 commercial participants).

Niagara Mohawk - Commercial High-Efficiency Heating and Water Heating Program (Gas)

This program would offer prescriptive rebates to firm commercial customers and multifamily buildings that install high-efficiency heating and water heating equipment. The rebates would be designed to reduce the incremental cost between standard and high-efficiency equipment. Niagara Mohawk has proposed a total budget of \$2,636,819 for the period of 2010 through 2011, with a cumulative annualized savings of 68,369 MMBtu. The program's projected participation level is 1,336 participants.

KEDNY/KEDLI - Commercial High-Efficiency Heating and Water Heating Program (Gas)

This program would offer prescriptive rebates to firm commercial customers and multifamily building owners that install high-efficiency heating and water heating equipment. The rebates are designed to reduce the incremental cost between standard and high-efficiency equipment. KEDNY has proposed a total budget of \$1,618,880 for the period of 2010 through 2011, with a cumulative annualized savings of 38,664 MMBtu. KEDNY's

projected participation level is 600 participants. KEDLI has proposed a total budget of \$916,424 for the period of 2010 through 2011 with a cumulative annualized savings of 28,656 MMBtu. KEDLI's projected participation level is 400 participants.

INDEPENDENT PROGRAM ADMINISTRATOR PROPOSALS

The framework established for the EEPS program includes administration of the efficiency programs by either NYSERDA or the utilities. This framework is clearly within the Commission's role as a regulator rather than as an agency like NYSERDA that regularly performs service functions and awards contracts to do the same. Recognizing that delivery of the actual programs is often performed by contractors, and entities other than NYSERDA and the utilities may have innovative ideas that would add value to the EEPS program, the Commission established a process for potential independent program administrators to submit proposals to NYSERDA and the utilities for their consideration. The process was intended to allow for NYSERDA and the utilities to adopt innovative program types into their portfolios with the opportunity for potential independent program administrators to either partner with NYSERDA and/or the utilities on delivery, if possible, or to compete in a bidding process to obtain a contract from NYSERDA and/or the utilities to deliver the energy efficiency services. Most of the potential independent program administrators that emerged did not closely follow the process we outlined, or keep to our deadlines, but NYSERDA and the utilities did receive 15 independent program administrator proposals, which were addressed as part of the filings of program proposals. The independent program administrator proposals that were submitted are summarized in Appendix 2, along with summaries of the

assessments of such programs made by the utilities, NYSERDA and Staff.

PARTY COMMENTS

No comments were received on the individual utility or NYSERDA program proposals under consideration. Comments in support of energy efficiency programs for agricultural customers were received from the New York Farm Bureau, EnSave, Ag&Mkts, Janice Beglinger, John Chambers, Robert Chevako, Casandra Daggett, Lois Engle, Betty Holt, Terry Jones, Jeff Kays, Lynndee Kemmet, Amy Maxwell, John McDonough, Scott Osborn, Susan Petak, Ernest Ramsey, Paul Raymond, Carol Sheesley, Bill Wickham, and Patricia Worden. These comments are summarized below.

Ag&Mkts expresses its concern that the proposed EEPS programs are not tailored to meet the specific needs of the state's agricultural sector. According to Ag&Mkts, the programs as proposed are likely to exclude small farmers that pay residential rates, and eligibility that is determined by a customer's combination of type of account, volume of demand, type of meter, and service classification will further limit participation by farms and food processors with diverse process and production needs and highly specialized operations. Their rural locations are an additional disadvantage for participation in the EEPS programs that have been proposed. It recommends an agriculture-specific energy efficiency program which is standardized and available across utility territories.

Eighteen utility customers from various parts of New York State submitted comments calling for an energy efficiency program that addresses the needs of the state's agricultural community, which includes both farms and food processors. The letters express a belief that energy efficiency programs targeted for the agricultural community will help farms financially and improve the environment.

The New York Farm Bureau also wrote in support of an energy efficiency program aimed at the agricultural community, in a belief that the energy efficiency programs that have been approved to date have not recognized the unique nature of agricultural ratepayers. It states that helping farmers reduce energy usage will reduce energy costs for farms, improve their financial sustainability, and allow them to provide ongoing environmental benefits. While the Farm Bureau does not necessarily endorse the EnSave proposal (an independent program administrator program that would address the agricultural community) it finds the proposal more appropriate for its constituents than any of the other proposed programs. It encourages all utilities to modify their EEPS programs to improve agricultural participation.

EnSave submitted comments urging the Commission to act swiftly to approve EnSave's program and to allow it to work with NYSERDA to address NYSERDA's suggested modifications. EnSave supports creation of a statewide working group on agricultural energy efficiency programs, as suggested by other parties that submitted comments, but only after the Commission approves its program so as to avoid unreasonable delays in delivery of energy efficiency services. EnSave submitted documents in support of an energy efficiency program for the agricultural community generally, or the EnSave proposal specifically, from State Senator Darrel J. Aubertine, Dairy Farmers of America, Innovation Center for U.S. Dairy, the Farm Bureau, Assemblyman David Koon, Assemblyman William Magee, the National Association of Conservation Districts, New York Federation of Resource Conservation and Development Councils, and State Senator Catharine M. Young.

DISCUSSION

1. Funding Principles

As a general principle for all EEPS programs, monies collected from electric ratepayers should be used to fund only electric energy efficiency measures and monies collected from gas ratepayers should be used to fund only gas efficiency measures. Heating efficiency measures in buildings heated by a fuel source other than natural gas or electricity should not be funded by EEPS resources. Measures which are not cost effective on a stand-alone basis, and measures that do not contribute directly to achieving the Commission's electricity or gas usage reduction targets, should not be funded by EEPS resources. Each measure to be installed must be cost effective on a stand-alone basis such that the measure has a total resource cost (TRC) value of at least one prior to inclusion of program administrative and evaluation, measurement, and verification costs. Further, program administrators should determine that each project as a whole will be cost effective after inclusion of all program administrative and evaluation, measurement, and verification costs.⁴ The determination of total resource benefits must be based on avoided costs, carbon reduction per unit values, and all other inputs and assumptions in effect at the time benefit/cost analyses are performed.

Also, a limitation is needed on the amount of rebate that is provided for individual measures or projects. Consistent with the guideline that we previously established for other rebate programs for business customers, the total incentive paid for any rebate should not exceed an amount that produces less than a one-year payback for commercial customers and one-half year for industrial customers.

⁴ Utility program administrators must also include estimated shareholder performance incentive amounts for evaluating the cost-effectiveness of projects.

2. Benefit/Cost Analysis

All of the benefit cost estimates for electric and gas measure categories reported below are based either on numerous specific installations or on generic estimates. They are intended to suggest whether measure types are more or less likely to be cost-effective. However, the cost-effectiveness of a measure type is often highly site, and actual measure detail, specific. It may also depend on whether the context requires coverage of full costs or only of partial costs. For prescriptive measures, it will be necessary to either generically prescreen the measures for cost-effectiveness based on typical costs and savings⁵ or to prescreen them on a project-specific basis. For custom measures, it will be necessary to prescreen measures on a project-specific basis. The measures must achieve a resources benefit/cost ratio of at least one (1.0). The program's implementation protocol should include a TRC prescreening analysis both at the specific measure and project level before project funding commitments are made. We believe such a requirement will ensure cost-effective investments on behalf of ratepayers and will not be overly burdensome for large custom projects requiring engineering studies.

a. Gas Measure Level Benefit/Cost Analysis

Tables 1 below displays measure-category average TRC ratios for gas commercial and industrial measures which would be typical of the programs covered by this order. The TRC results indicate that many gas measures can be cost-effective as part of a commercial and industrial energy efficiency program.

The Table 1 gas measures are analyzed using avoided cost estimates for upstate and downstate service territories.

⁵ For prescriptive programs, the incentives would generally be based on typical costs. Higher costs would be at the participant's expense.

Section 1 and 2 of Table 1 are based on project details related to measures funded under National Grid’s Energy Initiative Program in Massachusetts. Section 3 addresses other measure types, for which Staff developed the measure cost and savings estimates by working with National Grid and Con Edison staff and public information sources.

Table 1
TRCs for Gas Energy Efficiency Measures

GAS MEASURES	TRC Measure Ratios With CO ₂	
	Downstate	Upstate
1. Modeled as Retrofit -- Total Measure Costs, Savings		
Boiler Combustion Controls	3.8	3.0
Boiler Reset Controls	1.8	1.5
Insulation	2.0	1.6
Windows C&I Scale	1.8	
Windows C&I Scale		2.4
2. Modeled as Replacement -- Estimated Incremental Cost: 40% of Total Measure Costs		
Condensing Boilers All Sizes	3.1	2.5
Cooking Equipment, Commercial/Institutional	5.6	4.4
Furnace 92% + AFUE	2.1	1.6
Furnace with ECM	2.0	1.6
Hydronic Boilers all Sizes	3.4	2.7
Infrared Space Heating	5.1	4.1
Water Heater – Indirect	2.4	1.9
Water Heater - On-Demand	1.4	1.1
3. Modeled as Retrofit -- Total Measure Costs, Savings		
Stack Heat Exchanger	4.1	3.3
Air to Air Heat Recovery	1.7	1.3
Boiler Oxygen Trim Controls (Sensor)	1.4	1.1
Boiler Blowdown Heat Exchanger (Steam)	3.3	2.6
Condensing Unit Heater	2.2	1.7
Direct-fired Heater/Makeup Air	3.1	2.4

Filings from Con Edison, National Grid, and NYSEG/RG&E provide information about the type of custom measures proposed

to be included in their programs. Many of the energy efficiency measures in widespread use by the commercial and industrial community will also be used as part of custom rebate programs. The additional analysis here will focus primarily on measures not covered in Table 1. For every measure, seasonal gas avoided costs (summer, winter, or year-round average) are used as appropriate.

Con Edison

Con Edison categorizes gas measures as either "market driven" or "retrofit". Market driven measures generally refer to either new construction or the replacement of in-place equipment near or at the end of its useful life ("end-of-life"). Retrofit refers to early replacement, as opposed to end of life replacement, and can also mean add-ons such as new controls equipment added to an existing system (not including the replacement of old controls). Con Edison's gas analyses follow benefit cost analysis conventions which prescribe that for market driven replacement the incremental costs of a new high efficiency model versus a new standard efficiency unit is modeled, whereas for retrofit measures the much higher full cost of the measure is modeled. Similarly, the market driven savings reflect only the energy consumption differential between the new standard and higher efficiency models, while retrofit savings are those between the new high efficiency equipment and the older equipment in place.

For the retrofit category, the higher costs and higher savings tend to offset each other, but not necessarily to the extent needed to make the replacement cost effective. This is especially so if recent efficiency improvements have been relatively modest. In some cases reported below (gas and electric), a measure appears generally cost-effective as a market driven replacement but not as a retrofit (early)

replacement. As regarding certain measures with generic TRC ratios below 1.0, it is not likely that they will prove to be cost-effective for funding in the site/measure/context-specific screening.

Con Edison has proposed a group of combination water heater/furnaces or water heater/boilers. For both the furnace and boiler combinations, the market driven replacements are strongly cost-effective, ranging from 1.8 to 4.5. The retrofit replacements, however, have ratios ranging from 0.9 to 1.0.

Con Edison also suggests use of a group of add-on heating, ventilation, and air conditioning (HVAC) controls. Energy management systems installation and HVAC commissioning, as modeled, are not cost-effective (0.3 and 0.4). However, optimizing existing energy management systems and retro-commissioning have TRCs of 1.3 and 1.8, respectively, and are cost effective. Zoning and programmable thermostats are also cost-effective (2.7 and 8.4).

Among Con Edison's numerous space-heating-only measures, various furnaces and boilers, modeled as end-of-life measures, have ratios similar to those on Table 1, Section 2, Downstate. When modeled as early replacement, all the furnaces/boilers have ratios lower than for end-of-life but still solidly passing the TRC test - 1.5 is the lowest value.

Many of the other proposed space heating measures are also shown on Table 1. While the ratios often vary between Table 1 and a Con-Edison-specific analysis, no measure shown as cost-effective Downstate on Table 1 is suggested not to be cost-effective in the current Con Edison analysis. Exhaust Hood - Demand Ventilation is the only end-of-life measure not on Table 1 but modeled by Con Edison; it has a TRC of 0.4.

Several retrofit/add-on measures are not covered in Table 1. These include:

Insulate and Seal ducts	TRC	0.7
Boiler Heating Pipe Insulation	TRC	10.8
Boiler Tune-Up	TRC	2.8
Electronic Parallel Positioning Controls	TRC	1.0
Repair/replace steam traps	TRC	11.9 ⁶
Insulate steam lines/condensate tank	TRC	10.5
Destratification Fans (HVLS)	TRC	1.5
Demand controlled ventilation	TRC	2.6

Con Edison also lists many Water Heating Only measures. The High Efficiency Stand Alone Commercial Water Heater fails as both end-of-life and early replacement (respectively, 0.9 and 0.5). The Condensing Stand Alone Commercial Water Heater passes as end-of-life (1.4) and fails as retrofit (0.6). On-Demand Tankless Water Heater with an Energy Factor grade below 0.95 fails as both an end-of-life (0.9) and retrofit (0.7) measure. On-Demand Tankless Water Heaters with a higher level of efficiency approximate the 1.4 in Table 1 when modeled as end-of-life replacement, while those modeled as retrofit fail at about 0.8. Indirect Water Heaters are solidly cost-effective on both an end-of-life and retrofit basis at TRC ratios of 3.5 and 2.4, respectively.

