

EXH. WAG-1T
DOCKETS NOS. UE-240004/UG-240005
2024 PSE GENERAL RATE CASE
WITNESS: WILLIAM GEHRKE

BEFORE THE WASHINGTON

UTILITIES AND TRANSPORTATION COMMISSION

WASHINGTON UTILITIES AND
TRANSPORTATION COMMISSION

Complainant,

v.

PUGET SOUND ENERGY

Respondent.

DOCKET NOS. UE-240004 and UG-240005
(Consolidated)

RESPONSE TESTIMONY (NONCONFIDENTIAL)

OF

WILLIAM GEHRKE

ON BEHALF OF

JOINT ENVIRONMENTAL ADVOCATES

August 6, 2024

JOINT ENVIRONMENTAL ADVOCATES
RESPONSE TESTIMONY (NONCONFIDENTIAL) OF
WILLIAM GEHRKE

TABLE OF CONTENTS

I.	INTRODUCTION.....	1
II.	NATURAL GAS DEPRECIATION EXPENSE SCENARIO	2
III.	CONSTRUCTION WORK IN PROGRESS AND CLEAN GENERATION RESOURCES RATE ADJUSTMENT	8
IV.	PSE’S CLEAN GENERATION RESOURCE RATE ADJUSTMENT PROPOSAL.	16
V.	CONCLUSION	17

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EXHIBIT LIST

Exh. WAG-2	Professional Qualifications
Exh. WAG-3	Comparison of Natural Gas Depreciation Expense Scenarios

1 **I. INTRODUCTION**

2 **Q. Please state your name and business address.**

3 **A.** My name is William Gehrke, and I am a Senior Technical Analyst at the NW
4 Energy Coalition (“NWECC” or the “Coalition”). My business address is 811 1st
5 Ave., Suite 305, Seattle, WA 98104.

6 **Q. Please describe your education and background.**

7 **A.** I received a bachelor's and a master's in economics from Florida State University. I
8 previously was as a utility analyst for the Florida Public Service Commission. I
9 have also worked as a Senior Economist for Oregon's residential consumer
10 advocate. In my career, I have worked on rate-making, planning, and policy
11 dockets before the Washington Utilities and Transportation Commission, Oregon
12 Public Utilities Commission, and the Federal Energy Commission. I have been in
13 my current role for NWECC since 2023. My c.v. is attached as Ex. WAG-2.

14 **Q. Have you provided testimony before the Commission before?**

15 **A.** Yes. I have provided testimony before the Washington Utilities and Transportation
16 Commission on two occasions. First, I provided testimony in Avista’s 2024 general
17 rate case. Second, I have provided testimony on Puget Sound Energy rate
18 proceeding UG - 230968. I have also provided testimony to the Oregon Public
19 Utility Commission.

20 **Q. On whose behalf are you testifying?**

21 **A.** I am testifying on behalf of the Joint Environmental Advocates.

1 **Q. Please provide a summary of your testimony.**

2 **A.** JEA recommends that the Commission take an incremental approach when
3 considering changes to depreciation rates in this case. JEA's stance is that changes
4 in depreciation rates for natural gas assets should be counterbalanced with the
5 overall rate increase in this proceeding and investments in beneficial
6 electrification. Additionally, JEA is against PSE obtaining automatic approval for
7 CWIP treatment at the rate base for all CETA-associated resources. Instead, JEA
8 proposes that PSE receive CWIP in rate-based treatment on a case-by-case basis.
9 Last, JEA supports PSE's proposal to collect CETA-eligible resources through the
10 Clean Generation Resources Rate Adjustment Tracker (CGR Tracker).

