STATE OF NEW HAMPSHIRE PUBLIC UTILITIES COMMISSION

IR 20-004

ELECTRIC DISTRIBUTION UTILITIES

Investigation into Rate Design Standards for Electric Vehicle Charging Stations and Electric Vehicle Time of Day Rates

Order Determining the Appropriateness of Rate Design Standards for Electric Vehicle Charging Stations Pursuant to SB 575

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August 18, 2020

In this Order, the Commission determines the appropriateness of rate design standards for electric vehicle charging stations as required by SB 575.

I. PROCEDURAL HISTORY

In 2018, the legislature enacted and the governor signed into law SB 575, an act relative to electric vehicle charging stations. Among other things, SB 575 required the Commission to determine whether it would be appropriate to implement certain rate design standards for electric vehicle charging stations. These standards included cost of service, prohibition of declining block rates, time of day rates, seasonal rates, interruptible rates, load management techniques, and demand charges. SB 575 also directed the Commission to determine whether it is appropriate to implement electric vehicle time of day rates for residential and commercial customers.

On January 10, 2020, Commission Staff (Staff) filed a memorandum (Staff Memorandum) recommending the Commission solicit comment on issues relating to rate design standards and time of day rates for electric vehicle charging. The Commission issued an Order of Notice on January 16, 2020, soliciting comment on issues identified in the Staff Memorandum by February 20, scheduling a technical session on February 28, and directing Staff to file a recommendation by April 3.

The Office of the Consumer Advocate (OCA), Public Service Company of New Hampshire d/b/a Eversource Energy (Eversource), Unitil Energy Systems (Unitil), the Department of Environmental Services (DES), Clean Energy New Hampshire (CENH), Conservation Law Foundation (CLF), ChargePoint, Greenlots, Revision Energy, the City of Lebanon, the Peterborough Energy Committee, and Randolph Bryan filed comments on the issues identified in the Staff Memorandum. A technical session was held on February 28, 2020, where docket participants discussed the comments.

On April 3, 2020, Staff filed its recommendation (Staff Recommendation) regarding rate design standards for electric vehicle charging stations and other issues relating to electric vehicle time of day rates for residential and commercial customers. The Commission provided stakeholders the opportunity to file written comments on the Staff Recommendation by May 11. The OCA, Eversource, DES, the City of Lebanon, CENH, CLF, ChargePoint, Revision Energy, and Richard Russman filed comments on the Staff Recommendation.

The Commission held a hearing on the issues within the Staff Recommendation and the contents of the participant comments on July 14, 2020. The Commission determined at hearing that an additional opportunity for supplemental comments and reply comments would be appropriate and established deadlines of July 24 and July 31, for supplemental and reply comments respectively. Eversource, Unitil, the City of Lebanon, and Tesla, Inc. (Tesla), filed supplemental comments. Eversource, CENH, and ChargePoint filed reply comments.

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Information relative to this investigation, including docket filings, other than any information for which confidential treatment has been requested of or granted by the Commission, is available at <u>http://www.puc.state.nh.us/Regulatory/Docketbk/2020/20-004.html</u>.

II. STAFF RECOMMENDATION AND STAKEHOLDER COMMENTS

The April 2020 Staff Recommendation, May 2020 stakeholder comments, and July 2020 supplemental comments and reply comments, are described in the Commission Analysis below. Earlier comments, including those filed in February 2020 responding to the Commission's initial comment solicitation, are summarized in the April 2020 Staff Recommendation.

III. COMMISSION ANALYSIS

As directed by SB 575, the Commission considered the appropriateness of the electric vehicle charging station rate design standards and other issues relating to time of day electric vehicle charging.

