

August 1, 2023

Amanda Maxwell
Executive Director
Washington Utilities & Transportation commission
621 Woodland Square Loop SE
Lacey, WA 98503
Submitted Via UTC Web Portal

Re: Docket No. UG-220244 – Avista's 2023 Gas Integrated Resource Plan

Dear Executive Director Maxwell,

On behalf of Sierra Club and its nearly 27,000 members in Washington, thank you for the opportunity to provide these comments on Avista's 2023 Gas IRP. This is the Company's first gas plan filed since Washington enacted the Climate Commitment Act ("CCA") in 2021, and since the 2022 general rate case settlement ("GRC settlement") where Avista committed to incorporating several gas decarbonization issues into its resource planning. Unfortunately, Avista's IRP does not align with the CCA's decarbonization requirements, satisfy the Commission's lowest reasonable cost standard, or meet Avista's GRC settlement commitments.

The plan includes a preferred portfolio that relies almost exclusively on purchasing CCA allowances, rather than pursuing available decarbonization strategies like building electrification. Avista arrived at this preferred portfolio by underestimating the costs and risks of an allowance-dependent compliance strategy, and by applying a deeply flawed analysis of electrification that significantly overestimates its costs. Avista also failed to develop a gas system decarbonization strategy as required by the GRC settlement, or to address key elements specified in the settlement such as targets for the ratio of new gas customers to new electric customers. Accordingly, Sierra Club recommends that the Commission decline to acknowledge the IRP, and direct Avista to refile a decarbonization plan that satisfies the GRC settlement requirements along with an IRP that satisfies the CCA and Commission rules.

Section I of these comments describes how Avista's customer growth forecasts fail to account for building decarbonization policies and market trends, and how these flawed forecasts drive Avista's decisions about resource procurement and CCA compliance. Section II describes how Avista's IRP fails to satisfy the GRC settlement requirements. Section III describes how Avista's preferred portfolio underestimates the cost and risk of an allowance-based compliance strategy, underestimates the costs of alternative fuels, and significantly overstates the costs of

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<sup>&</sup>lt;sup>1</sup> UTC Docket UE-22053, Avista 2022 General Rate Case, Final Order 10/04, Appendix A: Full Multiparty Settlement Stipulation (Dec. 12, 2022) [hereinafter "GRC Settlement Stipulation"].

electrification. When these errors are corrected, Avista's electrification scenario appears to have lower rate impacts and a lower annual levelized cost than its preferred portfolio. Section IV discusses Avista's hostility to building electrification and demand-side management ("DSM"), which warrants an independent evaluation of opportunities to incorporate these measures into its CCA compliance strategy. Section V summarizes Sierra Club's conclusions and recommendations.

## I. Avista's customer growth forecasts fail to account for building decarbonization policies and market trends.

Avista's customer growth forecasts, which significantly impact projected resource needs and resource selection, are based solely on historic trends, and do not account for building decarbonization policies or market developments that Avista acknowledges will reduce demand for gas among new customers. Examples of such policies include the Climate Commitment Act, the Inflation Reduction Act's generous electrification incentives, Washington's building codes that are projected to dramatically increase the use of electric heat pumps in new construction, and Avista's 2022 GRC settlement commitment to phase out its gas line extension allowance by January 1, 2025. Avista's reliance on inflated customer growth forecasts that do not account for these policies risks overbuilding its gas system, contrary to clear State policy directives to begin

<sup>2</sup> IRP at 2-1 ("The customer fore

<sup>&</sup>lt;sup>2</sup> IRP at 2-1 ("The customer forecast in the 2023 IRP assumes growth based on historic trends."); IRP at 3-14 ("This IRP does not include fuel switching in the demand forecast, but rather includes specific fuel use electrification as a resource option for both commercial and residential customers.").

<sup>&</sup>lt;sup>3</sup> See Sierra Club, Washington State Will Build New Homes with Heat Pumps to Cut Energy Costs and Climate Pollution, Protect Health (Nov. 2022),

https://www.sierraclub.org/press-releases/2022/11/washington-state-will-build-new-homes-heat-pumps-cut-energycosts-and. Avista acknowledges that the building codes will produce "fundamental changes" in its customer growth trajectory, but states that the codes were enacted after its customer growth forecasts were completed. IRP at 2-2. But considering risk in planning requires utilities to account for developments that may not be fully final or certain, and Avista was certainly aware of the likelihood that Washington's codes would significantly shift in favor of electrification—it opposed the codes during their development. Comments of Avista et. al to SBCC (March 11, 2022), https://sbcc.wa.gov/sites/default/files/2022-03/WA Utilities combo 031122.pdf. Moreover, Avista's planning should take into account the underlying statutory directive for codes to support "the broader goal of building zero fossil-fuel greenhouse gas emission homes and buildings by the year 2031," which has been in effect since 2018. RCW 19.27A.020(2)(a). Similarly, it would not be reasonable to ignore the clear trend toward electrification-friendly building codes based on the State Building Code Council's decision to temporarily delay implementation of the codes so that it can address legal uncertainty arising from a recent court decision. Washington State Building Code Council, Council Votes to Delay Effective Date of 2021 Code Editions to October 29, 2023, https://www.sbcc.wa.gov/news/council-votes-delay-effective-date-2021-code-editions-october-29-2023. Even if this process were to result in substantive changes to the codes, it would not affect the least-risk principle or broader trends in code development. Indeed, Avista has joined a lawsuit challenging the codes, claiming that they have already produced "the permanent loss of new customers over time." Rivera v. SBCC, E.D. Wa. 1:23-cv-03070, Complaint for Declaratory and Injunctive Relief, at 11 (May 22, 2023), http://climatecasechart.com/wpcontent/uploads/sites/16/case-documents/2023/20230522 docket-123-cv-03070 complaint.pdf. The court declined plaintiffs' request to enjoin the codes, stating "Washington is committed to addressing climate change and the court will stay out of its way." Earthjustice, Federal Court Denise Gas Industry Request to Block Washington State's Climate-Friendly Building Codes (July 18, 2023), https://earthjustice.org/press/2023/federal-court-denies-gasindustry-request-to-block-washington-states-climate-friendly-building-codes.

<sup>&</sup>lt;sup>4</sup> GRC Settlement Stipulation, at; *see also* UTC Docket UG-210729, Order 01 (Oct. 29, 2021) (ordering a reduction of gas line extension allowances).

rapidly shrinking that system, exposing its customers to significant stranded asset risk.<sup>5</sup> It may also bias Avista's analysis against non-pipe alternatives ("NPAs") by overstating the demand those NPAs would need to reduce, and artificially inflate electrification costs by assuming the need to retrofit buildings that are likely to be built all-electric from the start.