A number of water heating measures not covered on Table 1 easily pass our benefit/cost criterion. These include: Heat Recovery Water Heater, Pipe Wrap, Graywater Heat Exchanger/GFX, Low Flow Pre-rinse Spray Nozzle, and Circulation Pump Time Clocks. However, Solar Water Heating with gas auxiliary tank fails with a TRC of 0.4. Con Edison also lists three air conditioning measures not covered on Table 1, which,

⁶ However, in the September 18, 2009, EEPS Order, the table on page 8 showed a downstate ratio for steam traps of only 0.3, based on National Grid's New England experience.

despite lower summer gas avoided costs, all pass as end-of-life replacements, with TRC ratios ranging from 1.5 to 3.4.

Con Edison lists numerous commercial and industrial end-of-life replacement cooking measures. Table 1 shows a Downstate TRC ratio of 5.6 for such measures. Similarly, all the measures as modeled by Con Edison pass easily except a High Efficiency Gas Griddle at a TRC ratio of 0.6.

Among proposed building envelope measures, double and triple glazing low emissivity windows fail as end-of-life replacement measures with TRC ratios near 0.8. We have previously found commercial and industrial replacement of single pane windows with simple double pane fixtures downstate cost-effective at 1.8 (Table 1). The use of triple glazing and the low emissivity coating feature is not economically justified. Several other building shell retrofit measures are cost-effective as modeled,⁷ except Improved Below-Grade Insulation, with a TRC ratio of 0.4.

Finally, Con Edison proposes three Laundry measures which are modeled as cost-effective:

Wastewater, Filtration/Reclamation, retrofit	TRC 1.5
Ozone Commercial (Gas HW), retrofit	TRC 8.5
High Efficiency Clothes Washer, EOL replacement	TRC 1.1 ⁸

Niagara Mohawk

Most of the measures that Niagara Mohawk proposed for its Commercial High-efficiency Heating and Water Heating Program match those shown on Table 1 and are therefore considered cost-effective (all modeled as end-of-life replacement). For the

⁷ This result occurred even though measure life for four measures was reduced from 30 or 40 years to 25 years.

⁸ This measure was found to be cost-effective in the analysis for our June 2009 Multifamily Buildings order.

current programs, however, Niagara Mohawk provided measure costs and savings estimates from various sources which suggested that a few of the measures may be less cost-effective than is shown on Table 1 - such as Infrared Heaters (TRC ratio 1.7 with upstate avoided costs; 4.1 on Table 1) and on-demand tankless water heaters (TRC ratios of 0.8 upstate, 0.9 downstate; 1.1 and 1.4 on Table 1). High Efficiency Condensing Unit Heaters appear to be the only new measure, with a TRC ratio of 2.2.

NYSEG/RG&E

NYSEG and RG&E propose broad categories of custom rebate measures without specifying individual measures. However, except for grain dryers, the broad categories would reasonably include the measures covered on Table 1 or in the Con Edison and Niagara Mohawk discussions above. NYSEG and RG&E have provided no detail on grain drying equipment.

b. Electric Measure Level Benefit/Cost Analysis

Table 2 below displays measure-category average TRC ratios for electric commercial and industrial measures which would be typical of the programs covered by this order. The TRC results indicate that many electric measures can be cost-effective as part of a commercial and industrial energy efficiency program.

Table 2, Section 1 reports benefit/cost ratios for four categories of electric measures: compressed air, custom, lighting, and variable speed drives, reflecting National Grid's aggregated Massachusetts experience. The underlying data was used to develop TRC ratios specifically related to operation and maintenance and industrial process projects. The Section 2 measure-type TRC ratios are based on NYSERDA's Existing Facilities program. The lighting TRC ratio represents the aggregate TRC of a sample of completed projects provided by NYSERDA. The other NYSERDA items reflect typical costs and

savings estimated by a NYSERDA consultant and a 70%/30% weighting of downstate and upstate costs and savings. Except where specifically identified as retrofit or replacement project, the measure-type TRCs reflect a mix of retrofit and replacement projects.

Table 2
TRCs for Electric Energy Efficiency Measures

ELECTRIC MEASURE TYPES	TRC Measure Ratios with CO ₂	TRC Measure Ratios with CO ₂
	Downstate	Upstate
1. NIAGARA MOHAWK		
Compressed Air		1.2
Custom		1.8
Lighting		4.9
Variable Speed Drives		3.4
Operations and Maintenance (within Custom)		6.7
Industrial Processes (within Custom)		1.2
2. NYSERDA		
Variable Frequency Drives Retrofit	6.2	
Variable Frequency Drives New Construction	9.3	
Motors, Totally Enclosed Fan Cooled	1.6	
Commercial Kitchen Equipment	3.1	
Chillers	10.1	
Commercial Washers	4.6	
Motors, Open Drift Proof	2.6	
Refrigeration Equipment	4.1	
HVAC (without ground-source heat pumps)	6.9	
Lighting	4.8	3.4

Con Edison

Con Edison has provided life, savings, and cost information on measures proposed for consideration in its custom rebate program for electric commercial and industrial customers. For this analysis, all measure costs, measure lives, and energy and capacity savings are as reported by Con Edison, based on

engineering calculations and numerous references.⁹ The measures that Con Edison has detailed with benefit cost information all relate to either hospitals or data/server centers. For hospitals, the measures include various lighting and HVAC measures, described variously as retrofits and end-of-life replacements. The average TRC ratio for the list of twenty hospital measures is 4.0 when weighted by cost and savings per measure, but not weighted by the number of measures that might be adopted. Four types of the hospital measures, however, have ratios around 0.4 to 0.6. They are described as retrofit, three-year life operational opportunities regarding ventilation, space heat, water heat, and miscellaneous.

For data/server centers, Con Edison has modeled three groups of measures. The lighting measures have often been found cost-effective elsewhere. All of the cooling measures are focused on cooling the computer machinery year-round.¹⁰ Six twenty-year life chillers¹¹ have TRC ratios ranging from 1.3 to 1.7. Among ten-year life add-on measures, Chiller-Water Side Economizers are very cost-effective at about 5.2, and Variable Speed Drive Remodels for existing motors are more borderline at 1.2. However, ten-year life "component level cooling-spray cooling on chips to reduce heat loads" has a ratio of 1.0 to 1.3 depending on Con Edison's modeled configuration.

⁹ References are made to government agencies (e.g., DEER, CEC, EPA, Energy Star, LBL), energy efficiency and trade organizations (e.g., ACEEE, Lighting Control Association), periodicals (e.g., InfoWorld), utilities (e.g., PG&E, BC Hydro), consulting firms (e.g., GDS, RS Means, Accenture), manufacturers (e.g., Grainger Industrial, IBM, Siemens, Trane, Intel), and vendors.

¹⁰ Therefore, annual average avoided kWh costs were applied in the analysis instead of summer avoided costs.

¹¹ Apparently assigned incremental costs and savings by Con Edison representing choice among new models.

For the 13 "plug load" measures (with measure lives of 4 or 5 years, variously described by Con Edison as retrofit and end-of-life measures), the average TRC ratio is 2.5 when weighted by cost and savings per measure, but not weighted by the number of measures that might be adopted. However, four measures do not appear cost-effective whether described by Con Edison as end-of-life or retrofit. High efficiency UPS (Uninterruptible Power Supply) has a TRC of approximately 0.7 either way. "Massive Array of Idle Disks" versus standard efficient data storage has a TRC below 0.3 as either end-of-life or retrofit.

c. Program Level Benefit/Cost Analysis

All of the program TRC ratios¹² reported below are calculated consistent with Commission orders and Staff guidelines on system inputs, such as long run avoided costs, and methodology. They include administrative and evaluation costs, shareholder performance incentives for the utilities, the CO2 adder, and the Technical Manual free rider default estimate (with Staff's treatment of rebates paid to free riders). However, each ratio, in relation to the ratios of other proposed programs, is highly dependent on the program administrator's estimates of measure costs and savings, and assumptions about the mix of cost-effective measures participants will select (very cost-effective measures versus minimally cost-effective ones). Various levels of detail regarding the assumptions behind the aggregate program TRC ratios have been provided to Staff, but generally not enough to allow Staff to review those estimates fully. Still, the measure-type ratios above confirm that each company, with reasonable administrative costs, should

¹² In certain cases the ratios reflected in the original and recent filings have been modified by the program administrator after discussion with Staff to make them consistent with relevant orders and guidelines.

be able to conduct a cost-effective program using the measures shown.

TRC Ratios for the Programs as a Whole¹³

Utility	Program Name	Electric/Gas	TRC
Con Edison	C&I Custom Efficiency	Electric	2.1
Con Edison	C&I Custom Gas Efficiency Equipment Rebate	Gas	2.6
Niagara Mohawk	Commercial High-efficiency Heating and Water Heating	Gas	3.0
NYSEG	Non-residential C&I Custom Rebate	Electric	1.5
NYSEG	Non-residential C&I Custom Rebate	Gas	1.9
NYSEG	Non-residential Small Business Direct Installation	Electric	1.9
RG&E	Non-residential C&I Custom Rebate	Electric	1.4
RG&E	Non-residential C&I Custom Rebate	Gas	1.9
RG&E	Non-residential Small Business Direct Installation	Electric	1.9

3. Customer Outreach and Education/Marketing

Consistent with prior orders, and as part of the utility program implementation plans and NYSERDA operating plan for the commercial and small industrial customer energy efficiency programs, each of the program administrators will submit program-specific marketing plans for certification by the Director of the Office of Consumer Services.

4. Approved Programs

The total amount of funding we shall approve at this time for the commercial and small industrial customer market sector reflects in part our calculation of the proportional share of the expected cost of EEPS electric and gas programs divided pro rata by customer market sector, and the need to retain a portion of the total allocation for commercial and small industrial customer programs for programs that will be considered later. The funding of gas programs further reflects

¹³ Unlike the measure level tables, these ratios include administrative and evaluation costs and shareholder performance incentives for the utilities, as well as appropriate free rider treatment. As with the measure ratios, the CO2 adders are included.

the fact that some of the gas programs will replace existing interim energy efficiency programs.

Con Edison - Commercial & Industrial
Custom Efficiency Program (Electric)

This program is approved without modifications other than the adjustments to the annual program budget and energy savings levels, and the other generic modifications to all programs as described in this order. In addition, all installed measures included as part of the program must be cost-effective on a stand-alone basis and on a project basis as described above.

NYSEG/RG&E - Non-Residential Small Business
Direct Installation Program (Electric)

In our June 23, 2008 EEPS Order we invited the electric utilities to submit their proposals for two "fast track" energy efficiency programs, including a Small Business Direct Installation Program for customers with peak demand less than 100 MW. NYSEG/RG&E did not submit electric fast track program proposals but included these proposed programs in their 90-day program portfolio proposals. According to NYSEG/RG&E, they are designed to conform to the requirements for the Small Business Direct Installation Programs of the other utilities that we approved in our January 16, 2009 EEPS Order Approving "Fast Track" Utility-Administered Electric Energy Efficiency Programs with Modifications.

We find that the programs are consistent with our requirements and acceptable in all respects except that the NYSEG/RG&E's programs as proposed would cost substantially more per MWh for the energy savings goals proposed than was approved for the other utilities. The other approved program budgets and MWh goals have similar cost allowances per MWh and NYSEG/RG&E

have not provided sufficient support for higher costs per unit of energy saved than was allowed the other utilities.

Therefore, we approve the programs with adjustments to the annual budgets and MWh goals such that the approved program cost per MWh is \$268, an amount similar to that approved for the other utilities. The resulting program budgets and MWh goals are shown in Appendix 3.

NYSEG/RG&E - Non-Residential Commercial/
Industrial Custom Rebate Program (Electric and Gas)

The NYSEG/RG&E program description needs to be modified to specify that all NYSEG and RG&E commercial and industrial customers will be eligible to participate in the program, but that only NYSEG/RG&E electric customers of record with an electric load of 100 KW or greater will be eligible to participate in the electric programs, and that only NYSEG/RG&E commercial and industrial gas customers of record will be eligible to participate in the gas programs. Further, NYSEG/RG&E proposed that eligibility to receive rebates for installed gas measures would be assumed based on electric eligibility qualification. However, we do not believe that a gas customer who pays an SBC surcharge should be required to meet a specific electric load threshold in order to participate in a natural gas energy efficiency program. Therefore, we direct NYSEG/RG&E to offer the gas program to all non-residential gas customers who pay the SBC surcharge, regardless of their electric load. It is our expectation that large industrial customers will be eligible to participate in these programs without the specific set-aside of funding suggested in the NYSEG/RG&E comments dated July 2, 2009.

