Exh. JDW-1TC Dockets UE-240006/UG-240007 Witness: John D. Wilson REDACTED VERSION

BEFORE THE WASHINGTON UTILITIES AND TRANSPORTATION COMMISSION

WASHINGTON UTILITIES AND TRANSPORTATION COMMISSION,

Complainant,

v.

AVISTA CORPORATION,

Respondent

DOCKETS UE-240006 & UG-240007 (Consolidated)

TESTIMONY OF

JOHN D. WILSON

ON BEHALF OF STAFF OF WASHINGTON UTILITIES AND TRANSPORTATION COMMISSION

Power Costs; Portfolio Forecast Error; Energy Recovery Mechanism

July 3, 2024

CONFIDENTIAL PER PROTECTIVE ORDER

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LIST OF EXHIBITS

Exh. JDW-2	CV John Wilson
Exh. JDW-3C	Avista's Response to Public Counsel Data Request No. 268, Confidential
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Exh. JDW-4	Avista's Response to Staff Data Request No. 192
Exh. JDW-5	Avista's Response to Staff Data Request No. 120
Exh. JDW-6	Avista's Response to Staff Data Request No. 213
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Exh. JDW-9C	Avista's Response to Staff Data Request No. 118, Confidential Attachment A
Exh. JDW-10	Avista's Response to Staff Data Request No. 208 (Supplemental) and
	Attachments
Exh. JDW-11	Avista's Response to Staff Data Request No. 171 (Supplemental)
Exh. JDW-12	Testimony of Ramon J. Mitchell, Exh. RJM-3CT, Docket UE-230172
	(Oct. 2023)
Exh. JDW-13	Avista's Response to Staff Data Request No. 222
Exh. JDW-14	Avista's Response to Staff Data Request No. 174
Exh. JDW-15	Avista's Response to Staff Data Request No. 183 (Supplemental)
Exh. JDW-16	Avista's Response to Staff Data Request No. 175(C) (Second Supplemental)
Exh. JDW-17	Avista's Response to Staff Data Request No. 184 (Supplemental)
Exh. JDW-18	Avista's Response to Staff Data Request No. 219
Exh. JDW-19	Avista's Response to AWEC Data Request No. 53, Attachment B
Exh. JDW-20C	Avista's Response to Staff Data Request No. 176(C) (Supplemental) and
	Attachment A
Exh. JDW-21	Avista's Response to Staff Data Request No. 186
Exh. JDW-22C	Avista's Response to Staff Data Request No. 189
Exh. JDW-23	Avista Witness Kalich's "Rattlesnake Flat" workpaper

1		I. INTRODUCTION
2		
3	Q.	Please state your name, occupation, and business address.
4	A.	My name is John D. Wilson. I am Vice President at Grid Strategies, LLC. Grid
5		Strategies is based in the Washington, DC area, although my office is in Lexington,
6		KY.
7		
8	Q.	Please state your qualifications to provide testimony in this proceeding.
9	A.	I received a BA degree from Rice University in 1990, with majors in physics and
10		history, and a Master of Public Policy degree from the Harvard Kennedy School of
11		Government, with an emphasis in energy and environmental policy, and economic
12		and analytic methods.
13		Since 2019, I have been a consultant, first, at Resource Insight, Inc., and now
14		at Grid Strategies, LLC. Previously, I was deputy director of regulatory policy at the
15		Southern Alliance for Clean Energy (SACE) for more than twelve years, where I was
16		the senior staff member responsible for SACE's utility regulatory research and
17		advocacy, as well as energy resource analysis. I engaged with southeastern utilities
18		through regulatory proceedings, formal workgroups, informal consultations, and
19		research-driven advocacy.
20		My work has considered, among other things, the cost-effectiveness of
21		prospective new electric generation plants and transmission lines, retrospective
22		review of generation-planning decisions, conservation program design, ratemaking
23		and cost recovery for utility efficiency programs, allocation of costs of service