Avista has assumed new customer growth will continue along historic trajectories, despite acknowledging that its planning approach needs to "[r]ecognize historical trends may be fundamentally altered," and describing throughout the IRP how several policies are likely to reduce new gas customers. Indeed, Avista's new gas customer growth forecast increased from 1.0% in its 2021 IRP to 1.1% in its 2023 IRP—a step in the opposite direction of clear and growing trends. 8

The only justification Avista has offered for ignoring these trends is that "there is uncertainty about the timing and size of those policy decisions." But making reasonable forecasts in the face of uncertainty is at the heart of resource planning. And by not even attempting to account for these trends, Avista fails to adequately consider "the risks imposed on ratepayers" by the potential to over-invest in unnecessary gas resources that run contrary to state and federal "public policies regarding resource preference," as required by Commission rules. Moreover, many of the factors influencing customer growth rates are known with relative certainty, and have been known throughout the development of Avista's IRP. For example, Avista's 2021 IRP discussed the State Energy Strategy, which emphasizes the need to maximize building electrification and calls for electrification-friendly building codes. Hut rather than addressing head-on these policies' likely effects on customer growth, Avista used the same line found in its 2023 IRP, stating that there is "uncertainty about the timing and size" of these policies' role in shifting Washington away from reliance on fossil gas. Similarly, Avista's agreement to phase out its line extension allowance on a pre-determined timeline will have a clear, direct, and predictable

<sup>&</sup>lt;sup>5</sup> See IRP at 2-22 ("Changes in total demand can drastically change both the timing and resources selected....").

<sup>&</sup>lt;sup>6</sup> IRP at 1-9; see also IRP at 7-2 ("As discussed in previous chapters, demand is the greatest risk in this IRP and has fundamentally changed due to building codes and climate programs.").

<sup>&</sup>lt;sup>7</sup> See, e.g., IRP at 2-1 to 2-2 ("A price elasticity was now incorporated into this analysis so there may be additional movement from natural gas customers to electric end uses simply due to increases in price to comply with climate programs."); IRP at 2-2 ("[I]t is important to understand these forecasts reflect the "status quo" and do not fully reflect emerging natural gas connection restrictions in Washington and Oregon."); IRP at 2-2 (describing changes to rules and policy in Washington and Oregon as "fundamental changes" impacting natural gas usage); IRP at 3-14 ("State policies in Oregon and Washington may lead customers to electrify their natural gas space and water heating to reduce greenhouse gas emissions."); IRP at 5-3 ("Over the past few years both Oregon and Washington have added state policies, impacting the overall trajectory of Avista's resource needs and future rates."); IRP at 5-14 (assuming a 50% direct credit to homeowners under the IRA for costs to convert from gas to electric end use, but not accounting for the IRA in customer growth forecasts).

<sup>&</sup>lt;sup>8</sup> IRP at 1-10.

<sup>&</sup>lt;sup>9</sup> IRP at 1-9.

<sup>&</sup>lt;sup>10</sup> WAC 480-90-238(2)(b) (directing utilities to consider, at a minimum, "market-volatility risks, ... risks imposed on ratepayers, ... public policies regarding resource preference adopted by Washington state or the federal government, the costs of risks associated with environmental effects including emissions of carbon dioxide," and other factors in advancing lowest-reasonable cost IRPs).

<sup>&</sup>lt;sup>11</sup> Avista 2021 Gas IRP, at 5, 102, <a href="https://www.myavista.com/-/media/myavista/content-documents/about-us/our-company/irp-documents/natural-gas-irp-documents/2021-natural-gas-irp.pdf">https://www.myavista.com/-/media/myavista/content-documents/about-us/our-company/irp-documents/natural-gas-irp-documents/2021-natural-gas-irp.pdf</a>.

<sup>&</sup>lt;sup>12</sup> Avista 2021 Gas IRP, at 22.

effect on gas customer growth that Avista is best positioned to evaluate. <sup>13</sup> While Avista will certainly continue to refine its treatment of decarbonization policies in customer growth forecasts going forward, this is no reason to continue ignoring their effects, as Avista did in its 2021 IRP. Indeed, other utilities have provided examples of how to account for these trends using available information: Puget Sound Energy addressed this issue by assuming zero customer growth in its 2023 gas IRP preferred portfolio. <sup>14</sup>

Avista claims to address the potential impacts of trends toward electrification in its electrification scenario, but it is hard to see how the scenario accomplishes this task. <sup>15</sup> The IRP contains no discussion of how the building electrification scenario was compared to Avista's base customer growth forecasts, or used to evaluate their reasonableness. To the extent the scenario is addressed in the IRP, it is largely treated as an alternative resource portfolio that is compared to Avista's preferred portfolio, rather than a sensitivity analysis or reality check on Avista's customer growth forecasts.

One potential remedy is to direct Avista to explicitly account for all significant enacted and proposed building decarbonization policies in future load forecasts, but this would likely be insufficient for two reasons. First, Avista has repeatedly failed to incorporate climate policies into its customer forecasts. It relied word-for-word on the same excuse about uncertainty in its 2021 and 2023 IRPs, even as these policies and their expected effects have become more concrete, and even as commenters like UTC Staff and Oregon Public Utility Commission Staff expressed concern about Avista's forecasting approach. <sup>16</sup> Second, waiting another two years to correct Avista's growth forecasts could lead to procurement of unnecessary resources that are likely to become stranded assets, and harm progress toward fast-approaching decarbonization targets when the climate science and CCA timelines make clear that there is no time to waste. Therefore, a stronger remedy may be appropriate, such as nonacknowledgement of resource procurement plans that rely on customer growth forecasts, or direction to file updated demand forecasts before Avista's next IRP that explicitly account for new climate policies.

### II. Avista's IRP fails to satisfy commitments made in its 2022 general rate case settlement.

In its 2022 GRC settlement, Avista agreed to incorporate several elements related to gas system transition and decarbonization into its 2023 IRP.<sup>17</sup> These include a gas system decarbonization plan with several specific elements, and incorporation of NPA analysis into Avista's resource planning going forward. Avista's incorporation of these elements in its IRP left much to be desired, and has flatly failed to satisfy some GRC settlement requirements.

<sup>&</sup>lt;sup>13</sup> GRC Settlement Stipulation, at 11.

<sup>&</sup>lt;sup>14</sup> See UTC Docket UG-220242, Puget Sound Energy's 2023 Gas Integrated Resource Plan.

<sup>15</sup> IRP at 2-3

<sup>&</sup>lt;sup>16</sup> Avista 2023 Gas IRP Appendices, at 12 (detailing OPUC Staff's concerns about Avista's "reliance on the Status Quo ... without regard to new clean energy policies" and the resulting "compliance obligation and stranded asset risk"), <a href="https://www.myavista.com/-/media/myavista/content-documents/about-us/our-company/irp-documents/natural-gas-irp-documents/2023-gas-irp-appendix.pdf">https://www.myavista.com/-/media/myavista/content-documents/about-us/our-company/irp-documents/natural-gas-irp-documents/2023-gas-irp-appendix.pdf</a>; *id.* at 28 ("It's not clear to [UTC] Staff how demand goes up in most scenarios despite the Washington building code changes.").

<sup>17</sup> GRC Settlement Stipulation, at 11-12.