Con Edison - Commercial and Industrial
Custom Gas Efficiency Program (Gas)_____

This program is approved without modifications other than the adjustment of the annual program budget and energy savings levels, and other generic modifications to all programs, as described in this order

Niagara Mohawk - Commercial High-Efficiency
Heating and Water Heating Program (Gas)_____

This program would offer prescriptive rebates to firm commercial customers and multifamily buildings customers. However, the Commission separately considered the multifamily building customer market segment and addressed the appropriate level of corresponding funding allocations deemed reasonable to serve that particular segment of the residential gas market. Niagara Mohawk was authorized a specific budget to implement a multifamily program to serve its gas customers at that time. We have concerns related to overlapping programs, such as proper attribution of program costs and energy savings and the need for utility programs and NYSERDA programs to coexist within each service territory as complementary, rather than as competing, programs. Therefore, Niagara Mohawk is directed to offer prescriptive rebates only to firm commercial customers, and is precluded from offering the program to customers in multifamily buildings with five or more dwelling units.

5. Deferred Programs

KEDNY/KEDLI - Commercial High-Efficiency
Heating and Water Heating Program (Gas)_

KEDNY/KEDLI filed an update to this program on October 20, 2009, which reflected substantial changes in the program's design and resulted in an increase in the cost per

unit of saved energy.¹⁴ KEDNY/KEDLI has informed Staff that the updated program proposals reflect recent experience gained from their Interim Gas Program experience. The revisions were received too late to allow for adequate Staff review. Therefore, we are unable to act on this program at this time. KEDNY/KEDLI should continue to operate their corresponding Interim programs until further notice. In addition, Staff should work with the companies to obtain the information that is required for Staff to make an informed recommendation to us regarding the revised programs at a later date.

6. Program Funding

The electric energy efficiency proposals for this market segment totaled more than \$190 million in annual spending. The gas efficiency proposals totaled more than \$27 million in annual spending, which is more than twice the amount of funding we are allocating to this market segment.

The annual program budgets, evaluation budgets, and energy savings goals for the approved commercial and industrial programs shall be as set forth in Appendix 3. For the commercial and industrial programs considered here, the total amount of funding we shall approve at this time reflects in part our calculation of the proportional share of the expected cost of EEPS electric and gas programs divided pro rata by customer market segment and the need to retain a portion of the total allocation for commercial and industrial customer programs for programs that will be considered later. We are also committing to this market segment some electric monies we had intended to allocate to the large industrial market sector, and a portion of

¹⁴ In contrast, Niagara Mohawk also filed an update to its Commercial High-Efficiency Heating and Water Heating Program on October 20, 2009, which reduced program costs compared to projected energy savings (from \$49/Dt down to \$39/Dt) and increased the projected total energy savings through 2011 with no requested changes to the program budget.

the "fast track" monies provided in our June 23, 2008 EEPS Order. In particular, NYSEG and RG&E did not seek to conduct the Non-residential Small Business Direct Installation Program as a "fast track" program and are instead seeking to conduct such programs now. The funding of gas programs further reflects the fact that some of the gas programs will replace existing interim energy efficiency programs.

7. Independent Program Administrator Proposals

Niagara Mohawk, in its initial September 22, 2008 filing, included one of the independent program administrator proposals in its proposed portfolio. It incorporated Positive Energy's residential behavioral marketing proposal as part of its Building Practices and Demonstration program. We will be evaluating the merits of the Building Practices and Demonstration program at an upcoming session. On November 3, 2008, Central Hudson submitted an update to its EEPS proposals to include a program based on a proposal submitted to it by Positive Energy. In its September 22, 2008 EEPS submittal, NYSERDA expressed interest in further investigation of proposals submitted to it by EnSave, Inc. and EnerNOC, Inc.

After review of the independent program administrator proposals we concur with the utility and NYSERDA assessments about disposition of these proposals and recommend that, with the possible exception of the Building Practices and Demonstration program which we will not be deciding on here, these proposals are not appropriate as stand-alone programs run by an independent administrator. Several of the proposals, however, employ concepts worth exploring as elements of EEPS or SBC-funded programs that have already been approved and could be undertaken within the existing NYSERDA and utility energy efficiency program framework. We encourage the existing program administrators to explore ways to incorporate the proposed

independent program administrator programs within their program frameworks to the extent feasible consistent with competitive practices.

Three types of programs singled out as promising by NYSERDA and the utilities are a program for efficient agricultural fixtures and equipment, such as that proposed by EnSave; commissioning systems,¹⁵ such as that proposed by EnerNOC, Inc.; and behavioral marketing to encourage residential customers to take energy saving actions, along the lines of the proposal from Positive Energy (now known as OPower). We concur with NYSERDA and with those that submitted comments that the agricultural community has unique needs that are not well addressed within the existing EEPS program structure. We therefore direct NYSERDA to lead a collaborative effort to determine how best to incorporate an agricultural energy efficiency program within its EEPS-funded Existing Facilities Program. With regard to commissioning, in October 2009 we approved commissioning efforts as part of National Grid's Energy Initiative program. Other program administrators should examine the inclusion of commissioning as part of their approved energy efficiency programs, with appropriate updates to their implementation plans. We will address the merits of a behavioral marketing approach to energy efficiency in an upcoming review of EEPS residential program proposals. It should also be noted that some of the independent program administrator proposals might be appropriate as proposed or as tailored into responses to competitive solicitations by the utilities and NYSERDA.

¹⁵ "Commissioning" is a quality assurance process to ensure that energy efficiency measures and systems are designed, installed, calibrated, and operated as designated in the design specifications.

8. Policy Guidelines Regarding Customized Incentives

Large commercial and industrial customers often require customized energy efficiency programs to best meet their individual needs. As a result, programs offered by NYSERDA and the utilities include customized incentive payments that may be a percentage of the overall cost of a particular project. However, we must ensure the appropriate expenditure of ratepayer dollars. Therefore, we will require that NYSERDA or the utilities obtain proper documentation (i.e., itemized invoices depicting the installation costs of the energy efficiency measures) before any energy efficiency incentives are paid that are based on a total overall cost of a project. Program administrators should ensure that EEPS program funding is used only for costs associated with end-use energy savings equipment.

9. Program Evaluation

- a. Con Edison - Commercial & Industrial Custom Efficiency Program (Electric),
Con Edison- Commercial and Industrial
Custom Gas Efficiency Program (Gas)

Con Edison has included evaluation plans for each of the programs under consideration here that employ similar evaluation strategies. The plans cover key elements, including process and impact evaluations, budgets, sampling strategies, net impact analysis, and steps to mitigate threats to data reliability. Con Edison will use an outside consultant to conduct the evaluations under the management of its recently created independent measurement, verification, and evaluation section. The process evaluations will rely on methods such as document reviews and surveys of samples of participants and non-participants to achieve objectives, such as improving program performance and overcoming barriers to program participation. Since the number of participants in the Commercial Custom Gas Efficiency Equipment Rebate program is likely to be small during

the program's early stages, all participants will be surveyed for the purposes of this program's process evaluation but non-participants will not be surveyed. The impact evaluations will include a variety of methods, including pre-and post installation inspections and pre-and post longitudinal analysis. For the electric Commercial and Industrial Custom program, the impact analysis will explore the specific measures targeted by the program (lighting, HVAC, and plug load). The details of the impact methodologies will be more fully defined after an evaluation contractor is selected.

The plans generally comport with the guidelines developed by Staff and the Evaluation Advisory Group pursuant to our June 2008 EEPS Order. While adequate as a first step, more detailed evaluation plans are necessary to explain more fully the evaluation approach, standards, and budget. For example, while Con Edison states that for each of the programs the budget for evaluation and market research is 5% of the total budgets, it has not yet determined how the dollars will be apportioned between these two activities and specific evaluation elements such as process and impact evaluation. The plans also fail to address how Staff and the Evaluation Advisory Group will be engaged to execute their oversight responsibilities. The evaluation plans should offer the opportunity for Staff to review the critical elements of the evaluation process, including customer surveys, statistical approaches, modeling techniques, and draft reports.

- b. NYSEG/RG&E - Non-Residential Small Business Direct Installation Program (Electric), NYSEG/RG&E - Non-Residential Commercial/ Industrial Custom Rebate Program (Electric and Gas)_____

NYSEG/RG&E filed with their program proposals a generic evaluation plan designed to cover the 12 programs in

their proposed portfolio of energy efficiency programs. NYSEG/RG&E affirm a commitment to quality evaluation and the evaluation guidelines that were developed by Staff and the Evaluation Advisory Group, but offer few supporting details. While they promise to provide these details upon hiring an independent evaluation contractor, Staff cannot review an evaluation plan without additional program specific detail on key evaluation components. These include process and impact evaluations, budget, sampling strategy, and steps to improve data reliability. The plan must also address how Staff and the Evaluation Advisory Group will be engaged to execute their oversight responsibilities. In addition, the reporting protocol outlined by NYSEG/RG&E must be made consistent with the requirements outlined in our June 2008 EEPS Order. Specifically, there is no mention of plans to submit the required monthly "scorecard report" and NYSEG/RG&E propose to provide the required annual reports to us "approximately 90 days following the end of the calendar year" when we require the annual report no later than 60 days after the conclusion of the calendar year.

c. Niagara Mohawk - Commercial High-Efficiency Heating and Water Heating Program (Gas)

Niagara Mohawk provided an evaluation plan that addresses key activities including process and impact evaluation, budget, sampling strategies, steps to mitigate threats to data reliability, and the data collection process. The evaluation plan generally comports with the evaluation guidelines developed by Staff and the Evaluation Advisory Group pursuant to our June 2008 EEPS Order. While the proposed evaluation plan is adequate as a first step, a more detailed evaluation plan is necessary to explain more fully Niagara Mohawk's evaluation approach, standards, and budget. Niagara

Mohawk has established an evaluation budget of 5% of the program funding, but notes that the actual budget could be higher or lower. Moreover, there is no breakdown of the approximate cost of the key elements of the evaluation effort, such as process and impact evaluation. As for sampling strategies, Niagara Mohawk agrees to statistical reliability goals consistent with Staff's evaluation guidelines, but does not provide information about the sampling protocols and cautions that "actual evaluation results may deviate from this standard." The scope and timing of evaluation effort is not sufficiently defined, the impact evaluation methodology is left open-ended, and there is no breakdown of data for specific measures. In general we find that the plan as presented lacks needed specificity. Also, the discussion of how Staff and the Evaluation Advisory Group will execute their oversight and coordination responsibilities is inadequate. The evaluation plan should also provide an opportunity for Staff to review the critical elements of the evaluation process, including customer surveys, statistical approaches, modeling techniques, and draft reports.

10. Collections

The schedule of collections we are approving today will commence on April 1, 2010. This will allow us to coordinate these increases with others we anticipate may result from the consideration of other EEPS programs and funding levels in the near future as we complete the current round of reviews and take stock of the entire portfolio. To the degree that EEPS programs are replacing rate plan and/or "interim" energy efficiency programs, it is our intention that the costs for such programs should be collected in an SBC charge and not through some other revenue mechanism.

SEQRA FINDINGS

Pursuant to our responsibilities under the State Environmental Quality Review Act (SEQRA), in conjunction with this order we find that programs approved here are within the overall action previously examined by us in Case 07-M-0548 and will not result in any different environmental impact than that previously examined. In addition, the SEQRA findings of the June 23, 2008 Order in Case 07-M-0548 are incorporated herein by reference and we certify that: (1) the requirements of SEQRA, as implemented by 6 NYCRR part 617, have been met; and (2) consistent with social, economic, and other essential considerations from among the reasonable alternatives available, the action being undertaken is one that avoids or minimizes adverse environmental impacts to the maximum extent practicable.

CONCLUSION

For the reasons given in the discussion above, the Commission approves, with modifications, electric and gas energy efficiency programs designed to serve the commercial and industrial customer market segment to be administered by Con Edison, Niagara Mohawk, NYSEG, and RG&E. It does not approve programs proposed by KEDNY and KEDLI. The utility and NYSERDA decisions not to include independent program administrator proposals within the filings they submitted in response to our June 23, 2008 EEPS order are deemed appropriate. Nevertheless, the utilities and NYSERDA are encouraged to consider how concepts addressed in the independent program administrator proposals might be incorporated within the existing EEPS framework. In addition, the Commission approves adjustments to the rate of SBC collections from ratepayers to ensure the correct level of funding for all EEPS programs approved.

The Commission orders:

1. System Benefits Charge (SBC) funding for Energy Efficiency Portfolio Standard (EEPS) programs to be administered by Consolidated Edison Company of New York, Inc. (Con Edison); Niagara Mohawk Power Corporation d/b/a National Grid (Niagara Mohawk); New York State Electric and Gas Corporation (NYSEG); and Rochester Gas and Electric Corporation (RG&E) is approved by program as set forth in Tables 1 and 2 of Appendix 3 of this order. The annual program budgets, evaluation budgets, and energy savings goals for the programs shall be as set forth in Tables 1 and 2 of Appendix 3 of this order. Funding may not be reallocated among programs without further approval by the Commission.

2. Con Edison, Niagara Mohawk, and NYSEG/RG&E shall, within 60 days of the issuance of this order, submit Implementation Plans for their approved EEPS programs that reflect this order and Staff Guidelines for preparing the implementation plans that are to be provided by the Director of the Office of Energy Efficiency and the Environment within 15 days of the issuance of this order. The programs, including measures, quality assurance, marketing, administration, and evaluation plans, should be described and implemented in a manner that is consistent with the discussion in this order. The types of measures and the level of particular financial inducements/incentives/rebates shall not be changed except in consultation with Staff; any disagreements shall be brought to the Commission for resolution.

