

**Exh. ASR-1T
Dockets UE-220066, UG-220067,
and UG-210918
Witness: Andrew S. Rector**

**BEFORE THE WASHINGTON
UTILITIES AND TRANSPORTATION COMMISSION**

**WASHINGTON UTILITIES AND
TRANSPORTATION COMMISSION,**

Complainant,

v.

PUGET SOUND ENERGY,

Respondent.

**DOCKETS UE-220066, UG-220067,
and UG-210918 (*Consolidated*)**

In the Matter of the Petition of

PUGET SOUND ENERGY

**For an Order Authorizing Deferred
Accounting Treatment for Puget Sound
Energy's Share of Costs Associated with
the Tacoma LNG Facility**

TESTIMONY OF

ANDREW S. RECTOR

**STAFF OF
WASHINGTON UTILITIES AND
TRANSPORTATION COMMISSION**

Transportation Electrification and Distributed Energy Resources

July 28, 2022

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LIST OF EXHIBITS

- Exh. ASR-2 PSE Electric Vehicle Charging Pilot Programs July-December 2021 Update
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- Exh. ASR-4 PSE Pilot EVSE Installations with No Usage (as of March 2022)
- Exh. ASR-5 PSE Transportation Electrification Plan (March 15, 2021)
- Exh. ASR-6 PSE Calculation of Incentive Rate of Return on Transportation Electrification Plan EVSE
- Exh. ASR-7 EV Marketing Performance Report (summary report about PSE customer survey) (December 16, 2019)
- Exh. ASR-8 PSE Responses to Select UTC Staff Data Requests
- Exh. ASR-9 PSE Calculation of Proposed DER Preferred Portfolio Revenue Requirement
- Exh. ASR-10 PSE 2022 DER RFP: Proposal Summary (April 19, 2022)
- Exh. ASR-11 PSE Proposed Energy Storage Demonstrations
- Exh. ASR-12 PSE and Staff Revenue Requirement Calculations for Energy Storage Demonstrations

1 I. INTRODUCTION

2

3 Q. Please state your name and business address.

4 A. My name is Andrew S. Rector, and my business address is 621 Woodland Square
5 Loop SE, Lacey, Washington, 98503. My business mailing address is P.O. Box
6 47250, Olympia, Washington, 98504-7250. My business email address is
7 Andrew.rector@utc.wa.gov.

8

9 Q. By whom are you employed and in what capacity?

10 A. I am employed by the Washington Utilities and Transportation Commission
11 (Commission) as a Regulatory Analyst in the Conservation and Energy Planning
12 (CEP) Section of the Regulatory Services Division.

13

14 Q. How long have you been employed by the Commission?

15 A. I have been employed by the Commission since April 2018.

16

17 Q. Please state your qualifications to provide testimony in this proceeding.

18 A. I have a Master's degree in Public Affairs, with emphases in sustainability and
19 policy analysis, from Indiana University. I completed the Public Utilities Reports
20 Guide's "Principles of Public Utilities Operations and Management" in October
21 2018 and attended New Mexico State University's rate case basics workshop in May
22 2019, among other workshops, trainings, and conferences.

23

1 As a Regulatory Analyst, I am responsible for the development of Staff
2 recommendations concerning tariff filings, conservation plans, integrated resource
3 plans (IRPs), and clean energy implementation plans (CEIPs) by regulated
4 companies for presentation to the Commission at open public meetings and
5 adjudications. I have also served as CEP’s subject matter expert on electric vehicle
6 supply equipment (EVSE) and have been the lead analyst on several Puget Sound
7 Energy (PSE) EVSE filings, including its 2021 transportation electrification plan
8 (TEP).

9
10 **Q. Have you testified previously before the Commission?**

11 A. Yes. I submitted testimony in October 2020 in Docket UE-200115, “Application for
12 an Order Authorizing the Sale of All of Puget Sound Energy's Interests in Colstrip
13 Unit 4 and Certain of Puget Sound Energy's Interests in the Colstrip Transmission
14 System.”

15
16 **II. SCOPE AND SUMMARY OF TESTIMONY**

17
18 **Q. What is the scope and purpose of your testimony?**

19 A. I address the Company’s electric vehicle supply equipment (EVSE) pilot program,
20 transportation electrification plan (TEP) investments, proposed distributed energy
21 resources (DER) and demand response (DR) preferred portfolio, and proposed
22 energy storage demonstrations. The purpose of my testimony is to evaluate the
23 prudence of the investment costs incurred by PSE and if the proposed investment

1 costs expected to be made in the three years (2023, 2024, and 2025) of the multi-year
2 rate plan (MYRP) should be included in rates on a provisional basis, subject to
3 refund. Staff makes recommendations about performance metrics regarding its TEP
4 and DER preferred portfolio, as well as recommendations for PSE to use the cost
5 benefit analysis methodology developed in Docket UE-210824 in its mid-2024 TEP
6 report.

7
8 **Q. Please summarize your recommendations.**

9 A. I recommend the Commission allow PSE's EVSE pilot program and into rates
10 starting in Rate Year 1 (RY1). I also recommend the Commission allow PSE's TEP
11 investments into rates on a provisional basis starting in RY1, with performance
12 metric tracking and reporting requirements as detailed in my testimony below. I
13 further recommend that the Commission *not* allow inclusion of the Company's
14 proposed DER and energy storage demonstration investments in rates during the
15 MYRP on a provisional basis, and remove from PSE's electric revenue requirement
16 all amounts associated with these investments (including plant-related costs and
17 operations and maintenance [O&M] expenses), because these investments do not
18 meet the standards set forth in the Commission's Policy Statement on Property that
19 Becomes Used and Useful After the Rate Effective (Used and Useful Policy
20 Statement).¹

21

¹ *In the Matter of the Commission Inquiry into the Valuation of Public Service Company Property that Becomes Used and Useful after Rate Effective Date*, Policy Statement on Property that Becomes Used and Useful, Docket U-190531 (Jan. 31, 2020) (hereinafter "Used and Useful Policy Statement").

1 **Q. Are you recommending that the Commission find PSE’s DER and energy**
2 **storage demonstration investments imprudent?**

3 A. No. As explained later in my testimony, I am only recommending that the
4 Commission not grant these forecasted investments provisional treatment within the
5 context of this rate case. If the Commission accepts this recommendation, PSE
6 would still be able to seek recovery of these forecasted investments in a future rate
7 case once they are in-service or when PSE can provide more certainty as to these
8 future investments.

9
10 **Q. Have you prepared any exhibits in support of your testimony?**

11 A. Yes. I prepared Exhibits ASR-2 through ASR-12.

- 12 • Exh. ASR-2 shows PSE’s most recent TE pilot progress report, covering the
13 second half of 2021.
- 14 • Exh. ASR-3 shows PSE’s revenue requirement calculation for its TE pilot
15 program and TEP investments.
- 16 • Exh. ASR-4 shows the workplace/fleet and multifamily EVSE installed by PSE
17 as part of its TE pilot program that had not had any charging sessions as of the
18 end of March 2022.
- 19 • Exh. ASR-5 is a copy of PSE’s TEP, filed in March 2021.
- 20 • Exh. ASR-6 is an excerpt from a Company workpaper that shows the Company’s
21 calculation of the 2 percent incentive rate of return on its TEP investments.
- 22 • Exh. ASR-7 is a report describing the results of a December 2019 survey
23 conducted by PSE to ascertain its customers awareness and perceptions of EVs.

- 1 • Exh. ASR-8 contains a series of select PSE responses to UTC Staff data requests.
- 2 • Exh. ASR-9 shows PSE’s revenue requirement calculation for its proposed DER
- 3 preferred portfolio.
- 4 • Exh. ASR-10 is PSE’s April 2022 report summarizing the responses to its DER
- 5 request for proposals (RFP).
- 6 • Exh. ASR-11 is an excerpt from a PSE response to a UTC Staff data request
- 7 showing the projects that may constitute PSE’s energy storage demonstrations.
- 8 • Exh. ASR-12 shows PSE’s revenue requirement calculation for its energy storage
- 9 demonstrations.

10

11 **III. DISCUSSION**

12

13 **A. Transportation Electrification**

14

15 **1. Background**

16

17 **Q. Describe the Commission’s approach to transportation electrification.**

18 A. The Commission described its approach to TE in a June 2017 policy statement in
19 Docket UE-160799.² The policy statement laid out several principles that inform
20 how utilities should plan their TE investments. Some of those principles include:

² *In the matter of Amending and Adopting Rules in WAC 480-100 Rulemaking to consider policy issues related to the implementation of RCW 80.28.360, Policy and Interpretive Statement Concerning Commission Regulation of Electric Vehicle Charging Services, Docket UE-160799 (June 14, 2017) (hereinafter “Electric Vehicle Charging Services Policy Statement”).*

- 1 • Charging availability and consumer awareness are barriers that electric
2 utilities can address in the effort to transform the electric vehicle market;³
3 • Maximizing the benefits of electric vehicle (EV) charging requires shifting
4 charging times to off-peak periods;⁴
5 • EV charging services should be offered under a “portfolio” approach, where
6 utilities offer customers multiple charging options to serve a range of
7 customer types and market segments;⁵
8 • Load management should be prioritized in utility EVSE programs;⁶
9 • Utility EVSE programs should include carve-outs for low-income
10 customers;⁷
11 • Utility EVSE programs should include a reporting plan;⁸
12 • Portfolios should be designed to maximize increase revenue from kilowatt
13 hour (kWh) sales, grid benefits, and environmental benefits;⁹ and
14 • Utility EVSE programs must include an education and outreach component.¹⁰

15 The policy statement further noted that the Commission would rely on its existing
16 prudence standard in considering requests for cost recovery.¹¹
17

³ *Id.* at ¶ 66.

⁴ *Id.* at ¶ 71.

⁵ *Id.* at ¶ 74.

⁶ *Id.* at ¶ 78.

⁷ *Id.* at ¶ 85.

⁸ *Id.* at ¶ 92.

⁹ *Id.* at ¶ 94.

¹⁰ *Id.* at ¶ 96.

¹¹ *Id.* at ¶ 25.