A. Cost of Service

Rates for regulated utilities are generally based on the cost of providing service to a particular customer class. Staff Memorandum at 1. Staff recommended the Commission "issue guidance that, to the maximum extent practicable, electric vehicle charging rate designs shall reflect the marginal cost of providing electric vehicle charging services." *Id.* at 3. Staff reasoned that cost of service has been a foundational component of rate design in New Hampshire for decades. *Id.*

Commenters generally viewed cost of service as an appropriate rate design standard for electric vehicle charging. Eversource noted that both marginal and embedded costs should play a role in designing rates, and suggested that available marginal cost data could be used to "provide a starting point for each rate component," with a review and update of those initial rates IR 20-004

once data is collected. Eversource Comments at 2. Unitil asserted that an electric vehicle rate must be based on a combination of embedded costs and marginal costs, and further clarified that "certain costs that support the offering of an EV-specific time-of-use (TOU) rate (*e.g.*, operations and maintenance (O&M), administrative and general (A&G), etc.) should be recognized and allocated to these loads so they do not burden non-EV customers." Unitil Supplemental Comments at 1. Unitil further commented that electric vehicle time of use (EV TOU) rates should be developed "within the context of a general rate case to ensure the level of the rate reflects the utility's most current and representative level of embedded costs." Id. at 2.

We find that cost of service rate design is appropriate for electric vehicle supply equipment (EVSE), subject to the qualifications below concerning the use of marginal cost methodology for initial rates. The Commission has generally designed rates based primarily on marginal cost of service, to ensure rates recover costs associated with serving a particular customer class and price signals are reflective of that class's long run marginal costs, while using embedded cost of service studies to allocate the revenue requirement. *See Re Pub. Serv. Co. of New Hampshire*, 77 NH PUC 276, 285 (June 8, 1992) (cost of service studies described as the foundation of rate design). We find no reason to deviate from this practice for EVSE.

Eversource and Unitil raised arguments regarding the importance of basing rate design on some combination of embedded and marginal costs, but those arguments are not in conflict with the Staff Recommendation which asks the Commission to provide guidance that, *to the maximum extent practicable*, electric vehicle charging rate designs should reflect the marginal cost of providing electric vehicle charging services.

In the near term, designing embedded cost allocations with any degree of accuracy for a new rate class would be difficult because there is no information regarding the load shape or

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peak coincidence of that class. Such information is a necessary prerequisite for allocating to each rate class its appropriate share of embedded costs. *See* Transcript of July 24, 2020, Hearing (Tr.) at 161-162. Once a utility has collected more information on a new rate class, it should be capable of more accurately assigning embedded costs. For initial EV TOU proposals, however, rates designed based primarily on marginal costs would be appropriate.

We encourage the utilities to consider applying the marginal cost methodology we approved in DE 17-189, as explained in the TOU Technical Statement marked as Exhibit 20 in that docket. Any utility that chooses not to utilize that methodology for its initial proposal should include an explanation in testimony as to why the proposed alternative methodology is appropriate.

Appropriate initial electric vehicle charging rate designs would reflect the marginal cost of providing electric vehicle charging services to the maximum extent practicable. Consistent with normal practice, we anticipate that these rates will be updated and reconciled on a regular basis to ensure they reflect costs associated with that class of customer's usage patterns.

B. Declining Block Rates

Declining block rates price successive blocks of electricity consumed by a particular customer class within a given billing cycle at per unit prices that decrease as usage increases. Staff Memorandum at 2. Staff recommended the Commission "issue guidance prohibiting declining block rates for any separately metered EVSE." *Id.* at 4. Staff reasoned that declining block rates are not an appropriate rate design standard for electric vehicles charging because the price signal sent to customers by declining block rates discourages conservation and could lead to peak load growth. *Id.* Staff also noted that New Hampshire's largest electric utility offers only declining block distribution and transmission rates to its general service customer classes.

Staff suggested a blanket prohibition on declining block rates for EVSE would create a barrier for those general service customers who might seek to install EVSE at their premise without separate metering. *Id*. Commenters generally agreed that declining block rates would not be appropriate for separately-metered electric vehicle charging. *Id*.