Avista's gas system decarbonization plan is required to include supply curves of decarbonization resources; consider a comprehensive set of strategies, programs, and incentives for efficient customer equipment, which could include electrification; and include targets for the ratio of new gas customers added relative to new electric customers. In an appendix to the IRP that does not appear to have been submitted to the Commission, Avista describes how it purports to have met the GRC settlement requirements.<sup>18</sup>

In the appendix, Avista explains that it has not established any targets to reduce the ratio of new gas customers relative to new electric customers. This clearly violates the GRC settlement. Instead, the appendix states that due to the phaseout of Avista's line extension allowances and Washington's updated building codes, "Avista does not anticipate any new gas customers added to the system beginning in 2025, and potentially earlier." Avista goes on to state that "[b]ecause the ratio of new gas customers relative to new electric customers is already expected to be 0, any such future target would also be 0." This assumed ratio of zero is flatly inconsistent with Avista's customer growth forecasts discussed in Section I above. 21

More importantly, the appendix expresses an assumption, not a target. Even if Avista's planning was based on an expectation of no new customers (which it clearly is not), the GRC settlement would require a commitment from Avista to meeting and maintaining this target, accompanied by a plan for doing so. Avista does not even mention the new customer ratio in the body of its IRP (or in any materials that appear to have been submitted to the Commission), much less incorporate the ratio into a gas system decarbonization plan. Likewise, the IRP does not mention any planned steps to encourage all-electric new construction in a way that would influence this ratio. Such measures could include marketing, education and outreach on the benefits of all-electric new construction (and a phaseout of such materials encouraging the use of gas in new construction), partnerships with developers and contractors to support all-electric construction, increased efficiency incentives for all-electric new construction, and phasing out incentives for new construction that uses gas.<sup>22</sup>

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<sup>&</sup>lt;sup>18</sup> Avista 2023 Gas IRP Appendices, at 248-251 (Appendix 5.1), <a href="https://www.myavista.com/-media/myavista/content-documents/about-us/our-company/irp-documents/natural-gas-irp-documents/2023-gas-irp-appendix.pdf">https://www.myavista.com/-media/myavista/content-documents/about-us/our-company/irp-documents/natural-gas-irp-documents/2023-gas-irp-appendix.pdf</a>.

<sup>&</sup>lt;sup>19</sup> Avista 2023 Gas IRP Appendices, at 251.

<sup>&</sup>lt;sup>20</sup> Avista 2023 Gas IRP Appendices, at 251.

<sup>&</sup>lt;sup>21</sup> See also Avista, Customer Forecasts 2023 IRP, Base tab, row B, filed in UTC Docket UG-220244 on May 2, 2023 (showing increasing Washington residential customer counts through 2045).

<sup>&</sup>lt;sup>22</sup> Several utilities and utility commissions have adopted one or more of these approaches and can provide a model for an updated decarbonization strategy that incorporates them. *See*, *e.g.*, Colorado PUC, Decision No. C23-0413, at 93 (June 22, 2023) (directing a utility to phase out all incentives for "residential-type gas-fired space heating, water heating, or air conditioning equipment for the new construction market" by 2024, and for the utility's Energy Star New Homes program to "fully encourage [building electrification] technologies as soon as reasonably possible," and to "support only all-electric housing by June 30, 2024"),

https://www.dora.state.co.us/pls/efi/EFI Search UI.Show Decision?p session id=&p dec=30107; California PUC, CPUC Reduces Incentives for Natural Gas to Better Align with State's Climate Goals (Apr. 6, 2023), https://www.cpuc.ca.gov/news-and-updates/all-news/cpuc-reduces-incentives-for-natural-gas-to-better-align-with-state-climate-goals-2023; UTC Docket UE-22066, PSE 2022 General Rate Case, Final Order 24/10, Appendix A: Revenue Requirement Settlement at 36, 41-42 (directing PSE to prepare an updated Gas Decarbonization Study that includes "[a] segmentation of new and existing customers to separately evaluate the costs and benefits of electrifying new and existing customers and a scenario whereby PSE seeks to electrify all new customers and

**Recommendation:** We recommend that the Commission direct Avista to re-file a gas system decarbonization plan that includes decreasing annual targets for the ratio of new gas customers relative to new electric customers that align with and meaningfully advance progress toward Avista's CCA obligations, as well as concrete steps for achieving those targets (including one or more of the measures listed above). At the very least, Avista should be required to file such a plan in its 2025 IRP, and to update its targets for the ratio of new gas and electric customers in each subsequent IRP.

Avista fares only slightly better on the requirement that its decarbonization plan consider a comprehensive set of strategies, programs, and incentives for efficient customer equipment, which could include electrification. The appendix does not meaningfully discuss any of these strategies in the context of a comprehensive gas system decarbonization plan (indeed, there is no such discrete decarbonization plan anywhere in the IRP). 23 Instead, the appendix simply references Chapters 3 and 6 of the IRP, and the Conservation Potential Assessments contained in the appendix. Chapter 3 discuses DSM resources, but does not mention the CCA, decarbonization, or the role of electrification and DSM in meeting CCA targets. Chapter 6 presents Avista's Washington preferred portfolio and CCA compliance strategy, which is heavily focused on allowance purchases and meets only a tiny fraction of forecasted demand through DSM.<sup>24</sup> Avista cannot meet its GRC settlement commitments by simply pointing to scattered sections of its IRP that generally address topics related to those identified for consideration in the decarbonization plan. **Recommendation:** We recommend that the Commission direct Avista to specifically discuss the role of DSM measures in its CCA compliance strategy, including specific electrification measures for both new and existing customers, in its re-filed gas system decarbonization plan and subsequent IRPs.<sup>25</sup>

Finally, the GRC settlement requires Avista to integrate consideration of NPAs, including building envelope efficiency measures, electrification, and gas DSM, into its resource planning, and to discuss how DSM programs may best be used as NPAs with its Energy Efficiency Advisory Group. <sup>26</sup> The IRP's NPA analysis consists of a single paragraph that generally describes potential NPA measures and the conditions under which they are considered. <sup>27</sup> It does not address any specific capacity expansion projects for which NPA analysis was conducted or the outcome of any such analysis. There does not appear to be any documentation in the IRP or supporting materials of advisory group consultation about how DSM programs can best be used as NPAs. The appendices describe questions about NPA analysis raised by UTC and Oregon PUC staff, with Avista's responses generally revealing a lack of interest in seriously considering

projected corresponding carbon emission reductions," which will be incorporated into PSE's 2025 gas IRP, and to develop a Targeted Electrification Strategy that considers "a comprehensive set of strategies, programs, incentives, promotional materials, and other measures to encourage electrification of new and existing customers" and includes "annual targets to continue reducing new gas customer additions in future years").

<sup>&</sup>lt;sup>23</sup> Avista 2023 Gas IRP Appendices, at 251.

<sup>&</sup>lt;sup>24</sup> Issues with Avista's CCA compliance strategy are discussed in Section III below.

<sup>&</sup>lt;sup>25</sup> This should include a discussion of the potential for DSM and electrification to mitigate compliance risk, stranded asset risk, and risks associated with higher-than-expected allowance and alternative fuel prices, as discussed in Section III below.

<sup>&</sup>lt;sup>26</sup> GRC Settlement Stipulation, at 11-12.

<sup>&</sup>lt;sup>27</sup> IRP at 8-9.

NPAs (especially before capacity shortfalls are identified and expansion projects are planned, when it may be too late for a realistic NPA analysis), and no history of selecting NPAs to meet resource needs.<sup>28</sup>

**Recommendations:** We recommend that the Commission direct Avista to include project-specific NPA analysis in its future IRPs for all capacity expansion projects and groups of geographically-related projects over \$500,000 (the threshold used in this IRP). The analysis should explain which measures were considered, and if the NPA is not selected, why not. If the reason is that the NPA could not be implemented in time to meet the resource need, the analysis should explain the steps Avista will take to perform its NPA analysis in time to meet resource needs for future projects. We also recommend that the Commission direct Avista to file documentation of its consultation with advisory groups and interested parties on how DSM and electrification programs may be best used as NPAs no later than its 2025 IRP.

# III. Avista's preferred portfolio does not provide a realistic path to Climate Commitment Act compliance, and therefore does not satisfy the Commission's lowest reasonable cost standard.