3. Con Edison, Niagara Mohawk, and NYSEG/RG&E shall each incorporate reports on these programs into the periodic quarterly program and evaluation reports, annual program reports and evaluations, and monthly scorecard reports already required for the other EEPS programs they administer. Con Edison,

Niagara Mohawk, and NYSEG/RG&E shall track their expenditures on evaluation-related market research in such a manner that they may be reported and scrutinized in the future. Within sixty days of the issuance of this order, the Director of the Office of Energy Efficiency and Environment will provide to these entities guidance on any specific periodic reporting requirements applicable to these specific programs.

4. In the Implementation Plans, Con Edison, Niagara Mohawk, and NYSEG/RG&E are directed to also include the following information related to their outreach and education (O&E)/marketing programs and, if necessary, to submit new budgets:

- (a) specific budget amounts for each individual element of the O&E/marketing budget for each year of the program;
- (b) a list and description of the O&E/marketing vehicles to be used;
- (c) an explanation of the target audiences for each program component;
- (d) a timeline for the development, implementation and evaluation of the O&E/marketing efforts;
- (e) how the O&E/marketing programs relate to the entity's general and other O&E/marketing programs; and
- (f) the efforts that will be undertaken to minimize any overlap and/or customer confusion that may result from O&E/marketing activities in the same or adjacent market areas.

5. Annual reports of each calendar year's O&E/marketing program achievements, as available to date, and updated plans for the upcoming calendar year, shall be submitted each year with the third quarter status report so that they can be reviewed prior to the end of each program year.

6. All O&E/marketing plan components of the compliance filings will be subject to review and certification by the Director of the Office of Consumer Services that they conform to the requirements of this order before they shall be implemented.

7. The electric System Benefits Charge (SBC) is augmented such that beginning on April 1, 2010, the 2010 level of overall SBC electric revenue collections is increased by \$4,568,571, and such that beginning on January 1, 2011, the annual level of overall SBC electric revenue collections is increased by an additional \$1,522,858, to be collected in the manner shown in Table 3 of Appendix 3.

8. The gas SBC is augmented such that beginning on April 1, 2010, the 2010 level of overall SBC gas revenue collections is increased by \$2,534,544, and such that beginning on January 1, 2011, the annual level of overall SBC electric revenue collections is increased by an additional \$844,846, to be collected in the manner shown in Table 4 of Appendix 3.

9. Each utility affected by this order shall file tariff amendments and/or statements on not less than 30 days' notice to become effective April 1, 2010, incorporating the revisions described herein. The requirements of Section 66(12)(b) of the Public Service Law as to newspaper publication of the changes proposed by these filings is waived.

10. To the degree that EEPS programs are replacing rate plan and/or "interim" energy efficiency programs, it is our intention that the costs for such programs should be collected in an SBC charge and not through some other revenue mechanism, and our action today will result in concurrent decreases in collections for some rate plan and/or interim energy efficiency programs.

11. Shareholder incentives and net lost revenues are not addressed by this order. If Con Edison, Niagara Mohawk, NYSEG, or RG&E have a rate plan that provides for either, it shall consult with Staff and then propose whatever adjustments are necessary in such provisions, if any, due to changes in circumstances arising from this order.

12. The budgets approved in this order are to be funded by an SBC; they do not represent traditional rate allowances in the sense that any under-spending shall result in the utility drawing down less money from the SBC collections. Efficiencies in that regard are for the benefit of ratepayers, not shareholders. Con Edison, Niagara Mohawk, NYSEG, and RG&E shall manage the EEPS and SBC funds prudently and within the budgets authorized by the Commission.

13. NYSERDA is encouraged to meet with interested utilities and Staff to discuss how best to address the energy efficiency needs of the agricultural community. Within 90 days of the issuance of this order, NYSERDA shall submit a proposal to the Commission describing how an agriculture-focused program could be incorporated as a component within the EEPS Existing Facilities Program.

14. The Secretary in her sole discretion may extend the deadlines set forth herein.

15. These proceedings are continued.

By the Commission,

(SIGNED)

JACLYN A. BRILLING
Secretary

DESCRIPTIONS OF PROPOSED COMMERCIAL AND INDUSTRIAL PROGRAMS

Con Edison - Commercial and Industrial Custom Efficiency Program (Electric)

Con Edison submitted a set of electric-only program proposals in its September 22, 2008 filing and provided an update to the Commercial & Industrial (C&I) Custom Efficiency program on October 21, 2009. The C&I Custom Efficiency program would promote any energy efficiency measures in existing buildings and new construction that are not offered by other Con Edison programs for new or existing commercial and industrial customers.

The proposed cumulative budget through 2011 is \$10,660,000. Projected cumulative annual savings are 15,980 MWh through 2011. Con Edison expects that the program would serve 56 healthcare facilities and 22 data centers to achieve a coincident peak demand reduction of 6.57 MW in 2011.

Con Edison provided a breakdown of the C&I Custom Efficiency program as shown in the tables below for the years 2010 and 2011.

**Con Edison C&I Custom Efficiency Program
Proposed Electric Program Costs for 2010- 2011**

	2010	2011	Total
Program Planning and Administration	\$350,000	\$357,000	\$707,000
Program Marketing & Trade Ally	\$550,000	\$562,000	\$1,112,000
Customer Incentives or Services	\$2,375,000	\$4,295,000	\$6,670,000
Program Implementation	\$750,000	\$766,000	\$1,516,000
Evaluation and Market Research	\$275,000	\$380,000	\$655,000
Total Utility Cost	\$4,300,000	\$6,360,000	\$10,660,000

**Con Edison C&I Custom Efficiency Program
Proposed Electric Program Participants and Savings for 2010- 2011**

	2010	2011	Total
Participants	28	50	78
Annualized MWh Savings	5,760	10,220	15,980
MW Savings	2.37	4.20	6.57

The C&I Custom Efficiency program would initially target data centers and healthcare facilities to promote energy efficiency upgrades including, but not limited to, the measures shown below.

**Con Edison C&I Custom Efficiency Program
Data Center and Healthcare Facility Measures**

Data Center Measures
Server Virtualization
Comatose servers and data storage units
Replacing inefficient servers
Power management software
Energy efficient data storage devices
High efficiency cooling, fans, and HVAC
High efficiency lighting (with occupancy sensors)
Healthcare Facility Measures
Commissioning and retro-commissioning
Optimization of controls
Premium motors
Premium HVAC components
High efficiency lighting
High efficiency chillers (excluding steam driven chillers)
High efficiency cooling towers

In addition to these measures, Con Edison would offer financial incentives for industrial and commissioning measures (shown in the table below) or for upgrading equipment or systems not covered specifically by other Con Edison C&I programs.

**Con Edison C&I Custom Efficiency Program
Industrial and Commissioning Measures**

Industrial Measures
Lean Manufacturing
Increased Machine Effectiveness
Improved Product Quality
Reduced Costs
Reduced Lead Times
Improved Process-flow
Increased Inventory Turns
Facility Optimization
Commissioning Measures
Retro-commissioning
Enhanced Building Operations
Monitoring-based Commissioning

To determine program eligibility, customers would provide documentation for the energy savings expected from a proposed measure based on pre-established criteria set by Con Edison. Con Edison proposes to provide up to 50% of the cost for a technical survey to identify cost-effective measures and to provide additional incentives for measures to be installed based on a tiered level of energy savings. The technical study total rebate amount would be capped at \$50,000 and buyback incentives would be capped at \$250,000 per project. A Con Edison funded technical survey would not be a prerequisite to receiving the commercial buyback rebate offered in the C&I Custom Efficiency program. Any cost-effective project analyzed by a professional engineer or qualified contractor would be eligible to receive the tiered rebate.

The proposed tiered kWh buyback rebate structure would reward customers for increasing energy efficiency levels for both equipment and systems installed. These tiers and corresponding buyback rebates are shown in the table below. As noted in the table, Tier 4 provides for up to a 10% bonus to the

Tier 1-3 rebate if energy savings result in a 5% or greater peak demand reduction.

**Con Edison C&I Custom Efficiency Program
Tiered Buyback Rebate Structure**

Tier	Savings Level	Buyback Rebate
Tier 1	Up to 10% energy reduction	\$0.08/kWh
Tier 2	11 to 20% energy reduction	\$0.10/kWh
Tier 3	> 20% energy reduction	\$0.12/kWh
Tier 4	≥ 5% peak demand reduction	10% bonus

Con Edison proposes to use a combination of internal staff and third party contractors to administer, deliver, and implement the C&I Custom Efficiency program. Con Edison would train staff and contractors on processes and procedures associated with the program, such as reporting, roles and responsibilities, quality assurance, administrative procedures, budgets, and timelines.

Con Edison proposes to use a mix of marketing strategies to reach the C&I customer market segment. It plans to leverage existing relationships and to market the program through direct mail, the internet and outreach to trade allies and industry partners.

Con Edison - Commercial and Industrial
Custom Gas Efficiency Equipment Rebate Program (Gas)

On April 30, 2009, Con Edison filed a proposal for a suite of energy efficiency programs which included Multifamily, Multifamily Low Income, and Large Industrial Gas programs. Con Edison updated the proposal on May 20, 2009. On June 5, 2009, Con Edison filed a proposal for a set of commercial gas energy efficiency programs. On September 9, 2009, Con Edison submitted an updated proposal combining a number of previously proposed gas programs into two programs, a Commercial and Industrial (C&I) Gas Efficient Equipment Rebate Program and a C&I Custom Gas Efficiency Program.

Con Edison's proposed C&I Custom Gas Efficiency program provides a delivery channel for natural gas efficiency measures that are not eligible for incentives through Con Edison's other programs.¹

The proposed program budget through 2011 is \$5,359,000.

Anticipated cumulative annual savings are 113,400 Dth through 2011. Con Edison projects a total of 132 participants through 2011 (approximately 20 industrial and 112 commercial participants).

Con Edison provided a breakdown of the C&I Custom Efficiency program as shown in the tables below for the years 2010 and 2011.

**Con Edison C&I Custom Gas Efficiency Program
Proposed Program Costs for 2010- 2011**

	2010	2011	Total
Program Planning and Administration	\$73,797	\$108,361	\$182,158
Program Marketing & Trade Ally	\$158,911	\$293,373	\$452,284
Customer Incentives or Services	\$1,616,432	\$2,663,204	\$4,279,636
Program Implementation	\$79,851	\$110,679	\$190,530
Evaluation and Market Research	\$96,029	\$158,457	\$254,486
Total Utility Cost	\$2,025,000	\$3,334,000	\$5,359,000

**Con Edison C&I Custom Gas Efficiency Program
Proposed Program Participants and Energy Savings for 2010-2011**

	2010	2011	Total 2010-2011
Participants	48	84	132
Annualized Dth Savings	45,360	68,040	113,400

The program would be available to all firm gas customers installing new or replacement equipment in existing commercial or industrial facilities (including governmental, institutional, and non-profit facilities). Con Edison would

¹ Con Edison has too few large industrial customers to merit a separate program, so all of its industrial customers would be served by this program.

offer performance-based financial incentives to customers installing non-traditional or emerging technologies that result in cost-effective energy efficiency savings. Con Edison proposes an extensive list of measures eligible for incentives in the following general categories: space and water heating; heating, ventilation, and air conditioning (HVAC) controls; space conditioning; cooking; building envelope; and commercial laundries.

Con Edison would offer customers a tiered incentive based on therm savings resulting from the custom measure. To qualify for financial incentives, eligible customers would be required to provide documentation that their proposed efficiency upgrades would pass Con Edison's cost-effectiveness threshold and technical criteria. Con Edison proposes to provide up to 50% of the cost for a technical survey for a gas measures-only project and 30% of the cost of a technical study for gas measures, when combined with the incentive available for custom electric measures under a gas/electric comprehensive project. Total technical study incentives are capped at \$50,000 for gas only projects and \$67,000 for combined gas and electric measures projects. Financial incentives would be capped at \$100,000 per project/participant for natural gas measures.

A Con Edison-funded technical study would not be a prerequisite to receiving the incentive offered by the C&I Custom Gas Efficiency program. Any cost-effective project that has been analyzed by a qualified professional engineer or other qualified contractor may be eligible to receive the tiered incentive. Con Edison may provide additional reimbursement subject to program guidelines (i.e., incentives for oil to gas conversion customers).

Con Edison C&I Custom Gas Efficiency Program

Tier 1	Up to 20% energy reduction	\$1/first year therm savings
Tier 2	Over 20% energy reduction	\$2/first year therm savings

Con Edison proposes to use a combination of internal staff and third party program implementation contractors to administer and deliver the proposed C&I Custom Gas Efficiency program. Con Edison would train staff and contractors about processes and procedures associated with the program and would integrate this program with the electric component of the C&I Custom Efficiency Program. Con Edison expects to maintain rigorous contractor qualification standards for its C&I Custom Gas Efficiency Program. Participating contractors would be required to complete an application and screening process which, at a minimum, will require them to possess any necessary licenses and knowledge of industry best practices for project analysis and equipment installation.

Con Edison plans to market its electric and gas C&I Custom Efficiency Programs using a unified, customer-targeted approach. Marketing is expected to reflect appropriate technology and facility types for a given customer segment rather than individual natural gas or electric measures or programs. Con Edison intends to proactively market its energy efficiency programs by leveraging existing relationships and using customer data to direct customer-focused, targeted promotional activities to specific sectors identified as having strong potential for energy efficiency savings. Con Edison employs account executives to support its largest C&I customers and this staff will conduct individual marketing and provide ongoing customer support for the C&I energy efficiency programs.