1 **Q. Does Washington have laws governing utility EVSE investments that impact**
2 **this case?**

3 A. Yes. Washington has two laws that govern utility EVSE investments that impact this
4 case. The first law, RCW 80.28.360, authorizes the Commission to allow an
5 incentive return on investment¹² on EVSE capital expenditures deployed “for the
6 benefit of ratepayers.”¹³ This incentive rate of return may be up to two percent above
7 the electric utility’s rate of return on common equity but may only be allowed
8 provided that the company’s EVSE capital expenditures do not increase its annual
9 revenue requirement by more than one-quarter of one percent.

10 The second law, RCW 80.28.365, allows (but does not require) an electric
11 utility to submit an “electrification of transportation plan” (commonly referred to as
12 a TEP) to the Commission.¹⁴ A TEP should describe how the utility intends to
13 “deploy[s] [EVSE] or provide[s] other electric transportation programs, services, or
14 incentives to support electrification of transportation.” The plans can include
15 proposed programs, as well as the anticipated costs and benefits of those programs.

¹² RCW 80.28.360(2) (“An incentive rate of return on investment under this section may be allowed only if the company chooses to pursue capital investment in electric vehicle supply equipment on a fully regulated basis similar to other capital investments behind a customer’s meter. In the case of an incentive rate of return on investment allowed under this section, an increment of up to two percent must be added to the rate of return on common equity allowed on the company’s other investments.”).

¹³ RCW 80.28.360(1) (“In establishing rates for each electrical company regulated under this title, the commission may allow an incentive rate of return on investment through December 31, 2030, on capital expenditures for electric vehicle supply equipment that is deployed for the benefit of ratepayers, provided that the capital expenditures of the utilities’ programs or plans in RCW 80.28.365(1) do not increase the annual retail revenue requirement of the utility, after accounting for the benefits of transportation electrification in each year of the plan, in excess of one-quarter of one percent. The commission must consider and may adopt other policies to improve access to and promote fair competition in the provision of electric vehicle supply equipment.”).

¹⁴ RCW 80.28.365 (“An electric utility regulated by the utilities and transportation commission under this chapter may submit to the commission an electrification of transportation plan that deploys electric vehicle supply equipment or provides other electric transportation programs, services, or incentives to support electrification of transportation.”).

1 Finally, the law lays out the factors the Commission may consider when reviewing
2 the plans and the timeline within which that review should occur.

3

4 **Q. Describe the TE investments that the Company has included in its case.**

5 A. The Company has requested recovery of two different sets of TE investments. The
6 first is its EVSE pilot program, which the Company is currently winding down. The
7 second is its TEP, designed as a set of permanent programs to follow up on the pilot
8 programs. Staff will address each of these individually below.

9

10 **2. EVSE Pilot Program**

11

12 **Q. What is your recommendation regarding the PSE EVSE pilot program?**

13 A. Staff recommends that the Commission allow the Company to include the costs for
14 its EVSE pilot program in rates.

15

16 **Q. Describe PSE's EVSE pilot program.**

17 A. PSE's EVSE pilot program was initiated in late 2018 in Docket UE-180877. The
18 pilot program is a portfolio of five separate programs, each governed by a separate
19 tariff schedule:

- 20 • Schedule 551: non-residential charging products and services;
- 21 • Schedule 552: residential charging products and services;
- 22 • Schedule 553: education and outreach;
- 23 • Schedule 554: low-income transportation service; and

1 • Schedule 583: charging products and services.

2 The pilot program took effect on December 14, 2018. Generally, the pilot program
3 allowed the Company to provide products (including EVSE) and services to
4 accelerate the market transformation towards electric vehicles.

5
6 **Q. Is the EVSE pilot program provisional pro forma capital?**

7 A. No. Because the EVSE pilot program investments are in-service prior to the rate
8 effective date it would *not* be classified as provisional pro forma capital.

9
10 **Q. When was the pilot program effective, and what is its status?**

11 A. The pilot program became effective December 13, 2018. While the pilot program is
12 still ongoing, it is transitioning into an operation and evaluation phase. The
13 Company’s most recent pilot report, covering the second half of 2021, is submitted
14 as Exh. ASR-2. According to the report, the pilot programs for residential, workplace
15 and fleet customers have reached their full customer allotments. For these programs,
16 customer surveys and data analysis are the only remaining major activities planned.
17 The public EVSE pilot has five public EVSE yet to be installed; those will be placed
18 in various parts of PSE’s service territory. Finally, PSE plans to install EVSE at the
19 headquarters of two community-based organizations (CBOs) serving low-income
20 customers (which PSE refers to as “equity-focused” customers).

21

1 **Q. What have the pilot programs accomplished to date?**

2 A. As of the end of 2021, PSE had enrolled 500 residential customers (491 of which
3 were still in the program), 40 workplace and fleet properties, and 35 multifamily
4 properties. Additionally, the Company installed three public EVSE locations, as well
5 as five EVSE sited at equity-focused service provider offices.¹⁵ In total, the
6 Company reported that pilot participants consumed more than 1.7 million kWh of
7 electricity and avoided more than 174 thousand gallons of gasoline and 1,700 tons of
8 carbon dioxide emissions.¹⁶

9
10 **Q. Are the EVSE pilot program costs currently being recovered?**

11 A. No. PSE requested cost recovery in this general rate case. The Company filed an
12 accounting petition in February of 2019, requesting to defer the net costs incurred in
13 its TE pilot program for recovery in a future general rate case. The Company's
14 petition was granted on August 29, 2019.¹⁷

15
16 **Q. What pilot program costs is the Company requesting recovery for in this case?**

17 A. PSE is requesting recovery of \$8.6 million in deferred costs, including \$2.8 million
18 in each of RY1 and RY2, and \$3.0 million in RY3. Staff developed Exh. ASR-3,
19 which is a spreadsheet adapting the Company's response to UTC Staff Data Request
20 No. 53. It provides the Company's calculation of the revenue requirement being
21 requested for its TE pilot program and its TEP.

¹⁵ Exh. ASR-2 at 7-9.

¹⁶ Einstein, Exh. WTE-1CT at 29: 2-4.

¹⁷ *In the matter of the petition of Puget Sound Energy*, Docket UE-190129, Order 01 (August 29, 2019).

1 **Q. Is PSE requesting the two percent return incentive on its EVSE pilot program**
2 **investments as allowed under RCW 80.28.360?**

3 A. No. PSE is not seeking the additional two percent rate of return for its pilot program
4 projects.

5
6 **Q. Describe Staff’s review of the EVSE pilot program expenses.**

7 A. Staff reviewed the pilot program primarily to determine if the costs associated with
8 capital in service was prudently incurred. Staff witness Ball has grouped the
9 principles upon which the Commission should evaluate MYRP components.¹⁸ In the
10 case of the EVSE pilot program, the principles Staff relied on are the “backward-
11 looking” prudence standards described in Ball’s testimony. As such, Staff examined
12 whether the investments (EVSE, in this instance) are in service, and whether those
13 investments were reasonable and resulted in benefits for ratepayers.¹⁹ Staff focused
14 on non-single family residential EVSE in its review, assuming that residential
15 customers in single-family homes would not go through the trouble and expense of
16 installing EVSE if they did not intend to use it.²⁰

17
18 **Q. Did Staff also examine whether installed EVSE pilot program investments were**
19 **used and useful to Washington ratepayers?**

¹⁸ Ball, Exh. JLB-1T at 17:14-18:2.

¹⁹ Used and Useful Policy Statement at 9:26.

²⁰ According to the terms of the pilot program, the Company supplied the EVSE for residential customers, paying 75 percent of the cost to purchase and install the EVSE, up to two thousand dollars, with the customer responsible for any remaining expenses. *See* Docket UE-180877, Attachment A to initial filing at page 9 (Oct. 26, 2018).

1 A. Yes. For property to be used and useful it must be “employed for service in
2 Washington and capable of being put to use for service in Washington.”²¹ Under this
3 standard, the installed EVSE can meet the used and useful standard. However,
4 evidence illustrates that some of the installed EVSE sites have not *yet* been used by
5 ratepayers. Exh. ASR-4 illustrates eight EVSE sites (seven multi-family properties
6 and one commercial location) that have had no usage since their installation. It is
7 based on PSE’s response to UTC Staff Data Request Nos. 49 and 204. The data was
8 current as of the end of March 2022. Of the seven multi-family properties with no
9 EVSE usage, PSE states that at the time the properties applied to participate in the
10 pilot program, six of them had residents who already owned EVs and could
11 presumably use the EVSE.²² The Company presumes that the lack of usage of these
12 EVSE is primarily due to the resident EV owners relocating. This assertion is
13 certainly plausible but has not been verified.²³ Use of the commercial property began
14 in April 2022; the Company believes the delay was on the customer’s end.

15
16 **Q. Is there any reason these EVSE sites cannot be used in the future?**

17 A. No. If PSE does not remove the EVSE sites and continues to service them, these
18 investments benefit ratepayers because they are available to ratepayers for future use.

²¹ Used and Useful Policy Statement at fn. 23 (quoting *People’s Org for Wash. Energy Res.*, 101 Wn.2d 430).

²² The seventh was one of three properties submitted by the King County Housing Authority, which indicated that it had tenants whose lack of access to EVSE was a barrier to purchasing an EV.

²³ The Company recently discovered and fixed a hardware issue at one location and may begin to see usage at it going forward.

1 Because these investments are available for future beneficial use, Staff believes they
2 are used and useful to Washington ratepayers.²⁴

3

4 **Q. What was the cost to install these EVSE sites?**

5 A. In total, the eight EVSE sites cost \$318 thousand to install.²⁵

6

7 **Q. Does Staff recommend disallowance for these or any other expenses incurred
8 through PSE’s EVSE pilot program?**

9 A. No. Even though some of the EVSE sites have not been used since installation (and
10 other sites have seen very little usage), Staff does not recommend disallowance. Staff
11 understands that these expenses were incurred as part of a pilot program. Pilot
12 programs are designed to be learning experiences and therefore bring an element of
13 risk. In this instance, Staff does not want to discourage PSE or any other utility from
14 taking risks as part of a pilot program by recommending that pilot program expenses
15 be disallowed. Additionally, the EVSE sites can still become “useful” in the future,
16 particularly as EVs become more common throughout the Company’s service
17 territory.