We find that declining block rates would not be appropriate for electric vehicle charging for separately metered EVSE. We find that, where declining block rates are already offered, declining block rates may be appropriate for customers that do not want to separately meter their EVSE.

C. Seasonal Rates

Seasonal Rates are designed to reflect the cost of providing service to a class of customer during different seasons of the year. *Id.* at 9. Staff recommended the Commission "issue guidance expressing a preference for seasonally differentiated electric vehicle charging TOU rates consistent with the underlying cost causation of the summer and winter seasons." *Id.* at 10. Some commenters expressed concern regarding the complexity of seasonal rate offerings, while others noted that existing customers who take default service energy supply already have rates that change on a seasonal basis. *Id.*

Distribution, transmission, and energy supply costs vary on a seasonal basis with summer peak loads being the primary cost driver for system upgrades and energy prices; and winter cold spells being a cost driver for energy supply. We recently approved a rate for EVSE where the volumetric rates for distribution, transmission, and energy supply would change on a seasonal basis consistent with the timing of the change in default energy supply rates. *Liberty Utilities (Granite State Electric) Corp.*, Order No. 26,376 at 9 (June 30, 2020). We find that it is appropriate to charge seasonal rates to account for the seasonality of winter and summer cost drivers on the electric system. We find, consistent with our recently approved EVSE rate, that it would be appropriate for seasonal rate changes to occur coincident with other rate changes, such as at the time of an electric utility's default energy service rate change.

D. Interruptible Rates

Interruptible rates are designed to reflect the cost of providing service to a class of customers that permits its service to be interrupted during periods of peak electrical demand. *Id.* at 10. Staff recommended the Commission issue guidance that interruptible rates are not an appropriate rate design for electric vehicle charging. Commenters generally agreed that interruptible rates would not be appropriate for electric vehicle charging. *Id.* at 10-11.

Interruptible rates would present unique problems for electric vehicle charging, particularly for public charging stations intended to accommodate long range travel. We find that interruptible rates would not be appropriate to implement for electric vehicle charging.

E. Load Management Techniques

Load management techniques are offerings where a customer commits to reductions in load at times of peak electrical demand, typically in exchange for either annual or per-event compensation. *Id.* at 11. Staff recommended the Commission issue guidance that load management techniques may be an appropriate strategy for electric vehicle rate design, but expressed a clear preference for delivery of such offerings in conjunction with TOU rate offerings, to the extent reasonably practicable. *Id.* at 12.

Commenters generally viewed load management techniques as appropriate for electric vehicle charging. *Id.* Eversource suggested that load management could be an acceptable

alternative to full TOU rates and would remove the burden of affirmative action associated with time of use rates. Eversource Supplemental Comments at 3. CENH disagreed and did not see load management as an acceptable alternative to TOU rates. CENH Reply Comments at 2. CENH suggested that technologies embedded within chargers and vehicles can be responsive to TOU price signals with little affirmative action necessary. *Id.* The City of Lebanon argued that "price signals have to go ahead of, [or] at the very least in conjunction with, any utility load management efforts." Tr. at 163.

Load management offerings may provide near-term ratepayer benefits without installation of metering infrastructure and other associated upgrades. For that reason, we find that load management techniques may be an appropriate strategy for electric vehicle rate design, especially when offered in conjunction with EV TOU rate offerings.

F. Demand Charges

Demand charges are a rate structure component intended to recover costs associated with a customer's kilowatt (kW) or kilovolt-ampere (kVa) demand over a given period (*e.g.*, 30minute interval, hour interval). Staff Recommendation at 13. In New Hampshire, demand charges are generally based on the customer's monthly peak usage, regardless of whether that peak is coincident with the system peak. *Id*.