Avista's CCA compliance strategy relies almost exclusively on emission allowances, with some synthetic methane in the later years, a very small amount of energy efficiency, and no electrification. <sup>29</sup> This strategy exposes Avista's customers to significant compliance and stranded asset risks that Avista has not adequately considered. It also relies on overly optimistic assumptions about the prices of allowances and alternative fuels, and unreasonably high assumptions about the cost of electrification. Therefore, Avista's preferred portfolio, or Preferred Resource Strategy, does not satisfy the Commission's lowest reasonable cost standard. <sup>30</sup> **Recommendation:** Sierra Club recommends that the Commission decline to acknowledge the IRP, and direct Avista in its future filings to correct the errors in this IRP and better incorporate electrification as an effective CCA compliance strategy.

A. Avista underestimates the cost of allowances and fails to address the risks of an allowance-based compliance strategy.

Avista's preferred portfolio relies on purchasing hundreds of thousands of CCA allowances or offsets each year, without any meaningful reductions in gas use and associated emissions.<sup>31</sup> Avista's planned allowance purchases steadily increase over the analysis period and reach roughly one million purchased allowances around 2043, even as the total number of available allowances decreases under the CCA's emissions cap.<sup>32</sup> By 2045, Avista proposes to use close to

<sup>&</sup>lt;sup>28</sup> Avista 2023 Gas IRP Appendices, at 24, 34-35.

<sup>&</sup>lt;sup>29</sup> IRP at 6-27 to 6-28.

<sup>&</sup>lt;sup>30</sup> WAC 480-90-238.

<sup>&</sup>lt;sup>31</sup> IRP at 6-27 ("Avista does not expect a significant reduction in traditional gas use with the CCA prices assumed in this expected case.").

<sup>&</sup>lt;sup>32</sup> IRP at 6-29. Allowance purchases decrease slightly toward the very end of the analysis period, but this is only because Avista assumes it will meet a small amount of its compliance obligations using synthetic methane. As discussed in Section III.B below, synthetic methane faces extremely high market barriers and is unlikely to play a role in decarbonizing Washington's buildings.

10% of all statewide allowances, and this percentage is likely to sharply increase between 2045 and 2050 as the CCA's emissions cap decreases. Avista acknowledges that its pro-rata share of Washington's statewide emissions cap will decrease steadily over time, and that its planned allowance purchases will exceed its estimated emissions allotment beginning around 2029. By 2043, Avista's allowance purchases exceed its emissions allotment by roughly 800,000 metric tons of climate pollution.<sup>33</sup>

This compliance strategy creates significant risks for Avista's customers, which the Company fails to address. First, Avista's approach is completely at odds with the CCA's decarbonization mandate, and the utility would face very high compliance costs if policymakers enact *any* additional decarbonization policies that it cannot meet with allowance purchases. Indeed, CCA compliance strategies like Avista's may make such policies more likely by over-relying on allowances and threatening the integrity of the CCA's emissions cap, which could signal to policymakers that further action is needed. The purpose of the CCA's gradual phase-in and market flexibilities is not to excuse inaction until abrupt, massive, costly, and disruptive efforts are needed, but to allow covered entities to make near-term investments in smaller-scale decarbonization, and ramp these investments up as they become more familiar and cost-effective. Commission Staff has expressed significant concern about similar allowance-dependent compliance strategies filed by Cascade Natural Gas and Puget Sound Energy in their IRPs.<sup>34</sup>

Second, Avista's CCA compliance strategy creates significant stranded asset risk. Its plan to continue business as usual while purchasing CCA allowances will result in investments in traditional gas infrastructure that can and should be avoided by instead pursuing electrification in the near term. Sooner or later, widespread electrification of Avista's service area is inevitable: Avista's allowance-based strategy will eventually be foreclosed by the CCA's declining emissions cap as discussed above, analyses like the State Energy Strategy clearly indicate that electrification will be the primary approach to decarbonizing Washington's buildings, and market trends are already rapidly moving in that direction. When this happens, many of the gas infrastructure investments proposed in this IRP will become stranded assets that are no longer used and useful well before they are fully amortized. Avista can minimize this risk by focusing its CCA compliance strategy on electrification and avoiding new gas infrastructure investments wherever possible.

Third, Avista underestimates the risk of high allowance prices. Its preferred portfolio assumes CCA allowances will be available at a mid-range price, rather than the ceiling price. This is extremely unlikely in light of expected competition for allowances from other emitters, especially if other utilities like Puget Sound Energy and Cascade Natural Gas proceed with their similar compliance strategies (which would use most or all of the available allowances in several

<sup>&</sup>lt;sup>33</sup> Compare IRP at 5-10 with IRP at 6-29.

<sup>&</sup>lt;sup>34</sup> UTC Docket UG-220131, Commission Staff Comments Regarding 2023 Natural Gas IRP, at 12-15 (Apr. 28, 2023) [hereinafter "Staff Comments on 2023 Cascade IRP"] (detailing the Department of Ecology's clear intention to avoid overreliance on allowances and maintain the integrity of the CCA's emissions cap, consistent with the statute's core purpose); UTC Docket UG-220242, Commission Staff Comments Regarding Puget Sound Energy's 2023 Natural Gas IRP, at 9-10 (June 5, 2023); *see also* UTC Docket UG-220242, Sierra Club Comments on Puget Sound Energy Final 2023 Gas IRP, at 9-10 (June 5, 2023).

years). <sup>35</sup> Unless utilities make significant progress toward actually reducing their emissions, allowance prices are likely to be driven to the ceiling price in most years. Avista's analysis indicates that this would significantly increase the annual system costs of its preferred portfolio, with the annual increase reaching roughly \$100 million in 2035 and growing to roughly \$200 million by 2042. <sup>36</sup> Thus, when comparing Avista's preferred portfolio to other portfolio options, it is more appropriate to base the comparison on Avista's "PRS – Allowance Price Ceiling" scenario. For portfolios that rely less on allowances (and are less likely to drive their prices to the ceiling), a mid-range allowance price estimate may be appropriate.

Finally, under Avista's preferred portfolio, customers remain exposed to significant risks of volatile and increasing gas prices (and to the even higher and more uncertain costs of alternative fuels, to the extent the portfolio relies on them). Changing geopolitical and economic conditions have led to significant gas price surges in the Pacific Northwest. Moreover, gas suppliers must also comply with the CCA, so if Avista's strategy increases allowance prices as discussed above, it may make compliance more expensive for gas suppliers, resulting in higher gas prices that are passed on to Avista's customers. Greater investments in building electrification, energy efficiency and conservation, and demand response can help reduce ratepayers' exposure to gas price risk.

By failing to adequately address these state policies and risks associated with GHG emissions, Avista's IRP fails the Commission's lowest reasonable cost standard.<sup>37</sup>

B. Avista underestimates the cost of alternative fuels and overestimates their availability.

Avista's analysis also applies overly optimistic assumptions about the cost and availability of alternative fuels such as synthetic methane, hydrogen, and biomethane (sometimes called renewable natural gas or RNG). Avista's Washington preferred portfolio does not use any hydrogen or biomethane, but some biomethane is selected in the Oregon preferred portfolio and some alternate scenarios.<sup>38</sup>

Numerous filings to the UTC have thoroughly documented the risks of alternative fuels, including unknown and likely very high costs, the potential that necessary technologies will never overcome key barriers to commercial availability, the fuels' poor suitability for use in buildings compared to harder-to-electrify sectors, and the significant health and safety risks of burning unproven fuels in homes and buildings.<sup>39</sup> Rather than recounting all of these risks here, we offer some observations about the use of alternative fuels in Avista's IRP.