18

²⁴ However, the Commission has stated that the term “useful” means “that a company has demonstrated that its investments benefits Washington ratepayers.” Used and Useful Policy Statement at ¶ 26. Although Staff is *not* taking this position, it could be argued that some of the installed EVSE investments are not currently benefiting Washington ratepayers because they have yet to be used by ratepayers.

²⁵ Rector, Exh. ASR-4.

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3. Transportation electrification plan

Q. Should PSE receive cost recovery of its transportation electrification plan in this general rate case?

A. Yes. Staff recommends that the Commission allow PSE to recover the costs of its 2023-2025 TEP provisionally starting in RY1 of this MYRP. Exh. ASR-3 shows the break down by rate year (RY1-RY3) of capital investments. I also recommend that PSE be required to include the following metrics in its annual reporting required in this case:

- Number of EVSE stations and charging ports installed through the TEP programs, broken out by program;
- Energy served through the TEP programs, broken out by program;
- Number of customers that are part of named communities and take service through PSE’s EV tariffs;
- Load profiles by customer class;
- Energy and capacity of load reduced or shifted through load management activities; and
- The distribution of benefits from PSE’s TEP programs.

Q. Describe the procedural history of the PSE TEP filing.

A. PSE’s TEP was filed on March 19, 2021.²⁶ A copy is filed in this case as Exh. ASR-5. The Commission issued a notice of opportunity to file written comments on May

²⁶ Docket UE-210191, July-December 2020 Update - Electric Vehicle Charging Pilot Programs (March 19, 2021).

1 26, with a deadline of July 23, which was later extended to July 30. In all, the
2 Commission received 33 sets of comments from affected persons. In the meantime,
3 after discussions with Staff, the Company filed an addendum to the plan on July 14.
4 The plan came before the Commission on August 12, 2021, at the Commission's
5 regularly scheduled open meeting.

6
7 **Q. Has the Commission acknowledged PSE's TEP?**

8 A. Yes. The Commission issued an acknowledgement letter regarding PSE's TEP on
9 August 12, 2021.

10
11 **Q. Does the Commission's acknowledgement of the TEP represent a finding of
12 prudence?**

13 A. No. An acknowledgement of PSE's TEP is not a determination by the Commission
14 that the plan is prudent. Having an acknowledged transportation electrification plan
15 does not absolve a utility from the requirement to procure resources in a prudent
16 manner, nor does it prevent the Commission from reviewing the actual incurred costs
17 of a utility's investments for prudence.

18
19 **Q. Describe the contents of the TEP.**

20 A. PSE's TEP identified its transportation electrification guiding principles, approach,
21 and objectives; provided background information; and examined how the Company
22 intended to plan for greater EV penetration in the future. The plan also discusses

1 program options, as well as the costs and benefits of the proposed TE investments.²⁷

2 An addendum to the plan added further details about the Company’s schedule,
3 affected persons engagement approach, reporting framework, load management
4 plans, and program offerings.²⁸

5
6 **Q. What programs did the Company describe as part of its TEP?**

7 A. PSE described programs that were geared to many different sectors of the EV
8 market, including the commercial/fleet, public charging, residential (both single-
9 family and multi-family), and workplace sectors. The Company also proposed
10 programs for low-income and disadvantaged communities, education and outreach
11 activities, technology demonstrations, and load management efforts.²⁹

12
13 **Q. What is PSE’s TEP revenue recovery request in this case?**

14 A. Exh. ASR-3 provides PSE’s requested recovery of \$42.1 million to implement its
15 TEP during the years 2023-2025 in this case. This includes \$12.2 million in capital
16 and depreciation (\$1.2 million in RY1, \$4.0 million RY2, and \$7.0 million in RY3),
17 and \$29.9 million in operations expenses (\$8.5 million in RY1, \$11.0 million in
18 RY2, and \$10.4 million in RY3).

19
20 **Q. Does this \$42.1 million include the additional two percent incentive rate of**
21 **return as allowed by RCW 80.28.360?**

²⁷ Rector, Exh. ASR-5.

²⁸ Docket UE-210191, Addendum to Puget Sound Energy 2021 Transportation Electrification Plan (herein after “Addendum”).

²⁹ Rector, Exh. ASR-5 at 65-67.

1 A. No. The \$42.1 million TEP cost does not include the additional two percent incentive
2 rate of return. The Company included the additional two percent incentive separately
3 as part of Adjustment 6.52. Other than the incentive rate of return, the adjustment
4 covers only expenses and cost of plant related to PSE's TE pilot programs as
5 described above. In conversation with Commission Staff, the Company explained
6 that putting the incentive rate of return in the adjustment, despite the adjustment
7 otherwise exclusively covering pilot program costs, was done for ease and
8 transparency. The Company explained that, because no other infrastructure besides
9 EVSE-related infrastructure receives this incentive rate of return, the Company chose
10 to put the incentive rate of return dollars in the TE pilot program adjustment rather
11 than create a separate adjustment just for the incentive rate of return.

12
13 **Q. How much does the Company calculate its incentive rate of return should be for**
14 **each of the three rate years?**

15 A. The Company has calculated that it should receive \$49 thousand in RY1, \$228
16 thousand in RY2, and \$537 thousand in RY3. Exh. ASR-6 is an Excel sheet from
17 PSE's workpapers and provides the calculation the Company used to arrive at these
18 figures. PSE calculated two percent of the cumulative total budgeted amount for each
19 year for capital expenditures, accumulated depreciation, and deferred income taxes,
20 and finally grossed up that amount to account for federal income taxes.

21

1 **Q. Describe Staff’s review of PSE’s revenue recovery request in this case.**

2 A. Staff reviewed the cost recovery request from several different angles. Staff relied
3 upon RCW 80.28.360 and 80.28.365, as well as the policy statement, in its review of
4 the TEP proposed investments. Staff’s review included ensuring that the plan met
5 with all the tenets of the law and the policy statement.

6 The below sections provide Staff’s analysis on whether these forecasted TEP
7 proposed investments should be in rates provisional basis; how equity considerations
8 fit into the formulation of the plan; and the performance metrics, performance
9 incentive mechanism (PIM), and reporting framework proposed by the Company.

10

11 **a. Inclusion in rates on a provisional basis**

12

13 **Q. Did Staff conduct a prudence review of PSE’s TEP proposed investments?**

14 A. No. Staff did not conduct a prudence review as Staff might normally do because the
15 investments envisioned through the TEP are forward-looking investments, meaning
16 they are investments that have not actually been made yet. These investments will
17 not be in-service prior to the rate-effective date. As stated by the Commission in its
18 Used and Useful Policy Statement:

19 [R]eview and verification of [provisional pro forma] investments must occur
20 in a future period, necessitating a framework of provisional recovery of
21 identified rate-effective period investments, with a retrospective review and
22 verification process, and with rates subject to refund. . . .The Commission’s
23 longstanding practice is to audit and review the prudence of a company’s
24 investment in plant after the plant is placed into service.³⁰
25

³⁰ Used and Useful Policy Statement at ¶ 38-42.

1 The Commission has stated that the Used and Useful Policy Statement provides
2 relevant guidance pertaining to the recovery of provisional capital within the context
3 of a multi-year rate plan.³¹

4

5 **Q. Given PSE’s TEP proposed investments will not be in-service until after the**
6 **rate-effective date, did Staff analyze whether these investments should be**
7 **included in rates provisionally, subject to refund?**

8 A. Yes. Staff focused on five key elements of the same policy statement identified in
9 Staff witness Ball’s testimony in determining whether forecasted capital should be
10 included within rates on a provisional basis:

- 11 1) The degree of certainty as to the budget;
- 12 2) The degree of certainty that the project will be built;
- 13 3) The need for the project;
- 14 4) The inclusion of offsetting factors; and
- 15 5) The use of cost controls.³²

16 I will discuss each one of these factors below in this section.

17

³¹ See *WUTC v. Northwest Natural Gas, d/b/a NW Natural*, Dockets UG-200994, et al., Order 05 at fn. 5 (Oct. 21, 2021) (“RCW 80.04.250, which forms the basis for the Policy Statement, is neither superseded nor displaced by RCW 80.28.425, which governs multiyear rate plans. Rather, the requirements set out in RCW 80.28.425 are consistent and compatible with RCW 80.04.250. Accordingly, the Policy Statement continues to provide relevant guidance for regulated utilities and non-company parties that propose recovery of rate effective period property in a multiyear rate plan where rates approved for years two through four are provisional and subject to refund.”).

³² Ball, Exh. JLB-1T at 29:9-13.

1 **Q. How certain is PSE that these estimated investments in TEP will occur?**

2 A. Exh. ASR-8 contains the Company's responses to select Staff data requests. In the

3 Company's response to UTC Staff Data Request No. 270,³³ examines the level of

4 certainty which PSE has that it's TEP investments will ultimately be made.

5 According to the exhibit, the Company sees robust demand for its TE services, which

6 gives it substantial certainty that it will make significant TE investments. However,

7 as PSE acknowledges, the actual total investment is subject to change, as are the

8 programs within which those dollars are invested.

9

10 **Q. Is Staff comfortable with the Company's level of certainty regarding how much**
11 **will be invested in PSE's TEP during the MYRP?**

12 A. Yes. Staff acknowledges that there is strong demand for the Company's TE services.

13 More importantly, PSE has an acknowledged TEP in place, which Staff agrees

14 should ensure that significant TE investments will be made, even though there is

15 some uncertainty about the exact amount that will be spent on such investments.

16

17 **Q. What is the Company's representation as to the need for the programs**
18 **envisioned in the TEP?**

19 A. The Company cites several reasons for offering its TE programs within its TEP. Exh.

20 ASR-7 is a December 2019 report on PSE's customer survey (acquired in response

21 to UTC Staff Data Request No. 47) showing that 68 percent of its customers were

22 likely to consider purchasing an EV within the last five years. This is one data point

³³ Rector, Exh. ASR-8 at 1-2.

