January 2025 PEX Meeting

January 22, 2024

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Contents

01	Safety Moment – OSHA and Cold Weather Safety – Michael Blaney			
02	Prescriptive BMS Products Update – Michael Blaney			
03	Lighting Incentive Updates – Jerry Song			
04	Update on New Gas Equipment Incentive Phaseout and Hard to Electrify Buildings – Nicholas Wojcik			
05	Trane Air Conditioning Clinic – Nolan Lantieri			
06	Advanced Green Insulation Introduction - Gustavo Teza			
07	PEX 2024 Goals and Progress – Mat McCarthy			
08	Quick Hits/Reminders/2025 Meeting Dates – Mat McCarthy			

National Grid 2

01

Safety Moment – OSHA and Cold Weather Safety Michael Blaney arthur.blaney@nationalgrid.com



OSHA's Top 10

A Guide for Improving Workplace Safety



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The Top 10 OSHA Safety Violations of 2024

Employers and business owners:

- Are machine guards are in good working order?
- Do employees who work at heights have the necessary fall protection equipment?
- Is that equipment in good condition?

PPE is also important to prevent injury.

Respiratory, Eye, Fire etc., to avoid serious physical harm

Have Employees been trained how to operate powered equipment safely?

Do employees know how to read MSDS?

"How are we doing with workplace safety?"

1. Fall Protection - 1926.501

This has remained the top safety violation for 14 years, according to the OSHA office. This involves anything to do with a lack of or incorrect use and training when it comes to fall protection training and equipment. With over 6,000 violations this year, it's a big offender under OSHA standards.

- 2. Hazard Communication 1910.1200
- 3. Ladders 1926.1053
- 4. Respiratory Protection 1910.134
- 5. Lockout/Tagout 1910.147
- 6. Powered Industrial Trucks 1910.178
- 7. Fall Protection Training Requirements 1926.503
- 8. Scaffolding 1926.451
- 9. Personal Protective and Lifesaving Equipment Eye and Face Protection 1926.102
- **10. Machine Guarding 1910.212**

Cold Weather Safety

Be Prepared – Working in the cold can be dangerous January 22, 2025



Winter Weather: Plan, Equip, Train

- Know the symptoms of cold stress; reddening skin, tingling, pain, swelling, leg cramps, numbness, and blisters.
- Dress properly; wear <u>at least three layers</u> of loose-fitting clothing, insulated gloves and boots, and cover your head.
- Monitor your physical condition and that of your coworkers.
- Stay dry and pack extra clothes; moisture can increase heat loss from the body.
- Take frequent breaks in warm, dry areas.
- Drink warm liquids.

Plan. Equip. Train.

6 Tips for Working Safe in Cold Weather

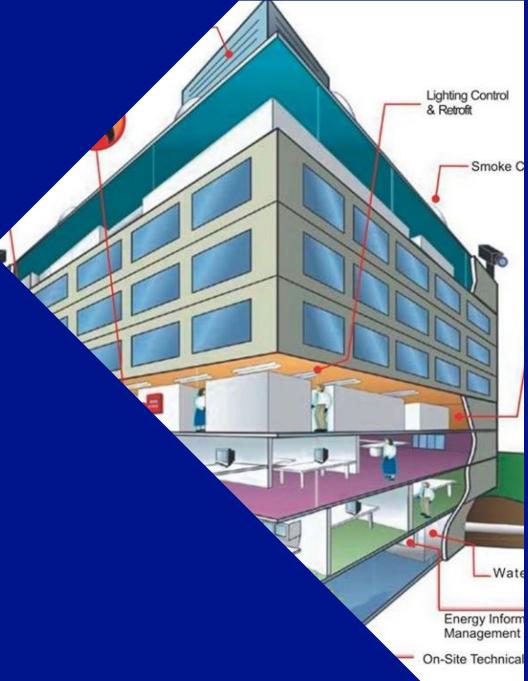
- 1. Stay well nourished by eating and drinking enough
- 2. Stay well rested
- 3. Plan breaks from the cold
- 4. Stay dry
- 5. Dress for the conditions
- 6. Keep a cold weather safety kit in your vehicle

