STATE OF NEW HAMPSHIRE

Before the

PUBLIC UTILITIES COMMISSION

Docket No. DE 23-039

Liberty Utilities (Granite State Electric) Corp. d/b/a Liberty

Request for Change in Distribution Rates

Data Requests of the Office of the Consumer Advocate to Liberty, Set 1

<u>DeCourcey and Therrien</u>

1. Refer to page 10, lines 13-17 of the direct testimony of Matthew DeCourcey and Gregg Therrien, regarding characterization of the Multi-Year Rate Plan (MYRP) as a pilot program.
    a. What are the intended benefits of the MYRP?
    b. What metrics will the Company track to demonstrate whether the intended benefits are achieved?
    c. What sections of Liberty's Filing describe how this pilot should be evaluated?
    d. What should the criteria for a successful pilot be?
    e. How will the Company evaluate whether the MYRP created benefits to customer and to Liberty over a traditional rate case filing at the end of the MYRP Term?
    f. What metrics will the Company use to evaluate whether the MYRP created benefits to itself and to its customers compared to a traditional rate case filing.
2. Refer to page 5, lines 7-8 of the direct testimony of Matthew DeCourcey and Gregg Therrien and explain the difference between the Company's current stair-step approach and its proposal for the Commission to "authorize distributions rates for three one-year periods beginning in July 2023 based on forward-looking estimates of its COS for each of the three years."
3. Refer to page 12, lines 3-4 of the direct testimony of Matthew DeCourcey and Gregg Therrien and explain how the MYRP will encourage Liberty to achieve cost efficiencies if actual costs are allowed to vary from those in the approved capital plan, within allowed tolerances.
4. Refer to page 17, line 2 of the direct testimony of Matthew DeCourcey and Gregg Therrien and define what is meant by "outside management's control."
5. Did Liberty consider utilizing a tracker for variations in the cost of capital projects that lie outside management's control? Please explain why or why not.

6. Refer to page 17 of the direct testimony of Matthew DeCourcey and Gregg Therrien regarding capital steps.
    a. Please explain how the proposed annual reconciliation of costs in the MYRP provides a greater incentive to the Company to control costs than the use of rates steps that are not recovered until the conclusion of a case.
    b. Please explain how the proposed annual reconciliation filing reduces regulatory burden over using capital steps.

7. Refer to page 18, lines 10-11 of the direct testimony of Matthew DeCourcey and Gregg Therrien and explain whether there is a cost limit for variances that are eligible to be deferred.

8. Refer to the statement on pages 19 and 20 of the direct testimony of Matthew DeCourcey and Gregg Therrien, that "customers are protected from overspending by the limitations placed on spending for Replacement Project and by the prudency review."
    a. Is the Company currently subject to after-the-fact prudency review of its capital projects? If yes, please explain how this is different from the MYRP. If not, please explain why not.
    b. How many times over the last ten years has the Commission determined a Company investment was imprudent?
    c. Please provide the decisions and page references for instances when the Commission found Liberty had imprudently incurred costs, and costs were disallowed, over the last 10 years.

9. Refer to the statement on page 21, lines 5-7 of the direct testimony of Matthew DeCourcey and Gregg Therrien, which states "the upward adjustment to rate base cannot exceed 20% for any individual specific project or 10% of the total change in UPIS for any RY."
    a. Please explain how the Company developed the 20% and 10% limit and provide all workpapers in Excel with formulae instance and any supporting sources.
    b. What occurs currently when Liberty spends more than its proposed capital plan?

10. Refer to the statement on page 26 of the direct testimony of Matthew DeCourcey and Gregg Therrien, which states: "at the time the Company made its reconciliation filing following the end of RY3, the Company could request to recover some, or all, of the deferred revenues.
    a. Please confirm that this proposal allows Liberty to true up its costs to revenues. If not confirmed, please explain why not.
    b. Please explain how this proposal differs from the currently approved rate step methodology.