KEDNY, KEDLI and Niagara Mohawk Commercial High-Efficiency Heating and Water Heating Program (Gas)

On September 22, 2008, KeySpan New York (KEDNY, KeySpan Long Island (KEDLI), and Niagara Mohawk filed the proposed Commercial High Efficiency Heating and Water Heating Program. They subsequently filed updates to the program

proposals on October 20, 2009. The program offers prescriptive rebates to firm commercial customers and multifamily buildings which install high-efficiency heating and water heating equipment. The rebates are designed to reduce the incremental cost between standard and high-efficiency equipment.

KEDNY had initially (September 22, 2008) proposed a total budget of \$1,618,880 for the period 2010 through 2011, with a cumulative annualized savings of 38,664 MMBtu. KEDNY's projected participation level was 600 participants.

KEDLI had initially (September 22, 2008) proposed a total budget of \$916,424 for the period 2010 through 2011, with a cumulative annualized savings of 28,656 MMBtu. KEDLI's projected participation level was 400 participants.

Niagara Mohawk has proposed a total budget of \$2,636,819 for the period of 2010 through 2011, with a cumulative annualized savings of 68,369 MMBtu. The program's projected participation level is 1,336 participants.

The program would offer a range of rebates to allow for broad participation from small to large commercial customers. Rebates will include high efficiency furnaces and boilers, low-intensity infrared heaters, high-efficiency condensing unit heaters, and direct-fired make-up air systems. Rebates will also be offered for high-efficiency indirect water heaters and instantaneous tankless water heaters.

The prescriptive rebates would vary depending on the type of heating equipment installed, but will be capped at \$15,000 per piece of equipment. A project cap of \$100,000 will be applied. KEDLI, KEDNY, and Niagara Mohawk require that any project with more than ten rebates will need pre-approval from the company. In addition, they state that they reserve the right to negotiate a lower rebate amount per-unit for multiple installations at a single site to ensure that rebate dollars are

helping participants reduce the true incremental costs of installing the equipment.

The program would be promoted primarily to contractors, architects, engineers, equipment vendors, and other trade allies. Since many of the trade allies overlap in the residential and smaller multifamily and commercial markets, the program may be promoted together with the Residential High Efficiency Heating and Water Heating and Controls Program. It would be marketed to customers using KEDLI, KEDNY, and Niagara Mohawk's account management staff, through equipment dealers, HVAC contractors, as well as through direct marketing to customers.

KEDNY Proposed Program Costs for 2010-2011 :

Commercial High-Efficiency Heating and Water Heating	2010	2011	Total
Program Planning and Administration	\$143,617	\$143,617	\$287,234
Program Marketing & Trade Ally	\$138,600	\$138,600	\$277,200
Customer Incentives or Services	\$450,000	\$450,000	\$900,000
Program Implementation	\$27,500	\$27,500	\$55,000
Evaluation and Market Research	\$49,723	\$49,723	\$99,446
Total Utility Cost	\$809,440	\$809,440	\$1,618,880

KEDLI Proposed Program Costs for 2010-2011:

Commercial High-Efficiency Heating and Water Heating	2010	2011	Total
Program Planning and Administration	\$59,313	\$59,313	\$118,626
Program Marketing & Trade Ally	\$98,453	\$98,453	\$196,906
Customer Incentives or Services	\$260,000	\$260,000	\$520,000
Program Implementation	\$18,626	\$18,626	\$37,252
Evaluation and Market Research	\$21,820	\$21,820	\$43,640
Total Utility Cost	\$458,212	\$458,212	\$916,424

Niagara Mohawk Proposed Program Costs for 2010-2011:

Commercial High-Efficiency Heating and Water Heating	2010	2011	Total
Program Planning and Administration	\$254,899	\$298,833	\$553,732
Program Marketing & Trade Ally	\$84,966	\$99,611	\$184,577
Customer Incentives or Services	\$728,283	\$853,808	\$1,582,091
Program Implementation	\$84,966	\$99,611	\$184,577
Evaluation and Market Research	\$60,690	\$71,151	\$131,841
Total Utility Cost	\$1,213,805	\$1,423,013	\$2,636,819

KEDLI, KEDNY and Niagara Mohawk Proposed Eligible Measures and Incentives Levels

Product & Rating	Rebate
Furnace (up to 150 MBH) 92% AFUE or greater	\$400
Furnace (up to 150 MBH) 92% AFUE or greater & ECM motor	\$500
Condensing Unit Heater (151 to 400 MBH) 90% thermal efficiency	\$500
Direct fired heaters/direct fired makeup air (up to 1,500 MBH)	\$1,000
Direct fired heaters/direct fired makeup air (1501 – 3000 MBH)	\$1,500
Direct fired heaters/direct fired makeup air (over 3,000 MBH)	\$2,000
Infrared heaters (all sizes) Low Intensity	\$500
Steam Boiler (up to 300 MBH) 82 % AFUE or greater	\$700
Hydronic Boilers (up to 300 MBH) 85% AFUE or greater	\$1,000
Hydronic Boilers (301 to 499 MBH) 85% Thermal Efficiency	\$2,000
Hydronic Boilers (500 to 999 MBH) 85% Thermal Efficiency	\$2,500
Hydronic Boiler (1000 to 1700 MBH) 85% Thermal Efficiency	\$3,500
Hydronic Boiler (1701 MBH and larger) 85% Thermal Efficiency	\$5,000
Condensing Boiler (up to 300 MBH) 92 AFUE or greater	\$2,000
Condensing Boiler (301 to 499 MBH) 92% thermal efficiency	\$3,000
Condensing Boiler (500 to 999 MBH) 92% thermal efficiency	\$5,000
Condensing Boiler (1,000 to 1,700 MBH) 92% thermal efficiency	\$10,000
Condensing Boiler (1701 MBH and larger) 92% thermal efficiency	\$15,000
Indirect fired water heaters (up to 50 gallon storage)	\$100
Indirect fired water heaters (up to 50 gallon storage)	\$300
On Demand Tankless water heaters with energy factor of .82 or higher and electronic ignition	\$500

New York State Electric & Gas Corporation and Rochester Gas and Electric Corporation - Non-residential Commercial and Industrial Custom Rebate Program (Electric and Gas)

New York State Electric & Gas Corporation (NYSEG) and Rochester Gas & Electric (RG&E) propose custom energy efficiency rebate programs for their non-residential electric and gas customers. They originally filed the program proposals on September 22, 2008 and filed updates on April 22 and 24, 2009 and on August 4 and 6, 2009.

The programs are targeted at commercial, industrial, institutional, and municipal customers with an electric load of less than 2 MW, although customers with a load of 2 MW or more would be eligible to participate. The programs are designed to encourage commercial and industrial customers to identify and implement cost-effective energy efficiency improvements in their facilities beyond those available through the prescriptive rebate program.

NYSEG proposes a cumulative electric program budget of \$5,862,000 and total cumulative savings of 15,634 MWhs for the program years 2010 and 2011. NYSEG estimates that 130 customers would participate in the electric program through 2011. For the gas component of the custom rebate program, NYSEG proposes a total program budget of \$1,064,000 and total cumulative savings of 23,760 Dth. NYSEG estimates that 40 gas customers would participate through 2011.

RG&E proposes a cumulative electric program budget of \$3,712,000 and total cumulative savings of 9,586 MWhs for the program years 2010 and 2011. RG&E estimates that 70 customers would participate in the electric program through 2011. For the gas component of the custom rebate program, RG&E proposes a total program budget of \$1,066,000 and total cumulative savings of 23,220 Dth. RG&E estimates that 40 gas customers would participate through 2011.

NYSEG and RG&E provided the following breakdown of the proposed Commercial and Industrial Energy Efficiency program costs for the years 2009-2011 by category:

**NYSEG Non-residential Commercial and Industrial Custom Rebate Program - Electric
Proposed Program Costs for 2010-2011**

	Startup	2010	2011	Total
Customer Incentives or Services	0	\$1,764,000	\$1,764,000	\$3,528,000
Program Planning and Administration	0	\$246,000	\$246,000	\$492,000
Program Implementation Costs	\$100,000	\$641,000	\$641,000	\$1,382,000
Program Marketing and Trade Ally	\$20,000	\$88,000	\$88,000	\$196,000
M & V	\$2,000	\$131,000	\$131,000	\$264,000
Direct Utility Costs	\$122,000	\$2,870,000	\$2,870,000	\$5,862,000

**NYSEG Non-residential Commercial and Industrial Custom Rebate Program - Electric
Proposed Program Participants and Savings for 2010- 2011**

	2010	2011	Total
Customers	65	65	130
Annual MWh Savings	7,817	7,817	15,634

**NYSEG Non-residential Commercial and Industrial Custom Rebate Program - Gas
Proposed Program Costs for 2010- 2011**

	Startup	2010	2011	Total
Customer Incentives or Services	0	\$238,000	\$238,000	\$476,000
Program Planning and Administration	0	\$50,000	\$50,000	\$100,000
Program Implementation Costs	\$100,000	\$158,000	\$158,000	\$416,000
Program Marketing and Trade Ally	\$20,000	\$4,000	\$4,000	\$28,000
M & V	\$2,000	\$21,000	\$21,000	\$44,000
Direct Utility Costs	\$122,000	\$471,000	\$471,000	\$1,064,000

**NYSEG Non-residential Commercial and Industrial Custom Rebate Program - Gas
Proposed Program Participants and Savings for 2010- 2011**

	2010	2011	Total
Customers	20	20	40
Annual Dth Savings	11,880	11,880	23,760

RG&E Non-residential Commercial and Industrial Custom Rebate Program - Electric
Proposed Program Costs for 2010- 2011

RG&E Electric	Startup	2010	2011	Total
Customer Incentives or Services	0	\$1,144,000	\$1,144,000	\$2,288,000
Program Planning and Administration	0	\$127,000	\$127,000	\$254,000
Program Implementation Costs	\$100,000	\$384,000	\$384,000	\$868,000
Program Marketing and Trade Ally	\$20,000	\$57,000	\$57,000	\$134,000
M & V	\$2,000	\$83,000	\$83,000	\$168,000
Direct Utility Costs	\$122,000	\$1,795,000	\$1,795,000	\$3,712,000

RG&E Non-residential Commercial and Industrial Custom Rebate Program - Electric
Proposed Program Participants and Savings for 2010- 2011

	2010	2011	Total
Customers	35	35	70
Annual MWh Savings	4,793	4,793	9,586

RG&E Non-residential Commercial and Industrial Custom Rebate Program - Gas
Proposed Program Costs for 2010- 2011

RG&E Gas	Startup	2010	2011	Total
Customer Incentives or Services	0	\$232,000	\$232,000	\$464,000
Program Planning and Administration	0	\$45,000	\$45,000	\$90,000
Program Implementation Costs	\$100,000	\$170,000	\$170,000	\$440,000
Program Marketing and Trade Ally	\$20,000	\$4,000	\$4,000	\$28,000
M & V	\$2,000	\$21,000	\$21,000	\$44,000
Direct Utility Costs	\$122,000	\$472,000	\$472,000	\$1,066,000

RG&E Non-residential Commercial and Industrial Custom Rebate Program - Gas
Proposed Program Participants and Savings for 2010- 2011

	2010	2011	Total
Customers	20	20	40
Annual Dth Savings	11,610	11,610	23,220

NYSEG and RG&E propose to use their internal marketing and sales personnel and trade allies to encourage customers to replace existing equipment with high performance energy efficient equipment. Promotional activities may also include bill inserts, targeted mailings, and informational advertising.

NYSEG and RG&E propose general categories of eligible measures for rebates that may include, but are not limited to, energy management systems, building thermal envelope upgrades, energy recovery systems and economizers, variable-speed air compressors, energy efficient process improvements, geothermal heating and cooling, day lighting systems, infrared radiate heaters, steam traps, grain dryers, and heat recovery systems.

Rebates would be paid on the basis of either 50% of the incremental cost between the standard equipment measure and the comparable energy-efficient equipment option or the amount to reach a two-year equipment payback period in energy consumption savings, whichever is less. No specific cap on the total rebate amount afforded to any one particular customer is proposed.

The program would be administered by the utilities and implemented through the use of a competitively selected contractor that would assist in delivering the programs in both service territories. The implementation contractor would be employed for application intake, review and approval, and for processing incentive payments. NYSEG and RG&E propose that responsibilities be shared between the utilities and the implementation contractor for reporting, customer care, and quality assurance, and that other EEPS program functions may be conducted by contractors at the utilities' direction. A separate evaluation contractor would be used for measurement, verification, and evaluation of the program.

NYSEG and RG&E state that not every customer would require technical assistance, nor would a program-provided energy assessment be required to qualify for measure rebates. However, technical assistance could be provided by the program upon request by a customer, and within program cost-effectiveness criteria and Commission-approved budget

parameters. Proof of installation would be verified by invoice, or other acceptable documentation, submitted with a customer application prior to the payment of a rebate.

