

**BEFORE THE WASHINGTON
UTILITIES AND TRANSPORTATION COMMISSION**

WASHINGTON UTILITIES AND
TRANSPORTATION COMMISSION,

Complainant,

v.

PUGET SOUND ENERGY,

Respondent.

DOCKET UE-240004 and UG-240005
(Consolidated)

CROSS-ANSWERING TESTIMONY OF

ROGER D. COLTON

ON BEHALF OF THE ENERGY PROJECT

EXHIBIT RDC-3T

September 18, 2024

TABLE OF CONTENTS

	<u>Page</u>
I. Introduction.....	1
II. Whether PSE is reasonable to require twelve months of customer usage data to have customer burdens considered in the Company’s Energy Burden Analysis (EBA).....	2
III. Whether it is reasonable to require PSE to anticipate changes to their future bill assistance programs and future rate increases and to, in recognition of these changes, to require PSE to simulate how this may affect energy burdens.	4

1 **I. Introduction**

2 **Q. PLEASE STATE YOUR NAME AND ADDRESS.**

3 A. My name is Roger Colton and I use the pronouns he, him, and his. My address is 34
4 Warwick Road, Belmont, Massachusetts.

5 **Q. ARE YOU THE SAME ROGER COLTON WHO PREVIOUSLY PREPARED**
6 **RESPONSE TESTIMONY ON BEHALF OF THE ENERGY PROJECT FOR THIS**
7 **PROCEEDING?**

8 A. Yes, I am.

9 **Q. PLEASE EXPLAIN THE PURPOSE OF YOUR TESTIMONY.**

10 A. The purpose of my Cross-Answering Testimony is to reply to the Response Testimony of
11 Mariel Thuraisingham and Charlee Thompson, filed on behalf of the Joint Environmental
12 Advocates (JEA) regarding the Puget Sound Energy (PSE) general rate case.¹ I respond
13 to two issues raised by that testimony:

- 14 1. Whether PSE is reasonable to require twelve months of customer usage
15 data to have customer burdens considered in the Company's Energy
16 Burden Analysis (EBA); and
- 17 2. Whether it is reasonable to require PSE to anticipate changes to their
18 future bill assistance programs and future rate increases and to, in
19 recognition of these changes, require PSE to simulate how this may affect
20 energy burdens.

21 I address these two issues separately below.

¹ Thuraisingham and Thompson, Exh. MT-CT-1T.

1 **II. Whether PSE is reasonable to require twelve months of customer usage data to have**
2 **customer burdens considered in the Company’s Energy Burden Analysis (EBA).**

3 **Q. PLEASE SUMMARIZE THE FIRST ISSUE PRESENTED IN THE RESPONSE**
4 **TESTIMONY OF THURASINGHAM AND THOMPSON TO WHICH YOU**
5 **RESPOND.**

6 A. In the Response Testimony of Thuraisingham and Thomson, the JEA witnesses opposed
7 PSE’s requirement that customers have at least twelve months of customer energy usage
8 data to be considered for analysis in the Company’s EBA. The witnesses proposed, in the
9 alternative, that PSE “should instead consider a lower usage timeline—such as three or
10 six months—for inclusion in its analysis of energy burdened customers.²

11 **Q. HOW DO YOU RESPOND TO THIS PROPOSAL?**

12 A. This recommendation by the JEA witnesses has a sound empirical foundation for PSE’s
13 Census Tracts when viewed from the perspective of whether the required 12-months of
14 data would disproportionately exclude the lowest income households from the analysis.
15 Table 1 below presents data, for PSE’s service territory, on the extent to which households
16 had lived in the same house for the year immediately preceding the year of the American
17 Community Survey (ACS). As can be seen, households with income less than \$35,000
18 were nearly 50% more likely than households with income of \$75,000 or more to have
19 changed homes from where they had lived just one year before. Even households with
20 income between \$35,000 and \$50,000 were one-third more likely to have changed homes
21 in the preceding year.

² Id., at 23.

\$9,999 or less	\$10,000 to \$14,999	\$15,000 to \$24,999	25,000 to \$34,999	\$35,000 to \$49,999	\$50,000 to \$64,999	\$65,000 to \$74,999	\$75,000 or more
17.5%	16.8%	17.0%	18.1%	16.3%	14.4%	14.4%	12.3%

1 By requiring households to have 12 complete months of data, PSE excludes these
 2 households that are more frequently mobile. Given that mobility is often motivated by
 3 high home energy bills, the very characteristic that PSE purports to measure, the EBA
 4 tends to mask the depth of the problem by excluding the lowest income households that
 5 would more likely have higher home energy burdens.

