DRAFT 7.17.23

RESOLUTION OF THE ENERGY EFFICIENCY ADVISORY COUNCIL REGARDING PROPOSED MID-TERM MODIFICATION OF NATIONAL GRID

Adopted: July ___, 2023

Pursuant to § 3.8.1 of the Department of Public Utilities' (the "Department") Energy Efficiency Guidelines set forth in D.P.U. 20-150-A (May 3, 2021) ("Guidelines"), an energy efficiency Program Administrator that seeks to make the following significant modifications to its Energy Efficiency Plan shall submit its proposed modifications to the Energy Efficiency Advisory Council ("EEAC") for review:

1) the termination of an existing Energy Efficiency core initiative or Hard-to-Measure Energy Efficiency core initiative; or
2) a modification to the implementation of one or more Energy Efficiency core initiatives that is projected to result in a decrease in the Energy Efficiency Program benefits over the three-year term that is greater than 20 percent.

(as described above, a "Category One MTM").

Pursuant to § 3.8.2 of the Guidelines, a Program Administrator that seeks to make the following significant modifications to its Energy Efficiency Plan shall submit its proposed modifications at the same time for review by the Council, and for review and approval by the Department:

1) the addition of an Energy Efficiency Core Initiative or Hard-to-Measure Energy Efficiency Core Initiative or Demonstration Project; or
2) the transition of a Hard-to-Measure Energy Efficiency Core Initiative to an Energy Efficiency Core Initiative; or
3) an increase or decrease to a three-year term sector budget that is greater than 10 percent.

(as described above, a "Category Two MTM," which are subject to Department review and approval). Additionally, for the 2022-2024 Three-Year Plan term, in lieu of the third Category Two MTM described above, a Program Administrator that seeks to exceed a program-level budget shall submit its proposed modifications at the same time for review by the Council, and for review and approval by the Department. 2022-2024 Three-Year Plans, D.P.U. 20-120 through D.P.U. 20-129, at 225 (2022). Such proposal must clearly demonstrate that the proposed budget change will result in an increase in kWh or therm savings.

In accordance with the Guidelines and the Department's Order in the 2022-2024 Three-Year Plans, Massachusetts Electric Company and Nantucket Electric Company, each d/b/a National Grid (together, "the Company") is currently seeking support of the EEAC to implement a Category Two MTM to its energy efficiency programs as set forth in Attachment A (Exhibit NG-4).

Summary of MTM Request

National Grid proposes to modify its electric Three-Year Plan to add a refrigerant-management demonstration project for the commercial and industrial ("C&I") sector, pursuant to the Guidelines

at §3.9 (Demonstration Project). Through the Demonstration Project, the Company proposes to identify specific ways in which energy efficiency programs can be leveraged to reduce both energy use and greenhouse gas emissions from refrigerant leaks in grocery stores. In particular, the Company proposes to evaluate two measures: (1) the detection, measurement, and repair of leaks in refrigeration systems using a high global warming potential ("GWP") refrigerant; and (2) the retrofit of existing refrigeration systems using a high GWP refrigerant with a lower-GWP refrigerant. The Company proposes to transfer $950,000 from its existing Department-approved C&I sector budget for the current Three-Year Plan term to fund the demonstration project.

1. Demonstration Project

As described in Attachment A, National Grid has proposed a Demonstration Project designed to reduce Green House Gas (GHG) emissions from refrigerant leakage at grocery stores in Massachusetts. Although the initial focus is on the grocery segment of the C&I sector, National Grid states that it has relevance across all C&I HVAC markets within the program portfolio.[1]

Pursuant to §3.9 of the Energy Efficiency Guidelines, the Department's review of a Demonstration Project must consider:

(a) reasonableness of the size, scope, and scale of the proposed project in relation to the likely benefits to be achieved;
(b) adequacy of the evaluation plan;
(c) extent to which there is appropriate coordination among Program Administrators; and
(d) bill impacts to customers.