(1) Appropriateness for EV Charging

Staff recommended the Commission issue guidance that demand charges may be a component of an appropriate rate design for high demand draw charging stations, but not residential charging applications. *Id.* at 15. Staff also recommended the Commission direct the utilities to consider alternatives to the customer peak demand charges prevalent in New

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Hampshire, such as the use of volumetric pricing structures or demand charges which are based on coincidence with system peak and other peaks reflective of cost causation. *Id*.

Commenters had mixed opinions regarding demand charges. Many advocated for demand charge alternatives due to the impact of demand charges on the economic viability of EVSE with high demand draw, but low utilization rates, such as Direct Current Fast Chargers (DCFC). *Id.* at 14; CENH Supplemental Comments at 2-41. Others saw demand charges as necessary to send price signals to customers that reflect underlying cost causation. Staff Recommendation at 15. ChargePoint suggested the Commission direct the utilities to file demand charge alternatives, rather than simply consider alternatives, as Staff recommended. ChargePoint Comments at 8. Unitil suggested that demand charges based on the customer contribution to the utility's coincident peak demand may be suitable for recovering transmission and supply-related costs, but not distribution-related costs. Unitil Supplemental Comments at 5.

We understand that demand charges may limit the economic viability of low utilization rate, high demand draw EVSE, but also acknowledge their role in limiting cost shifts between classes and customers. We find that demand charges may be an appropriate rate design for high demand draw EVSE, but not for residential charging applications. We expect that utilities will consider demand charge alternatives in any high demand draw rate design proposals they may develop, but decline at this time to require the utilities to file proposals related to demand charge alternatives.

(2) Rate Design Alternative Analyses

Staff recommended the Commission require Eversource to file for review within 90 days the results of any analysis conducted by its affiliates relating to rate design alternatives to demand charges, or if it is not available, when it becomes available. Eversource did not comment on any pending assessments performed by its affiliates, but did reference a rate offered by its Connecticut affiliate which provides volumetric pricing in lieu of demand charges. We decline to require Eversource to file this assessment with the Commission, as this is the type of information that could be requested by parties via discovery in any future adjudicative proceeding.

(3) Peak Coincident Billing/Metering Feasibility

Staff recommended the Commission direct each utility to file within 90 days a feasibility assessment of incorporating peak-coincident demand charges into its billing and metering system for the purposes of offering a high demand draw electric vehicle charging rate. Eversource and Unitil both commented favorably regarding the potential for modified demand charge structures that might better reflect peak coincident cost drivers associated with certain rate components. Eversource Comments at 7; Unitil Supplemental Comments at 5. While we decline to require Staff's suggested feasibility assessment, we anticipate that any high demand draw rate design proposals filed in an adjudicative proceeding will be informed by an assessment of the costs and feasibility of offering a peak coincident demand charge rate component.

G. Time of Day Rates

Time of Day, or Time of Use rates are designed to reflect the cost of providing service to a class of customer at different times of the day. Staff Recommendation at 5. Such rates may be variable, based on real-time costs, or fixed, with pre-defined periods based on underlying cost causation. *Id.* Eversource and Liberty already offer TOU rates for residential and/or general service customers. Tr. at 20, 162.

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(1) Appropriateness for Electric Vehicle Charging

Staff recommended the Commission issue guidance supporting time of use rates as an appropriate rate design component for electric vehicle charging. Staff Recommendation at 5. Commenters generally agreed that TOU rates were appropriate for electric vehicle charging. *Id.* Based on the record in this proceeding, we conclude that TOU rates are appropriate for electric vehicle charging.

(2) Whole Facility/Home v. Separately-Metered

Staff recommended the Commission issue guidance that any electric vehicle TOU rates offered by the utilities should provide an option for customers to enroll in a separate rate class specific to electric vehicle charging end use. Staff reasoned that the uniquely flexible demand and potential load shape of electric vehicles warrants unique rate treatment, drawing an analogy to separately metered controllable water heating rates offered by the utilities. Some commenters suggested separate metering of electric vehicle charging could add unnecessary cost and result in a lost opportunity for development of TOU rates for a whole home or facility. DES Comments at 6; OCA Comments at 3. CENH encouraged the Commission to consider the interaction of EV charging and net metering for those customers who might embrace a whole home TOU rate. CENH Comments at 2-3. Eversource observed that customers could embrace its currently available TOU structures and pricing, either as part of their whole home or business, or as a separately-metered service. Eversource Comments at 3.