1		between rate classes and jurisdictions, design of retail rates, and performance-based
2		ratemaking for electric utilities.
3		My professional qualifications are further summarized in Exhibit JDW-2.
4		
5	Q.	Have you testified previously before the Washington Utilities and
6		Transportation Commission (the Commission)?
7	A.	Yes. I testified concerning power costs on behalf of Commission Staff (Staff) in
8		PacifiCorp's 2023 general rate case, Docket UE-230172 and PacifiCorp's 2022
9		power cost adjustment mechanism annual report, Docket UE-230482.
10		
11	Q.	Have you testified before other commissions?
12	A.	Yes. I have testified more than 50 times before utility regulators in nine U.S. states
13		and Nova Scotia, and I have appeared numerous additional times before various
14		regulatory and legislative bodies.
15		
16	Q.	What is the purpose of your testimony in this proceeding?
17	A.	I am presenting my review of Avista's net power expense (NPE) forecast for rate
18		years 2025 and 2026, as presented in the testimony of Clint G. Kalich in Exhibit
19		CGK-1T, and Avista's proposals to (a) include a NPE adjustment of \$65.8 million to
20		address anticipated forecast error and (b) revise the Energy Recovery Mechanism
21		(ERM) by eliminating the deadbands and using a 95% pass-through of cost variance
22		from authorized levels to customers, as presented in the testimony of Scott J. Kinney
23		in Exhibit SJK-1T.

1	Q.	Have y	ou prepared ex	chibits in support of your testimony?
2	A.	Yes. I s	ponsor Exh. JD'	W-2 through Exh. JDW-23:
3		•	Exh. JDW-2 C	CV John Wilson
4 5 6		•	Exh. JDW-3C A Confidential Atta	Avista's Response to Public Counsel Data Request No. 268, achment A
7		•	Exh. JDW-4	Avista's Response to Staff Data Request No. 192
8		•	Exh. JDW-5 A	Avista's Response to Staff Data Request No. 120
9		•	Exh. JDW-6	Avista's Response to Staff Data Request No. 213
10		•	Exh. JDW-7 A	Avista's Response to Staff Data Request No. 32
11		•	Exh. JDW-8 A	Avista's Response to Staff Data Request No. 119
12 13 14		•	Exh. JDW-9C A Attachment A	Avista's Response to Staff Data Request No. 118, Confidential
15 16 17		•	Exh. JDW-10 A and Attachments	Avista's Response to Staff Data Request No. 208 (Supplemental)
18		•	Exh. JDW-11 A	Avista's Response to Staff Data Request No. 171 (Supplemental)
19 20 21		•	Exh. JDW-12 7 UE-230172 (Oct	Festimony of Ramon J. Mitchell, Exh. RJM-3CT, Docket t. 2023)
22		•	Exh. JDW-13 A	Avista's Response to Staff Data Request No. 222
23		•	Exh. JDW-14 A	Avista's Response to Staff Data Request No. 174
24		•	Exh. JDW-15 A	Avista's Response to Staff Data Request No. 183 (Supplemental)
25 26 27		•	Exh. JDW-16 A Supplemental)	Avista's Response to Staff Data Request No. 175(C) (Second
28		•	Exh. JDW-17 A	Avista's Response to Staff Data Request No. 184 (Supplemental)
29		•	Exh. JDW-18 A	Avista's Response to Staff Data Request No. 219
30 31 32		•	Exh. JDW-19 A Attachment B	Avista's Response to AWEC Data Request No. 53,
33 34 35		•	Exh. JDW-20C Supplemental an	Avista's Response to Staff Data Request No. 176(C) ad Attachment A
36		•	Exh. JDW-21	Avista's Response to Staff Data Request No. 186