11 **Q. Please summarize your recommendations.**

12 **A.** As discussed below, I recommend that the Commission:

- 13 • Adopt a modestly less aggressive depreciation scenario that helps achieve
14 state decarbonization goals while freeing up funds for other decarbonization
15 measures.
- 16 • Adopt a policy granting Construction Work in Progress (CWIP) in rate base
17 for non-emitting electric generation or renewable resources generating
18 resources on a case-by-case basis.
- 19 • Adopt PSE's Clean Generation Resources Rate Adjustment

20 **II. Natural Gas Deprecation Expense Scenario**

21 **Q. What is the status of the gas utility system in Washington?**

22 **A.** Gas utility systems are in a state of significant transition in Washington. Natural
23 gas is methane gas, a significant source of greenhouse gas and other pollutant

1 emissions. The Climate Commitment Act is a cap and invest program requiring
2 95% reductions in GHG emissions by 2050 and making natural gas emissions
3 subject to carbon regulation. Washington's building code and PSE's line extension
4 allowance have been updated to decrease the likelihood of new customers
5 connecting to the natural gas system. Washington State has implemented policies
6 that will result in the PSE's natural gas business needing to decarbonize its
7 operations.

8 Washington's climate policies will trigger very significant changes in PSE's
9 gas system. For example, Washington's 2021 State Energy Policy states
10 "decarbonizing the building sector requires the state to maximize energy efficiency
11 and maximize electrification."¹ These two policies will play a major role in
12 directing PSE to decarbonize its energy system. Both will reduce the throughput of
13 natural gas and the number of customers served by PSE's natural gas system.

14 **Q. Why is it important that the Commission assist PSE in managing the**
15 **transition of the natural gas system?**

16 **A.** With a decrease in natural gas throughput, fixed costs will be divided among a
17 smaller number of customers, resulting in higher gas rates. This may cause PSE's
18 natural gas customers to consider switching to electricity because of the elevated
19 gas rates or financial incentives. If the number of customers decreases, the rate
20 increase will be even more noticeable for those who remain. JEA worries that those

¹ Washington Department of Commerce, Washington 2021 State Energy Strategy at 67
(Dec.2020).

1 who continue to use natural gas may be individuals who are unable to transition
2 away from the natural gas system.

3 In the context of cost-of-service rate making, PSE's natural gas rates are
4 based on the costs of providing natural gas to customers. PSE's customer bills will
5 be influenced by a decline in throughput or customer count. Some components of
6 PSE's rates are based on variable costs and can decline in cost with a decrease in
7 natural gas throughput. For instance, if PSE's natural gas sales decrease, the
8 Company can reduce its natural gas purchases, reducing costs in customer rates.
9 Other types of costs on PSE's natural gas system are fixed and do not decline with
10 throughput. The largest cost category of this type is fixed costs collected from
11 customers over the assets' lifespan through rates.

12 **Q. Do you agree that the depreciation expense for gas assets should be calculated**
13 **based on shorter service lives?**

14 **A.** Yes, as part of a managed transition, it is a tool that is necessary for the
15 Commission to gradually ramp up depreciation expenses to mitigate impacts on
16 future natural gas customers.

17 **Q. What is PSE's proposal around natural gas depreciation expense in the**
18 **general rate case?**

19 **A.** For distribution system investments, PSE has proposed to shorten the service lives
20 by 10 years, which means that these assets will be paid off over a shorter period of
21 time.² PSE has sought to change depreciation expense rates to reflect its
22 expectation of shorter service lives for gas assets and decreasing gas throughput in

² UE 240004 – PSE Exhibit NWA-1T, Page 29, Lines 23.

1 the future.³ The Company believes this will help mitigate the risk of stranded costs
2 from widespread electrification of energy uses currently served by gas.⁴⁵

3 **Q. What are the other reasons behind PSE's request to raise depreciation rates in**
4 **the natural gas proceeding?**

5 **A.** While PSE's proposal is designed to reduce risk for future customers, it's important
6 to note that the increase in depreciation is also in the Company's best interest. By
7 increasing depreciation rates to reflect decreased service lives and recover the costs
8 to customers, the Company will gain additional revenue in the near term to support
9 its operations from increased depreciation expense in rates. This approach
10 significantly reduces PSE's risk of recouping the investment in the natural gas
11 system over the long term, allowing the Company to recover its investment sooner
12 and reduce risk. The legislature also explicitly endorsed this approach in EBHB
13 1589.

14 **Q. Does traditional cost of service regulation incentivize new capital projects?**

15 **A.** Yes. The rate of return regulation incentive encourages PSE to pursue capital
16 projects. PSE's profit is tied to the size of its rate base, which grows in response to
17 new assets being added to rate base. This is an old incentive that was originally put
18 in place to encourage the growth of the natural gas system to serve customers.