11. Refer to page 28, lines 10-15 of the direct testimony of Matthew DeCourcey and Gregg Therrien and explain how the creation of an evidentiary proceeding on recovery of deferred revenues reduces regulatory burden over the status quo.

12. Refer to pages 33-35 of the direct testimony of Matthew DeCourcey and Gregg Therrien regarding the proposed earnings sharing mechanism (ESM).

    a. Please list the factors that would contribute to Liberty earning less than its authorized return on equity (ROE).

    b. Please list the factors that would contribute to Liberty earning more than its authorized ROE.

    c. Please explain why customers should bear the majority of the costs (75%) of Liberty's earnings fall more than 200 bps below the ROE.

    d. Do customers bear the costs associated with Liberty underearning under its current rate step methodology? Please explain why or why not?

    e. How does the Company recover underearning's currently?

    f. Did Liberty estimate the potential customer rate impacts from its proposed ESM for each year of the MYRP? If yes, please provide those results and the underlying workbooks in Excel readable format with formulae intact. If not, please explain why not.

    g. How will the Company incorporate performance incentive mechanisms (PIM) rewards and/or penalties into its determination of the annual ESM?

    h. Explain how Liberty determined to set its proposed ROE deadband at 100 basis points on either side of the allowed ROE. Provide references for other jurisdictions that use a similar 100 basis point deadband in their MYRP or Performance Based Ratemaking mechanisms.

13. Provide the dollar value equivalent of a basis point for each of the years covered by the proposed MYRP. Provide all underlying calculations in spreadsheet format with any formulas used in these calculations intact.

14. Provide copies of all presentations that have been made to the Company board of directors and/or parent company executives related to the proposed MYRP and any previous presentations related to the development of this proposal. Provide both the slideshow file (in Powerpoint or pdf form) and any handouts or associated materials.

<u>Hanser</u>

15. Refer to pages 3-4 of the direct testimony of Philip Hanser, which states: "For example, multiyear rate plans provide utilities with a broad-based incentive framework by extending the period between rate cases. As a result, the multiyear framework incentivizes the utility to achieve cost efficiencies because it will be able to retain a portion of any enhanced earnings until the time of the next rate case." Please explain how Liberty's proposed MYRP promotes cost efficiencies if it is permitted to reconcile costs on an annual basis.

16. Refer to page 6, lines 15-16 of the direct testimony of Philip Hanser.

    a. Please provide a list of all U.S utilities that adjust rates using the I-X approach. Please include in your response the docket or proceeding number where each utility received approval.

    b. Please explain why the Company did not propose an I-X approach.

    c. Did Liberty consider escalating its historical test year revenue requirement according to an inflation index, such as the gross domestic product price index (GDP-PI) less a productivity factor? Please explain why or why not?

17. Refer to footnote 8 on page 9 of the direct testimony of Philip Hanser and indicate which of the utilities have annual reconciliations for under-earnings. Please provide the docket or proceeding number where each utility received approval.

18. Refer to page 9, lines 5-10 of the direct testimony of Philip Hanser regarding annual adjustments in MYRPs.

    a. Please provide a list of all known utility MYRPs that include annual reconciliation of under-earnings. Please provide the docket or proceeding number where each utility received approval.

    b. Please provide a list of all known utility MYRPs that include the reconciliation of under-earnings only at the conclusion of the MYRP period. Please provide the docket or proceeding number where each utility received approval.

    c. Please provide a list of all known utility MYRPs that do not permit annual reconciliation of under-earnings. Please provide the docket or proceeding number where each utility received approval.

19. Refer to page 10, lines 8-14 of the direct testimony of Philip Hanser regarding "earnings sharing."

    d. Please provide a list of all known utility MYRPs that include ESMs for under-earnings. Please provide the docket or proceeding number where each utility received approval.

    e. Please explain why customers should bear the risk of utility under-earnings.

    f. Please explain why an ESM is needed in addition to the Company's proposal for an annual reconciliation of costs.