1		• Exh. JDW-22CAvista's Response to Staff Data Request No. 189
2		• Exh. JDW-23 Avista Witness Kalich's "Rattlesnake Flats" workpaper
3		
4		The information contained in these exhibits is correct to the best of my knowledge
5		and belief.
6		
7		II. RECOMMENDATIONS AND SUMMARY
8		
9	Q.	Please summarize your testimony.
10	A.	I address four issues. First, I provide Staff's position on Avista's proposed forecast
11		error adjustment. Specifically, I conclude that Avista's proposed portfolio forecast
12		error is not justified and should be rejected.
13		Second, I provide Staff's position on Avista's proposal to exclude carbon
14		allowance costs from its dispatch decisions. I find that Avista's proposal is
15		inconsistent with the intentions of the Department of Ecology. To maximize
16		compliance with the intent of the CCA, Avista should be directed to include carbon
17		allowance costs in dispatch decisions. I also find that the annual ERM proceeding is
18		the most reasonable proceeding in which to review the prudence of Avista's
19		implementation of CCA-related activities.
20		Third, I provide Staff's position on Avista's proposal for revisions to its
21		Energy Recovery Mechanism. With respect to Avista's proposal to eliminate the
22		deadbands, the Commission already considered similar arguments and strongly
23		endorsed retaining the deadband and sharing structure in its decision in PacifiCorp's
24		2023 general rate case (Docket UE-230172). Accordingly, as a matter of

1		Commission policy, the proposal to eliminate the deadbands should be disregarded.
2		In that same decision, however, the Commission did express openness to adjusting
3		the sharing percentages and the threshold between the deadband and sharing
4		percentages. I recommend simplifying the mechanism to use a \$3 million deadband
5		and a 90 percent customer/10 percent Company sharing formula.
6		Finally, I have reviewed Avista's net power cost filing, and I have found
7		several forecast errors, some of which are not acknowledged by Avista. I recommend
8		that the Commission accept my corrections to Avista's 2025 and 2026 forecast NPE.
9		
10	Q.	Please summarize your recommended changes to 2025 and 2026 forecast NPE.
11	A.	As discussed in Section VI, I have identified eight model errors, two of these errors
12		are output errors, five of these errors are input errors, and one is a model scope error.
13		I recommend that the Commission direct Avista to reduce NPE by \$232,506, to
14		reflect the net effect of the two model output errors. I also recommend that the
15		Commission direct Avista to update its model to address the five model input errors
16		discussed in Section VI and to include both non-energy WEIM and CCA allowance
17		costs in modeled dispatch costs as recommended in Section IV. The impact of the
18		update on NPE cannot be known until Avista completes further modeling. Staff will
19		request that further modeling through data requests after the non-company parties

1		III. PORTFOLIO FORECAST ERROR PROPOSAL
2		
3		A. Overview of Avista's Portfolio Forecast Error Proposal
4		
5	Q.	Please summarize Avista's portfolio forecast error proposal.
6	A.	Avista proposes to include an adjustment to NPE of \$65.8 million to address the
7		persistence of the NPE forecast error, despite standardizing power supply modeling
8		methods. Avista argues that the adjustment (and its ERM proposal) is justified on the
9		basis of "the punitive nature of volatility and variability almost entirely outside
10		utility control." ¹
11		Avista's proposed adjustment is based on a five-year average of the
12		difference between an "emulated" NPE value, representing a forecast made in
13		September of the prior year, as compared to the actual value. Avista's "emulated"
14		NPE value includes the following components, using 2022 as an example:
15		• Cost to serve load: Calculated using monthly peak and off-peak loads from
16		the 2023 IRP and the corresponding monthly Mid-C futures price from
17		September 2021.
18		• Revenues from dispatchable thermal generation: Calculated as 100% dispatch
19		of thermal units in hours in which each unit's cost to operate (calculated
20		using the unit's annual O&M, heat rate, and monthly natural gas futures) is

¹ Kinney, Exh. SJK-1T at 66:5-6 and 66:12 mentioning "various drivers," which I interpret to reference the immediately preceding testimony.

