Electric Distribution Utilities Docket No. DE 20-170 Electric Vehicle Time of Use Rates Public Service Company of New Hampshire d/b/a Eversource Energy Set 1 Data Requests

Received: 10/26/2021

Date of Response: 11/09/2021

Request Number: Eversource 1-2

Witness: Dr. Sanem Sergici

Request:

Refer to RSA 236:133 (b), which states the standards for determining whether an EV TOU rate should be implemented "shall include consideration whether such implementation would encourage energy conservation, optimal and efficient use of facilities and resources by an electric company, and equitable rates for electric consumers."

a. Does the DOE believe that the DOE-proposed EV TOU rate sufficiently satisfies each of these three determinates and why?

b. Could Eversource's managed charging proposal also meet each of these standards? If not, why not?

Response:

a. Yes, rates designed following the approach outlined in Dr. Sergici's testimony would satisfy each of the criteria. The rate is designed to incentivize reducing load during peak periods and/or shifting the more flexible load to off-peak periods, use resources efficiently by flattening the load profile by shaving the peak load and reduce future capacity investment needs, and be cost reflective and equitable across rate classes by recovering the costs incurred by the relevant rate class.

b. The Department objects to this request as irrelevant to this proceeding, which, according the various plain language Commission directives in Order No. 26,394, the agreed upon procedural schedule, and the title of the proceeding, was established to review separately-metered electric vehicle time of use rate proposals and alternative metering feasibility assessments – not load management proposals.

Notwithstanding this objection, the Department provides the following answer to the Company's proffered request:

Eversource's managed charging proposal could achieve these standards, though not as well as a TOU rate. The Company's managed charging proposal is limited to 1,000 networked level 2 chargers, when a well-designed TOU rate would face no such limitation. Similarly, the managed

charging proposal is limited to summer weekday periods of up to eight hours (<u>Bates 40</u>). Because Eversource's distribution circuit and substation load profiles do not necessarily line up with the system summer peak period, it would not be as efficient as a rate design which sends time-varying price signals on a year-round basis. Furthermore, Eversource was instructed to develop EV TOU rates by the Commission. It is important to present a passive load management option for the customers who would not choose to participate in a utility managed (active) charging program. EV TOU rates is one such option for those EV customers who may prefer to shift their charging from peak to off-peak (and super off-peak) periods in response to the price signals.