20. Refer to the statement on page 11, lines 5-6 of the direct testimony of Philip Hanser, which states: "'Formula rate' plans include full (or nearly full) true-up provisions." Please explain how Liberty's proposal to reconcile costs on an annual basis is different than a "formula rate" plan.

21. Refer to page 11 of the direct testimony of Philip Hanser.

    a. Please provide a list of all known utility MYRPs that include an ESM similar to that proposed by Liberty. Please provide the docket or proceeding number where each utility received approval.

b. Did the Company model its ESM on another jurisdiction's MYRP? If yes, please provide the name of the utility and the associated docket or proceeding number.

c. Please explain why customers should bear the majority of the costs (75%) of Liberty's earnings fall more than 200 bps below the ROE.

22. Refer to page 12, lines 17-18 of the direct testimony of Philip Hanser, which states that "capital is forecast for RY2 and RY3 based on capital spend plans, and O&M is forecasted based on an escalation factor." Please explain how this approach differs from the current stair-step approach.

23. Refer to page 14, lines 4-7 of the direct testimony of Philip Hanser and explain how setting rates on utility-specific forecasts with an ESM provides more incentives for cost control than setting rates based on an external index or I-X approach with an ESM.

24. Refer to page 14, lines 8-10 of the direct testimony of Philip Hanser and explain how Liberty's MYRP leads to more gradual and deterministic rate increases compared to the current step adjustment methodology.

25. Refer to page 15, lines 19-21 of the direct testimony of Philip Hanser.

    a. Does "specific capital projects" indicate that utilities were not allowed adjustments for replacement projects or projects that were not previously identified in the capital plan? Please explain your response.

    b. How are changes to the capital plan addressed in the current step adjustment methodology? Please explain for both the removal of capital and additional capital.

26. Refer to the direct testimony of Philip Hanser on page 16, lines 12-13 that states "under the MYRP, the sum of the value of replacement projects is required to exceed the value of the canceled projects." Please also refer to the direct testimony of Matthew DeCourcey and Gregg Therrien on page 19, lines 9-10 that states that "In either case, the total value of the Replacement Project(s) cannot be greater than the previously approved capital projects they are replacement."

    Please confirm that the total value of replacement projects must be lower than the initial projects they are replacing as included in the direct testimony of Matthew DeCourcey and Gregg Therrien and that the statement by witness Philip Hanser is an error. If not confirmed, please explain the discrepancy.

27. Refer to page 22, line 13 and page 23, lines 1-2 of the direct testimony of Philip Hanser and explain why reliability and resilience are more important to consumers than they were previously. Please include a list of all sources relied upon in making this determination.

28. Refer to page 22, lines 1-5 of the direct testimony of Philip Hanser.

    a. Did the Company calculate the incremental net benefits that accrue to customers from meeting the proposed higher performance levels for System Average Interruption Frequency Index (SAIFI) and System Average Interruption Duration Index (SAIDI)? If yes, provide the value of the net incremental benefits to customers and include all supporting workpapers in Excel with formulae intact.

b. What are the costs (i.e., reliability investments) associated with achieving higher levels of SAIDI and SAIFI, and have these costs been incorporated in the proposed MYRP?

29. Refer to page 26, lines 12-14 of the direct testimony of Philip Hanser and explain how sharing percentages are “skewed to the benefit of customers” if Liberty “treats the relative risk of over- and under-earning symmetrically” as stated on page 12 lines, 7-8.

30. Refer to page 26, lines 11-12 of the direct testimony of Philip Hanser and explain how the MYRP provides more “transparency concerning utility capital and O&M forecasts” than the Company’s current approach.

Erica Menard

31. Refer to page 11, lines 5-7 of the direct testimony of Erica Menard and list potential unintended consequences the Company seeks to avoid.