19

³ UE 240004 – PSE Exhibit NWA-1T, Page 3, Lines 3-6.

⁴ UE 240004 – PSE Exhibit NWA-1T, Page 4, Lines 13-15. UE 240004 – PSE Exhibit NWA-1T, Page 28, Lines 7-9.

⁵ UE 240004 – PSE Exhibit AEB-1T, Page 8, Lines 16-21.

1 **Q. What has been the traditional life cycle of a utility asset?**

2 **A.** Local distribution companies (LDC) typically adhere to a standard life cycle for
3 their assets. This process commences with the LDC strategically planning for
4 utility assets to provide natural gas service. Subsequently, the LDC either
5 constructs or procures utility assets to meet the system's requirements. The LDC
6 then assumes responsibility for maintaining and operating the asset while it is in
7 service. Upon reaching the end of its useful life, the LDC retires and removes the
8 asset, thus completing the cycle. The cycle continues as the Company replaces the
9 asset, perpetuating the ongoing cycle. PSE's natural gas assets have conformed to
10 this life cycle.

11 **Q. What are JEA's concerns with PSE proposal around depreciation?**

12 **A.** JEA appreciates the Company's motivation to mitigate risk for future customers as
13 Washington transitions away from natural gas. JEA is concerned that the life cycle
14 of a utility assets will continue to occur, growing the Company's natural gas rate
15 base with new capital additions. For more information on PSE's future capital
16 spending projections, refer to JEA Exh. BTC-1T. JEA is concerned that this may
17 lead to a cycle of constantly investing in new assets and expanding its rate base.
18 PSE has indicated that the company intends to make substantial long-term
19 investments in the gas delivery system. This growth in natural gas assets is
20 occurring while PSE simultaneously increasing depreciation expense to mitigate
21 risk for future customers.

1 **Q. What impact does PSE’s depreciation proposal have on rates in this**
2 **proceeding?**

3 **A.** PSE’s proposal results in 76.862 million dollars increase in depreciation expense
4 the first year of the rate case.⁶ In this rate case, PSE’s rate proposal seeks to have a
5 196.040 million overall increase to revenue requirement in rate year 1 for natural
6 gas customers.⁷ The depreciation increase is a significant driver of the rate increase
7 in this proceeding.

8 **Q. What is JEA’s recommendation?**

9 **A.** JEA recommends that the Commission establishes depreciation rates in a 5-year
10 service life reduction scenario. Exhibit WG-2 details the difference in the
11 depreciation rates between the five-year scenario and PSE’s proposed ten-year
12 scenario. JEA’s recommended scenario of a 5-year service life reduction results in
13 43.8 million less in depreciation expense compared to the 10-year service life
14 reduction. JEA suggests that the Commission gradually increases natural gas
15 depreciation expenses over multiple rate periods.

16 **Q. Why should the Commission adopt JEA’s recommendation?**

17 **A.** Rather than allocating the limited customer funds towards increasing the
18 depreciation expense for natural gas assets in this specific matter, JEA
19 recommends diverting the funding to support other gas decarbonization initiatives,
20 such as increased funding for beneficial electrification. It's essential to align the
21 increased depreciation expenses with long-term plans to reduce gas system fixed

⁶ UE 240004 – PSE Exhibit SEF-16.

⁷ UE 240004 – PSE Exhibit JDT-1T, Page 31, Lines 1.

1 costs. Investing in beneficial electrification can be a key strategy to avoided and
2 reducing gas system fixed costs, as evidenced by PSE's proposal to avoided
3 significant gas system costs through electrification efforts in Duvall, the discussion
4 of non-pipe alternatives and zonal electrifications in JEA Exh. BTC-1T, and the
5 provisions of ESHB 1589 directing large combination utilities to pursue
6 geographically targeted electrification to advance these objectives.⁸ PSE still needs
7 to present concrete strategies to reduce gas system expenditures in the future. For
8 information around JEA's proposal to fund beneficial electrification measures refer
9 to JEA Exh. BTC-1T.