1		lower than the corresponding monthly Mid-C futures price from September
2		2021.
3		• Revenues from Avista's other generation: Calculated using monthly peak and
4		off-peak generation forecasts from the 2023 IRP and the corresponding
5		monthly Mid-C futures price from September 2021.
6		The "Actual" NPE value is calculated in the same way, by substituting actual loads
7		and other generation for the 2023 IRP forecast and using daily, instead of monthly,
8		market prices and loads. ²
9		
10	Q.	What variability is represented in Avista's portfolio forecast error calculation?
11	A.	Avista's portfolio forecast error calculation accounts for exactly four sources of
12		variability, as follows, again using the example of the portfolio forecast error
13		calculation for 2022:
14		• The difference between forecast loads (2023 IRP) and actual loads;
15		• The difference between power market futures (as forecast in September
16		2021) and actual power market prices at Mid-C;
17		• The difference between gas futures (as forecast in September 2021) and
18		actual gas prices; and
19		• The difference between forecast generation from non-dispatchable or non-
20		thermal generation (2023 IRP) and actual generation from those same
21		sources.

² Kinney, Exh. SJK-1T at 67:7-17, accord JDW-3 (Avista's answer to PC DR No. 268C, Confidential Attachment A).

1	Q.	Is the portfolio forecast error calculated by Avista a forecast of power expenses?
2	A.	No. While it is common for Avista and other Washington-jurisdictional utilities to
3		use multi-year averages of actual costs to support a reasonable cost forecast, this is

not a forecast of power expenses. If actual 2025 NPE were to be \$65.8 million higher
than forecast 2025 NPE, those costs would be recovered through the ERM.

However, nor is the portfolio forecast error a forecast of the difference
between actual revenues and actual costs. If it were, then one could anticipate that
the ERM would become unnecessary. I do not think that Avista has confidence that
its portfolio forecast error will actually result in eliminating the need for the ERM.

A better description of Avista's \$65.8 million calculation is that it is a prepayment of a revenue requirement that Avista expects based on historical trends. The ERM is a cost sharing mechanism which allows companies to annually true up actual power supply costs with authorized baseline costs; the result is a difference in NPE from the forecast used to set rates. That difference is not, itself, an expense. It is rather the result of the difference between revenues and expenses that can result in either a credit or a charge to customers.

17

Of course, Avista characterizes the \$65.8 million calculation differently. In

18 response to a data request, Avista states:

19 ... the Company is highlighting <u>new risk</u> that is beyond our control. ...
20 It is simply a factor necessary to arrive at a normalized power supply
21 expense over time when we are valuing the thermal fleet hundreds of
22 millions of dollars higher in the case than the last one. Absent this
23 adjustment, there will be a chronic under-collection of costs at the same
24 time customers are receiving a windfall benefit from thermal plant
25 operation margins when compared to previous cases. Data presented in

1 2		our case illustrates how modeled customer value and risk has changed over time. ³
3		However, in the same response, Avista references annual differences between its
4		forecast and actual thermal fleet value of \$33 million lower, \$35 million higher, and
5		\$17 million lower in 2020, 2021, and 2022, respectively (the three most recent
6		complete years of data). ⁴ Avista's claim that this "new risk" will result in a "chronic
7		under-collection of costs" is contradicted by the 2021 actual data, which shows that
8		the thermal fleet value can drive over-collections as well.
9		Thus, Avista is proposing to include in its NPE forecast recovery of a
10		revenue requirement that does not yet exist. This is what I mean by "pre-payment" of
11		an anticipated revenue requirement. But in reality, this revenue requirement may
12		never occur and could even be a credit to customers. It is unreasonable for Avista to
13		propose a large new "cost" that could turn out to be either a credit or a charge to
14		customers – such a "cost" would be unprecedented.
15		
16		B. Drivers of NPE Variability
17		
18	Q.	What are the drivers of NPE variability that Avista is concerned about?
19	A.	Avista does not provide a single list, but I identified the following drivers that Avista
20		appears to believe are outside its control:

³ JDW-4 (Avista's Response to Staff DR No. 192, part (g)).
⁴ Kinney, Exh. SJK-1T at 70, Table 12.