1 offered by the Company to explain why it is offering the programs envisioned in the
2 TEP.³⁴ The TEP goes on to cite the Company’s internal “Beyond Net Zero Carbon”
3 campaign, through which it plans to go “beyond net zero carbon energy” by 2045, as
4 further justification for its TE efforts.³⁵ According to the TEP, the four overarching
5 goals of the plan are:

- 6 • Supporting and enabling market transformation
- 7 • Addressing charging infrastructure gaps
- 8 • Planning and managing electric loads
- 9 • Furthering energy equity and inclusion³⁶

10
11 **Q. What offsetting factors did the Company consider when deciding to offer the**
12 **TEP programs?**

13 A. The Company’s testimony describes several categories of offsetting factors. Several
14 of those accrue directly to EV drivers, such as lower maintenance costs, reduced fuel
15 costs, and environmental benefits. Additionally, the Company calculates the amount
16 of revenue it expects to gain from EV charging at \$98.8 million as a customer
17 benefit.³⁷

18
19 **Q. Does the Company provide reasonable expectations for cost controls for its TEP**
20 **programs?**

³⁴ Rector, Exh. ASR-5 at 7.

³⁵ *Ibid.*; Puget Sound Energy, “Together, We’re Creating a Clean Energy Future”,
<https://www.pse.com/pages/together>, accessed May 31, 2022.

³⁶ Rector, Exh. ASR-5 at 9.

³⁷ Einstein, Exh. WTE-1CT at 51:7-56:1.

1 A. Yes.

2

3 **Q. What are the cost controls PSE has in place for its TEP programs?**

4 A. As described previously, RCW 80.28.360 allows electric utilities to realize an
5 additional two percent return on their TE investments, provided that said investments
6 do not increase the utility's annual revenue requirement by more than 0.25 percent.
7 This limit has acted as a natural cost control for TE investments, as utilities in
8 Washington state have planned their TE investments so that they inch towards that
9 0.25 percent limit but do not exceed it.

10

11 **Q. Based on the above analysis, has PSE met the threshold for including its TEP
12 costs in rates on a provisional basis?**

13 A. Yes. PSE has documented sufficient need for the TEP investments and offered a high
14 degree of certainty that investments will be made, even if the specific offerings and
15 budget differ from what is included either in the TEP or in the Company's testimony
16 in this case. Staff agrees that there should also be sufficient existing cost controls in
17 place to ensure budgets do not grow unnecessarily. Finally, Staff believes that the
18 Company has adequately considered offsetting factors in this case.

19

20 **Q. Do the investments envisioned under the TEP otherwise comply with RCW
21 80.28.360?**

22 A. Yes. The law allows an incentive rate of return on EVSE that is deployed on a fully
23 regulated basis for the benefits of ratepayers between July 1, 2015, and December
24 31, 2030. The proposed investments meet these requirements.

1 **Q. Should PSE be allowed to recover the proposed costs associated with TEP in**
2 **rates on a provisional basis over the duration of the MYRP?**

3 A. Yes. However, these provisional costs (if included in rates) would be subject to
4 future review and possible refund.

5
6 **Q. Despite Staff's recommendation to allow the proposed costs associated with the**
7 **TEP in rates, did Staff uncover any issues in its review that it would like to**
8 **discuss?**

9 A. Yes. Several issues came up during Staff's review of PSE's testimony. These
10 include: the customer survey upon which PSE bases its TEP; the cost benefit analysis
11 upon which TEP is based; equity considerations; and the proposed performance
12 measures and performance incentive mechanism (PIM). Staff addresses the cost
13 benefit analysis, equity, and performance measures/PIMs issues in separate sections
14 below.

15
16 **Q. Describe the customer survey upon which PSE bases its TEP.**

17 A. As shown in Exh. ASR-7, PSE customers were asked whether they were "likely to
18 consider" purchasing an EV. Sixty-eight percent of respondents indicated they were
19 "extremely" or "somewhat" likely to consider purchasing an EV in the next five
20 years.³⁸

21

³⁸ Rector, Exh. ASR-7 at 4.

1 **Q. Why is this number remarkable?**

2 A. It is not especially remarkable except for the context within which PSE cites it. In
3 both its initial testimony³⁹ and the TEP,⁴⁰ the Company states that “68 percent of
4 residential customers *plan on* buying or leasing an EV in the next five years”
5 (emphasis added). Note the use of “plan on” in the Company’s filings, versus the less
6 definitive “likely to consider” language used in the survey itself. While Staff has no
7 proof that the survey results served as a direct input into the TEP, Staff is concerned
8 that the framing of the survey results in the TEP and in this filing may indicate that
9 PSE is planning for a future that includes a steeper EV adoption curve than is
10 justified by the information it is receiving from its customers.

11
12 **Q. How could PSE remedy this situation?**

13 A. PSE has agreed to a reporting timeline in its TEP docket that includes reports due
14 before the end of 2022 and in mid-2024.⁴¹ In the first report following a final order in
15 this GRC, Staff recommends the Company explain how both the customer survey
16 and PSE’s annual EV forecast became inputs into the TEP, as well as how they
17 influence the amount and type of EVSE sites PSE plans to install through its TEP.

18

19 **b. Cost benefit analysis**

20

21 **Q. Did PSE provide a cost benefit analysis in its direct testimony?**

³⁹ Einstein, Exh. WTE-1CT at 26:10-13.

⁴⁰ Rector, Exh. ASR-5 at 7.

⁴¹ Addendum at 10.

1 A. Yes. The Company summarizes the results of a cost benefit analysis performed using
2 a model developed by the energy consulting firm E3 in 2017.⁴² The model viewed
3 costs and benefits of EV purchases through two lenses: a ratepayer lens and a
4 regional lens. The analysis PSE provides in its direct testimony is viewed through the
5 ratepayer lens.⁴³

6

7 **Q. What were the results of the cost benefit analysis?**

8 A. The results showed that ratepayers realized a net benefit of \$68.1 million from EV
9 adoption over the 2023-2025 timespan. This assumes that EV adoption continues
10 along a trajectory envisioned by the Company's forecast and contains other
11 assumptions from the Company's 2021 IRP.

12

13 **Q. Is the analysis PSE presented valid?**

14 A. Yes. Although, as with any cost benefit analysis, the specific costs and benefits
15 included are important. There may be other valid ways of calculating the costs and
16 benefits that comply with Washington's policy objectives.

17

18 **Q. Is Commission Staff currently examining cost effectiveness for DERs, including**
19 **EVs?**

20 A. Yes. Docket UE-210804 is a Staff investigation that aims to develop a jurisdictional-
21 specific cost effectiveness test (JST) that could be used for multiple DERs (including

⁴² E3, Economic & Grid Impacts of Plug-In Electric Vehicle Adoption in Washington and Oregon (March 2017).

⁴³ Einstein, Exh. WTE-1CT Figure 2 at 56.

1 EVs) and incorporates policies from the Clean Energy Transformation Act (CETA).
2 It is an ongoing investigation with an uncertain completion date.

3

4 **Q. Has PSE submitted comments in Docket UE-210804?**

5 A. Yes. PSE submitted comments offering a set of costs and benefits that it believes
6 should be considered in a JST. The costs and benefits listed in PSE's comments
7 closely matched those included in both the ratepayer and regional perspectives
8 developed by E3.

9

10 **Q. Does Staff recommend PSE apply the JST to its EVSE program going forward?**

11 A. Yes. If Docket UE-210804 results in the adoption of a jurisdiction-specific cost test
12 that can be applied to EVSE programs, Staff would recommend PSE to replace its
13 existing cost benefit methodology with the methodology approved in Docket UE-
14 210804. As discussed in further detail below, Staff recommends that PSE apply the
15 new JST methodology in its comprehensive TEP report due in mid-2024.

16

17 **c. Equity Analysis**

18

19 **Q. Should the Commission consider equity in its analysis of PSE's proposed TE**
20 **investments?**

21 A. Yes. As laid out in Staff witness Reynolds' testimony, the Commission should
22 consider equity in its approval of this MYRP, which includes PSE's proposed TE
23 investments. The Company should have an assessment of current conditions within

1 its service territory and demonstrate that its proposed actions will improve the
2 equitable distribution of benefits throughout its territory.⁴⁴

3

4 **Q. Did PSE factor equity into its TEP?**

5 A. Yes.

6

7 **Q. How did PSE factor equity into its TEP?**

8 A. PSE attempted to factor equity into its TEP in two ways. First, as outlined in the
9 addendum to the TEP,⁴⁵ the Company developed a community engagement plan for
10 its diversity, equity, and inclusion (DEI) TE products. The community engagement
11 plan involves collecting and assessing community feedback; designing products to
12 meet the outcomes discussed in that engagement; and acquiring customers for the
13 DEI TE products. Second, as part of the TEP, the Company committed to targeting
14 30 percent of its TE spending towards its DEI products.⁴⁶

15

16 **Q. How does the Company define eligibility for its DEI products?**

17 A. In the TEP, the Company defines a DEI-eligible customer as one that is a member of
18 a highly impacted community⁴⁷ or one of the vulnerable populations⁴⁸ identified
19 through its CEIP process.⁴⁹ PSE took this definition one step further in Docket UE-
20 220294 by establishing tariffs that will govern TEP implementation. Schedule 583-

⁴⁴ Reynolds, Exh. DJR-1T at 12:6-11.

⁴⁵ Addendum at 1-3.

⁴⁶ *Id.* at 7.

⁴⁷ RCW 19.405.020(23).

⁴⁸ RCW 19.405.020(40).

⁴⁹ WAC 480-100-640(4)(b).

1 B, PSE defines “equity-focused customer” as “a [c]ustomer that is part of Named
2 Communities or a [c]ustomer that shares demographic characteristics with
3 [c]ustomers in Named Communities;⁵⁰ and the CBOs, government agencies and
4 tribal entities that serve them.”

5
6 **Q. How will the Company determine whether it is meeting this 30 percent
7 commitment?**

8 A. Exh. ASR-8 contains PSE’s response to UTC Staff Data Request No. 52 regarding
9 this question.⁵¹ It states that the Company will utilize “standard accounting
10 mechanisms” to track dollars spent on “Equity-Focused” activities. It is unclear to
11 Staff how those standard accounting mechanisms will allow PSE to track dollars
12 going to specific communities. Therefore, Staff recommends reporting mechanisms
13 below that will clearly and transparently identify this information.