6 **Q. DO YOU AGREE WITH THE REMEDY PROPOSED BY THE JEA WITNESSES?**

7 A. To the extent that the JEA witnesses recommend that PSE include households with a
 8 “lower usage timeline” --for example, including either three months or six months—I
 9 agree that the proposal is a reasonable proposal. That does not, however, mean that PSE
 10 should base the energy burden analysis in its EBA on fewer than twelve months of data.
 11 Attempting to calculate annual energy burdens based on fewer than twelve months of
 12 data would be difficult. Instead, my conclusion, is that PSE need only three to six
 13 months of data *from the particular customer* upon which to base its energy burden
 14 analysis. Reasonable alternatives exist to impute the remaining months of data. If PSE
 15 has only six months of data for a particular customer, it could, for example, use the
 16 average residential usage to complete the remaining months. It could, in the alternative,
 17 use average residential data for the neighborhood in which the customer resides. It could
 18 use average residential data for the type of housing unit (e.g., one-family detached, multi-

³ American Community Survey (5-year data), Table B07010 (2022).

1 family of 5+ units) in which the customer resides. It could use average consumption for
2 the prior resident of the unit in question. Any of these alternatives is a better alternative
3 than the exclusion of the customer from the EBA analysis.

4 **Q. WHAT DO YOU RECOMMEND?**

5 A. I recommend that the proposal of the JEA witnesses be adopted, perhaps with additional
6 clarification. Given that it is unreasonable to exclude customers entirely from the EBA
7 simply because they do not have 12 complete months of usage data, PSE should adopt a
8 procedure where they include customers with a “lower usage timeline” as recommended
9 in the Response Testimony of Thuraisingham and Thomson. I recommend further that
10 PSE work with agency members of the LIAC in developing an appropriate mechanism by
11 which to impute energy consumption to households with an incomplete billing history.
12 Agency members have both experience and expertise in determining heating costs for
13 households with incomplete billing histories for purposes of determining appropriate
14 assistance grants.

15 **III. Whether it is reasonable to require PSE to anticipate changes to their future bill**
16 **assistance programs and future rate increases and to, in recognition of these**
17 **changes, to require PSE to simulate how this may affect energy burdens.**

18 **Q. PLEASE EXPLAIN THE SECOND ISSUE YOU WISH TO ADDRESS FROM**
19 **THE TESTIMONY OF THE JEA WITNESSES.**

20 A. In their Response Testimony, JEA witnesses Thuraisingham and Thomson testify that the
21 Commission should require PSE to anticipate changes to its future bill assistance
22 programs and future rate increases and, in recognition of these changes, to require PSE to

1 simulate how such changes may affect energy burdens.⁴ The JEA testimony recommends
2 that “the Company could work with its LIAC to determine an appropriate methodology
3 for simulating energy burden over time as a function of factors that increase customer
4 bills.”⁵ With some clarification, I find that this recommendation is not only reasonable,
5 but is supported by much of what I said in my Response Testimony. This
6 recommendation should be adopted.

7 **Q. WHAT CLARIFICATION DO YOU SUGGEST?**

8 A. The principle that is presented in the testimony of the JEA witnesses is consistent with
9 the observation in my Response Testimony that the pursuit of energy affordability is a
10 journey, not a destination.⁶ As the JEA witnesses observe, there are multiple factors that
11 can influence what energy burdens exist. Indeed, even the PSE EBA makes this same
12 observation.⁷ As I asserted in my Response Testimony,

13 To the extent that the Commission might establish specific quantitative equity
14 goals for PSE to pursue, those goals may become out-of-date or inappropriate
15 over time. As I discuss above, for example, incomes increase at different
16 rates in different locations over time. As PSE witness Mikelson identified in
17 his discussion of low-income usage, energy consumption may differ based on
18 the age and energy efficiency of homes in different geographic areas. As the
19 PSE Energy Burden Analysis identifies, energy burdens are a function of the
20 interaction between household incomes and household energy bills, an
21 interaction which almost certainly will vary by time and place.⁸

⁴ Thuraingham and Thompson, Exh. MT-CT-1T, at 24.

⁵ Id.

⁶ Colton, Exh. RDC-1T, at 51 – 52. (“there are multiple elements which influence the pursuit of equity. The pursuit of equity goals is a journey, not a destination which the Commission can identify at a single point in time.”)

⁷ See, Exh. BDJ-3, at 11.

⁸ Id.

1 This observation relates to the JEA recommendation in that while my testimony and the
2 JEA testimony are fundamentally similar, they are not identical. It is important to
3 acknowledge the difference while noting that they are more alike than different.

4 **Q. WHAT DIFFERENCES DO YOU SEE BETWEEN YOUR TESTIMONY AND**
5 **THE JEA TESTIMONY?**

6 A. The specific language in the JEA testimony is more limited than the language that I
7 included in my testimony. The JEA testimony is narrowly focused on examining how
8 energy burdens may fluctuate “as a function of *factors that increase customer bills.*”
9 (emphasis added). In contrast, both the Company’s EBA and my Response Testimony
10 note that “energy burdens are a function of the *interaction between household incomes*
11 *and household energy bills.*”⁹ As I note in my Response Testimony, a review of empirical
12 data for the PSE service territory clearly demonstrates that in some years incomes
13 increase, while in other years income decline.¹⁰

14 Moreover, bills may, but need not, increase at the rate expected based on changes in
15 prices. For example, PSE data reported through its Energy Information Administration
16 (EIA) Form 861 data¹¹ shows that PSE electric bills were nearly identical in the years
17 2018 and 2020 (\$1,135 vs. \$1,141) despite increasing rates. However, from 2019 to
18 through 2023, average PSE residential electric bills spiked, increasing from \$1,112 in
19 2019 to \$1,405 in 2023. My conclusion here is that PSE bills will not always *increase* or
20 not always at the rate anticipated by PSE. There is a degree of uncertainty associated

⁹ Id. (emphasis added).