32. Refer to the direct testimony of Erica Menard at page 18, lines 13-22 regarding the proposed reliability PIM.

    a. Is Liberty currently subject to reliability standards for SAIDI and SAIFI? If yes, please provide those standards and the associated performance requirements.

    b. Is Liberty subject to any penalties currently related to SAIDI and SAIFI performance? Please explain.

    c. What obligations does Liberty currently have to increase reliability?

    d. Does Liberty have any corporate goals related to SAIDI and SAIFI performance? If yes, please provide the performance targets for each year between 2017 and 2021 and how actual performance compared to those targets.

    e. In the absence of the PIM, what percentage increase in SAIDI and SAIFI performance would Liberty achieve each year of the MYRP?

33. Refer to the direct testimony of Erica Menard at page 16, lines 2-7. Did Liberty consider taking the mean of peer utility SAIDI and SAIFI values and setting the reward/penalty at one standard deviation above or below the mean? If no, please explain why not. If yes, why did Liberty choose not to propose that method?

34. Did the Company consider a reliability PIM related to feeders with below average levels of reliability? Please explain why or why not.

35. Please explain why the Company did not propose a PIM related to Customers Experiencing Multiple Interruptions as included in Attachment ELM-PBR-1.

36. Refer to the direct testimony of Erica Menard on page 14, lines 2-3 and 9-13 that discusses the selection of utilities for reliability data.

a. Please provide a list of utilities that were initially considered but ultimately not selected due to differences in “regional conditions” and “exogenous seasonal weather affects.”

b. Were the “regional conditions that affect reliability” and “exogenous seasonal weather affects” measured for the utilities located further away and selected based on a selection criterion? If not, describe the assessment process for determining utility inclusion based on these criteria.

37. Refer to page 15, lines 7-10 of the direct testimony of Erica Menard.

a. Why is a PIM required for SAIFI if the Company has a strong score?

b. Would the Company not maintain a strong SAIFI score absent of the PIM? Please explain why or why not.

c. Would the Company seek to improve its SAIDI score in the absence of the PIM? Please explain why or why not.

38. Did the Company conduct a benefit cost analysis (BCA) to determine the cost-effectiveness of outperforming industry standards for SAIDI and SAIFI? If yes, please provide all workpapers in Excel with formulae intact. If not, please explain why not.

39. Did the Company conduct a benefit cost analysis (BCA) of its proposed time-of-use (TOU) Rate Adoption PIM? If yes, please provide all workpapers in Excel with formulae intact. If not, explain why not.

40. Refer to page 25, lines 1-11 of the direct testimony of Erica Menard regarding the Interconnect PIM.

a. Did the Company calculate the incremental net benefits that accrue to customers from shortening the existing 40-day time to complete Supplemental Reviews? If yes, provide the value of the net incremental benefits to customers and include all supporting workpapers in Excel with formulae intact.

b. What are the costs associated with shortening the time required to complete Supplemental Reviews, and have these costs been incorporated in the proposed MYRP?

c. Please provide the Company’s average time to process Supplemental Reviews for each of the previous five years.

41. Refer to page 28, lines 13-14 of the direct testimony of Erica Menard. For each PIM listed in Attachment ELM-PBR-1 that the Company deemed “duplicative,” please provide the name of the report where data is reported, where each report is filed, and available weblinks to the location of each report.

42. Refer to page 31, lines 15-17 of the direct testimony of Erica Menard regarding non-wires alternatives (NWAs)

a. Please explain why the Company is not proposing any NWAs in its MYRP.

b. Are there barriers in place that prohibit the Company from proposing NWAs in the MYRP?

c. Does the Company have a disincentive to pursue NWAs?

43. Regarding the penalty/reward structure for the reliability PIM:

    a. Identify and provide the risk and reward analysis used to select +/-25 basis points reward/penalty ROE adjustments for meeting or not meeting the reliability PIMs.

    b. Identify and provide a list of all peer utilities that have implemented similar reliability PIMs. Include in your response for each, the level of penalty and reward used for the ROE adjustment.

44. Please explain why the Company did not include metrics for Reliability and Resilience as included Attachment ELM-PBR-1 in its MYRP.