Prescriptive BMS Products Update Michael Blaney arthur.blaney@nationalgrid.com





Subscription BMS Included



Previously Reviewed Subscription-Based System Control Products

Manufacturer	Product Name	Primary Customer Type	Product Approved for Prescriptive BMS Subscription-Based System Control Incentives	Date of Submission	Date of Review
Encycle	SwarmStat and SwarmLogic	Commercial	Yes	3/1/24	3/13/24
RunWise	RunWise	Commercial, Multifamily	Yes	3/1/24	3/13/24
Carrier	Comfort Vu	Commercial, Multifamily	No	*	4/3/24
Carrier	Connect 43x43F	Commercial, Multifamily	No	*	4/3/24
GridPoint	EC2000 Controller	Small Business	Yes	6/4/24	7/26/24
Trane	Pivot Smart Thermostat	Commercial, Multifamily	No	*	4/3/24
Strato Automation	BACwall RTU Thermostat + SLC/OCN+	Commercial	No		4/3/24
Parity Go	Parity Go	Commercial, Multifamily	Yes	6/20/24	8/20/24

How To Submit a BMS Offering for Prescriptive Incentive Eligibility Review



For buildings 5,000 - 300,000 square feet, the Sponsors of Mass Save offer incentives for:

- First time or replacement BMS installation
- Addition or optimization of an existing BMS
- Installation of subscription-based system control

Incentives

BMS Project Type Incentives	Incentive Rate (\$/sequence/sqft)	
Installation of New BMS	\$0.10	
Upgrade of Existing BMS	\$0.05	
Subscription Based System Control	\$0.01/pre-paid year	
Building Control & Active Demand Response Enrollment Incentive*	\$3,000	

*A minimum of two prescriptive electric sequences of operation must be implemented or optimized to be eligible for first time building ADR enrollment

What makes a good candidate?

Some key features that would permit the approval of a cloud-based product are a few things like a BMS project.

- Central control
- Trend data
- Central operator location (in the cloud or local) to see all the system points

The application does a good job of spelling out what is required.

Lighting Incentive Updates Jerry Song jerry.song@nationalgrid.com



Phaseout and Hard to Electrify Buildings Update on New Gas Equipment Incentive Nick Wojcik <u>nicholas.wojcik@nationalgrid.com</u>

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Hard to Electrify Guidance Tech Alert 12-11-2024

Distribution

To be distributed among National Grid internal sales and engineering, external firms contracted for energy efficiency work by National Grid, or representatives from other PAs. This document contains policy by which all Program Administrators have agreed to abide.

Subject of tech alert

The purpose of this tech alert is to provide guidance regarding what fossil fuel projects may still be incentivized via the MassSave program in program year 2025 and beyond. The upcoming 3 year plan (2025 – 2027) will prohibit incentive towards any new fossil fuel equipment with a few exceptions. This tech alert will outline those exceptions.

Required action:

1. Statement of Projects Not Within Scope of MassSave Program

The formal statement of projects that are no longer able to be incentivized is as follows: an energy efficiency plan may not include, "spending on incentives, programs or support for systems, equipment, workforce development or training as they relate to new fossil fuel equipment unless such spending is for low-income households, emergency facilities, hospitals, a backup thermal energy source for a heat pump, or hard to electrify uses, such as industrial processes ("Fossil Fuel Spending")."

2. PA Encouragement of Electrification

Despite the decision outlined above, the MassSave PAs and DOER recognize that customers may choose to replace pre-existing fossil fuel equipment with fossil fuel equipment as part of a broader project scope that includes efficiency measures supported by the program. The PAs agree to take the following steps to promote electrified systems instead of fossil fuel systems and to ensure that efficiency incentives do not support replacement fossil fuel equipment:

- The PAs' application forms and incentive offer letters to customers will include language stating that incentives cannot pay for new fossil fuel systems.
- The PAs' C&I retro-commissioning reports may offer recommendations for new electric systems and may not offer recommendations for new fossil fuel systems, unless an exemption (e.g., low-income, hard-to-electrify, etc.) applies.
- C&I customers may pay for a separate scope to a retro-commissioning report that
 includes recommendations to replace existing fossil fuel equipment. The PAs will
 not provide any funding for the separate scope and will not fund any fossil fuel
 equipment recommended by the separate scope.