10 **III. Construction Work in Progress and Clean Generation Resources**
11 **Rate Adjustment**

12 **Q. What are two methods of recovering financing costs incurred during**
13 **construction?**

14 **A.** Two common methods for recouping financing costs during construction are
15 Allowance for Funds Used During Construction (AFUDC) and Construction Work
16 in Progress (CWIP) in rate base.

17 **Q. What is AFUDC method?**

18 **A.** AFUDC covers the financing costs during the construction phase using ADUDC
19 rates. The WUTC uses the Company's authorized rate of return to calculate the
20 PSE's AFUDC rate. Costs incurred during construction are placed in CWIP
21 account and accrue interest by multiplying the amounts in CWIP account by the
22 AFUDC rate. Once a project is complete and enters service, the accrued interest

⁸ See ESHB 1589 Sections 3(4)(h), 3(4)(m).

1 from AFUDC charges and the CWIP balance is added to the utility's rate base.
2 Throughout the project's life, as it depreciates, customers pay both construction
3 costs and AFUDC incurred during construction by the Company.

4 **Q. What is the CWIP in rate base method?**

5 **A.** The CWIP in rate base method allows utilities to include construction costs for
6 projects into the rate base before the plant is finished and in service. This means
7 that customers start paying the utility for these costs as soon as they are included in
8 the rate base, even before the project is completely finished. As with other items in
9 utilities rate base, the return is the product of CWIP in rate base multiplied by the
10 rate of return authorized for the utility.

11 **Q. What is the conventional way that construction costs are recovered from**
12 **customers?**

13 **A.** AFUDC is the traditional way that construction financing costs are recovered from
14 customers.

15 **Q. What is the major difference between the AFUDC approach and the CWIP in**
16 **rate base approach?**

17 **A.** The inclusion of CWIP in rate base allows the utility to recover construction costs
18 prior to the completion of construction. Conversely, the AFUDC approach permits
19 the utility to recover construction costs only after the assets have been placed into
20 service.

21

1 **Q. What is PSE’s proposal around CWIP?**

2 **A.** PSE proposes that the Commission transition to a hybrid CWIP in rate base method
3 for Clean Energy Transformation Act (“CETA”) projects. Under PSE's proposal,
4 the company could utilize AFUDC for assets under construction prior to a general
5 rate case. Once new base rates are established in this proceeding, PSE's proposal
6 would enable the company to recover the financing costs of CETA projects in the
7 rate base.

8 **Q. Why is PSE recommending moving away from AFUDC?**

9 **A.** PSE recommends incorporating CWIP into the rate base to enhance cash flow for
10 funding construction expenditures and servicing interest payments on related debt.⁹
11 PSE contends that including CWIP in the rate base will help lessen the initial rate
12 impact on customers when assets are put into service.¹⁰ PSE also argues that using
13 CWIP in the rate base “enhances debt ratings due to enhanced coverage ratios and
14 earning quality improvements, which thereby lower borrowing costs.”¹¹

15 **Q. What issue does CWIP in rate base present to Puget Sound Energy’s electric**
16 **customers?**

17 **A.** A fundamental principle of utility regulation is that consumers should only bear the
18 costs of "used and useful" assets. CWIP enables companies to provide funds to
19 customers for an asset before the customers receive service for that asset.

⁹ UE 240004 – PSE Exhibit DAD-1T, Page 63, Lines 4-5.

¹⁰ UE 240004 – PSE Exhibit DAD-1T, Page 64, Lines 7-8.

¹¹ UE 240004 – PSE Exhibit DAD-1T, Page 68, Lines 3-5.

1 Therefore, allowing PSE to use CWIP in the rate base is an exceptional measure. In
2 a CWIP in rate base approach, the customers of PSE act as investors for the project
3 by paying for financing costs prior to commercial operation. This setup renders the
4 company indifferent to construction delays, as customers concurrently bear the
5 financing cost of new assets prior to construction. CWIP in rate base is a shift in
6 risk to customers especially around long-lead time generating resources that may
7 face delays and/or construction cost increases.