45. Regarding the TOU Rate Adoption PIM:

    a. Please provide the proposed basis point reward for the TOU Rate Adoption PIM.

    b. How did the Company determine the basis point reward level? Please provide any supporting workpapers in Excel with formulae intact.

    c. Identify and provide a list of all peer utilities that have implemented similar TOU PIMs. Include in your response for each, the level of reward used for the ROE adjustment.

46. Regarding the Interconnect PIM:

    a. Please provide the proposed basis point reward for the Interconnect PIM.

    b. How did the Company determine the basis point reward level? Please provide any supporting workpapers in Excel with formulae intact.

    c. Identify and provide a list of all peer utilities that have implemented similar interconnection PIMs. Include in your response for each, the level of reward used for the ROE adjustment.

47. Did the Company calculate the ratepayer impacts of its proposed PIM? If yes, please provide a copy of the analysis in Excel format with formulae intact. If no, please explain why not.

48. Did the Company consider proposing performance metrics with rewards based on a portion of net benefits (i.e., shared savings)? If so, please describe any such metrics that Liberty considered, and please explain why the Company opted not to include any such mechanisms in its proposal. If not, why not?

49. Regarding the metric related to Third-Party Developer Data Access as included in Attachment ELM-PBR-1, please explain whether third-party developers of distributed energy resources currently have access to granular feeder and substation performance data (i.e., 8760 load profiles, voltage sag, power quality, etc.).

Greg Tillman

50. Refer to page 12 of the direct testimony of Greg Tillman and explain if the meters used for the TOU rate option will need to be replaced by the proposed AMI meters? If yes, what are the costs associated with the meters for the TOU rate option.

51. Refer to the direct testimony of Greg Tillman at page 14, Figure 3. Customer Education Plan Tactics and Budget:

    a. Describe the process used to allocate the Budget between the different Communication Tactics.

    b. Clarify if "All NH Electric Customers" is referring to all customers in Liberty's service territory or for all customers over the entire state.

52. Refer to page 5 of the direct testimony of Greg Tillman, where reference is made to the Company's Advanced Rate Design Roadmap. Please provide a copy of this roadmap.

53. Refer to page 5 of the direct testimony of Greg Tillman, where Mr. Tillman states concerning the rate design proposals that he has put forward in this testimony, "they are not the entirety of the Company's plan for rate design innovation in New Hampshire."

    a. Please detail the other elements included in the Company's plan for rate design innovation in New Hampshire that have not been proposed in this proceeding.

    b. Is the Company's Advanced Rate Design Roadmap comprehensive of all of the Company's future plans for rate design innovation in New Hampshire? Please explain.

54. Refer to pages 12-13 of the direct testimony of Greg Tillman, where Mr. Tillman discusses the Company's plans for implementing TOU rates in advance of full AMI deployment, and specifically, to the following response from Mr. Tillman:

    > "The Company plans to utilize meters capable of and programmed to measure the consumption of energy during the time periods defined in the proposed rates. Since these time periods are consistent with the existing EV charging rates and the Battery Storage Pilot, the same metering and billing solutions for those rates will apply to the solutions required for support of the full requirements TOU rates being proposed by Liberty."

    a. Please clarify the type of meters that is referenced in the cited section. Are these interval meters? How do they differ from the AMI meters that this Company intends to install?

    b. Please clarify what is meant by the phrase "metering and billing solutions."

    c. Why is it important that the time periods for the proposed TOU rate are consistent with existing EV charging rates and the Battery Storage Pilot?

55. Refer to page 9 of the direct testimony of Greg Tillman, where Mr. Tillman provides a summary of Commission Staff's proposal on EV TOU rates and the Commission's decision on the same in

Docket No. IR 20-004, and where Mr. Tillman indicates that the Company designed its TOU rate proposal in the instant proceeding to conform to the Commission's guidance in that previous case. Did the Company consider the applicability of the Commission's guidance in Docket No. IR 20-004 to the instant proceeding in light of the fact that the Commission guidance concerned the design of rates for EV whereas the instant proceeding concerns a whole-house rate design? Please explain in detail.