NYSEG/RG&E - Non-residential
Small Business Direct Installation Program (Electric)

NYSEG/RG&E propose these programs to provide energy efficiency improvements for non-residential customers with electric load of less than 100 kW. The programs are designed to identify cost-effective efficiency improvement opportunities and encourage customers to implement energy-efficiency improvements by providing a free assessment of a customer's facilities and direct installation of the measures selected by the customer on a cost-shared basis. The direct installation of selected measures would be subject to 70%/30% cost-sharing where the utility pays for 70% of the total installed measure costs. Eligible measures would include, but are not limited to, lighting retrofits, incandescent exit signs, occupancy sensors, light emitting diode (LED) refrigeration case lights, and vending machine controls. No cap on the total amount of incentive per customer account is proposed.

NYSEG's proposed overall program budget for the program is \$20,228,000 through 2011. NYSEG's projected participation level is 2,200 customers in 2010 (4,400 total through 2011) with proposed annual electric savings of 35,276 MWh through 2011.

RG&E's proposed overall program budget for the Non-residential Small Business Direct Installation Program is \$9,174,000 through 2011. RG&E's projects a participation level of 2,000 through 2011, with proposed annual electric savings of 16,034 MWh through 2011.

**NYSEG Non-residential Small Business Direct Installation Program
Proposed Program Costs for 2010-2011**

	Start-up	2010	2011	Total
Program Planning and Administration	\$0	\$715,000	\$715,000	\$1,430,000
Program Marketing & Trade Ally	\$25,000	\$607,500	\$607,500	\$1,240,000
Customer Incentives or Services	\$0	\$7,260,000	\$7,260,000	\$14,520,000
Program Implementation	\$205,000	\$1,109,000	\$1,109,000	\$2,423,000
Evaluation and Market Research	\$3,000	\$306,000	\$306,000	\$615,000
Total Utility Cost	\$233,000	\$9,997,500	\$9,997,500	\$20,228,000

**RG&E Non-residential Small Business Direct Installation Program
Proposed Program Costs for 2010-2011**

	Start-up	2010	2011	Total
Program Planning and Administration	\$0	\$300,000	\$300,000	\$600,000
Program Marketing & Trade Ally	\$25,000	\$277,500	\$277,500	\$580,000
Customer Incentives or Services	\$0	\$3,300,000	\$3,300,000	\$6,600,000
Program Implementation	\$205,000	\$455,000	\$455,000	\$1,115,000
Evaluation and Market Research	\$3,000	\$138,000	\$138,000	\$279,000
Total Utility Cost	\$233,000	\$4,470,500	\$4,470,500	\$9,174,000

The companies would rely on their own account representatives to manage customer eligibility, make initial contact with customers, and enlist eligible customer participants. A third-party implementation contractor would be used to deliver the programs.

DESCRIPTIONS AND ASSESSMENTS OF PROGRAMS SUBMITTED BY
INDEPENDENT PROGRAM ADMINISTRATORS

Air Power USA, Inc. (Large Industrial - Electric)

Organization Receiving Proposal: NYSERDA

Program Description:

Air Power USA, Inc. (Air Power) proposes to provide air compression audits, implementation support, and monitoring for twenty-five large industrial customers.

The program primarily targets large industrial customers. Air Power estimates that these customers comprise approximately 20% of NYSERDA sites with a load of more than one MW and 30% of industrial load for the entire state. The program sponsors propose that the small number of customers involved will allow 100% of field savings to be verified by pre- and post-installation measurement. The program would complement the existing NYSERDA FlexTech program by providing re-piping for industrial compressed air customers, new control systems, and air-reduction measures. FlexTech could help implement other energy saving measures at the same location where Air Power projects would be undertaken.

Estimated Number of Customers Served: 25 through 2011

Program Costs: \$288,000 per customer

Estimated Energy Savings: 40,000 MWh in 2011

NYSERDA Assessment:

NYSERDA has determined that the Air Power proposal would not achieve the targeted MWh savings within the time period established by the June 23, 2008 EEPS Order. It also determined that the payment and deliverables schedule are misaligned and that the program duplicates existing NYSERDA offerings. The Air Power proposal reflects an individual project development proposal rather than a sufficiently detailed developed program, as required by the EEPS Order. NYSERDA has suggested that Air Power submit its proposed projects directly to the appropriate NYSERDA program area for future consideration as part of the NYSERDA program solicitation process.

Staff Assessment:

Air Power is an established company that provides various pneumatic (compressed air) technical services and support throughout a variety of industries. Air Power's services could fit within NYSERDA's existing C/I programs, and potentially within a utility industrial and/or block bidding program, but is not appropriate as a separately administered program.

American Wind Power & Hydrogen, LLC (Institutional - Electric)**Organization Receiving Proposal:** NYSERDA**Program Description:**

American Wind Power & Hydrogen, LLC (AWP&H) proposes to install an energy efficiency project that would provide base load and peak power production through the use of hydrogen-powered fuel cell technology.

The sponsor proposes the installation of a single energy efficiency project consisting of a facility in the northern New York City/Westchester area that would provide high efficiency base load power production and peak power production to supply electric energy to the distribution or wholesale electric grid or to the Metro North Railroad.

A typical fuel-cell driven facility would produce 250 KW of base load electric power and an additional 300 KW of electric power during peak load hours. Sites considered for fuel cell implementation are Manhattan College, SUNY in Westchester County (Purchase), or Farmingdale State College. Farmingdale State College has previously proposed to NYSERDA that renewable portfolio standard incentive funding of \$1 million be provided for a 300 KW fuel cell installation project. In addition, National Grid has agreed to provide \$850,000 for the Farmingdale project. These funds would be used as part of the matching funds required for a \$7 million project to be proposed to the US Department of Energy (DOE). A proposal was to have been submitted to DOE on August 27, 2008 for funding under a \$130 million request for fuel cell proposals.

Estimated Number of Customers Served: 1**Program Costs:** \$7,050,000**Estimated Energy Savings:** 2,704 MWh annually (single installation)**NYSERDA Assessment:**

NYSERDA found that the MWh reductions would not be achieved within the timeframe established by the June 23 EEPS Order. It also determined that there is an insufficient alignment of payments and deliverables and that the potential exists for AWP&H to have an unfair competitive advantage as a

result of the proposal. NYSERDA also found that there are rate impact concerns resulting from the program's payment of an excessively large proportion of measure cost. NYSERDA concluded that the AWP&H proposal represents project development and management, as opposed to program development, and would be more appropriately considered as an individual project eligible to participate in NYSERDA or utility-sponsored programs.

Staff Assessment:

There is technical merit to furthering hydrogen technologies, but the AWP&H proposal does not fit into the Energy Efficiency Portfolio Standard framework as an independent program.

City University of New York (New York City Commercial and Institutional - Electric)

Organizations Receiving Proposal: Con Edison and NYSERDA

Program Description:

This proposal, from the City University of New York Institute for Urban Systems Building Performance Lab (Building Performance Lab), seeks to establish standards and procedures to accelerate and broaden the acceptance of "commissioning" as an important conservation tool. It also proposes to use "student interns both as a way of controlling some of the labor-intensive aspects of retro-commissioning project costs and to develop new career pathways and workforce resources." The program would coordinate with NYSERDA and utility incentive programs to incorporate retro-commissioning within existing buildings and identify other opportunities for enhanced building operations that might otherwise be lost.

The program would develop a multi-tier process, starting with prescriptive standards based on various system types and conditions. The New York City Retro-commissioning Program would use best practices drawn from other programs to establish pre-approved guidelines and methods for retro-commissioning and enhanced building operations, similar to those that are part of programs offered by PSE&G and Southern California Edison in California, and Excel Energy in Colorado.

The overall objective of the program is to accelerate the penetration of retro-commissioning and enhanced building operations in the New York City commercial and institutional buildings market. This market segment comprises approximately 1 billion square feet of floor area. Without aggressive implementation of retro-commissioning and enhanced building operations, the Building Performance Lab expects that only about 2.5% of the New York City building stock will undergo retro-commissioning. The Building Performance Lab believes that this rate could be doubled, to approximately 5% by 2012, through use of this program.

Estimated Number of Customers Served: 25,000,000 square feet of floor space in New York City

Program Costs: \$1.2 million per year

Estimated Energy Savings: \$20 million in retail energy cost savings

NYSERDA Assessment:

NYSERDA has determined that the Building Performance Lab proposal should not be considered further because the savings objectives can not be reached within the time frame established by the EEPS Order, there is insufficient alignment of payment deliverables, the program could provide an unfair competitive advantage, and there is redundancy with existing NYSERDA program offerings.

Staff Assessment:

Staff concurs that this proposal should be rejected as an independent program administrator program. The Building Performance Lab could, however, examine ways to work within the existing NYSERDA and Con Edison energy efficiency program delivery structures to encourage use of retro-commissioning and enhanced building operations in the New York City area.

Conservation Services Group (Residential and Low Income - Electric)

Organizations Receiving Proposal: NYSEG/RG&E

Program Description:

Consumer Services Group (CSG) proposes a contractor and customer-focused heating, ventilation, and air conditioning (HVAC) training and installation program. CSG has worked with National Grid administering a similar program in Massachusetts and Rhode Island. CSG is also operating air conditioner efficiency programs in California and in the Kansas City area of Kansas and Missouri. CSG has also provided services to the Long Island Power Authority (LIPA).

The proposed program seeks to develop HVAC contractor capability for selling and delivering higher quality equipment to customers and for educating and motivating customers to understand and demand better equipment and installation quality with lower lifecycle costs. The program features the early retirement of the most inefficient systems and the adoption of above-code equipment and whole-house integration strategies. Emphasis is placed on adequate sizing of installed equipment and quality installation and maintenance.

A central element of the program design is working with installation contractors to help them understand the value of using high-efficiency measures and the importance of the marketing, sales, and technical business elements required to make such efficiency programs work.

Estimated Number of Customers Served: Not identified

Program Costs: Not identified

Estimated Energy Savings: Not identified

NYSEG/RG&E Assessment:

NYSEG/RG&E determined that the Conservation Services Group program proposal recommends a set of measures designed to facilitate program implementation rather than providing a complete program proposal. CSG was encouraged to submit a response to the companies' planned residential HVAC program request for proposals.

Staff Assessment:

Staff concurs with NYSEG/RG&E's assessment of this proposal. CSG should work within the existing utility and/or NYSERDA energy efficiency program framework.

Consumer Powerline, Inc. (Potentially all Customer Market Sectors - Electric)

Organizations Receiving Proposal: Central Hudson, Con Edison, National Grid, NYSEG, NYSERDA, Orange & Rockland, and RG&E

Program Description:

This proposal from Consumer Powerline, Inc. consists of two parts. Part A involves installation of energy efficiency measures in residential and low income buildings that would be conducted by NYSERDA. Specifically, it would give away compact fluorescent light bulbs at no cost to the consumer. Part B of the proposal would create a "white tag" auction market to be administered and managed by NYSERDA. White tags are the equivalent of renewable energy credits that are used in renewable energy markets, however, instead of representing a unit of energy generated using renewable energy sources a white tag represents a unit of energy saved as a result of energy efficiency initiatives.

Estimated Number of Customers Served: No information provided

Program Costs: No information provided

Estimated Energy Savings: 10,630,583 MWh in 2011

NYSERDA, NYSEG/RG&E Assessments:

NYSERDA finds that the Consumer Powerline direct installation component of this proposal directly conflicts with existing opportunities that are currently offered. It also determined that the estimate of savings and the proposed timeframe required to achieve those savings does not comport with the Commission's Energy Efficiency Portfolio Standard orders.

NYSEG/RG&E have determined that approving or implementing a proposal involving certificate trading as described by Consumer Powerline exceeds the authority provided to them under the Commission's Energy Efficiency Portfolio Standard orders. They therefore reject the proposal.

Staff Assessment:

Staff agrees that this proposal should be rejected. Any direct install energy efficiency services (Part A) should be provided through existing or planned utility and/or programs.

White tag (Part B) systems are nascent, emerging approaches that require additional policy deliberations before consideration can be given to rolling out operational programs. Furthermore, this proposal lacked detail concerning program costs, target markets, customers, and operational information.

CoolNRG USA, Inc. (Residential and Low Income - Electric)**Organizations Receiving Proposal:** Con Edison and NYSERDA**Program Description**

CoolNRG proposes to rapidly distribute approximately 2.7 million compact fluorescent light bulbs with a concurrent highly publicized and targeted marketing campaign, using an approach that the company has used in other parts of the world. The program relies on reaching 1.35 million households in a one week time span. A significant element of the marketing effort is the offer of two free compact fluorescent light bulbs with a \$5 purchase at Duane Reade drugstores (the sole distribution partner). These bulbs would be placed in a specially branded retail box for the campaign. CoolNRG and its media partner would undertake a large-scale promotional campaign for a prize giveaway that rewards recipients of special light bulbs which will be randomly inserted in the product supply and will illuminate green only when inserted and turned on. The program sponsor indicates that it believes that this campaign represents a significant media opportunity and could likely generate large-scale public interest.

Estimated Number of Customers Served: 36% of New York City households (which represents 15% of New York State households) in one week.

Program Costs: 0.7 cents per kWh. The total proposed program cost is \$5,542,250.

Estimated Energy Savings: 860,890 MWh over the life of the compact fluorescent bulbs distributed.