We find it appropriate for the utilities to propose a separately metered EV TOU rate. While we agree that TOU offerings for a whole home or business may be appropriate and may benefit New Hampshire ratepayers such rates are more properly addressed in the context of a utility's rate case. We decline to provide guidance on the interaction of net metering and EV TOU rates, as this order focuses on separately-metered EV TOU rates. We acknowledge that both Liberty and Eversource offer a whole home/facility TOU rate currently available to customers and expect that proposals to reform those rate offerings would only be considered in the context of a full rate case.

(3) Alternative Metering Feasibility Assessment

Staff recommended the Commission direct the electric distribution companies to file a feasibility assessment within 90 days relating to opportunities for offering an EV TOU rate for residential and commercial facilities that use interval metering capability of devices other than a utility-owned meter. Staff further recommended that, if an electric distribution company finds such an offering would not be feasible at this time, the assessment should nonetheless include a quantification of costs that would need to be incurred to deploy such a strategy, an explanation of any other barriers that may exist, and a roadmap for overcoming those barriers.

Commenters had mixed opinions regarding the feasibility of alternative metering. ChargePoint was supportive of the Staff recommendation and provided examples from Minnesota and Wisconsin, where this technology has been embraced for metering and billing purposes. ChargePoint Supplemental Comments at 6-137. ChargePoint also suggested that the Commission develop screening criteria for third party devices, consistent with best practice in other jurisdictions. *Id.* at 3-4. CENH supported the feasibility assessment. It also provided a recent order from the Massachusetts Department of Public Utilities, which focused on exploring alternatives to smart meters that might provide similar functionality within the constraints of the Companies' current communications, data management, and billing systems. CENH Supplemental Comments at 1, 42-54. The OCA was supportive of the feasibility assessment recommendation. The OCA suggested that Eversource already uses third party metering for its active demand reduction and electric vehicle load management programs in Massachusetts. Tr. at 84.

Eversource drew a distinction between the methodologies and technologies it uses for billing, and the methodologies it uses to calculate and pay an incentive for load management program participation. Eversource Supplemental Comments at 2-3. Eversource expressed concern around disparate data collection, storage, and transmittal protocols it might encounter. Eversource insisted that all meters providing service to customers be company owned, operated, and maintained. Eversource Comments at 3-4. Eversource commented that affiliates have encountered challenges associated with alternative data sources for customer-sited generation. Eversource Supplemental Comments at 4-5. In Eversource's view, an assessment of the feasibility of third party meter integration within 90 days is both premature and untenable. *Id.* at 3. Unitil did not support the use of interval metering devices other than a utility owned meter for revenue and billing purposes. Unitil Supplemental Comments at 6. Unitil provided an extensive assessment of the complexities associated with third party metering. Unitil cited ISO New England's Metering and Telemetering Criteria as an example of procedures and standards that have been developed for shared metering services. *Id.* at 6-40.

We are persuaded that further investigation of issues related to advanced metering functionality associated with EVSE embedded meters is warranted. We note that Eversource appears to have experience with third party metering approaches in other jurisdictions. Eversource Supplemental Comments at 4-5. We also find Unitil's Supplemental Comments to be a helpful initial assessment of some of the barriers associated with third party metering technology. We are further encouraged by actions in neighboring jurisdictions that appear to target EVSE as an opportunity to build an initial framework for integration of advanced metering functionality. While we decline at this time to require the utilities to file feasibility assessments related to alternative metering, we direct Staff to further develop this concept, with the input of the parties, in the initial stage of any adjudicative proceeding that may follow this investigation, and determine an appropriate timeline for such an assessment with the input of the parties.