¹⁰ Id., at 29–30.

¹¹ <https://www.eia.gov/electricity/data/eia861/>

1 with projections of future PSE bills. That uncertainty should be taken into account in the
2 PSE EBA.

3 **Q. WHAT DO YOU CONCLUDE WITH RESPECT TO THE RECOMMENDATION**
4 **BY THE JEA WITNESSES?**

5 A. I conclude that the fundamental proposition propounded by JEA witnesses
6 Thuraisingham and Thomson is absolutely correct. As the JEA witnesses testify, there is
7 uncertainty in the calculation of home energy burdens in PSE's EBA. That uncertainty
8 should be explicitly taken into account. To the extent that I have any disagreement with
9 the recommendation made by the JEA witnesses, I would support their recommendation
10 with the proviso that the uncertainty affects not merely the size of the bill underlying the
11 calculations of energy burdens, but also the level of income underlying those calculations
12 As the JEA witnesses recommend, PSE should work with its LIAC to develop agreed-
13 upon mechanisms to take both of those uncertainties into account.

14 **Q. DO YOU HAVE ANY FINAL RESPONSE TO THE TESTIMONY OF JEA**
15 **WITNESSES THURAISSINGHAM AND THOMSON?**

16 A. Yes. The JEA witnesses recommend that the Commission require PSE "to anticipate
17 changes to their future bill assistance programs" and, as with changes in bills of income-
18 qualified customers, to require PSE to "simulate how this may affect energy burdens."¹²
19 With one clarification, I absolutely agree with the principle advanced in this
20 recommendation. The principle is that the level of future bill assistance, either in the
21 aggregate or on an individual customer basis, can be expected to change from year-to-

¹² Thuraisingham and Thompson, Exh. MT-CT-1T, at 24.

1 year. It is not, however, simply the aggregate level of bill assistance that should be
2 considered. As between two years, the impact of bill assistance may vary based on the
3 number of participants or based on the distribution of participants by income. Two years
4 may have identical aggregate amounts of assistance, in other words, but still may
5 represent distinctly different abilities to address excess energy burdens on the PSE
6 system. Consistent with the discussion above, the JEA recommendation that PSE work
7 with its LIAC to develop ways to account for these uncertainties in the amount and
8 distribution of bill assistance should be adopted.

9 **Q. DO YOU HAVE ANY ADDITIONAL OBSERVATION ABOUT THIS JEA**
10 **RECOMMENDATION?**

11 A. Yes. In preparing its EBA, it is important to ensure that PSE accurately applies various
12 principles. One important principle is that the level of bill assistance available does not
13 affect the level of home energy burdens experienced by PSE customers. A higher level of
14 assistance, in other words, does not reduce a household's energy burden. Home energy
15 assistance is a resource that is available to help the state (and the utility) to reduce home
16 energy burdens. When appropriately designed and distributed, bill assistance will be an
17 effective tool to help reduce excess home energy burdens.

18 Words make a difference. The differences in levels of bill assistance appropriately noted
19 by the JEA witnesses will not "affect energy burdens." The differences in levels of bill
20 assistance will affect the ability of PSE to respond to excess energy burdens.

1 **Q. HOW IS THERE ANY PRACTICAL DIFFERENCE IN THE REAL WORLD**
2 **BETWEEN “AFFECTING ENERGY BURDENS” AND “AFFECTING THE**
3 **ABILITY TO RESPOND TO ENERGY BURDENS”?**

4 A. If energy assistance was sufficient to reach 100% of the excess energy burdens
5 experienced by income-qualified households, perhaps there would be no difference.
6 However, as we know, that is not the situation. The difference between *actual* home
7 energy bills and *affordable* home energy bills is commonly known as the “affordability
8 gap” for a reason. The dollars of available assistance represent a resource to fill that gap.
9 Those dollars of assistance—at least those dollars provided through government
10 appropriations—come with their own level of uncertainty, needing to be periodically
11 reappropriated by the relevant legislative body. If the appropriation declines, or if the
12 appropriation remains the same but is directed to be used for additional purposes (e.g.,
13 extending LIHEAP to cover water bills in addition to energy bills; extending LIHEAP to
14 cover total home energy rather than being targeted primarily to home heating and
15 cooling), the gap remains the same but the resources available to fill the gap deteriorate.

16 **Q. WHAT DO YOU CONCLUDE?**

17 A. I conclude that the recommendation of the JEA witnesses regarding taking into account
18 the uncertainties inherent in the availability of home energy assistance should be adopted.
19 I would merely clarify that this energy assistance does not “affect energy burdens” but
20 rather affects the ability of Washington state generally, and of PSE in particular, to
21 respond to excess home energy burdens.

22 **Q. DOES THIS COMPLETE YOUR CROSS-ANSWERING TESTIMONY?**

23 A. Yes, it does.