NYSERDA Assessment:

NYSERDA has determined that the CoolNRG proposal should not be pursued further because of the potential for unfair competition (e.g. sole distributorship), the high proportion of measure cost (up to 100%) borne by the program directly, and the overlap with existing NYSERDA programs.

Staff Assessment:

Staff agrees that this program should be rejected. Energy efficiency lighting programs are well underway, and

NYSERDA has spent years on market transformation efforts, building and strengthening the supply chain, and encouraging lighting improvements at the customer level through a variety of customer-focused delivery channels. There is no compelling need for this type of independently administered program and the cost for overhead associated with the program is high compared with existing programs.

EarthKind Energy, Inc. (Residential, Low Income, Small Commercial - Electric)

Organizations Receiving Proposal: Central Hudson, Con Edison, National Grid, NYSEG, NYSERDA, Orange & Rockland, and RG&E.

Program Proposal:

EarthKind Energy, Inc. (EarthKind) proposes to become an independent program administrator to provide solar thermal technologies to electric hot water customers through 2011 and beyond. EarthKind states that its mission is to "ignite the market for solar thermal technologies, and to catalyze the rapid acceptance and installation of fuel-free solar heat and solar hot water systems."

The program would sponsor solar installations, which is expected to increase general awareness and subsequent use of solar technologies by proving the value of solar hot water to residential customers and the worth of solar hot water, solar space heating, and photovoltaic installations in commercial settings. This proposal would initially provide a program of residential hot water for domestic use. Due to the variability of commercial applications and customers across the state, EarthKind would reserve pursuit of commercial applications for a later date.

Estimated Number of Customers Served: 5,000 total by 2015

Program Costs: \$25 million through 2015 (\$5,000 per installation)

Estimated Energy Savings: 17,000 MWh by 2015

NYSERDA and NYSEG/RG&E Assessments:

NYSERDA has determined that claimed program benefits may not be achievable within the timeframe established by the EEPS Order. NYSERDA also found that there is insufficient alignment of payment and deliverables. NYSEG/RG&E encouraged EarthKind to submit a block bidding proposal as part of an energy efficiency program that has not yet been considered by the Commission.

Staff Assessment:

Solar thermal systems have improved in their capabilities and cost-effectiveness in recent years and EarthKind

Energy has developed an established reputation in this field. EarthKind has developed relationships with manufacturers, suppliers, and installers and has already completed work in New York within existing NYSERDA programs. Estimated Total Resource Cost values for this program are below 1.0. Consequently, Staff agrees with NYSERDA and the utilities that solar thermal development should be completed within existing or planned NYSERDA and/or utility programs and not through the EEPS process.

EnerNOC, Inc. (Commercial, Industrial, and Institutional - Electric and Gas)

Organizations Receiving Proposal: Con Edison, National Grid, NYSEG, NYSERDA, RG&E.

Program Description:

Monitoring-based commissioning would target selected commercial customers for installation of energy monitoring equipment, review of facility energy use and detailed audits. Monitoring-based commissioning refers to a combination of remote retro-commissioning and continuous commissioning activities, coupled with ongoing technology-based monitoring that ensures persistent savings.

Targeted customers would be carefully screened and selected for participation to yield the greatest savings. The cost of participation and initial equipment installation could be covered, in part or in whole, by the program to offset any initial customer cost barriers that might exist. Initial benchmarking would be completed together with site-specific audits to determine inefficient operations and identify opportunities for system upgrades and /or capital improvements that could lead to cost-effective energy reduction.

Identification of eligible customer participants would be done cooperatively among the utilities, NYSERDA (where appropriate), and the customer. Working Group IV in the Energy Efficiency Portfolio Standards Proceeding (which dealt with emerging technologies, next-generation network management, and customer load management) carefully considered this innovative and cost-effective approach to energy efficiency and recommended that monitoring-based commissioning be approved by the Commission as an eligible EEPS measure.

The program has a proposed implementation budget of \$3,267,150 and assumes implementation of measures for a total of 12 customers, with expected savings of 73,226 MWh and 2.5 MMTherms of energy through 2015. EnerNOC has expressed its willingness to modify the initial budget estimate to meet utility

program objectives. Customers would be enrolled in 2009-2011 and each would receive three years of ongoing monitoring. On-going monitoring would provide an opportunity to address the inevitable drift away from optimum operations and focused maintenance.

Estimated Number of Customers Served: 180

Program Costs: \$15,021,525 total from 2009-2011

Estimated Energy Savings: 47,329 MWh in 2011; 1,590,000 therms in 2011

NYSEG/RG&E and NYSERDA Assessment:

NYSEG/RGE has encouraged EnerNOC to submit its proposal to the block bid program that NYSEG/RG&E have submitted and has not yet been considered by the Commission.

NYSERDA has recommended that the project be considered on a limited basis (approximately \$5 million) and use a recognized regional or national benchmarking scorecard rather than a proprietary approach. According to NYSERDA, the program would also benefit from close coordination among utilities and NYSERDA, greater clarification of the program's payment and deliverables schedule (including reducing front-loading and linking payments to energy savings performance), and increased goals for market penetration.

Staff Assessment:

The program proposes use of a promising approach for meeting the needs of commercial, industrial, and institutional customers involving commissioning and performance measurement. EnerNOC currently provides demand response and energy efficiency services to a number of New York customers (through various utility and NYISO programs) and it is not clear whether its provider role might conflict with a program administrator role. Staff encourages further discussion of how this type of program might be incorporated into existing utility and NYSERDA energy efficiency programs.

EnSave, Inc. (Agricultural - Electric)

Organizations Receiving Proposal: NYSEG, NYSERDA and RG&E

Program Description:

EnSave proposes the development of a New York Agriculture Energy Efficiency Program that would provide audits and incentives to farms for installation of energy efficiency measures and would take advantage of some federal funding (USDA-REAP). EnSave proposes to implement projects at farm sites and to work with upstream markets to expand the energy efficiency options available from equipment manufacturers and dealers. Proposed efficiency measures include high speed exhaust and circulation fans, variable speed well pumps, compact fluorescent light bulbs, sprinkler and drip-irrigation equipment, milk handling equipment (e.g. coolers, transfer pumps heat recover units, and compressors for bulk tanks), premium efficiency electric motors, storage water heaters, tank and pipe insulation, and greenhouse curtains. Rebates would be paid following verification of installation and operation of eligible measures. The proposed schedule of rebates is \$.08 per kWh saved for electric measures except lighting, \$.05 per kWh saved for lighting, and \$.14 per therm saved for gas efficiency measures.

EnSave partners closely with the National Association of Resource Conservation and the National Association of Conservation Districts to help them reach the agricultural community in New York. EnSave states that it provides support for farms which have applications pending before the US Department of Agriculture Rural Development Administration Rural Energy for America Program (REAP). EnSave proposes a marketing strategy which would work with three key agribusiness stakeholders: equipment manufacturers, equipment dealers, and the agricultural community at large. EnSave would leverage stakeholder outreach efforts to disseminate program information to agricultural customers.

Estimated Number of Customers Served: 263 in 2011

Program Costs: \$918,000 in 2011

Estimated Energy Savings: 3.842 MWh in 2011

NYSERDA, NYSEG/RG&E Assessments:

According to NYSERDA, "EnSave's experience with the agricultural sector and key partners, its comprehensive approach, and the needs of this sector warrant support and further investigation of this proposal." NYSERDA recommends that EnSave, Inc. designate a greater proportion of program funding for incentives to end-use or midstream market players. The proposed program would also benefit from close coordination with NYSERDA and utility programs. According to NYSERDA, EnSave needs to clarify payment and deliverables schedule, coordinate on measurement and verification with NYSERDA program, and needs to explain how therm savings incentives were derived.

NYSEG/RG&E encouraged EnSave to submit a block bidding proposal as part of their proposed energy efficiency program that has not yet been considered by the Commission.

Staff Assessment:

Agriculture is an area where a third party, such as EnSave (which has experience in providing energy efficiency services in this sector), could help to broaden customer participation. NYSERDA has existing programs but would benefit from a more coordinated approach within the agricultural community, including working with New York's agricultural-technical colleges and universities.

This proposal, however, would need further assessment, discussion, and coordination before it could be implemented. Staff recommends that NYSERDA develop a proposal for how an agriculture-focused program could be incorporated as a component within the EEPS Existing Facilities Program. NYSERDA is encouraged to meet with interested utilities and Staff to discuss how best to address the energy efficiency needs of the agricultural community.

Matrix Energy Services, Inc. (Entertainment Complexes - Electric and Gas)

Organization Receiving Proposal: NYSERDA

Program Description:

Matrix Energy Services (Matrix) proposes to provide demand control ventilation and other low-cost/no-cost measures for 120 entertainment complexes, such as movie theaters, in New York. The proposed program would also provide a site energy audit to identify other energy efficiency and demand response opportunities. The primary objective of the program is to help large indoor assembly spaces, used for entertainment and recreation, realize both short-term and long-term energy savings in a cost-effective manner. Such facilities typically have a unique operating pattern. According to Matrix, technologies with proven energy efficiency records are readily adaptable to this type of facility. A specific technology that could be used is Demand Control Ventilation (DCV). DCV technology reduces outdoor air intake during low occupancy periods. Reduced intake air directly correlates to a reduction in the operation of space cooling and heating, especially during extreme weather conditions.

Matrix first proposed retrofitting DCV on all packaged HVAC systems serving movie theaters through the 2001-2008 Innovative Design for Energy Efficiency Activities program. This idea became the basis for first Energy Efficiency program for entertainment centers that Matrix will be implementing in California during the 2009-2011 program years. According to Matrix and existing census data (2006 NAIS County Business Patterns, US Census Bureau), there are 305 movie theaters and approximately 10,902 arts, entertainment, and recreational establishments in New York.

Matrix would be responsible for all aspects of implementation, including marketing the program, conducting audits, installing measures, providing technical assistance, conducting training on best practices and providing referrals to relevant NYSERDA energy efficiency programs. In its proposal, Matrix states that it would not involve other subcontractors.

Estimated Number of Customers Served: 120

Program Costs: \$2,342,160

Estimated Energy Savings: 5,418,074 KWh and 2,791,000 therms through 2011.

NYSERDA Assessment:

NYSERDA has determined that there is an insufficient alignment of scheduled payments and expected deliverables in the Matrix proposal.

Staff Assessment:

There are potential energy savings in this market niche, but it does not warrant a separately administered independent program. In addition, there may be other contractors who could provide services in this market niche within the existing and planned range of New York's energy efficiency programs.

Nexant, Inc. (Data Centers - Electric)

Organization Receiving Proposal: NYSERDA

Program Description:

Nexant proposes to design and implement a Data Center Energy Management program. The proposed program focuses on existing buildings, although it is also readily applicable to new construction. Nexant's proposal includes two principal focus areas: best practices improvements and operations improvements. Best practices improvements and operations improvements consist of a variety of measures for optimizing energy efficiency in data management centers. Operations improvements are identified as having the potential to achieve significant market penetration that can yield substantial savings at lower costs. Applicability of any particular measure would depend upon various factors including, but not limited to: facility type, usage, budget, cost effectiveness, and the owner's preference.

Nexant expects to tailor program delivery based on customer consumption and to determine the optimum program structure and allocation of resources among marketing outreach, trade ally participation and incentives. Further, the Nexant proposal would determine the optimum measurement and evaluation protocols including the duration of the measurement period and the certification of performance after the measurement period in order to maximize the life of operations improvements. Nexant states that it has prior experience working with NYSERDA.

Estimated Number of Customers Served: 22

Program Costs: \$12,058,476 through 2011

Estimated Energy Savings: 18 MWh through 2011

NYSERDA Assessment:

According to NYSERDA, Nexant's proposal does not demonstrate a payment and deliverables schedule that is consistent with the objectives of the June 23 EEPS Order, could provide an unfair benefit to Nexant as a result of a lack of competition, and is redundant and/or conflicts with existing NYSERDA offerings.

Staff Assessment:

Nexant is an established firm providing a range of energy efficiency services, including contractor and program evaluation services for NYSERDA (among other things). Improving data center energy usage is recognized across the industry as an important and growing area of concern, and Nexant's proposal speaks to the attendant issues and strategies. However, NYSERDA has an existing program structure, and has increased its focus on this market segment partially eliminating the need for a program run by an independent program administrator.

Paradigm Energy (Residential and Low Income - Electric and Gas)**Organization Receiving Proposal:** Con Edison**Program Proposal:**

Paradigm Energy proposes a program that would offer a suite of energy efficiency measures for multifamily buildings in New York City. The program would target landlords and tenants for retrofit measures in common areas and within dwellings to achieve energy savings. The program seeks to retrofit 1,000 multifamily buildings to save 20% of their electric and gas usage. Fifteen percent of participating buildings would implement renewable energy strategies.

Eligible measures would include high-efficiency lighting, energy-efficient windows, duct sealing and insulation, thermostatic controls, high-performance boilers, and water-heaters for common areas that are within a landlord's control. In-unit improvements would include light bulb exchanges and appliance replacements. Tenants would be asked to pledge to conserve energy through better energy behaviors, such as turning off unused lighting, powering down computers, and other behavior-related power management strategies. Using a preliminary screening and energy auditing process, the program sponsor would undertake a whole building study designed to expedite the rapid flow of projects with the greatest potential for energy reduction into the program pipeline and to eliminate projects that do not exhibit energy savings potential or acceptable benefit cost ratios. Screening for eligibility would attempt to determine which aspects of the program would be of interest to an applicant and what energy efficiency potential exists in any given building project. A second level of screening would determine the existing building's operational characteristics and determine how a building's utilities are metered and billed with the objective of determining cost benefit relationships if energy strategies are pursued. A project site visit would provide verification information and would enable the identification of additional project opportunities that may not have been captured in the initial screening efforts.