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<sup>&</sup>lt;sup>35</sup> See UTC Docket UG-220242, Sierra Club Comments on Puget Sound Energy Final 2023 Gas IRP, at 4-7 (June 5, 2023); Staff Comments on 2023 Cascade IRP, at 12-15.

<sup>&</sup>lt;sup>36</sup> IRP at 7-3.

<sup>&</sup>lt;sup>37</sup> WAC § 480-90-238(2)(b) requires an IRP's lowest reasonable cost analysis to address "the risks imposed on ratepayers, ... public policies regarding resource preference adopted by Washington state or the federal government," and "the cost of risks associated with environmental effects including emissions of carbon dioxide," among others.

<sup>&</sup>lt;sup>38</sup> IRP at 6-25, 6-28, 7-10, 7-12.

<sup>&</sup>lt;sup>39</sup> See, e.g., UTC Docket U-210553, Comments of Sierra Club (July 31, 2023); UTC Docket UE-220242, Staff Comments on Puget Sound Energy's 2023 Gas Integrated Resource Plan, at 17-20 (June 5, 2023);

First, hydrogen does not appear to be selected in any portfolio or scenario. Avista acknowledges several "drawbacks to hydrogen" including "needing 3 times the volume to provide the same energy as natural gas," a "maximum blend rate in pipelines assumed at 20%," which "can reduce current pipeline capacity," the potential to "impact functionality of appliances and end uses," and hydrogen's "high cost." Because Avista acknowledges these drawbacks and sees no role for hydrogen blending in its resource portfolios or decarbonization strategies, any future proposals to develop hydrogen blending demonstration or pilot projects should be viewed with extreme skepticism.

Second, it is surprising that Avista uses synthetic methane in its Washington preferred portfolio. Avista acknowledges that "[t]he potential size of this resource is limited to the quantity of hydrogen available, a carbon source, and cost." That is, the availability and price of green hydrogen is a limiting factor in Avista's ability to use synthetic methane. But despite recognizing the insurmountable barriers to hydrogen becoming available for use in the building sector as discussed above, Avista projects that synthetic methane will be available to play a role in its decarbonization strategy. This wishful thinking is refuted by Avista's own analysis, and by other analyses documenting additional risks and barriers. 42 We urge the Commission to reject it.

#### C. Avista overstates the cost of building electrification.

Avista's preferred portfolio does not select any building electrification, contrary to the State Energy Strategy's finding that electrification is the lowest-cost, lowest-risk approach to decarbonizing Washington's buildings. As electrification achieves greater penetration and moves down the cost curve, more and more expert analyses are finding it to be the winning strategy for building decarbonization, often by a wide margin. For example, a recent report found that it would cost one utility's ratepayers more than 5 times as much per ton of avoided emissions to decarbonize using alternative fuels than to decarbonize by investing in electrification. These findings strongly suggest that Avista's failure to select any electrification arises from unreasonable modeling approaches or unreasonable assumptions about electrification's costs.

see also Oregon Public Utility Commission Docket No. LC 79, Opening Comments of Green Energy Institute at Lewis & Clark Law School, Climate Solutions, Columbia Riverkeeper, Community Energy Project, Electrify Now, Metro Climate Action Team, Natural Resources Defense Council and Sierra Club, at 19-34, 39-44 (Dec. 30, 2022) [hereinafter "NWN IRP Comments"], <a href="https://edocs.puc.state.or.us/efdocs/HAC/lc79hac14421.pdf">https://edocs.puc.state.or.us/efdocs/HAC/lc79hac14421.pdf</a>; California PUC Docket A.22-09-006, Sierra Club Protest to Application of Southern California Gas Company, San Diego Gas & Electric Company, and Southwest Gas Corporation to Establish Hydrogen Blending Demonstration Pilots (Oct. 12, 2022), <a href="https://docs.cpuc.ca.gov/PublishedDocs/Efile/G000/M497/K621/497621760.PDF">https://docs.cpuc.ca.gov/PublishedDocs/Efile/G000/M497/K621/497621760.PDF</a>.

<sup>&</sup>lt;sup>40</sup> IRP at 4-23 to 4-24.

<sup>&</sup>lt;sup>41</sup> IRP at 4-25.

<sup>&</sup>lt;sup>42</sup> See NWN IRP Comments, at 22-34 (Dec. 30, 2022).

<sup>&</sup>lt;sup>43</sup> See sources cited in footnotes 63-65 below.

<sup>&</sup>lt;sup>44</sup> Meera Fickling et al., *A Path to Pollution-Free Buildings: Meeting Xcel's 2030 Gas Decarbonization Goals*, at 12, Western Resource Advocates, Southwest Energy Efficiency Project, and Natural Resources Defense Council (with cost analysis from Synapse Energy Economics, Inc.) (July 2023), <a href="https://westernresourceadvocates.org/publications/a-path-to-pollution-free-building/">https://westernresourceadvocates.org/publications/a-path-to-pollution-free-building/</a>.

The IRP includes an extremely unclear and disjointed explanation of how electrification costs were estimated and how electrification was incorporated into resource selection. 45 This explanation lacks a basic overview of the resources, costs, or scenarios being analyzed, <sup>46</sup> fails to define key terms or identify key assumptions, features several charts with inadequate explanation and labels, and includes a summary of the five steps in the analysis after describing four out of those five steps. 47 It appears that Avista includes the total costs of electrification retrofits, or "conversion costs" in its levelized cost estimates. 48 These conversion costs are summarized in a table that appears to include the costs of installing gas-fired equipment, rather than electric equipment, which is labeled "Retrofit cost of Gas Equipment and Appliances for an Existing Gas Baseline House."<sup>49</sup> Avista assumes these costs are amortized over 5 years at the Company's rate of return, rather than paid upfront by building owners (or by Avista, to the extent it would be offering electrification incentives). <sup>50</sup> There does not appear to be any discussion of the reasoning behind this amortized retrofit cost arrangement. Avista also appears to assume all electrification projects are retrofits, rather than all-electric new construction. Finally, Avista appears to include the cost of meeting electrified customers' incremental electric load in its levelized electrification cost estimates. 51 Avista's increasing assumed electric rates appear to include the costs of decarbonizing electricity production and the costs of new transmission and distribution projects, but they do not appear to account for downward rate pressure from additional load resulting from electrification.

Although it is difficult to discern much of the reasoning behind Avista's analysis of electrification costs, it appears to unreasonably inflate those costs in several places. First, Avista bases its estimates on total costs, rather than the incremental costs that would be borne by ratepayers. Avista's assumed conversion costs include the full cost of an electrification retrofit, but the maximum cost borne by ratepayers would typically be only any incremental costs of electrification above the costs of replacing existing gas equipment upon burnout (less any electrification incentives available through programs like the Inflation Reduction Act). This is because Avista-provided electrification incentives would likely only cover these incremental costs. Second and perhaps most egregious, Avista has given no justification for amortizing behind-the-meter investments in customer-owned equipment and retrofit costs. This significantly increases total costs compared to expensing any Avista-provided incentives (which is the normal cost recovery mechanism for incentives). Third, by using the same retrofit-based cost estimate for all electrification projects, Avista effectively assumes that homes will be built mixed-fuel and later retrofitted, when it would be significantly more cost-effective to incentivize building all-

<sup>45</sup> IRP at 3-14 to 3-21.