1	• Volatile market conditions, including power and natural gas prices; ⁵
2 3	• Regional shift from resource sufficiency to resource neutral/deficit position, creating forward price premiums and less physical market liquidity; ⁶
4 5	• New carbon emission policy; ⁷
6	• Stream flows; ⁸
7	• Forced outages; and
8	• Retail loads. ⁹
9	If NPE vary from the forecast based on these drivers, then the resulting costs are
10	recovered through the ERM.
11	Avista witness Kalich points to two specific factors that he believes make it
12	more challenging for Avista than other Washington-jurisdictional utilities to manage
13	NPE. He points to a resource portfolio that is half hydro (with little cost reflected in
14	NPE), which leads to significant variation in the cost of natural gas depending on
15	stream flow. ¹⁰ He also discusses Avista's large surplus sales revenue, whose
16	realization depends on the "absolute and relative prices of natural gas and
17	electricity." ¹¹

⁵ Kinney, Exh. SJK-1T at 50:14, 55:14.
⁶ Kinney, Exh. SJK-1T at 50:19-25; Kalich, Exh. CGK-1T at 30:1-20.
⁷ Kinney, Exh. SJK-1T at 50:27-28, 56:9-22; Kalich, Exh. CGK-1T at 30:21-31:7.

⁸ Kalich, Exh. CGK-1T at 25:20-26:17.
⁹ Kinney, Exh. SJK-1T at 55:14-15.
¹⁰ Kalich, Exh. CGK-1T at 25:20-26:17.
¹¹ Kalich, Exh. CGK-1T at 26:19-28:25.

1 Q. Which NPE drivers does Avista control or have influence over?

- 2 A. While there are drivers of NPE that are outside Avista's control, it still has control or
- 3 strong influence over other NPC drivers, as summarized in Table 1.

4 Table 1: Drivers of NPE Variance, Considering Benefits of WEIM Participation

	Within Avista's Control		
Outside Avista's Control	Subject to Short-Term	Not Subject to Short-	
	Variation	Term Variation	
Load	Plant operating practices	Long-term PPAs	
Carbon emission policy	O&M cost	Long-term fuel supply	
Renewable resource	Hedging cost	agreements	
generation	Fuel procurement practices	Resource planning	
Market spot power prices	Bi-lateral transactions		
Unit dispatch	outside WEIM		
Wheeling rates	Dispatch of demand-side		
Qualifying facility contracts	resources		
Market fuel prices			

5	Thus, while I agree with Avista that it lacks control over some drivers of
6	NPE, several significant drivers are within its control, as Avista agrees. ¹² For the
7	most part, I believe that the classifications in Table 1 are fairly straightforward and
8	illustrate this division of responsibility.
9	Avista's witnesses give very little attention to their continuing responsibilities
10	to help minimize NPE costs to customers. I am particularly concerned with Avista's
11	approach in two areas. First, I will discuss Avista's portfolio error value calculation
12	in its hedging program. Second, in Section IV below, I will discuss the cost risk
13	associated with Washington's carbon emissions policy.

¹² JDW-4 (Avista's Response to Staff DR No. 192, parts (e) and (f)).