56. Refer to pages 10-11 of the direct testimony of Greg Tillman, where Mr. Tillman discusses the Company's experience deploying the "Time Choice Plus" TOU rate to its Missouri residential and small commercial customers.

    a. Please discuss any differences between the proposed design for the D-TOU and G-3-TOU in New Hampshire and the design of Time Choice Plus.

    b. Has Time Choice Plus been opened to all residential and small commercial customers? Is enrolment opt-out or opt-in?

    c. How much of a reduction in peak period energy consumption have customers enrolled in Time Choice Plus exhibited?

    d. What percentage of eligible residential customers are enrolled in Time Choice Plus?

    e. What percentage of eligible small commercial customers are enrolled in Time Choice Plus?

    f. Does Time Choice Plus include bill protection for newly enrolled customers? If so, please explain how this bill protection works, and please provide data on the number of customers that have benefited from this bill protection and the value of bill protection (in dollars) provided.

57. Refer to page 14 of the direct testimony of Greg Tillman and the discussion of the "Best-Bill Guarantee."

    a. How would the Best Bill Guarantee be funded?

    b. Does the Company believe that offering bill protection will affect the behavioral response of customers enrolled in TOU rates, for example, by reducing the degree of load shifting? Please explain in detail.

58. Refer to page 18 of the direct testimony of Greg Tillman, where Mr. Tillman explains how the Company determined the generation costs to be recovered through the proposed TOU rates and states: "Once the total generation cost is calculated, the TOU rates associated with recovery of generation costs can be determined based on how these costs are incurred in each of the TOU periods."

    a. Is it possible that the TOU rate would under-recover generation supply and/or generation capacity costs if enrolled customers shifted their consumption to off-peak periods? Please explain.

b. If the answer to (a) is yes, then how would the Company recovery any such revenue shortfall?

59. Refer to page 22 of the direct testimony of Greg Tillman, where Mr. Tillman explains that the proposed TOU rates could result in cross-subsidies or lost revenues.

    a. Please explain in detail how TOU rates might result in cross-subsidies.

    b. Please explain how the Company would cover lost revenues, should these result from the proposed TOU rates.

60. Refer to page 25 of the direct testimony of Greg Tillman, where Mr. Tillman states that "customers who choose a competitive supplier must seek access to time-differentiated energy service rates through their selected energy service provider."

    a. Please confirm that the Company is proposing to require that TOU-enrolled customers interested in contracting for supply on the competitive retail market only be permitted to contract for time-differentiated energy service.

    b. If (a) is confirmed, please explain why the Company is proposing to impose this condition.

61. Refer to page 15 of the direct testimony of Greg Tillman, where Mr. Tillman indicates that the Company intends to create separate rate classes for the TOU classes in the future.

    a. When does the Company expect to create separate rate classes for TOU customers?

    b. Please clarify whether the Company intends to create separate customer classes for TOU enrolled customers.

    c. What would be the implications for cost allocation, if any, of creating separate rate classes for TOU customers as the Company proposes to do.

    d. What are the benefits of creating separate rate classes for TOU customers?

    e. What, if any, are the drawbacks of creating separate rate classes for TOU customers?

62. Refer to page 16 of the direct testimony of Greg Tillman, where Mr. Tillman indicates that, "[t]o ensure continuity and simplification of the proposed rates," the Company determined to maintain the time periods used for its EV and battery TOU rates in its proposals for D-TOU and G-3-TOU. Please explain how the time periods were determined for the EV and battery TOU rates and provide all supporting data and documentation illustrating the basis for these time periods.