<sup>&</sup>lt;sup>46</sup> IRP at 3-14 to 3-15. The section gives some background on electrification policies in Washington and Oregon and the difficulties of estimating electrification costs, before launching right in with "[t]o begin the analysis the customer type, class and major end use must be separated." It then describes three categories of end use that do not appear to be used in the subsequent analysis.

<sup>&</sup>lt;sup>47</sup> IRP at 3-19.

<sup>&</sup>lt;sup>48</sup> IRP at 3-16 to 3-17, 3-19.

<sup>&</sup>lt;sup>49</sup> IRP at 3-17 (emphasis added). The table includes costs associated with a "96 AFUE GF [presumably gas furnace]," a "16 SEER AC," a "Tankless condensing 0.93 UEF WH [presumably water heater]," a "Gas Range," and a "Gas Dryer."

<sup>&</sup>lt;sup>50</sup> IRP at 3-17.

<sup>&</sup>lt;sup>51</sup> IRP at 3-18.

<sup>&</sup>lt;sup>52</sup> IRP at 3-16 ("Avista considered the generic cost 'total to a remodeler."").

electric from the outset.<sup>53</sup> These are just a few of the most readily-identified issues with Avista's electrification cost estimate. There are likely many more, such as Avista's apparent reliance on gas equipment costs for its conversion costs,<sup>54</sup> but these are harder to identify, understand, and correct with the available information.

Avista's electrification scenarios assume a 2% annual decrease in Washington customers, which Avista suggests is intended to model the impacts of Washington climate policies favoring electrification in new construction. <sup>55</sup> Even though this electrification of new construction would result from state policy and market forces, rather than any expenditure by Avista, the Company includes the retrofit-based conversion costs described above in its cost estimates for these scenarios. <sup>56</sup> Instead, Avista should have simply incorporated the expected reductions in new gas customers into its customer growth forecasts, without including its conversion cost estimates in the resource selection process. This is the approach taken by Puget Sound Energy in its 2023 gas IRP.

Even under Avista's deeply flawed analysis, the bill impact on residential, commercial, and industrial customers appears to be significantly lower under all electrification scenarios than under the preferred portfolio, and this is true throughout the analysis period.<sup>57</sup> And if key errors

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<sup>&</sup>lt;sup>53</sup> See, e.g., Mohammad Hassan Fathollahzadeh et al., The Economics of Electrifying Buildings: Residential New Construction, at 10-12, RMI (2022) (finding that an all-electric new home built in Seattle saves nearly \$2,000 in upfront costs, \$41 in annual operating costs, and over \$2,300 in 15-year net present costs, compared to a new mixedfuel home), https://rmi.org/insight/the-economics-of-electrifying-buildings-residential-new-construction/. <sup>54</sup> While it is impossible to comment on Avista's assumed equipment costs given this apparent error, it is important for Avista's updated or corrected analysis to apply reasonable assumptions about electric equipment costs and performance. Avista's vague description of the equipment assumed in its analysis reads: "Efficiency is considered as a generic value across equipment and does not represent ultra-high efficiency units or old lower-efficiency units." IRP at 3-16. Based on Figure 3.4 at page 3-15, Avista assumes electric space heating equipment with a coefficient of performance ("COP") of 2.5 at 50°F, which steps down to around COP 1 below 20°F. This performance can be significantly exceeded by modern heat pumps, and especially cold climate heat pumps, many of which can operate at a COP of 2 at temperatures as low as 5°F. These cold climate heat pumps are more representative of the performance that will be increasingly available to Avista customers over the IRP study period than Avista's assumed "generic value" units. See Testimony of Ed Burgess on Behalf of NW Energy Coalition, Front and Centered, and Sierra Club, Exh. EAB-1T, UTC Docket UE-220066, at 24 (July 28, 2022) (citing NE Energy Efficiency Partnerships, NEEP's Cold Air Climate Heat Source, Heat Pump List, https://ashp.neep.org/#!/product\_list/; K. Purdy, How to Find the Best Cold Climate Heat Pump, Climate Switch, https://carbonswitch.com/best-cold-climateheat-pump/); see also Trane Technologies Surpasses U.S. Dep't of Energy Requirements for High-Efficiency, Cold Climate Heat Pump, Business Wire, (Nov. 3, 2022) (reporting new model testing indicating that heat pumps can perform at -23F), https://www.businesswire.com/news/home/20221103005955/en/Trane-Technologies-Surpasses-U.S.-Department-of-Energy-Requirements-for-High-Efficiency-Cold-Climate-Heat-Pump; U.S. Dep't of Energy, Residential Cold Climate Heat Pump Challenge, Off. of Energy Efficiency & Renewable Energy, https://www.energy.gov/eere/buildings/residential-cold-climate-heat-pump-challenge (noting that major manufacturers are partnering with DOE on the Cold Climate Heat Pump Challenge to make electric heat pumps more effective, cheaper, more widely adopted, and grid interactive).

<sup>&</sup>lt;sup>55</sup> IRP at 2-3, 3-14, 7-5.

<sup>&</sup>lt;sup>56</sup> IRP at 7-18.

<sup>&</sup>lt;sup>57</sup> IRP at 7-19 (showing residential ratepayer impacts of \$7.03/Dth in 2025, \$6.89/Dth in 2035, and \$9.80/Dth in 2045 under the electrification scenarios, compared to \$7.31/Dth, \$7.64/Dth, and \$14.39/Dth in those years under the preferred portfolio/PRS). The rate benefits of the electrification scenario are even greater compared to the PRS – Allowance Price Ceiling scenario, which is the most appropriate comparison as discussed in Section III.A above. The electrification scenarios show similar rate benefits compared to the preferred portfolio for commercial and residential customers. IRP at 7-20.

in Avista's analysis are corrected, the electrification scenario appears to have a total annual levelized cost that is similar to or lower than that of Avista's preferred portfolio.

Figure 7.14 shows an annual levelized cost of somewhat more than \$400 million for the preferred portfolio with allowance prices at the ceiling (which is the appropriate price to assume for an allowance-dependent compliance strategy, as discussed in Section III.A above). 58 The annual levelized cost of the electrification scenario with expected conversion costs is \$522 million, of which conversion costs make up \$82 million.<sup>59</sup> If we remove these conversion costs (which should only apply to Avista-funded retrofits and not policy-driven all-electric construction), the electrification scenario's annual levelized costs are \$440 million, which are similar to those under the preferred portfolio with realistic allowance costs. There are good reasons to also exclude the \$134 million in annual electricity costs, since these represent the costs of serving new customers that build all-electric for reasons that have nothing to do with Avista's gas system resource selection—indeed, many of these customers will be served by other electric utilities and will never interact with Avista at all. If these costs are also removed, the electrification scenario's annual costs are \$306 million, well below the costs of its preferred portfolio. <sup>60</sup> Moreover, Avista's preferred portfolio relies on unrealistic assumptions about the cost and availability of alternative fuels (particularly synthetic methane in Washington), and correcting these would likely increase the cost of that portfolio even further.