(4) Energy, Transmission, and Distribution

Staff recommended the Commission issue guidance that any separately-metered electric vehicle charging rates developed by the utilities should include a time-varying component for energy, transmission, and distribution. Staff Recommendation at 8. Staff recommended that once a utility has collected data regarding the average annual load shape of 500 electric vehicle rate customers, the Company shall solicit a separate tranche for full requirements, load following energy service within its default service solicitation for the electric vehicle customers using an average annual load shape specific to that customer class. *Id*.

The main contention from commenters centered on the time varying energy service component of Staff's recommendation. Unitil asserted that power supply procurement should be based on wholesale power market considerations such as day-ahead energy prices and Locational Marginal Prices (LMPs). Unitil Supplemental Comments at 6. Eversource currently offers time of use rates for transmission and distribution, but expressed a concern that soliciting a separate tranche for energy supply based on the relatively small population of customers may not receive a response from the market. Eversource Comments at 4; Staff Memo at 3. Eversource also noted at hearing that its Connecticut affiliate regularly imputes a peak- and off-peak rate differential, describing it as a straightforward process that is meant to be revenue neutral. Tr. at 31-38. When New Hampshire utilities solicit default service from wholesale suppliers for a group of customers, they generally provide those suppliers with the average load shape of the customer group. That load shape is based on a sample population of customers who have interval meters that record their hourly usage. Staff's proposal to solicit default service bids based on a customer group and load shape specific to EV TOU customers may have value, though it is unclear to us at what size a given customer group will warrant the attention of market actors. We expect that any EV TOU proposals would address issues relating to incorporation of the EV rate class load shape when procuring default energy service from the wholesale market. Given the experience of Eversource in neighboring jurisdictions where it imputes a cost differential, and the likely *de minimis* nature of any initial cost shifting between EV TOU and non-EV TOU default service customers during initial years, we believe it is reasonable to allow a more flexible approach to energy procurement than the one outlined by Staff.

(5) Consistency Among Utilities

Staff recommended the Commission issue guidance that any separately-metered residential electric vehicle charging rate should: (1) be based directly on cost causation; (2) incorporate time varying energy supply, transmission, and distribution components; (3) have three periods (*e.g.*, off peak, mid-peak, and peak); (4) be seasonably differentiated (*e.g.*, summer and winter); (5) have an average price differential between off-peak and peak of no less than 3:1; and (6) have a peak period no longer than four hours in duration. Staff Recommendation at 9. In support of its recommendation, Staff reasoned that there is value in electric vehicle rate offerings for residential applications being generally consistent across utilities. *Id.* at 8.

The City of Lebanon commented that Liberty Utilities' EV TOU rate is similar to the guidance proposed above, with two exceptions: (1) a peak period duration of five hours rather

than four; and (2) a peak to off-peak price differential of slightly less than the 3:1 recommended by Staff during the winter season. City of Lebanon Comments at 2.

Eversource expressed a desire for the Commission to set goals and objectives for the Companies to consider as they assess any complexities and costs associated with a given TOU rate design. Tr. at 20-21. In seeking this guidance, Eversource distinguished between the three-part rate proposed in the Staff Recommendation and the two-part rate similar to its current offering, suggesting metering and billing considerations would vary between those two options. *Id.* Eversource asserted that existing Commission-approved rate structures "are an appropriate starting point for serving customers with EVs," and cautioned against "near-term implementation of more advanced time-of-use ("TOU") rate structures without the benefit of thorough analysis of robust historical data on EV customer usage." Eversource Supplemental Comments at 2. Eversource also cautioned that the three-part rate suggested by Staff "could not be implemented immediately, at least not on any large-scale basis, perhaps on a more manual basis," but agreed that "[i]t's something that should be looked at." Tr. at 20-21.