14
15 **Q. Has the Company established a baseline set of data to determine whether the
16 benefits from its existing TE activities are being distributed equitably?**

17 A. No. This is likely due to its TE activities up until this point being performed under
18 the auspices of a pilot program, for which the equitable distribution of benefits was
19 not an objective. TEP implementation is just getting underway.

20

⁵⁰ A “named community” is defined on the same tariff page as encompassing both highly impacted communities and vulnerable populations.

⁵¹ Rector, Exh. ASR-8 at 3.

1 **Q. Has PSE described how its TEP will distribute benefits equitably?**

2 A. No. As mentioned above, PSE identifies how it intends to invest funds so that 30
3 percent of those funds go to DEI customers. However, it has not presented any
4 accounting for how benefits will accrue to those same customers.

5
6 **Q. Does the Company need to show that TEP benefits are getting distributed in an
7 equitable manner to receive full cost recovery?**

8 A. Yes. As discussed further in Staff witness Reynolds' testimony, PSE must provide
9 data on distributional equity so that the Commission and all other affected persons
10 can effectively address the other aspects of equity, such as procedural and structural
11 equity.⁵² Staff presents how the Company can demonstrate that benefits are being
12 distributed equitably in the metrics and reporting sections below.

13

14 **d. Performance metrics and performance incentive
15 mechanism**

16

17 **Q. Has PSE proposed to track any performance metrics in this case?**

18 A. Yes. PSE has proposed three performance metrics:

- 19
- 20 • Number of residential EVs registered in PSE territory;
 - 21 • Number of commercial EVs registered in PSE territory; and
 - 22 • Number of EVSE located in highly impacted and vulnerable communities.⁵³

⁵² Reynolds, Exh. DJR-1T at 9:5-10:2.

⁵³ Einstein, Exh. WTE-1CT at 45:11-17.

1 **Q. What is Staff’s position on the performance metrics proposed by PSE?**

2 A. The metrics are useful but do not go far enough to demonstrate that the investments
3 being made through the TEP are appropriate to ensure the equitable distribution of
4 energy benefits.⁵⁴ The metrics are influenced by Company activities, but not
5 substantially under PSE’s control. Additionally, the metrics are structured more as
6 outputs (amount of infrastructure in the ground) as opposed to outcomes (how that
7 infrastructure performed to meet policy goals).

8 The Company’s direct testimony highlights some deficiencies in tracking
9 these metrics. For instance, it notes that data for commercial vehicles is not currently
10 available and states that the Company will begin reporting such data “once
11 available;” it also notes that PSE “will investigate other sources of reliable
12 information” regarding EVSE locations in its service territory. Such comments are
13 concerning because the data the Company might produce to track these metrics is
14 lacking. Finally, the testimony states that PSE will count installations in geographic
15 areas with “highly vulnerable population numbers,” a definition that Staff finds
16 insufficiently clear.⁵⁵

17
18 **Q. Does Staff propose different performance metrics?**

19 A. Yes. Staff proposes several alternative performance metrics:

- 20 • Number of EVSE stations and charging ports installed through the TEP
21 programs, broken out by program;
22 • Energy served through the TEP programs, broken out by program;

⁵⁴ Reynolds, Exh. DJR-1T at 12:13-18.

⁵⁵ Einstein, Exh. WTE-1CT at 46:17.

- 1 • Number of customers that are part of named communities and take service
- 2 through PSE’s EV tariffs;
- 3 • Load profiles by customer class;
- 4 • Energy and capacity of load reduced or shifted through load management
- 5 activities; and
- 6 • The distribution of benefits from PSE’s TEP programs.

7 Broadly, these metrics will help establish a baseline for TEP performance, from
8 which future performance incentive mechanisms (PIMs) may be proposed.

9
10 **Q. Explain why “number of EVSE stations and charging ports installed through**
11 **the TEP programs, broken out by program” is an appropriate metric.**

12 A. This metric is a very basic performance measure. It is necessary to know the raw
13 number of charging stations and ports installed so that the Commission and other
14 affected persons have a high-level understanding of how the Company’s TEP
15 implementation is progressing. Tracking stations and ports by program will give a
16 more granular idea of how the TEP is performing at a program level.

17
18 **Q. Explain why “energy served through the TEP programs, broken out by**
19 **program” is an appropriate metric.**

20 A. Similar to the above metric, energy served through the TEP is a basic performance
21 metric that should be tracked to establish a baseline for TEP performance and can be
22 used to build more outcome-oriented metrics later.

23

1 **Q. Explain why “number of customers that are part of named communities and**
2 **take service through PSE’s EV tariffs” is an appropriate metric.**

3 A. This metric will help the Company establish a baseline to measure whether benefits
4 are being distributed equitably. It is important to know which customers are
5 participating in the programs to track who is benefitting from the programs.

6

7 **Q. Explain why “load profiles by customer class” is an appropriate metric.**

8 A. This metric will help to show when EV charging is taking place, thus helping to
9 demonstrate whether the load-shifting policy goal is being met. One of the policy
10 goals established by the EVSE policy statement is shifting EV loads to off-peak
11 times to avoid unnecessary investments in generation, transmission, or distribution
12 infrastructure.⁵⁶

13

14 **Q. Explain why “energy and capacity of load reduced or shifted through load**
15 **management activities” is an appropriate metric.**

16 A. Similar to the load profiles metric above, this metric is aimed at establishing whether
17 load-shifting is occurring because of the Company’s TEP programs.

18

19 **Q. Explain why “the distribution of benefits from PSE’s TEP programs” is an**
20 **appropriate metric.**

21 A. This metric is useful because it assures the targeted customers in the program receive
22 the associated benefits. As discussed in Staff witness Reynolds’ testimony, RCW

⁵⁶ Electric Vehicle Charging Services Policy Statement at 71.

1 19.405.010(6) states that the public interest includes the equitable distribution of
2 energy benefits to vulnerable populations and highly impacted communities.⁵⁷

3

4 **Q. How often does Staff expect PSE to report on the metrics proposed in this**
5 **testimony?**

6 A. Staff expects PSE to report on the metrics as proposed by Staff witness Ball and
7 Reynolds' testimony.⁵⁸ Staff recognizes there is some overlap between metrics in the
8 TEP docket and those proposed in this docket. To the extent there is overlap, the
9 Company should use the same metrics in both its TEP and rate case reporting.

10

11 **Q. Does Staff propose performance targets or PIMs for any of these metrics?**

12 A. No. Staff does not propose any targets or PIMs for these metrics; however, Staff may
13 do so in the future.

14

15 **Q. Has the Company proposed a PIM?**

16 A. Yes. The PIM proposed by PSE is "number of residential and fleet EV customers on
17 managed charging programs or time of use rates."⁵⁹

18

19 **Q. Describe how the PIM works.**

20 A. The PIM sets annual installation targets for three different types of EV chargers:
21 single-family residence chargers, Level 2 fleet chargers, and direct current fast

⁵⁷ Reynolds, Exh. DJR-1T at 12:13-18.

⁵⁸ Ball, Exh. JLB-1T at 33:15-20; Reynolds, Exh. DJR-1T at 17:16-21.

⁵⁹ Einstein, Exh. WTE-1CT at 45:18-19.

1 charging (DCFC) chargers. To count towards the target, the charger must be signed
2 up to a managed load or time of use (TOU) rate. The Company would then receive a
3 reward for each charger installed annually that meets those qualifications above the
4 target.⁶⁰

5
6 **Q. Has the Company specified what its proposed targets would be, or defined how**
7 **the reward should be calculated?**

8 A. No. The Company has not yet proposed specific targets; instead, it claims it is “still
9 in the process of developing” those targets.⁶¹ PSE’s testimony presents the broad
10 outlines of its reward calculation proposal, which includes basing the reward amount
11 on a percentage of the expected net benefits accrued per charger. However, PSE
12 neither quantifies the costs and benefits of each charger, nor does it calculate a
13 specific dollar amount for the reward.⁶²

14
15 **Q. Does Staff support PSE’s proposed PIM?**

16 A. No. Staff finds the PIM to be more of an output-oriented metric rather than an
17 outcome-oriented one. This is problematic because the Company should be rewarded
18 more for achieving policy outcomes rather than for investing in outputs, and the PIM
19 as constructed does too much of the latter. Further, the lack of definition around the
20 target and calculation of the reward is concerning to Staff. Finally, as discussed in

⁶⁰ Lowry, Exh. MNL-1T at 43:1-11; Exh. MNL-5 at 4-5.

⁶¹ Lowry, Exh. MNL-1T at 38:12-16.

⁶² *Id.* at 39:9-40:15.

1 Staff witness Ball’s testimony, Staff is recommending that the Commission limit the
2 number of new PIMs in this case.⁶³

3
4 **e. Existing TEP metrics**

5
6 **Q. What metrics has the Company already committed to reporting on through its**
7 **TEP?**

8 A. As part of the TEP that was acknowledged in August 2021, PSE committed to
9 tracking and reporting on the following metrics:

- 10 • Customer satisfaction, engagement, and awareness of product(s);
- 11 • Avoided CO2 emissions (estimated) and customer cost savings;
- 12 • Average total cost of EVSE ownership by product;
- 13 • EV load profiles by participant type (residential, multifamily, public,
14 workplace, fleet and commercial);
- 15 • Electric consumption (kWh) and peak load (kW);
- 16 • EVSE installation timelines and costs by product;
- 17 • Utilization information, including total number of charging sessions, kWh
18 used per session, and EVSE uptime percentage;
- 19 • Revenue from PSE-owned and operated public EVSE and operating
20 expenses;
- 21 • Population served due to expansion of electric mobility services to highly
22 impacted communities, vulnerable populations, and their service providers;

⁶³ Ball, Exh. JLB-1T at 48:14-24.