• The PAs will prohibit projects participating in the Deep Energy Retrofit pathway from installing new fossil fuel equipment.

3. Retrofit Projects Within Scope of MassSave Program

Retrofit projects that allow an existing fossil fuel system to operate more efficiently are still permissible to be incentivized under the MassSave program. Such measures include but are not limited to:

- Heating, cooling, ventilation, and hot water controls, including combustion controls
- Existing Building Commissioning
- Steam traps
- Energy recovery
- Equipment, pipe, and duct insulation and sealing
- Weatherization

4. Exceptions to New Ruling

Exceptions to the new ruling must fall under at least 1 of the 3 following categories:

Emergency Facilities Exception

"Emergency facilities" are defined as hospitals, police and fire stations, facilities identified as supporting Critical Transportation Needs or Emergency Shelters in a state or local Comprehensive Emergency Management Plan, acute/post-acute medical facilities with life sustaining equipment, water/sewer pump stations, and emergency communication centers that serve a life safety function (for example, 911 Centers).

The PAs will not provide incentives for new fossil fuel equipment in "emergency facilities" in the C&I Existing Buildings Program in the 2025-2027 plan unless used as a backup thermal energy source for a heat pump or for a hard-to-electrify use. This definition will only be used to identify buildings participating in the New Construction and Major Renovations Program that can use natural gas for emergency generation.

Backup Thermal Energy Exception

The PAs propose to apply the "backup thermal energy source for a heat pump" exception to a limited set of C&I retrofits. Specifically, for some existing C&I buildings with rooftop unit ("RTU") HVAC systems, the most efficient and practicable retrofit will be an integrated, dual-fuel system with a heat pump and a natural gas furnace. To be eligible for incentives, the PAs will require that the fossil fuel component of the system run only under certain conditions, such as



below a certain temperature or when the heat pump is inoperable or cannot meet the full heating load. Integrated controls will ensure that the dual-fuel RTU primarily runs on electricity. The PAs will only provide incentives for and claim savings on the heat pump components of these hybrid systems, not the fossil fuel components.

The PAs will not provide incentives for new fossil fuel equipment in hospitals in the C&I Existing Buildings Program in the 2025-2027 plan unless used as a backup thermal energy source for a heat pump or for a hard-to-electrify use.

Hard to Electrify Exception

Hard-to-electrify uses are defined as those for which electrification is technologically infeasible or economically impracticable with current technology. The PAs will incentivize and claim savings on new, efficient fossil fuel equipment for hard-to-electrify uses. These uses may include:

- Thermal Oxidizers
- Other process equipment that requires water temperatures over 200° Fahrenheit
- Specialized manufacturing or process equipment
- Process equipment in research laboratories for scientific or medical research
- Process equipment in hospitals or medical offices regulated by the department of public health as health care facilities
- High-temperature process furnaces or ovens (heat treating or forging)
- High-pressure steam applications greater than 15 psi
- Commercial laundry equipment
- Sanitization processes (i.e., autoclaves for hospitals and biopharmaceuticals)

In addition to the processes listed above, the PAs and DOER agree to the following procedure to evaluate other hard-to-electrify uses during the 2025-2027 term, should the need arise:

- o If a customer notifies the PAs or their vendors of its interest in incentives for a project at a facility where new fossil fueled process load equipment will be installed, and where such equipment is for a process not listed above and that the PAs reasonably determine is "hard-to-electrify" because it is technologically infeasible or economically impracticable with current technology, the PAs will notify DOER and the EEAC consultants.
- The project proponent, the PAs, and the PAs' vendor will provide as much detail as possible regarding the project and the asserted hard-to-electrify process to DOER and the EEAC consultants.
- Within a month of the exchange of project and process information, the PAs and DOER, including the Director of the Energy Efficiency Division, will confer to discuss the project and process. The Director shall render



a decision whether such process is "hard-to-electrify" for purposes of the 2025-2027 Plan. The PAs may appeal such decision to the Commissioner of DOER, whose decision shall be final.

