



**State of Vermont
Public Utility Commission**

MEMORANDUM

To: Participants in Case No. 23-2220-RULE
From: Riley Allen, Commissioner^{JRA}
Re: Second Workshop Covering the Economic Impacts of Clean Heat Standard required by Act 18 – Focus on Assumptions and Modeling Key Variables
Date: October 24, 2024

Through this memorandum I am seeking comment on various aspects of the model that will inform the Clean Heat Standard economic impact analysis. Based on comments from the participants at the recent workshop, the Commission will be developing an independent model from that which is under development by the Department of Public Service.

There appears to be broad support among the workshop participants for reliance on the State's 2023 Thermal Energy Report ("TER") model. Supporting commenters noted the value of a "bottom-up" platform and that the TER model is transparent. I conclude that the model represents a reasonable starting point for the current round of revisions. To aid these efforts, the Commission has contracted with Opinion Dynamics to help build on the existing TER model and will also receive limited assistance from Energy Futures Group to help understand the TER model.¹

The Department of Public Service reports that it intends to proceed in parallel with efforts to develop an independent model and impact estimates. I anticipate that both models will help inform the choices made by the Legislature. I anticipate that this public workshop process will prove useful to both the Commission's own modeling efforts and the efforts of the Department.

In this notice, I'm seeking comments from the participants on the key choices related to modeled variables, and how best to manage relevant uncertainty. In particular, I am interested in: (a) which real-world variables should be represented as modeled variables useful in the spreadsheet models; (b) how these variables should be represented in the model to account for uncertainty; (c) which variables should include a reasonable range of values; (d) appropriate sources for the assumptions; and (e) the variables that should be included as sliders or toggles in a dashboard that is under development.

¹ Energy Futures Group was heavily involved in building the TER model.

On October 22-24, 2024, the Commission received guidance submissions from the Department of Public Service, Efficiency Vermont, Vermont Gas, and a member of the Climate Council related to Commission efforts to complete a model framework for the economic impact analysis of the Clean Heat Standard.²

I will be holding a second workshop on November 8, 2024, at 1:30 PM via Go To Meeting videoconference. Participants may access the workshop online at <https://meet.goto.com/281692093>, or call in by telephone using the following information: phone number: +1 (571) 317-3116 using access code: 281-692-093. The workshop will be recorded but not transcribed.

In advance of the workshop, I would like the participants to provide comments on the following questions, to be discussed at the workshop.³

1. Commission Plans – Are there any questions, comments, or recommendations for the Commission as it embarks on its modeling effort to develop the Clean Heat Standard economic model, using the Thermal Energy Report (TER) modeling framework as a start? Even while the Commission intends to rely on the TER modeling framework, it welcomes ideas and guidance on the model’s relationship with the LEAP framework that is embedded into the TER modeling and useful features from the NV5 Potential Study that may be appropriate to incorporate.
2. Baseline Assumptions – Are there any suggestions for how best to baseline against a CHS for purposes of the model? Conceptually, what should be incorporated into a baseline set of assumptions?
3. CHS Assumptions -- Is the Department correct that the key assumptions relate to the following modeled variable groupings: (1) measure characterizations and measure distribution (largely weatherization, heat pumps, and liquid and gaseous fuels); (2) incentive levels, especially for market-based incentives (i.e., not those related to low- and moderate-income households); (3) the price and availability of liquid fuels; and (4) the administrative costs?
 - a. What other broad topics or groupings should be considered?
4. Sensitivities – Which assumptions or model variables should be incorporated as a range rather than as a single value due to the uncertainties? How can we best inform the range of values to be incorporated in such sensitivities?
5. Market Influences – Several of the comments suggest that there are potentially important dynamic elements that are at risk of getting lost in the “bottom up” analysis under consideration. How can these influences be captured and differentiated from a purely administrative framework such as the Thermal Energy Benefit Charge?
6. Recommendations for best sources for any of the above model inputs would be welcome.

² The comments received are available on the Commission’s on-line case management system (ePUC) and can be accessed through Docket No. 23-2220-RULE under the “All Other Documents” tab.

³ As indicated in the text, some comments have already been received that will inform the discussion. Further comments should be filed in Docket No. 23-2220-RULE. The topic category that we are using for this effort is “9 Other”