Estimated Number of Customers Served: 1,000 buildings

Program Costs: \$38.5 million

Estimated Energy Savings: 182,000 MWh; 24.5 MMTherms 2009-2011

Con Edison Assessment:

Con Edison proposes that this proposal be rejected. According to Con Edison, there are various existing and planned efforts to address the multifamily market and Paradigm should work within the current and emerging energy efficiency programs.

Staff Assessment:

Staff agrees with Con Edison's decision to reject this proposal. There are various existing and recently approved efforts to address the multifamily market. Paradigm should be encouraged to work within the current and emerging energy efficiency framework.

Positive Energy, Inc. (Residential and Low Income - Electric)

[NOTE: Since the time of this filing, Positive Energy has changed its name to OPower].

Organizations Receiving Proposal: Central Hudson, Con Edison, National Grid, NYSEG, Orange & Rockland, and RG&E.

Program Description:

Positive Energy, Inc. proposes to implement a home-energy reporting system that can be characterized as a behavior modification consumer feedback program. The program would, with a feedback mechanism coordinated through utilities, identify a customer's energy consumption relative to a generic customer profile and similar customer energy consumption rates, and provide that information to the individual customer along with suggestions to reduce energy consumption. An interactive website would complement the reporting mailed to customers. According to the filing, this program is currently being deployed by several leading utilities across the country, including the Sacramento Municipal Utility District, Southern California Edison, Puget Sound Energy, and Connexus Energy.

The American Council for an Energy Efficient Economy (ACEEE - 24 April 2009) has recently stated that:

"[t]he assessment of kilowatt-hour savings during the period between April 2008 and February 2009 revealed that the change in energy consumption among consumers in the test group receiving monthly reports was 36 percent lower than the control group, while the change in energy consumption among consumers receiving quarterly reports was 19 percent lower than the control group."

The project sponsors state that the program would serve as a residential customer education program and a marketing program for the utilities to market other energy efficiency programs to all customers.

Estimated Number of Customers Served: Varies by utility

Program Costs: Approximately \$10 per customer per year

Estimated Energy Savings:

Central Hudson - 36,000 MWh annually and 375,000 therms

Con Edison - 70,589 MWh 2009-2011
 National Grid - 24,300 Mwh annually and 2.8 MW
 NYSEG - 22,817 MWh annually
 O&R - 32,295 MWh annually
 RG&E - 22,817 MWh annually

Niagara Mohawk, Central Hudson, and Con Edison Assessments:

Niagara Mohawk included Positive Energy's proposal as part of its proposed Residential Building Practices and Demonstration program. Central Hudson accepted Positive Energy's proposal as a residential program included in a supplement that Central Hudson filed on November 3, 2008. Con Edison determined that the proposal is not necessarily the best method for providing energy consumption information to residential customers to encourage energy efficiency. Con Edison said that it would continue to explore this concept to determine whether it might be appropriate to use in some form in the future.

Staff Assessment:

There is considerable potential value associated with use of behavioral marketing and positive feedback techniques as part of the consumer education process on energy usage for New York's residential market. National Grid's proposed Building Practices and Demonstration program proposal should be carefully reviewed when it is ripe for Commission consideration.

Strategic Applications International Corporation (Healthcare Facilities - Electric)

Organization Receiving Proposal: NYSERDA

Program Description:

Strategic Applications International Corporation (SAIC) proposes an enhanced version of NYSERDA's New Construction Program for existing healthcare facilities in Con Edison's service territory. SAIC proposes creation of the Healthcare Advisory Board that would be the recipient of funds and provide advice and consent to SAIC for the administration of EEPs funds dedicated to this program.

Principle objectives of the program include tailoring and transferring the NYSERDA New Construction program model to the healthcare facilities industry in the Con Edison service territory, decreasing the need for expensive infrastructure improvements funded through utility rate increases, addressing the special needs of large commercial customers, assisting New York City customers in obtaining a fair share of EEPs funds, and aggregating customer classes without the need to access Con Edison customer records.

Technical assistance from the proposal would only cover existing facilities and would be limited to 71 existing healthcare facilities in Con Edison's territory. The characterization of New York City hospitals is provided as 27,908 beds, 95.3 million square feet with \$566 million spent on electricity per year and \$142 million annually on gas. Eligible institutions consume approximately 2.57 million MWh and 14.2 million DTh per year with peak demand estimated at 293 MW. Customers in the program would receive technical assistance, performance-based financial incentives, and continuous program support and guidance. Customers would receive incentives to undertake improvements that meet agreed upon return-on-investment criteria through a progressive refund of technical assistance cost shares.

Estimated Number of Customers Served: 71

Program Costs: \$30,742,295

Estimated Energy Savings: 135,131 MWh/year

NYSERDA Assessment

NYSERDA has determined that the payments and deliverables schedule does not align with the requirements of EEPS Orders. The SAIC proposal also represents an unfair competitive advantage in a captive market (hospitals in New York City), and the proposal is redundant with existing NYSERDA program offerings. NYSERDA encourages SAIC to submit its proposal as part of NYSERDA's existing energy efficiency program framework.

Staff Assessment:

Staff agrees with NYSERDA's assessment. SAIC has provided services within the energy efficiency industry in the past which can be valuable in meeting the State's energy reduction goals, but these efforts should, as NYSERDA points out, be integrated within the existing NYSERDA energy efficiency programs or as part of utility energy efficiency programs.

State University of New York (Institutional - Electric)**Organization Receiving Proposal:** NYSERDA**Program Description:**

The State University of New York (SUNY) proposes the installation of energy efficient projects, primarily combined heat and power projects and lighting retrofits, at 26 of its 64 campuses which obtain energy from utilities. SUNY requests \$162.2 million of EEPS funds through 2011. The program would include advanced combined heat and power; comprehensive high-efficiency lighting upgrades; and a variety of heating, ventilation and air conditioning energy recovery applications. Program implementation would be completed in 2011.

Program attributes include use of fair labor practices, prevailing wages, the participation of under-represented business enterprises, demonstration of energy management practices and public policy goals, the opportunity to enact energy efficiency in a publicly funded state agency on a limited budget, coordination with a recommendation from the SUNY Energy Strategic Planning Task Force, and enhanced environmental benefits through the reduction of greenhouse gas emissions over the projected lifetime of the program.

Estimated Number of Customers Served: 26 campuses**Program Costs:** \$162,254,840 through 2011**Estimated Energy Savings:** 946,786 MWh by 2011, 2,549,964 MWh by 2015**NYSERDA Assessment:**

NYSERDA does not recommend the SUNY program because the payments and deliverables schedules do not align with established objectives. According to NYSERDA, the SUNY proposal would result in rate impact concerns as a result of the program paying too high a proportion of the program measure cost. Also, NYSERDA has determined that there are conflicts and/or redundancy with existing NYSERDA programs. NYSERDA recommends that SUNY submit its project-specific proposal(s) for consideration as part of NYSERDA's existing energy efficiency framework.

Staff Assessment:

Staff agrees with NYSERDA's assessment. SUNY should work within existing and emerging programs, as they have been, to effect energy efficiency improvements at its campuses and facilities.

The SUNY proposal lacks detail about the project(s) to be undertaken and it is unclear whether SUNY has the staff and/or organizational capabilities to implement a comprehensive program under its own management. Furthermore, combined heat and power projects are a major part of this proposal. As the Commission has stated in previous orders, combined heat and power projects are not appropriate uses for EEPS funding.

Table 1

Approved Commercial and Industrial Electric Programs Costs and Savings Targets

	<u>2010</u>	<u>2011</u>	<u>Total 2010-2011</u>	<u>% of Budget</u>
<u>Con Edison</u>				
<i>Commercial and Industrial Custom Efficiency Program</i>				
Savings (MWhs)	6,849	9,131	15,980	
Program & Administration Costs	\$4,340,143	\$5,786,857	\$10,127,000	95%
Evaluation/M & V Costs	<u>\$228,429</u>	<u>\$304,571</u>	<u>\$533,000</u>	5%
Total	\$4,568,571	\$6,091,429	\$10,660,000	
<u>NYSEG</u>				
<i>Non-Residential Small Business Direct Installation Program</i>				
Savings (MWhs)	24,354	32,472	56,826	
Program & Administration Costs	\$6,200,480	\$8,267,307	\$14,467,788	95%
Evaluation/M & V Costs	<u>\$326,341</u>	<u>\$435,121</u>	<u>\$761,463</u>	5%
Total	\$6,526,821	\$8,702,429	\$15,229,250	
<i>Non-Residential Commercial/Industrial Custom Rebate Program</i>				
Savings (MWhs)	6,700	8,934	15,634	
Program & Administration Costs	\$2,386,671	\$3,182,229	\$5,568,900	95%
Evaluation/M & V Costs	<u>\$125,614</u>	<u>\$167,486</u>	<u>\$293,100</u>	5%
Total	\$2,512,286	\$3,349,714	\$5,862,000	
<u>RG&E</u>				
<i>Non-Residential Small Business Direct Installation Program</i>				
Savings (MWhs)	11,096	14,794	25,890	
Program & Administration Costs	\$2,825,063	\$3,766,750	\$6,591,813	95%
Evaluation/M & V Costs	<u>\$148,688</u>	<u>\$198,250</u>	<u>\$346,938</u>	5%
Total	\$2,973,750	\$3,965,000	\$6,938,750	

Table 1 (continued)

Approved Commercial and Industrial Electric Programs Costs and Savings Targets

	<u>2010</u>	<u>2011</u>	<u>Total 2010-2011</u>	<u>% of Budget</u>
<u>RG&E</u>				
<i>Non-Residential Commercial/Industrial Custom Rebate Program</i>				
Savings (MWhs)	4,108	5,478	9,586	
Program & Administration Costs	\$1,511,314	\$2,015,086	\$3,526,400	95%
Evaluation/M & V Costs	<u>\$79,543</u>	<u>\$106,057</u>	<u>\$185,600</u>	5%
Total	\$1,590,857	\$2,121,143	\$3,712,000	

Table 2

Approved Commercial and Industrial Gas Programs Costs and Savings Targets

	<u>2010</u>	<u>2011</u>	<u>Total 2010-2011</u>	<u>% of Budget</u>
<u>Con Edison</u>				
<i>Commercial and Industrial Custom Gas Efficiency Program</i>				
Savings (Dekatherms)	27,629	36,839	64,468	
Program & Administration Costs	\$1,240,397	\$1,653,862	\$2,894,259	95%
Evaluation/M & V Costs	<u>\$65,284</u>	<u>\$87,045</u>	<u>\$152,329</u>	5%
Total	\$1,305,681	\$1,740,907	\$3,046,588	
<u>Niagara Mohawk</u>				
<i>Commercial High-Efficiency Heating and Water Heating Program</i>				
Savings (Dekatherms)	19,581	26,109	45,690	
Program & Administration Costs	\$717,461	\$956,614	\$1,674,075	95%
Evaluation/M & V Costs	<u>\$37,761</u>	<u>\$50,348</u>	<u>\$88,109</u>	5%
Total	\$755,222	\$1,006,962	\$1,762,184	

Table 2 (continued)

Approved Commercial and Industrial Gas Programs Costs and Savings Targets

	<u>2010</u>	<u>2011</u>	<u>Total 2010-2011</u>	<u>% of Budget</u>
<u>NYSEG</u>				
<i>Non-Residential Commercial/Industrial Custom Rebate Program</i>				
Savings (Dekatherms)	5,283	7,045	12,328	
Program & Administration Costs	\$224,768	\$299,691	\$524,459	95%
Evaluation/M & V Costs	<u>\$11,830</u>	<u>\$15,773</u>	<u>\$27,603</u>	5%
Total	\$236,598	\$315,464	\$552,062	
<u>RG&E</u>				
<i>Non-Residential Commercial/Industrial Custom Rebate Program</i>				
Savings (Dekatherms)	5,163	6,885	12,048	
Program & Administration Costs	\$225,191	\$300,254	\$525,445	95%
Evaluation/M & V Costs	<u>\$11,852</u>	<u>\$15,803</u>	<u>\$27,655</u>	5%
Total	\$237,043	\$316,057	\$553,100	

Table 3

EEPS Additional Annual Collections from Electric Ratepayers by Service Territory

	<u>April 1, 2010 - December 31, 2010</u>	<u>2011</u>
<u>Con Edison</u>	<u>\$4,568,571</u>	<u>\$6,091,429</u>
TOTAL	\$4,568,571	\$6,091,429

Table 4

EEPS Additional Annual Collections from Gas Ratepayers by Service Territory

	<u>April 1, 2010 - December 31, 2010</u>	<u>2011</u>
Con Edison	\$1,305,681	\$1,740,907
Niagara Mohawk	\$755,222	\$1,006,962
NYSEG	\$236,598	\$315,464
<u>RG&E</u>	<u>\$237,043</u>	<u>\$316,057</u>
TOTAL	\$2,534,544	\$3,379,390