## **MEMO REPORT**

Date: March 14, 2022

From: Douglas W. Brogan, P.E.

**To:** Jayson Laflamme, Asst. Director - Water Group, Regulatory Support Div., NH Dept. of Energy

**Re:** DW 21-022 Pennichuck East Utility, Inc.

Petition for Approval of 2021 Qualified Capital Project Annual Adjustment Charge

I am writing this memo report as an engineering consultant to the Water Group, Regulatory Support Division to summarize my findings in the above-referenced docket. The Qualified Capital Project Annual Adjustment Charge (QCPAC) program was initially authorized for Pennichuck East Utility, Inc. (PEU or company) in DW 17-128 (Order 26,179, October 4, 2018). In the current docket PEU is seeking approval of a QCPAC surcharge for projects completed in 2020; preliminary approval of projects proposed for 2021; and has provided its capital budgets for 2022 and 2023 for informational purposes. My review is limited primarily to the engineering and operational aspects of the filing and is based on review of the filing, subsequent updates (in particular the Exhibit DLW-1 capital expenditure schedules provided in response to DOE DR Tech 2 on December 29, 2021), other case discovery, E-22 forms (Reports of Proposed Expenditures for Additions, Extensions and Capital Improvements to Fixed Capital), and associated materials.

## 2020 Projects

The 2020 project year saw near-completion of a substantial, multipart, multiyear effort to address supply and distribution deficiencies and new treatment requirements in the company's Locke Lake system in Barnstead. The project was funded primarily through a \$4.24 million Drinking Water State Revolving Loan Fund (SRF) loan approved by the NH Public Utilities Commission (Commission) in DW 18-132 (Order 26,189, November 6, 2018). While described extensively in prior dockets and in company testimony in the instant docket (John J. Boisvert, pp. 7-8 and 9-12), the project generally consists of:

- 1) Addition of a new surface water source to supplement existing groundwater sources.
- 2) Consolidation of treatment in a centralized location for cost efficiency and to address new, lower arsenic standards.

3) Replacement of poor quality, undersized mains, and addition of new mains to eliminate dead ends.

The bulk of the work occurred in 2019 and 2020, with a small amount carried over into 2021. Project totals account for **\$4,182,481**, or 81 percent, of total QCPAC-eligible expenditures in service by December 31, 2020.

The next largest project in 2020 involved the first phase of replacement of problematic mains in the company's Williamsburg system in Pelham. Replaced mains were generally small diameter and characterized by elevated break history, inadequate valving, and lack of looping, with many of the mains running through backyards. The initial phase of the project replaced 5 percent of the system's mains, and one or two additional phases are anticipated in the future. The project accounted for \$595,046, or 12 percent, of total eligible expenditures in 2020.

The remaining 7 percent of 2020 costs include a variety of smaller items such as replacement of service lines, meters, pumps and other equipment. The company has affirmed that all of the included items were in service and used and useful as of December 31, 2020 (testimony of Donald L. Ware, p. 6, line 22). Several significant projects, including the Londonderry tank project (\$1,545,000, see docket DW 18-101) and Atkinson station rebuild (\$500,000), were deferred for various reasons.

## **2021 Projects**

The list of proposed 2021 projects includes close out items from the Locke Lake source of supply and treatment efforts totaling approximately **\$200,000**; the related decommissioning of the Airstrip well for **\$78,000**; and a variety of smaller projects. Several larger projects were again deferred, including the following:

- 1) The Londonderry tank project (\$1,600,000) was deferred an additional year as the company pursues required permits.
- 2) Interconnection of the W&E system in Windham to the town of Salem water system (\$705,000, see Energy 2-4 b) was also deferred to 2022 because requisite materials were not available in time to complete the project in 2021. This interconnection will bring supplemental water to address water quantity and quality limitations of the system's existing wells. It is made possible by a new Southern NH Regional Water Project pipeline carrying water from Manchester to Salem, and a franchise transfer from PEU to Salem recently approved in docket DW 20-080. Most recently, the company has requested approval of NH Drinking Water and Groundwater Trust Fund monies for the project.
- 3) The Atkinson tank rebuild has now been deferred to 2023 (\$600,000, see Energy 1-7).

## **Conclusion**

For 2020 projects, I would support a finding that each of the listed projects indicated as completed and in service at year end was prudent, used and useful.

For 2021, while the typical juggling of projects to balance project deferrals and funding availability is evident, the projects as proposed appear reasonable.