- 1 • Awareness and/or adoption levels of EVs due to increased EV education and
2 outreach to highly impacted communities, vulnerable populations, and their
3 service providers;
4 • EVs served in highly impacted communities; and
5 • Additional non-quantifiable benefits for highly impacted communities,
6 vulnerable populations, and their service providers.⁶⁴
7

8 **Q. How often is PSE expected to report on these metrics?**

9 A. Per the addendum to the TEP, the Company will submit three reports. PSE
10 committed to submit two of these as summary reports in late 2022 and late 2025.
11 These summary reports will focus on program progress or changes, expenses, and
12 revenues. PSE will submit a more comprehensive report approximately halfway
13 through the TEP’s five-year time horizon, in mid-2024. This comprehensive report
14 will include updates on EV adoption and forecasted adoption in the coming years;
15 load and grid impacts; program progress and expenses; lessons learned; and cost
16 benefit analysis results. All the reports are expected to report on the above metrics.⁶⁵
17

18 **Q. Will these reports be filed in the TEP docket?**

19 A. Yes, these reports will be filed as part of the TEP docket. They will also be
20 submitted to the statewide joint EVSE stakeholder⁶⁶ group, whose membership

⁶⁴ Addendum at 10.

⁶⁵ *Ibid.*

⁶⁶ Staff uses the term “affected persons” rather than “stakeholder” throughout its testimony in this case. *See* for instance Brewer, Exh. MAB-1T at 8:18. The Commission supported the creation of the EVSE stakeholder group in the Electric Vehicle Charging Services Policy Statement at ¶ 91. The policy statement uses the term “stakeholder”, and so it is used in the same context here.

1 includes Commission Staff, Public Counsel Unit of the Washington State Office of
2 the Attorney General, the State Department of Commerce and Department of
3 Transportation, automobile manufacturers, charging companies, and CBOs, among
4 other organizations.

5
6 **Q. How will the established reporting structure change with the additional metrics**
7 **proposed by PSE?**

8 A. It will change slightly. Staff does not expect the reporting metrics established
9 through the TEP to substantially change, except for the request that PSE perform a
10 cost benefit analysis using the methodology established in Docket UE-210804 rather
11 than using the existing methodology. Staff expects that PSE will submit a new cost
12 benefit analysis methodology, which will be reported in PSE's mid-2024 TEP filed
13 in Docket UE-210191.

14
15 **B. Distributed Energy Resources**

16
17 **Q. What is included in PSE's proposed DER program?**

18 A. PSE's DER program includes three separate proposals:
19 • a DER preferred portfolio, which is a set of customer-facing programs that
20 grew out of the Company's CEIP process;
21 • a set of energy storage demonstrations.; and
22 • a DR proposal.

1 Exh. ASR-9 shows the break down by rate year (RY1-RY3) of the proposed capital
2 investments.

3

4 **Q. Does your testimony address each of the three parts of the proposed DER**
5 **program?**

6 A. No. Staff does not address the DR proposal because the Company barely touches on
7 its proposed DR program in its testimony. Exh. WTE-1CT includes a table⁶⁷ that
8 indicates PSE intends to spend \$1 million in each rate year on DR but offers scant
9 details on what it intends to do with that money. If the Company does not want to
10 take the time to address this issue, then neither will Staff. The DER preferred
11 portfolio and the energy storage demonstrations are addressed below.

12

13 **1. DER preferred portfolio**

14

15 **Q. Should PSE receive cost recovery for its DER preferred portfolio?**

16 A. No. Staff recommends not allowing any provisional cost recovery in rates at this
17 time due to significant uncertainty surrounding what may ultimately be included in
18 the DER preferred portfolio. In other words, Staff believes that PSE has failed to
19 meet its evidentiary burden to establish that it is appropriate to include these costs in
20 rates on a provisional basis. The Commission should remove from PSE's electric
21 revenue requirement all amounts associated with PSE's DER preferred portfolio,
22 including plant-related costs and O&M expenses.

⁶⁷ Einstein, Exh. WTE-1CT, Table 8 at 73:16.

1 **Q. Why did PSE develop its DER preferred portfolio?**

2 A. PSE’s 2021 IRP identified a need for 80 MW of distributed solar and 25 MW of
3 distributed battery storage.⁶⁸ The Company began developing the DER preferred
4 portfolio to fill that need.

5
6 **Q. How did PSE develop its DER preferred portfolio?**

7 A. PSE developed its DER preferred portfolio as part of its CEIP process.⁶⁹ The
8 Company followed several steps to develop its DER preferred portfolio. First, it
9 conducted a benchmark study of other utilities’ DER programs and selected potential
10 programs (which it refers to as “concepts”) based on scalability, feasibility, and
11 accessibility. Next, PSE gathered cost data for each concept and conducted a cost test
12 for each of these concepts. Then it ranked each concept from lowest to highest cost
13 (in dollars per watt installed). PSE then calculated a customer benefit indication
14 (CBI)⁷⁰ score and filtered out any concepts that did not score greater than or equal to
15 the average CBI score. Next came a ranking of the remaining concepts by the
16 societal cost test (SCT) ratio, from highest to lowest. Finally, the Company selected
17 concepts based on a combination of high CBI scores, high SCT ratio, and low costs,
18 including a mixture of utility- and customer-sited/owned concepts.⁷¹

19

⁶⁸ Einstein, Exh. WTE-1CT at 60:13-18.

⁶⁹ PSE filed its draft CEIP in on October 15, 2021 within Docket UE-210795.

⁷⁰ WAC 480-100-605 (“Customer benefit indicator” means an attribute, either quantitative or qualitative, of resources or related distribution investments associated with customer benefits described in RCW 19.405.040(8).”).

⁷¹ This process is described in PSE’s draft CEIP at 32-40 in Docket UE-210795.

1 **Q. Has the CEIP been approved?**

2 A. No. The CEIP is being adjudicated, with a hearing in late January 2023. This means
3 the DER preferred portfolio has not been approved yet either, and given that the
4 procedural schedule in the CEIP docket will extend beyond the procedural schedule
5 of PSE's rate case, a decision on approval will not come until after the current case is
6 decided.

7
8 **Q. What impact does the absence of CEIP approval have for the DER preferred
9 portfolio in the current case?**

10 A. The Commission pointed to CEIP approval as a key element in determining whether
11 an investment is known and measurable in the used and useful policy statement.⁷²
12 The absence of CEIP approval, therefore, significantly increases the uncertainty of
13 whether the investments being proposed through the preferred portfolio will be
14 known and measurable and should be included in rates on a provisional basis.⁷³

15
16 **Q. What programs has the Company proposed to include in its DER preferred
17 portfolio?**

18 A. PSE has proposed the following concepts as part of its DER preferred portfolio:⁷⁴
19

- Community solar, including low-income and multi-family community solar;
- Commercial and industrial ("C&I") rooftop solar incentive;

20

⁷² Used and Useful Policy Statement at ¶ 35 ("[T]here is a greater degree of certainty that an investment is known and measurable if it is part of an *approved* Clean Energy Implementation Plan.") (emphasis added).

⁷³ Although PSE sought to consolidate the CEIP and this current GRC, such consolidation would only be helpful if the Commission unnecessarily rushed to approve the CEIP prior to the filing of responsive testimony in this docket.

⁷⁴ Einstein, Exh. WTE-1CT at 62:10-63:7.

- 1 • Third-party distributed solar PPA (or solar lease);
- 2 • Customer-sited solar+storage offering;
- 3 • Residential rooftop solar leasing (including income-eligible portion);
- 4 • Multi-family solar partnership;
- 5 • Multi-family rooftop solar incentive;
- 6 • C&I space leasing for batteries; and
- 7 • Residential PSE battery leasing (including income-eligible portion).

8

9 **Q. What steps has PSE taken to implement the preferred portfolio thus far?**

10 A. PSE released a DER request for proposals (RFP) on February 7, 2022.⁷⁵ Responses
11 were due to the Company by March 21, 2022. This RFP is targeted in that it seeks
12 only DER resources; the Company has also released an all-source RFP⁷⁶ and will
13 evaluate the two RFPs together. The evaluation is expected to take place in the fourth
14 quarter of this year, according to the schedule set by PSE in the DER RFP.⁷⁷

15

16 **Q. What is PSE's proposed DER preferred portfolio revenue requirement in this**
17 **case?**

18 A. Exh. ASR-9 is the Company's response to UTC Staff Data Request No. 262 and
19 shows its revenue requirement calculation for the proposed DER preferred portfolio.
20 It includes gross plant, accumulated depreciation, accumulated deferred income tax,
21 and depreciation expense. Together, those items total \$12.8 million for all three rate

⁷⁵ Docket UE-210878, 2022 Distributed Energy Resources Request for Proposals Exhibits (Feb. 7, 2022).

⁷⁶ Docket UE-210220, 2021 All-Source Request for Proposals (April 1, 2021).

⁷⁷ Docket UE-210878, 2022 Distributed Energy Resources Request for Proposals at 41 (Feb. 7, 2022).

1 years (\$1.0 million RY1, \$3.6 million in RY2, and \$8.2 million in RY3).⁷⁸ What is
2 not included in that total is O&M expenses. Based on the testimony of PSE witness
3 Jacobs⁷⁹ and PSE's response to UTC Staff Data Request 229,⁸⁰ PSE included in its
4 electric revenue requirement projected O&M expenses associated with the DER
5 solar and storage portfolio of \$9.4 million in RY1, \$13.3 million in RY2, and \$19.5
6 million in RY3, for a total of \$42.1 million. As discussed by Staff witness McGuire,
7 in Staff's electric revenue requirement calculation Staff has removed those amounts
8 from Adjustment 6.22.⁸¹ Therefore, the total revenue requirement for the proposed
9 DER preferred portfolio is \$54.9 million.

10
11 **Q. Describe Staff's review of PSE's DER portfolio revenue recovery request in this**
12 **case.**

13 A. Similar to the TEP discussed above, Staff reviewed the cost recovery request from
14 several different angles. The below sections will discuss Staff's review of the request
15 for prudence; how equity considerations fit into the formulation of the plan; and the
16 specific performance metrics.

⁷⁸ These totals are calculated using the Company's requested rate of return.

⁷⁹ Jacobs, Exh. JJJ-1T, Table 2 at 29:1.

⁸⁰ McGuire, Exh. CRM-9.

⁸¹ McGuire, Exh. CRM-1T at 19:1-3.