Why are we making this change?

This is a statewide policy affecting all MassSave PAs; it is imperative that all representatives from the PAs are on the same page regarding these projects.



Trane Air Conditioning Clinic Nolan Lantieri nolan.lantieri@trane.com







Join us for Trane's Air Conditioning Clinics

You're invited to register for our Air Conditioning Clinics at the Trane

Wilmington office! Below are the details:

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• 11 Session Course: Every Wednesday, February 26th - May 7th

Time: Dinner: 5:30 PM | Presentation: 6 PM – 8 PM (Note: Vegetarian dinner options will be available)

Location: 181 Ballardvale Street, Suite 201 | Wilmington, Massachusetts 01887

The Trane Air Conditioning Clinics are a series of in-person classes on the fundamentals of heating, ventilating, and air conditioning (HVAC). The clinics are approved by the American Institute of Architects (AIA) for continuing education credit. Topics include:

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Intro to HVAC Systems

VAV Systems

VRF Systems

Refrigeration Cycle

A/C Fans

Chilled Water Systems

Centrifugal Chillers

Alternative Refrigerants

ICE Storage Decarbonization /

Psychrometry

Electrification

Water Source Heat Pumps **Helical Rotary Water Chillers** Modular Chillers Heating with Compressors

Refrigeration System Components

Storage Source Heat

Passive House **DDC Controls**

CHOOSE YOUR REGISTRATION TYPE

CLASS INSTRUCTION + PRINTED

CLASS INSTRUCTION +

MATERIALS

ELECTRONIC MATERIALS

\$575.00/person

\$325.00/Person

Materials will be provided in class.

Materials are sent via email.

order to successfully register for the course.

For questions, please contact Adrianne Jarnagin at adrianne.jarnagin@trane.com



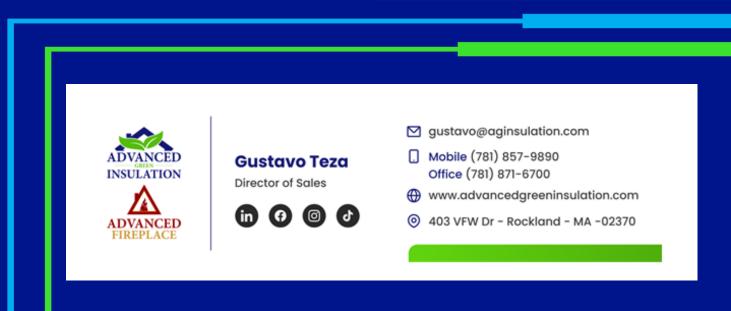
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PEX 2024 Goals and Progress Mathew McCarthy Mathew.McCarthy@nationalgrid.com



PEX 2024 Goals and Progress

CY 2024 PEX Progress (As of 1/13/25)							
Key Performance Indicators	Goal	Paid	(%G)				
Electric Savings (NLT MWH)	82,450	95,683	116%				
Gas Savings (NLT Therms)	1,674,970	2,508,759	150%				
Electric Electrification (NLT MMBTu)	49,510	11,529	23%				
Gas Electrification (NLT MMBTu)	64,490	32,928	51%				

Key Takeaways:

- Results are not yet final.
- Overall program
 performance has been
 excellent—thank you all for
 your hard work and
 dedication!
- ELX goals were ambitious; a reduction is expected in 2025.
- Goals for 2025 are still pending.
- PEX Awards will be distributed once the final results are confirmed.

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Quick Hits/Reminders/2025 Meeting Dates Mathew McCarthy Mathew.McCarthy@nationalgrid.com



Quick Hits/Reminders/2025 Meeting Dates

- Upcoming Trainings:
 - Mass Save events and trainings can be found on the Mass Save website <u>here.</u>
- PEX 1:1s Update
- PEX Landing Page:
 - https://www.nationalgridus.com/MA-Project-Expediter-Program
- 2025 Meeting Schedule
 - February 26, 2025
 - March 26, 2025

National Grid 25

Thank You!

Be Safe