Based on December 2019 registration data, New Hampshire is home to approximately 4,200 electric vehicles. Tr. at 91. Only approximately 40 of Eversource's more than 400,000 residential customers take service under the residential time of use rate. Staff Memo at 3. The lack of interest in Eversource's existing two-part rate structure suggests that it may be inadequate for purposes of electric vehicle charging. We also take administrative notice of Eversource's filing in DE 19-057 to note Eversource's recent petition for a rate increase declined to revise its residential time of use rate despite advice from its own cost of service consultant to the contrary.

The guidelines proposed by the Commission Staff regarding a consistent framework for separately-metered residential electric vehicle charging rate designs are appropriate, subject to three clarifications. First, we agree with the City of Lebanon that the five-hour peak duration is more appropriate than the four-hour peak duration. Second, the 3:1 peak to off-peak ratio should represent an average ratio during a given year, not during any one season. Third, we note that these guidelines serve as a useful starting point and are generally consistent with the rate designed and approved for the purposes of Liberty's Battery storage pilot, and later adopted for Liberty's separately-metered EV TOU Rate. *Liberty Utilities (Granite State Electric) Corp.*, Order No. 26,376 at 9. (June 30, 2020).

(6) Quantification of Incremental Costs

Staff recommended the Commission direct each utility seeking approval of an EV TOU rate to provide an assessment of incremental costs associated with that offering, including but not limited to those costs associated with billing, metering, and marketing. Several commenters responded to the Staff Recommendation noting concerns about incremental costs associated with billing and metering upgrades that may be a prerequisite to advanced rate design offerings. Unitil Supplemental Comments at 2; Eversource Comments at 5-6. Others asserted that the utilities should be directed to quantify benefits associated with those rate offerings. CENH Comments at 3; DES Comments at 7. We find quantification of costs to be appropriate, including but not limited to billing, metering, and marketing costs. We also find that it may be appropriate in future to quantify benefits associated with EV TOU offerings, but decline at this time to direct utilities to quantify benefits when they submit their proposals.

G. Proceeding to Consider Utility EV TOU Proposals

Staff recommended the Commission open a new proceeding and direct each electric utility to file within 120 days, consistent with the guidance above: (1) an EV TOU rate proposal for separately-metered residential and small commercial customer applications; (2) an EV TOU rate proposal for separately-metered high demand draw commercial customer applications that may incorporate direct current fast charging or clustered level two chargers. Staff recommended that each proposal should be accompanied by testimony explaining how those rates were developed, any plans for marketing residential EV TOU rates, and how the rate is consistent with the Commissions' appropriateness determinations herein.

Based on our review of the record in this investigation, we find electric vehicle time of use rates are an appropriate rate design for residential and commercial customers, and we believe a separate proceeding to adjudicate the merits of various proposals from each utility is warranted. Any proposals filed in this future proceeding should include testimony, projected costs, and be accompanied by illustrative tariff language. We also see value in the distinction Staff has drawn regarding residential and small commercial customers and high demand draw applications that may incorporate direct current fast charging or clustered level two chargers. We decline at this time to adopt a timeline for utility proposals, but direct Staff to develop an appropriate timeline for the filing of proposals, with the input of the utilities.

Based upon the foregoing, it is hereby

ORDERED, that a new docket shall be opened for the Commission to consider utilityspecific electric vehicle time of use rate proposals; and it is

FURTHER ORDERED, that Staff is directed to further develop the alternative metering feasibility assessment concept with the input of the parties to that docket; and it is

FURTHER ORDERED, that Staff is directed to further develop a timeline for filing of electric vehicle time of use rate proposals that will be included in the procedural schedule of the proceeding that follows this order.

By order of the Public Utilities Commission of New Hampshire this eighteenth day of August 2020.

Dianne Martin Chairwoman

Kathup M

Kathryn M. Bailey Commissioner

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Attested by:

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Debra A. Howland Executive Director

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