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a. Inclusion in rates on a provisional basis

Q. Did Staff conduct a prudence review of PSE’s proposed DER portfolio investments?

A. No. For the same reasons discussed in the TEP section above, Staff did not conduct a prudence review of the DER preferred portfolio. The DER preferred portfolio includes forward-looking investments, meaning they are investments that have not actually been made yet. These investments will not be in-service prior to the rate-effective date. The review process for provisional pro forma is discussed in the testimony of Staff witness Ball.⁸² Similar to the TEP investments, Staff considered the following five factors in determining whether the forecasted DER preferred portfolio costs should be included in rates on a provisional basis:

1. Degree of certainty as to the budget;
2. Degree of certainty that project will be built;
3. Demonstration of the need for the project;
4. Consideration of all offsetting factors; and
5. Reasonable expectations of cost controls.⁸³

Q. How certain is PSE that these estimated investments in the DER preferred portfolio will occur?

⁸² Ball, Exh. JLB-1T at Section VI.

⁸³ Ball, Exh. JLB-1T at 29:9-13.

1 A. As shown in Exh. ASR-8, PSE’s response to UTC Staff Data Request No. 266,⁸⁴
2 PSE claims that it cannot be certain that the projects envisioned in the DER preferred
3 portfolio will be made, or that the projects will cost what the Company estimates. As
4 noted in the exhibit, PSE expects to have better cost information once the responses
5 to its DER RFP have been analyzed. PSE expects to complete this analysis in the
6 fourth quarter of 2022, at which point it expects to have created a shortlist of selected
7 resources.⁸⁵

8

9 **Q. What responses has PSE received regarding the DER RFP thus far?**

10 A. On April 19, 2022, PSE filed a summary on the DER proposals it had received
11 through the DER RFP.⁸⁶ This summary is filed as Exh. ASR-10. Table 1 of the
12 summary⁸⁷ shows that bidders submitted just three MW of stand-alone 2025 winter
13 battery storage capacity. Bidders also submitted just one solar bid, though it is
14 unclear from the summary how big that solar resource might be.⁸⁸

15

16 **Q. How do responses to the DER RFP compare to PSE’s needs as outlined in its**
17 **IRP?**

18 A. PSE’s IRP identified a need of 80 MW of distributed solar and 25 MW of distributed
19 battery storage.⁸⁹ By comparison, the Company received bids for just three MW of
20 battery storage and some undetermined amount of solar capacity. The Company

⁸⁴ Rector, Exh. ASR-8 at 7-8.

⁸⁵ Docket UE-210878, 2022 DER RFP at 41 (Feb. 7, 2022).

⁸⁶ Docket UE-210878, 2022 DER RFP: Proposal Summary (April 19, 2022).

⁸⁷ Rector, Exh. ASR-10 at 4.

⁸⁸ The solar bid was submitted as an “equipment installation” “vendor service.” As the summary report explains (page 3), such bids need to be developed further before they include firm capacity information.

⁸⁹ Einstein, Exh. WTE-1CT at 60:14-18.

1 appears to have received a much smaller amount of capacity for both solar and
2 battery storage, leading Staff to conclude that it will be difficult for PSE to reach its
3 solar and battery storage targets as identified in its IRP.
4

5 **Q. How do responses to the DER RFP impact Staff's confidence that the proposed**
6 **DER preferred portfolio projects will be made?**

7 A. Given RFP response thus far, Staff is not confident that the Company will acquire
8 the targeted amounts of solar and battery storage.
9

10 **Q. Do the RFP responses introduce additional uncertainty into the analysis of cost**
11 **recovery in this case?**

12 A. Yes. The Company's DER preferred portfolio request in this case assumes that the
13 entire 80 MW of solar and 25 MW of battery storage will be acquired. While it does
14 not appear that those targets will be achieved, there is significant uncertainty around
15 how much will be achieved and therefore how much of the target PSE will
16 accomplish in RY1, RY2, or RY3. As of the date filing of this testimony, such
17 uncertainty makes it difficult for Staff to ascertain what PSE will spend in the three
18 rate years to acquire the solar and battery storage resources that it can.
19

20 **Q. Could the DER preferred portfolio change once PSE evaluates the results of the**
21 **RFP?**

22 A. Yes. There is little way to tell before responses are received and evaluated what the
23 results of an RFP will be. Additionally, the results of the DER RFP will be evaluated

1 alongside the results of the all-source RFP. The results of the two combined RFPs
2 could dramatically change the concepts that might ultimately be included in a
3 portfolio of DER programs.

4

5 **Q. Do you believe that future results of the RFP could impact the provisional DER**
6 **preferred portfolio cost PSE is seeking to include in rates in this case?**

7 A. Yes.

8

9 **Q. What is the Company's representation as to the need for the programs**
10 **envisioned in the DER preferred portfolio?**

11 A. PSE leans on the results of its IRP, which identified the 80 MW of distributed solar
12 and 25 MW of distributed battery storage targets, to show the need for these
13 programs.⁹⁰

14

15 **Q. What offsetting factors did the Company consider when deciding to offer the**
16 **DER preferred portfolio?**

17 A. Exh. ASR-8 contains PSE's response to UTC Staff Data Request No. 263.⁹¹ In the
18 response, PSE first notes that it does not believe many offsetting factors are
19 quantifiable within the context of the multiyear rate plan proposed in this case.
20 Nevertheless, the Company states that it considered several offsetting factors,
21 including avoided costs, effective load carrying capacity, and a flexibility benefit for
22 battery storage systems.

⁹⁰ Einstein, Exh. WTE-1CT at 60:13-18.

⁹¹ Rector, Exh. ASR-8 at 4-6.

1 **Q. Does PSE provide reasonable expectations as to cost controls in its DER**
2 **preferred portfolio?**

3 A. Yes.

4

5 **Q. What cost controls are in place for PSE's DER preferred portfolio?**

6 A. As demonstrated in Exh. ASR-8 (the Company's response to UTC Staff Data
7 Request No. 264),⁹² PSE manages costs through its Corporate Spending
8 Authorization (CSA) and project change request process. As described by PSE
9 witness Kensok,⁹³ the CSA process is used to design and gain board approval of
10 large, strategic projects included in its five-year business cycle.

11

12 **Q. Given your above analysis, has PSE met the threshold for including its DER**
13 **preferred portfolio costs in rates?**

14 A. No. The significant uncertainty around which resources will ultimately be acquired
15 as part of a DER preferred portfolio, as well as what those resources might cost,
16 leads Staff to conclude that the used and useful policy statement's threshold for
17 provisional inclusion of costs has not been met in this case. In other words, PSE has
18 failed to meet its evidentiary burden to includes these future costs in rates on a
19 provisional basis. As noted in the used and useful policy statement,⁹⁴ an approved
20 CEIP might reduce this uncertainty, but as mentioned above, the Company's CEIP

⁹² *Id.* at 6.

⁹³ Kensok, Exh. JAK-1T at 10:18-12:16.

⁹⁴ Used and Useful Policy Statement at ¶ 35.

1 will not be approved until after this rate case is completed. The approval process
2 itself opens the door for greater uncertainty.

3

4 **Q. If the Commission accepts your recommendation could PSE seek future cost**
5 **recovery of its DER preferred portfolio?**

6 A. Yes. My recommendation does not impact PSE's ability to seek recovery of these
7 projected costs in a future rate proceeding once these future investments are in-
8 service or when are these costs more certain. Rather my recommendation is only that
9 the Commission (within the context of this rate case) should not include these
10 uncertain costs in rates on a provisional basis.

11

12 **Q. Should PSE be allowed to recover the costs associated with the DER preferred**
13 **portfolio in rates over the next three years?**

14 A. No.

15

16 **Q. Could PSE include the DER preferred portfolio costs in a power cost only rate**
17 **case (PCORC) before its next general rate case?**

18 A. Yes. PSE could include the DER preferred portfolio costs in such a PCORC.
19 However, Staff witness Navarro is recommending that the Company's PCORC be
20 eliminated.⁹⁵ That would mean the Company would have to wait until its next
21 general rate case in 2025 to recover costs for its DER preferred portfolio. At that

⁹⁵ Navarro, Exh. HEN-1T at 36:4-17.

1 time, these costs would likely be more certain and, therefore, be appropriate for
2 inclusion in rates.

3
4 **b. Equity analysis**

5
6 **Q. Should the Commission consider equity in its analysis of PSE's proposed DER
7 preferred portfolio?**

8 A. Yes. As laid out in Staff witness Reynolds' testimony, the Commission should
9 consider equity in its approval of this MYRP, which includes PSE's proposed DER
10 preferred portfolio. The Company should have an assessment of current conditions
11 within its service territory and demonstrate that its proposed actions will improve the
12 equitable distribution of benefits throughout its territory.⁹⁶

13
14 **Q. Did PSE incorporate equity into its DER preferred portfolio?**

15 A. Yes.

16
17 **Q. How did PSE incorporate equity into its DER preferred portfolio?**

18 A. PSE attempted to incorporate equity into its DER preferred portfolio in a few
19 different ways. First, Appendix D-1 of the CEIP describes the development process
20 followed for the DER preferred portfolio. As described in the appendix, the
21 Company developed its DER preferred portfolio in collaboration with its Equity
22 Advisory Group (EAG). Additionally, the CBIs developed through the CEIP were a

⁹⁶ Reynolds, Exh. DJR-1T at 12:6-11.

1 factor in selecting the programs that make up the portfolio. Finally, the resulting
2 portfolio was designed to provide a mix of programs to different customer classes,
3 including carve-outs for income-eligible customers.⁹⁷
4

5 **Q. How does the Company intend to measure whether its DER preferred portfolio**
6 **is distributing benefits equitably?**

7 A. The Company plans to evaluate the distribution of benefits by measuring how the
8 DER preferred portfolio impacts its CBIs.
9

10 **Q. Has the Company described how its DER preferred portfolio will distribute**
11 **benefits equitably?**

12 A. Yes. The Company points to its CBIs to measure the distribution of benefits for its
13 DER preferred portfolio.
14

15 **Q. Does PSE need to show that DER benefits are getting distributed in an equitable**
16 **manner to receive full cost recovery?**

17 A. Yes. As discussed further in Staff witness Reynolds' testimony, PSE should provide
18 data on distributional equity so that the Commission and all other affected persons
19 can effectively address additional aspects of equity, such as procedural and structural
20 equity.⁹⁸ Staff addresses how the Company can demonstrate that benefits are being
21 distributed equitably in the performance-based metrics below.
22

⁹⁷ Docket UE-210795, 2021 PSE Clean Energy Implementation Plan, Appendix D-1 at 7.