The Company states that the proposed Demonstration Project would consist of two measures, one focused on refrigerant leak detection and reduction (Refrigerant Mitigation) and one based on retrofitting existing systems near the end of their life to use lower GWP refrigerants (Refrigerant Retrofit).[2] Although these measures are primarily described as GHG-reduction measures, National Grid claims they have the potential to provide energy savings.

National Grid presented the EEAC with the table below of the expected cost, energy and GHG savings and benefit-cost ratio (BCR) per site.[3] National Grid expects the refrigerant projects to be cost-effective under the existing framework due to the combination of modest energy savings benefits and significant non-energy benefits through GHG emission reductions.

[1] https://ma-eeac.org/wp-content/uploads/Exhibit-NG-4-Narrative-MTM-Proposal-5.26.23.pdf
[2] Ibid, page 2-4.
[3] https://ma-eeac.org/wp-content/uploads/Refrigerants-NG-Presentation-1.pdf

Per Site

	Cost to Implement	Energy Savings (kWh and MT CO2e)	Refrigerant Emission Reduction (MT CO2e)	Total Emission Reduction (MT CO2e)	BCR without Refrigerant Emissions	BCR with Refrigerant Emissions
Refrigerant Mitigation	$12,000	15,000	62	65	0.83	4.39
Refrigerant Retrofit	$70,000	30,000	424	427	0.56	9.15

National Grid is seeking approval of $950,000 from their existing C&I sector budget to fund this Demonstration Project. They indicate that the proposal may require shifts from other C&I programs to the C&I Research & Development hard-to-measure core initiative.

2. Effect of Mid-Term Modification on Regulatory Reporting and the Department-Approved Three-Year Plans for 2022-2024

For future regulatory reporting during the Three-Year Plan period, including the Plan-Year Reports and Term Report, the EEAC understands that the Company is not proposing to revise its approved Three-Year Plan goals, performance incentive pool, or performance incentive payout rates to reflect this MTM.

3. Resolution

The EEAC supports the National Grid's Demonstration Project based on the criteria set forth in §3.9 of the Guidelines for a Demonstration Project. Its size, scope, scale will provide useful information about the value of lower-environmental-impact refrigerant replacement and leak repair, as possible additions to the Massachusetts energy efficiency programs. It offers the potential to contribute modest, yet significant, energy savings as well as GHG reductions to the C&I portfolio.[4]

Pursuant to §3.9(b), the Demonstration Project includes funding for implementation as well as critical EM&V activities appropriate for a feasibility and demonstration effort. This filing comes early enough in the planning cycle for consideration of preliminary data and partial results before the first draft of 2025-2027 Plan is due.

The Company states that they provided other Program Administrators the opportunity to review the Demonstration and determine if they would like to jointly participate, as required by to §3.9(c).[5] Since National Grid expects to use its existing C&I budget to fund the Demonstration Program, there should not be any additional bill impacts for ratepayers.

The Councils support this Demonstration Project to better understand the value of these types of refrigeration measures for potential inclusion in a future Massachusetts Three-Year Plan. It offers the potential to provide the baseline for future plan measures that mitigate emissions from high

[4] https://ma-eeac.org/wp-content/uploads/Exhibit-NG-4-Narrative-MTM-Proposal-5.26.23.pdf
[5] Id.

GWP refrigerants and transform the market for low GWP refrigerants while providing net benefits to ratepayers and helping to achieve state GHG goals.

Through this project, National Grid should demonstrate whether:

- There are significant and persistent net benefits, including from energy savings as well as GHG reductions for either or both of the Refrigerant Mitigation and Refrigerant Retrofit measures,
- The shift of funds from other C&I offerings provides potential long-term additional savings and GHG benefits, rather than hinders current progress toward existing Plan goals,
- The net-savings and GHG-reduction impacts of projects in this demonstration may also apply to other and future HVAC and refrigeration measures.
- Participants in this demonstration are not also receiving any other publicly-funded refrigerant incentives.