8 **Q. Have delays occurred with generating facilities led to issues with CWIP in rate**
9 **base for customers?**

10 **A.** Yes. A recent example has occurred at the Vogtle Power Plant in Georgia. In 2009,
11 the Georgia legislature passed the Georgia Nuclear Energy Financing Act, which
12 required the Georgia Public Service Commission to move from AFUDC to a CWIP
13 in rate base approach. In 2009, the two new units of Vogtle were jointly built by
14 various utilities in the Southeast US, with Georgia Power holding the largest stake.
15 Vogtle Units 3 and 4 encountered significant cost overruns and construction
16 delays.¹² Both units were not online until 2024, nearly 14 years after construction
17 began. During the construction period, Georgia Power customers bore the
18 financing costs of Vogtle Units 3 and 4 in CWIP without receiving power from the
19 facility. In the case of the Vogtle nuclear power plant, the inclusion of
20 Construction Work in Progress (CWIP) in the rate base led to significant discontent
21 among customers with the Georgia regulatory framework. Subsequently, the
22 Georgia legislature chose to repeal the inclusion of CWIP in the rate base.

¹² <https://www.eia.gov/todayinenergy/detail.php?id=61963>

1 **Q. Is PSE considering long lead time resources that could encounter construction**
2 **delays?**

3 **A.** Yes.¹³ PSE is currently assessing the potential of nuclear power resources to serve
4 its load. For long lead time resources, it is crucial for the Commission to consider
5 the matter of granting CWIP in rate base for large capital projects thoroughly.

6 **Q. What is an advantage for customers under AFUDC framework?**

7 **A.** Under a AFUDC framework, the Company bears financing costs during
8 construction, which are passed once the project is completed. In an AFUDC, the
9 Company is encouraged to place the asset into service to begin receiving service
10 for their investment. In a CWIP in ratebase approach, the Company's financial risk
11 associated with construction delays is minimized.

12 **Q. Is the CWIP proposal being made in isolation?**

13 **A.** No. In this case, PSE is making several proposals to either minimize risk for
14 investors or increase cash flow for the Company. PSE has proposed increasing its
15 authorized return on equity to 9.95% in rate year one and 10.5% in rate year two.
16 PSE has proposed three new trackers associated with clean generation resources,
17 decarbonization, and wildfire.¹⁴ PSE is proposing to earn a return on purchased
18 power agreements.¹⁵ While JEA does not have a position on each of these
19 proposals, PSE's full suite of proposals in this rate case systematically shift risk to
20 customers and/or increase cash flow and earnings for investors.

¹³ UE 240004 – PSE Exhibit JM-1T, Page 46, Lines 3-4.

¹⁴ UE 240004 – PSE Exhibit SEF-1T, Page 2, Lines 8-12.

¹⁵ UE 240004 – PSE Exhibit SEF-1T, Page 84, Lines 5-7.

1 **Q. What is the Joint Environmental Advocate’s recommendation to the**
2 **Commission?**

3 **A.** Joint Environmental Advocates recommends that the Commission not grant PSE
4 approval moving forward for CWIP in rate base for all CETA-associated resources.
5 The Commission has the authority to employ any appropriate method to enable
6 PSE to allow them to recover financing costs before the construction of a capital
7 project is complete. JEA recommends that the Commission grant PSE construction
8 work in progress on a project-by-project basis. This should be a fact-specific
9 exercise where the Commission evaluates the project and weighs the risks of the
10 CWIP in the rate base for customers

11 **Q. Why is JEA making this recommendation?**

12 **A.** The inclusion of CWIP in the rate base offers significant advantages for PSE. By
13 employing a CWIP in rate base approach, PSE can have customers bear financing
14 costs in real-time before construction commences. There may be projects where it
15 is necessary to use CWIP in rate base, and other projects where it is not necessary.
16 If PSE successfully includes CWIP in the rate base for one project, they may use
17 the same reasoning to advocate for all future projects because it is beneficial to
18 investors. There are instances where the Commission may view CWIP in rate base
19 as advantageous and disadvantageous when determining if it is in the public
20 interest. Evaluating it on a case-by-case basis is the most effective approach,
21 providing the Commission with flexibility in responding to each situation.