63. Refer to pages 16 of the direct testimony of Greg Tillman, where Mr. Tillman discusses the development of time periods for D-TOU and G-3-TOU and states, "Liberty gathered and reviewed historical load and ISO – New England ("ISO-NE") locational marginal pricing ("LMP") data to ensure that the time periods were established to ensure effective TOU rates."

a. Do the proposed time periods for D-TOU and G-3-TOU more closely reflect the temporal pattern of energy and/or generation capacity costs more than the temporal pattern of transmission costs? Please explain in detail.

b. Do the proposed time periods for D-TOU and G-3-TOU more closely reflect the temporal pattern of energy and/or generation capacity costs more than the temporal pattern of distribution costs? Please explain in detail.

c. Has the Company performed any specific quantitative or qualitative analysis of LMP pricing data to support its proposed time periods for D-TOU and G-3-TOU? If yes, please provide documentation for this analysis.

d. Has the Company performed any specific quantitative or qualitative analysis of the temporality of transmission pricing to support its proposed time periods for D-TOU and G-3-TOU? If yes, please provide documentation for this analysis.

64. Refer to page 32 of the direct testimony of Greg Tillman, where Mr. Tillman indicates concerning distribution rates that the Company utilized "the ratio of the square of the hourly loads to differentiate the rates by time periods." Please provide workpapers for these calculations for each of the proposed TOU rates.

65. Refer to page 16 of the direct testimony of Greg Tillman, where Mr. Tillman indicates that, "[t]o ensure continuity and simplification of the proposed rates," the Company determined to maintain the time periods used for its EV and battery TOU rates in its proposals for D-TOU and G-3-TOU.

    a. Please explain how maintaining the time periods from the Company's existing TOU rates for EVs and batteries will promote continuity and simplification, and for whom.

    b. Did the Company evaluate other potential time periods for D-TOU and/or G-3-TOU? If yes, please describe all alternative time periods that were considered by the Company.

    c. If the answer to (b) is yes, then did the Company quantitatively evaluate the implications of alternative time periods on the TOU rate designs, including, for example, considering how the use of alternative time periods would impact the peak to off-peak price ratios? Please explain in detail and provide the results of any such evaluation.

    d. How did the Company determine the which months to assign to the summer season and which months to assign to the winter season?

66. Refer to pages 16-17 of the direct testimony of Greg Tillman, where Mr. Tillman discusses the development of time periods and the definition of seasons for D-TOU and G-3-TOU. Please comment on the following rate structure design alternatives, indicating whether the Company considered this alternative, indicating whether this option could be appropriate for D-TOU and/or G-3-TOU, and discussing any benefits or drawbacks of the following alternative designs for the Company's proposed TOU rates.

a. A two-period rate design with only peak and off-peak periods.

b. A rate design with more than two seasons.

c. A rate design with fewer periods in certain seasons.

d. A rate design with lower peak to off-peak price ratios.

e. A rate design in which only distribution costs are not recovered on a time-varying basis.

67. Refer to page 16 of the direct testimony of Greg Tillman, where Mr. Tillman indicates that determining the periods for D-TOU and G-3-TOU included "Additional technical considerations." Please detail these considerations, clearly explaining how they influenced the determination of periods for the proposed TOU rates.

68. Refer to page 16 of the direct testimony of Greg Tillman, where Mr. Tillman indicates that the Company's "time period analysis identified some areas of potential improvement." Please detail these areas of potential improvement and indicate any plans for addressing them in the future.

69. Refer to page 16 of the direct testimony of Greg Tillman, where Mr. Tillman indicates that the Company's "time period analysis identified some areas of potential improvement." Please detail these areas of potential improvement and indicate any plans for addressing them in the future.

70. Refer to Attachment DOE 1-1.8, provided in response to Department of Energy Data Request No. 1-1, and specifically to the worksheet labeled "Class_Hourly_Load_Shape."
    a. How did the Company determine this load shape?
    b. Why is load data only available through June 30, 2022?

71. Refer to Attachment DOE 1-1.9, provided in response to Department of Energy Data Request No. 1-1, and specifically to the worksheet labeled "Class_Hourly_Load_Shape."

    a. How did the Company determine this load shape?
    b. Why is load data only available through June 30, 2022?