**Recommendations:** We recommend that the Commission direct Avista to re-file an IRP that corrects the errors affecting Avista's choice of CCA compliance strategy. <sup>61</sup> In particular, the updated analysis should assume that allowance prices reach the ceiling in portfolios that rely on allowances to meet the majority of Avista's compliance obligations, and it should avoid selecting a preferred portfolio that runs directly counter to the CCA's emissions cap by failing to invest in actual emission reductions. Any portfolio where actual emissions exceed Avista's expected prorata share of the CCA emissions cap should be viewed with extreme skepticism. The updated analysis should also expressly address stranded asset risks in any portfolios that continue to build out Avista's gas system. <sup>62</sup> It should fully acknowledge the risks and potentially astronomical costs of alternative fuels, and explain any decision to incorporate these fuels into a preferred portfolio despite these risks. It should provide a much clearer explanation of how electrification and its costs are modeled, including the assumed unit costs (which should be incremental to new gas equipment, rather than total costs) and all assumptions regarding electric equipment

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<sup>&</sup>lt;sup>58</sup> IRP at 7-19.

<sup>&</sup>lt;sup>59</sup> IRP at 7-6.

<sup>&</sup>lt;sup>60</sup> Of course, the corrected electrification scenario cost does not account for any actual investment in electrification on Avista's part, since all electrification is driven by policies and economics rather than Avista's resource selection. Nevertheless, this shows how quickly correcting errors in Avista's analysis can change the outcome of its portfolio selection. Comparing the electrification scenario to the preferred portfolio also indicates the level of stranded assets and unnecessary expenditures on gas infrastructure, pipeline contracts, fuel costs, and allowance costs entailed in the preferred portfolio, since these costs would be avoided if the new gas customers assumed under that scenario were never added. These unnecessary costs equal the roughly \$100 million annual difference between the corrected electrification scenario cost (roughly \$306 million per year) and the corrected preferred portfolio cost (over \$400 million per year).

<sup>&</sup>lt;sup>61</sup> Although this is a serious remedy, we believe it is appropriate for reasons discussed in Section V below. <sup>62</sup> This analysis should include a qualitative discussion at the very least, and it should be quantitative if possible (e.g., by identifying the costs of gas infrastructure that would serve load above the projected percentage of remaining gas load in a given year under the State Energy Strategy's electrification scenario).

specifications. These assumptions should reflect the range of models that can be expected to be available over the planning period. Avista's updated analysis should also disaggregate any costs of electrifying existing customers vs. new customers, and should only include electrification costs in the portfolio analysis where the electrification is a result of action by Avista (as opposed to state policies or exogenous market forces). Avista should not assume any costs of behind-themeter electrification equipment are amortized unless it presents a clear proposal for a program to finance these equipment upgrades and an analysis of why this will have a lower total cost for ratepayers than simply providing upfront incentives and expensing them (e.g., an NPA analysis).

## IV. Avista's hostility to DSM and building decarbonization measures warrants an independent evaluation of its DSM and electrification strategies.

Throughout its IRP, Avista has displayed a level of hostility to building electrification and other DSM measures that raises serious concerns about whether it can objectively evaluate these strategies' role in meeting the Company's CCA obligations and meeting customer needs at the lowest reasonable cost. Washington's 2021 State Energy Strategy found that electrification is the lowest-cost, lowest-risk pathway to decarbonizing the vast majority of the state's buildings. This finding has been reinforced by the State's 2023 Biennial Energy Report, which finds that decarbonizing the building sector requires Washington to "[m]aximize energy efficiency" and "[m]aximize electrification," and by a growing number of expert analyses. In light of Avista's CCA and GRC settlement obligations, and the value it claims to place on decarbonization, we would expect it to advance a decarbonization plan that generally aligns with the State Energy Strategy by emphasizing electrification and efficiency. Instead, Avista has repeatedly resisted these strategies throughout its IRP and beyond.

Sections II and III above describe some of the ways Avista has given short shrift to electrification in its analysis, despite GRC settlement obligations to incorporate electrification into its decarbonization plan and numerous requests from commenters (including UTC Staff) to explore electrification opportunities and the changing policy landscape. But these are just the tip of the iceberg. Throughout the IRP, Avista has gone out of its way to highlight potential

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<sup>&</sup>lt;sup>63</sup> Washington State Department of Commerce, *Washington 2021 State Energy Strategy* at 15, 46, 66 (Dec. 2020), <a href="https://www.commerce.wa.gov/wp-content/uploads/2020/12/Washington-2021-State-Energy-Strategy-December-2020.pdf">https://www.commerce.wa.gov/wp-content/uploads/2020/12/Washington-2021-State-Energy-Strategy-December-2020.pdf</a> (finding that "[d]ecarbonizing the building sector requires the state to … maximize electrification," which is the least-cost way to achieve decarbonization goals).

<sup>&</sup>lt;sup>64</sup> Washington State Department of Commerce, *2023 Biennial Energy Report* at 46 (March 2023), <a href="https://deptofcommerce.app.box.com/s/uohdamh5qd1fwal543x78elme2w0pr0h">https://deptofcommerce.app.box.com/s/uohdamh5qd1fwal543x78elme2w0pr0h</a>.

<sup>65</sup> See, e.g., Charles Li et al., Financial Impact of Fuel Conversion on Consumer Owned Utilities and Customers in Washington, E3 (May 2022), https://www.commerce.wa.gov/wp-content/uploads/2022/06/WA-COU-Building-Electrification-Final-Report.pdf; Poppy Storm et al., Operation 2030: Scaling Building Decarbonization in Washington State, Clean Energy Transition Institute & 2050 Institute (Jan. 2022), https://uploads-ssl.webflow.com/5d8aa5c4ff027473b00c1516/61d7a479ba34328152be6239 CETI-2050%20Institute%20Operation%202030%20White%20Paper 2022-01-05.pdf; Jonny Kocher & Talor Gruenwald, Washington State Could Lead the Nation on Building Electrification Codes, RMI (Jan. 2022), https://rmi.org/washington-state-could-lead-the-nation-on-building-electrification-codes/; Rewiring America, Bringing Infrastructure Home: A 50-State Report on U.S. Home Electrification at 108 (June 2021), https://www.rewiringamerica.org/policy/bringing-infrastructure-home-report.

drawbacks to electrification and assert, without support, that gas is superior. <sup>66</sup> In customer surveys and stakeholder polling questions, Avista has consistently used lopsided framing that can be expected to make electrification appear less attractive than alternatives. <sup>67</sup> Outside of this IRP, Avista has brought multiple lawsuits to fight critical state climate policies, and sought to fund this litigation with ratepayer dollars. <sup>68</sup>

Cumulatively, these actions demonstrate a hostility to electrification that raises serious doubt about whether Avista can objectively evaluate opportunities to pursue electrification. Any effective remedy would require an independent perspective on these opportunities.

Recommendation: We recommend that the Commission require Avista, in consultation with its technical advisory group and relevant stakeholders, to engage an independent third party to propose, develop, and ideally implement a strategy focused on these opportunities. For example, the Commission could require Avista to issue an open Request for Proposals for a third party to develop an electrification program aimed at meeting Avista's CCA compliance obligations. This program proposal should focus on complete electrification of new and/or existing buildings. A similar proposal should be developed for at least one additional DSM program that would also be focused on Avista's CCA compliance obligations. Collectively, the electrification and DSM programs should satisfy a meaningful portion of Avista's compliance obligations (for example, 5% of required emission reductions by 2025, or 10% of required emission reductions by 2027).

#### V. Conclusion and Recommendations

For the reasons described above, we recommend that the Commission decline to acknowledge Avista's IRP, direct Avista to significantly reduce its reliance on CCA allowances, and incorporate a more transparent, realistic analysis of electrification into future filings that

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<sup>&</sup>lt;sup>66</sup> See, e.g., IRP at 3-14 (gratuitously stating that "customers may find extrinsic value in natural gas for resilience benefits and its superior performance compared to electric options").