⁹⁸ Reynolds, Exh. DJR-1T at 9:5-10:2.

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c. Performance metrics

Q. What performance metrics has the Company proposed to track to measure its DER preferred portfolio performance?

A. Exh. ASR-8 contains PSE’s response to UTC Data Request No. 206.⁹⁹ The response illustrates that the Company has a plan to track its CBIs and certain related metrics. Some of those other metrics include the amount of solar energy and capacity generated or added; the amount of energy and capacity enrolled through DR programs, and peak MW shifted; and the number of enrolled participants, both overall and among named communities.

Q. Which metrics are most important to be tracked through this rate case?

A. Staff proposes four metrics that the Company should track as part of this rate case:

- Number of customers served by each program, including a count of the number of named community members taking part in each program;
- The energy and capacity provided through each program, including how much of each is owned by or sited in named communities;
- Peak demand (in energy and capacity) avoided or shifted through DR and energy storage projects; and
- The value of the energy and capacity avoided or shifted through DR and energy storage projects.

⁹⁹ Rector, Exh. ASR-8 at 9-12.

1 Generally, Staff proposes these metrics be reported annually, which will help PSE
2 demonstrate both the effects of the proposed DER preferred portfolio as well as how
3 the benefits are getting distributed and could pave the way for potential PIMs in a
4 future general rate case. Additionally, these factors are among those that the
5 Commission will look to when making a final prudence determination later.

6
7 **Q. Is there substantial overlap between the metrics Staff proposes and those that**
8 **the Company already intends to track as part of its CEIP annual progress**
9 **reports?**

10 A. Yes. Staff proposes that such information also be reported as part of the reporting
11 mechanism proposed by Staff in this rate case¹⁰⁰ because it is information that will
12 help determine whether the benefits of the DER preferred portfolio are being
13 distributed equitably, and to create a record in this case upon which to make a final
14 prudence determination.

15
16 **Q. Has PSE proposed any PIMs associated with its DER preferred portfolio?**

17 A. No.

18
19 **Q. Does Staff propose any PIMs be put in place associated with the DER preferred**
20 **portfolio?**

21 A. No. Staff does not propose any targets or PIMs for the DER preferred portfolio;
22 however, Staff may do so in the future.

¹⁰⁰ Ball, Exh. JLB-1T at 33:15-20; Reynolds, Exh. DJR-1T at 17:16-21.

1 **2. Energy storage demonstrations**

2

3 **Q. What is your recommendation regarding the energy storage demonstrations?**

4 A. Staff recommends that the Commission not allow the energy storage demonstrations
5 to be put into rates at this time because the Company has not met the used and useful
6 policy statement’s threshold for provisional inclusion. The Commission should
7 remove from PSE’s electric revenue requirement all amounts associated with the
8 Company’s energy storage demonstrations, including plant-related costs and O&M
9 expenses.

10

11 **Q. Describe the Company’s proposed energy storage demonstrations.**

12 A. The Company does not spend much space describing its energy storage
13 demonstrations in testimony; where it does describe the projects, it uses the word
14 “may” more than once,¹⁰¹ indicating uncertainty around what projects will ultimately
15 be built. However, PSE provided some clues about what will be included in its
16 demonstrations as part of its response to UTC Staff Data Request No. 56. This
17 response is filed as Exh. ASR-11. In the response, PSE outlines 13 separate projects
18 that it plans to install. They include:

- 19 • Four non-lithium-ion battery technologies (iron air, vanadium redox,¹⁰²
20 pumped hydro, and compressed air);

¹⁰¹ Einstein, Exh. WTE-1CT at 67.

¹⁰² As shown in Exh. ASR-11, the response to UTC Staff Data Request No. 56 referred to “veraidum redux” as one non-lithium-ion technology to be explored. However, Staff confirmed with Company representatives that this was a typographical error, and the response should have referred to “vanadium redox.”

- 1 • Three vehicle to grid projects (a Level 2 fleet charger project, a DCFC fleet
- 2 charger project, and a residential project);
- 3 • Residential, commercial, and utility microgrid projects;
- 4 • A hydrogen project; and
- 5 • Battery grid services for both the residential and commercial sectors.

6

7 **Q. How did PSE determine which projects to include in the energy storage**
8 **demonstrations?**

9 A. According to PSE’s response to UTC Staff Data Request No. 207,¹⁰³ PSE explains
10 that it conducted a literature review of technologies that are unproven to PSE but
11 have the potential to provide benefits to customers and/or the grid. The Company
12 specifically looked closely at long-duration storage options in this literature review.
13 The data request response further notes that each project will be developed and
14 implemented according to PSE’s “New Technology Framework”, which is a one-
15 page document describing the steps in implementing a project but does not include
16 any evaluation or decision-making criteria.¹⁰⁴

17

18 **Q. Are the energy storage demonstrations part of the DER preferred portfolio?**

19 A. No. The Company discusses the two sets of projects separately in testimony.
20 Therefore, Staff discusses the demonstrations separately from the DER preferred
21 portfolio.

22

¹⁰³ Rector, Exh. ASR-8 at 13-14.

¹⁰⁴ *Id.* at 15.

1 **Q. What is PSE’s energy storage demonstrations proposed revenue requirement**
2 **request in this case?**

3 A. Exh. ASR-12 contains Staff’s calculation of the energy storage demonstrations
4 proposed revenue requirement for RY1, and the Company’s calculation of the
5 proposed revenue requirement for RY2 and RY3 (which the Company submitted in
6 response to Staff Data Request No. 253). For the three rates years, the revenue
7 requirement total comes to \$4.7 million (\$0.5 million for RY1, \$1.3 million for RY2,
8 and \$2.9 million for RY3).¹⁰⁵ PSE included amounts for the energy storage
9 demonstrations in its RY1 revenue requirement. However, as demonstrated in Exh.
10 ASR-11, Staff found through discovery that PSE no longer plans to complete any of
11 these projects in RY1.¹⁰⁶

12
13 **a. Inclusion in rates on a provisional basis**

14
15 **Q. Did Staff conduct a prudence review on PSE’s proposed energy storage**
16 **demonstrations?**

17 A. No. For the same reasons discussed in the TEP and DER preferred portfolio sections
18 above, Staff did not conduct a prudence review of the energy storage demonstrations.

19
20 **Q. Did PSE consider offsetting factors when deciding to install the energy storage**
21 **demonstrations?**

¹⁰⁵ These totals are calculated using the Company’s requested rate of return.

¹⁰⁶ In response to UTC Staff Data Request No. 294, PSE did not include specific operations and maintenance (O&M) expenses in its energy storage demonstrations request, and states that any such expenses will be “low and manageable” within its existing O&M budget. Exh. ASR-8 at 16.

1 A. No. PSE did not provide any information about offsetting factors considered when
2 deciding to offer the energy storage demonstrations.

3

4 **Q. How certain is PSE that these estimated investments in the energy storage
5 demonstrations will occur?**

6 A. According to PSE's response to UTC Staff Data Request No. 265,¹⁰⁷ the Company
7 cannot be certain that the projects it proposed as part of its energy storage
8 demonstrations would all be deployed, or that those deployed would cost what the
9 Company has projected.

10

11 **Q. What cost controls does the Company have in place for the energy storage
12 demonstrations?**

13 A. PSE intends to use the same CSA process described in the DER preferred portfolio
14 section above to control costs for the energy storage demonstrations, according to its
15 response to UTC Staff Data Request No. 264.¹⁰⁸

16

17 **Q. Although these investments have not be made yet, what are Staff's initial
18 concerns with the proposed cost recovery of the proposed energy storage
19 demonstrations?**

20 A. Staff is concerned that PSE has not sufficiently justified the investment it expects to
21 spend in the energy storage demonstrations. The Company spends only two pages in

¹⁰⁷ Rector, Exh. ASR-8 at 17-18.

¹⁰⁸ *Id.* at 19.

1 its testimony discussing the projects.¹⁰⁹ Those two pages address the goals of the
2 projects at a high level and discuss what projects “may” be included in the energy
3 storage demonstrations. The Company does not attempt to justify the need for the
4 energy storage demonstrations or discuss what benefits might accrue as a result.
5 Given that this is a project that the Company expects to recover \$4.7 million for in
6 this case, this is insufficient. PSE cannot expect Staff to recommend approval of
7 prospective expenses that it has not made much effort to justify in the first place.

8

9 **Q. Has PSE met the threshold for including its energy storage demonstrations costs**
10 **in rates on a provisional basis?**

11 A. No. The Company has not tried to justify the need for the energy storage
12 demonstrations or quantify the benefits of the projects. Those benefits therefore do
13 not meet the used and useful policy statement’s standard for being known and
14 measurable. Nor has PSE established that the demonstrations meet the five factors
15 for provisional treatment discussed in Staff witness Ball’s testimony.¹¹⁰

16

17 **Q. Should PSE be allowed to recover the costs associated with the energy storage**
18 **demonstrations in rates over the next three years?**

19 A. No.

20

21 **Q. Could PSE include the energy storage demonstration costs in a PCORC before**
22 **its next general rate case?**

¹⁰⁹ Einstein, Exh. WTE-1CT at 66-67.
¹¹⁰ Ball, Exh. JLB-1T at 29:9-13.

1 A. Yes. PSE could include the energy storage demonstration costs in such a PCORC.
2 However, Staff witness Navarro is recommending that the Company's PCORC be
3 eliminated.¹¹¹ That would mean the Company would have to wait until its next
4 general rate case in 2025 to recover costs for the energy storage demonstrations.

5
6 **Q. Does this conclude your testimony?**

7 A. Yes.

¹¹¹ Navarro, Exh. HEN-1T at 36:4-17.