72. Refer to Attachment GWT-1, and the table titled "TOU Rate ($/kWh) by Component," where two footnotes indicate that the following charges and factors are excluded for the time-varying rates: Reliability Enhancement/Vegetation Management Charge, Revenue Decoupling Adjustment Factor, Stranded Cost Charge, and Storm Recovery Adjustment Factor.

    a. Which of the noted charges and factors are assessed volumetrically?

    b. Please reproduce the "Rate Ratios" table provided in Attachment GWT-1 so that it reflects the impact of all volumetrically recovered charges.

73. Refer to Attachment GWT-2, and the table titled "TOU Rate ($/kWh) by Component," where two footnotes indicate that the following charges and factors are excluded for the time-varying

rates: Reliability Enhancement/Vegetation Management Charge, Revenue Decoupling Adjustment Factor, Stranded Cost Charge, and Storm Recovery Adjustment Factor.

a. Which of the noted charges and factors are assessed volumetrically?

b. Please reproduce the "Rate Ratios" table provided in Attachment GWT-1 so that it reflects the impact of all volumetrically recovered charges.

74. Refer to page 28 of the direct testimony of Greg Tillman, where, in the context of discussing Rates EV-L-E and EV-M-E, Mr. Tillman refers to "typical utilization." What is "typical utilization?"

75. Refer to page 22 of the direct testimony of Greg Tillman, where Mr. Tillman discusses "appropriate uses" for time-differentiated distribution rates. Please explain in detail how time-differentiated distribution rates can promote each of the following uses mentioned by Mr. Tillman:

a. Encourag[ing] beneficial electrification and technology adoption

b. Develop[ing] a better understanding of customer desires and behavior

c. Gain[ing] deeper insights into grid operations and modernization investments

d. Captur[ing] the benefits of distributed resources

76. Refer to page 26 of the direct testimony of Greg Tillman, where Mr. Tillman discusses the D-10 rate. Please explain in detail how the thirteen-hour peak period window for this rate was determined and provide any relevant supporting data and/or workpapers substantiating this determination.

<u>Balashov and Strabone</u>

77. Refer to the direct testimony of Dmitry Balashov and Anthony Strabone at page 9, lines 14-16, in which the witnesses state that among the functionalities the deployment of AMI will facilitate is an "enhanced customer care and customer empowerment to manage bills, by reviewing consumption in near real time to identify opportunities for savings or facilitate billing disputes through off-cycle meter readings, etc."

a. Please describe the extent to which these "functionalities" will be duplicative of those provided via the statewide customer data platform being developed, with the participation of Liberty's two retail utilities in New Hampshire, pursuant to Docket No. DE 19-197.

b. Please describe the extent to which Liberty's plan for AMI deployment, and any related upgrades to its internal systems, will interoperative with the DE 19-197 data platform and contribute to the success of the platform.

78. Refer to the direct testimony of Dmitry Balashov and Anthony Strabone at page 15, lines 16-19.

a. Did Liberty conduct a cost/benefit analysis on the appropriate level of Advanced Metering Functionalities as recommended by Staff? If yes, please provide this analysis. If not, please explain why Liberty has not carried out this analysis.

79. Did the Company conduct a cost/benefit analysis for its proposed AMI project? If yes, please provide a copy of the analysis in Excel with all formulae intact. If no, please explain why not.

80. Did the Company quantify any of the benefits associated with its proposed AMI project? If yes, please provide those values with supporting documentation in Excel with all formulae intact. If no, please explain why not.

81. Regarding the phased-in approach to AMI deployment, please explain if the Company is seeking approval of both the first and second phases of the AMI project as part of this MYRP.

82. Refer to the direct testimony of Dmitry Balashov and Anthony Strabone at page 26, lines 5-12, which states that meter hardware and firmware features which would trigger written consent requirements are disabled.

    a. Will Liberty enable these features for a future pilot or program if consent was obtained from customer for participation? Please explain why or why not.

    b. If Liberty is not planning to use the meter hardware and firmware features, please explain why Liberty chose to procure meters with this functionality.