<sup>&</sup>lt;sup>67</sup> For example, in a poll question presented to Technical Advisory Committee participants, the listed options for lessening greenhouse gas emissions included "*Invest* in renewable or synthetic gas," compared to "*Use ratepayer funds*" or "*Use taxpayer funds*" to "*subsidize* building electrification" (emphases added). IRP at 1-7. There is no reasonable basis for using different framing ("invest" vs. "use ratepayer funds to subsidize") for two options that both involve spending ratepayer funds on decarbonization and compliance measures. Moreover, electrification was the only decarbonization strategy that was split across multiple options, which can be expected to reduce the number of respondents selecting either option. Similarly, a customer survey focused on clean energy options frames electrification as "eliminating natural gas as an option in my home," primes respondents to raise concerns about non-gas cooking (but not concerns about health and indoor air quality risks associated with gas use), and describes mechanisms for encouraging electrification in draconian terms like "regulated by state mandate." IRP at 5-17; MDC Research, *Avista IRP Clean Energy Research*, at 32-33 (Apr. 2022), <a href="https://www.myavista.com/-/media/myavista/content-documents/about-us/our-company/irp-documents/natural-gas-irp-documents/avista-irp-clean-energy-research-tac.pdf.">https://www.myavista.com/-/media/myavista/content-documents/about-us/our-company/irp-documents/natural-gas-irp-documents/avista-irp-clean-energy-research-tac.pdf.</a>

<sup>&</sup>lt;sup>68</sup> Erick Bengel, *Avista Seeks to Charge Ratepayers for Litigation Challenging Ambitious Climate Plan*, Rogue Valley Times (July 7, 2023), <a href="https://www.rv-times.com/localstate/avista-seeks-to-charge-ratepayers-for-litigation-challenging-ambitious-climate-plan/article">https://www.rv-times.com/localstate/avista-seeks-to-charge-ratepayers-for-litigation-challenging-ambitious-climate-plan/article</a> <a href="https://docs.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.ncbi.nlm.nc

https://edocs.puc.state.or.us/efdocs/HTB/ug461htb15927.pdf; Rivera v. SBCC, E.D. Wa. 1:23-cv-03070, Complaint for Declaratory and Injunctive Relief (listing Avista as a plaintiff in a lawsuit against Washington's climate-friendly building codes) (May 22, 2023), http://climatecasechart.com/wp-content/uploads/sites/16/case-documents/2023/20230522 docket-123-cv-03070 complaint.pdf

complies with applicable Commission rules and Avista's 2022 GRC settlement commitments, including in a refiled 2023 IRP if the Commission finds this to be appropriate.

We recognize that nonacknowledgement and an order to refile are not to be taken lightly, and should be accompanied by clear direction from the Commission on the changes that will enable future IRP filings to be acknowledged. Under other circumstances, it may be sufficient to direct Avista to correct the issues with its IRP in future filings. However, we believe this would be insufficient here, for several reasons. First, Avista has repeatedly failed to update its analysis to account for climate policies across multiple IRPs, despite requests to do so from Staff and commenters. Second, Avista has not met its GRC settlement obligations to seriously evaluate electrification. Third, this is Avista's first gas IRP filing since the CCA was enacted, and it is critical to provide clear direction for implementing the CCA and filing compliant IRPs, especially in light of Washington's fast-approaching decarbonization deadlines. Finally, correcting Avista's approach to CCA compliance as soon as possible will minimize the risk that it will procure stranded assets or unnecessarily spend ratepayer funds on allowances or risky alternative fuels.

Ultimately, Avista's IRP does not represent a meaningful effort to reduce its emissions in compliance with the CCA, or to advance a decarbonization plan that meets Avista's obligations under the GRC settlement (especially the obligation to set targets for the ratio of new gas customers to new electric customers). Avista's preferred portfolio advances a risky, allowance-dependent compliance strategy that if acknowledged would set Avista on a dangerous course that diverges from the CCA's decarbonization requirements and overall emissions cap. This strategy does not satisfy the Commission's lowest reasonable cost standard, <sup>69</sup> because Avista does not adequately consider the fundamental compliance risks and stranded asset risks that the strategy imposes on ratepayers, or the opportunities to comply with the CCA and meet customer needs at lower cost and lower risk by supporting electrification.

In summary, Sierra Club's specific recommendations for the Commission and for Avista include:

- Decline to acknowledge Avista's 2023 IRP.
- Direct Avista to overhaul its capital forecast and decarbonization strategy to better incorporate electrification, consistent with the finding that it is a lower-cost, lower-risk CCA compliance strategy than overreliance on allowances.
- Update customer growth forecasts to explicitly account for all significant enacted and proposed building decarbonization policies.
- In scenarios that include reduced gas customer counts to reflect policies and market trends, do not include electrification-related costs in the scenario costs except where Avista proposes to make investments that support electrification.
- Direct Avista to re-file a gas system decarbonization plan that includes decreasing annual targets for the ratio of new gas customers relative to new electric customers, as well as concrete steps for achieving those targets.

<sup>&</sup>lt;sup>69</sup> WAC § 480-90-238(2)(a)-(b), 3(g).

- Direct Avista to update its targets for the ratio of new gas and electric customers in each subsequent IRP, such that the targets align with and meaningfully advance progress toward Avista's CCA obligations.
- Direct Avista to specifically address the role of DSM measures in its CCA compliance strategy, including specific electrification measures for both new and existing customers.
- Direct Avista to include project-specific NPA analysis for all capacity expansion projects and groups of geographically-related projects over \$500,000 in its future IRPs. The analysis should include the elements and explanations described in Section II of these comments.
- Direct Avista to file documentation of its consultation with advisory groups and interested parties on how DSM and electrification programs may be best used as NPAs no later than its 2025 IRP.
- Appropriately account for volatility and increases in gas and alternative fuel prices.
- Assume that allowance prices reach the ceiling in portfolios that rely on allowances to meet the majority of Avista's CCA compliance obligations.
- Avoid selecting a preferred portfolio that runs directly counter to the CCA's emissions cap by failing to invest in actual emission reductions.
- Expressly address stranded asset risks in any portfolios that continue to build out Avista's gas system.
- Fully acknowledge the risks and costs of alternative fuels, and explain any decision to incorporate these fuels into a preferred portfolio despite these risks.
- Provide a much clearer explanation of how electrification and its costs are modeled.
  Fully document and explain all inputs, assumptions, and analytical methods that are
  used to estimate electrification measure costs. These should include assumed unit
  costs (which should be incremental to new gas equipment, rather than total costs) and
  all assumptions regarding electric equipment specifications.
- Disaggregate any costs of electrifying existing customers vs. new customers.
- Do not assume any costs of behind-the-meter electrification equipment are amortized unless Avista presents a clear proposal for a program to finance these equipment upgrades and an analysis of why this will reduce the total cost for ratepayers.
- Require Avista, in consultation with its technical advisory group and relevant stakeholders, to engage an independent third party to propose, develop, and ideally implement a strategy focused on opportunities to meet CCA requirements through electrification and DSM. Collectively, these proposed programs should satisfy a meaningful portion of Avista's CCA compliance obligations.

Thank you for considering these comments.

Sincerely,

Jim Dennison Associate Attorney Sierra Club jim.dennison@sierraclub.org