1 **Q. Is JEA's proposed criteria based on the concept that CWIP included in the**
2 **rate base must yield specific public interest benefits to justify its authorization**
3 **for a project?**

4 **A.** Yes. For decades, AFUDC has been the default method for recovering
5 construction financing costs. AFUDC follows the regulatory principle of used and
6 useful, which states that customers should only pay for costs that they receive
7 benefits from on the utility system. In order to divert from used and useful
8 principles, JEA recommends that the Commission evaluate the specific criteria that
9 help determine public interest benefits.

10 **Q. What would be the best venue for PSE to seek approval for CWIP in rate**
11 **base?**

12 **A.** It would best for PSE to seek approval for CWIP in rate base in the certificate of
13 necessity process.

14 **Q. What specific criteria does JEA recommend the Commission adopt when**
15 **evaluating whether a specific project should receive CWIP in rate base**
16 **treatment?**

17 **A.** For a project to receive a CWIP in rate base treatment, JEA proposes the following
18 criteria for the Commission to use for evaluation if the project is in the public
19 interest:

20 **Criterion 1: The project is associated with an important state public policy**
21 **objective.**

1 The project must advance an important public policy such as the Clean Energy
2 Transformation Act. The project must advance public policy goals of the state of
3 Washington.

4 **Criterion 2: The Commission should evaluate the financial condition of the**
5 **utility, and how CWIP in rate base impacts PSE's financial condition.**

6 The Company must provide evidence to the Commission that CWIP in rate base is
7 necessary for that specific project.

8 **Criterion 3: The Commission should consider the impact that CWIP in rate**
9 **base has had on customers.**

10 The Commission has the flexibility to interpret this criterion in different ways.

11 When the request for CWIP in rate base is made for a specific resource, JEA
12 suggests that the Commission assess whether customers will not be overburdened
13 by the utility's proposal to include CWIP in the rate base for a project.

14 This is a task that requires consideration of specific facts. JEA offers one example.
15 Under Criterion 3, JEA recommends that the Commission consider the utility's
16 financial requirements. To ensure fairness, the Commission could also consider
17 customers' economic circumstances. The value of CWIP in rate base largely relies
18 on the discount rate used to compute the net present value of revenue requirement
19 scenarios. PSE's customers might be facing economic difficulties in times of
20 financial strain, and it may be beneficial to use a higher discount rate for PSE's
21 customers. Under such circumstances, implementing an AFUDC approach might
22 be positive for customers, delaying near-term rate increases for customers.

1 **Criterion 4: The Commission should consider public input when making a**
2 **decision.**

3 The Commission should consider public input when granting CWIP in rate base.
4 Public input can occur in the certificate of necessity process, or in a separate
5 WUTC proceeding.

6 **Criterion 5: The Commission should evaluate the development risk of the**
7 **facility, and how development risk is linked to CWIP in rate base.**

8 The Commission should consider the development risk of the project when
9 granting CWIP in rate base treatment for new resources. The Commission should
10 consider the viability of the resource coming into service on time, the impacts of
11 construction delays, and steps that PSE took to minimize development risk
12 associated with the project.

13 **IV. PSE's Clean Generation Resource Rate Adjustment Proposal.**

14 **Q. What is PSE's Clean Generation Resources Rate Adjustment proposal?**

15 **A.** PSE has proposed a Clean Generation Resource Rate Adjustment (CGR tracker) in
16 this general rate case proceeding. This proposal will enable PSE to recover fixed
17 costs associated with building or purchasing large-scale CETA-compliant
18 resources. The CGR tracker will also allow PSE to forecast rates and actual up
19 costs related to utility-scale generation resources until costs are placed into base
20 rates in a general rate case. PSE's tracker proposal arose out of the PSE 2022 rate
21 case.

1 **Q. What is Joint Environmental Advocate’s position on the CGR tracker?**

2 **A.** Joint Environmental Advocates supports the establishment of a CGR tracker.
3 Under CETA, PSE is allowed to defer all major project costs associated with its
4 clean energy action plan. PSE's proposed tracker proposal is similar to deferring
5 major CETA project costs for future rate recovery. The major difference is that the
6 tracker more closely tracks revenue associated with expenses associated with
7 CETA-generating resources. JEA supports this tracker because it will help PSE
8 make investments in clean energy to meet state policy.

9 **V. CONCLUSION**

10 **Q. Does this conclude your testimony?**

11 **A.** Yes.