1

C. Impact of Hedging on NPE Variability

2	Q.	How are hedging costs considered in Avista's portfolio error value calculation?
3	A.	Simply put, they are not. Since hedging is intended to reduce the variability of actual
4		costs from forecast costs, this is a potentially significant omission. Hedging should
5		help to reduce the difference between forecast and actual costs.
6		As discussed in Section IV, Avista is also subject to significant cost risk
7		associated with carbon allowances. Avista has a risk management policy in place to
8		hedge against risks associated with CCA allowance cost variability. ¹³ However, no
9		forecasts of Avista's hedging activities to minimize CCA allowance cost variability
10		are considered in Avista's NPE forecast.
11		While pointing out that Avista's NPE forecast does not include hedging costs
12		is necessary to clarify the context, I do not wish to suggest that Avista should include
13		hedging costs and benefits in its forecast NPE. Most hedging transactions will occur
14		after Avista has submitted its forecast NPE in this application. Furthermore, hedging
15		transactions are not methods that Avista can use to reduce key components of NPE,
16		such as fuel and market power prices. Again, hedging can reduce the difference
17		between forecast and actual costs, but this is a two-way street that can lead to either
18		higher or lower costs than would occur without hedging.

¹³ JDW-5 (Avista's Response to Staff DR No. 120).

1	Q.	Should Avista be expected to reduce the difference between forecast and actual
2		NPE using hedging?
3	A.	Ideally, yes. This is the Commission's policy. However, Avista witness Kinney
4		states that Avista finds less opportunity to cost-effectively hedge in the power and
5		natural gas markets. He cites a lack of counterparties (illiquidity) and high credit
6		exposure, resulting in transactions occurring mostly in the "near-term." ¹⁴
7		In further explaining this point, Avista states:
8 9 10 11 12 13 14		Unfortunately, hedging immediately after rates are set is not viable in today's marketplace. Further, given the variability and uncertainty around our hydro and wind portfolio, even 100% hedging using normalized generation from these resources would not remove all forecast error to allow for a "normal" power supply expense estimate, since the cost of volumetric error would not be included in the base cost level forecast. ¹⁵
15		It is worth noting that Avista's testimony does not opine on the liquidity of the
16		carbon allowance futures contracts market.
17		There is evidence that Avista's hedging for physical power has decreased
18		over the past five years. For the purposes of my analysis, I defined a hedging
19		transaction as a physical power transaction that included at least two days, occurring
20		no more than two years prior to the effective month and no less than 28 days prior to
21		the effective day. Considering these trades, I found that Avista's monthly trade
22		volumes dropped substantially between 2019 and 2023,
23		. This suggests, but does not prove, that physical power markets have

¹⁴ Kinney, Exh. SJK-1T at 62:11-63:2.
¹⁵ JDW-6 (Avista's Response to Staff DR No. 213, part (c)).

1		become more illiquid. ¹⁶ However, the evidence I have reviewed to date provides no
2		detailed information regarding the liquidity of the carbon allowance or natural gas
3		markets.
4		Avista does have some short-term control over the impact that hedging
5		transactions have on the difference between forecast and actual NPE, even if
6		opportunities to hedge are limited, as suggested by witness Kinney. NPE can be
7		adversely affected if Avista's hedging policies and practices are poorly designed, the
8		Company does a poor job of forecasting annual average output, or it fails to carefully
9		apply its hedging policies and practices.
10		
11		D. Recommendation Against Accepting Avista's Proposal
12		
13	Q.	Should Avista's portfolio error adjustment proposal be accepted by the
14		Commission?
15	A.	No. As discussed above, the proposed adjustment is not a cost and should not be
16		included in forecast NPE. Furthermore, most of the drivers of NPE variability can
17		work in either direction. Other than its trend analysis, Avista has presented no
18		evidence that the NPE variability is biased upwards.
19		The relevance of Avista's historical trend analysis is undercut by its
20		arguments that many of the drivers of NPE variability are new, such as the
21		Department of Ecology's climate regulations, which were made effective in October

¹⁶ For example, Avista may have failed to execute on available trade opportunities.

1		2022. Also, Avista's enviable position as a net seller to the market positions its NPE
2		to come out lower in some market conditions. ¹⁷ It is unreasonable to forecast a cost
3		that may not even occur.
4		
5		IV. IMPACT OF CARBON EMISSIONS POLICY ON NPE
6		
7		A. Relationship of CCA Allowances to NPE
8		
9	Q.	Are Climate Commitment Act (CCA) allowance costs a significant risk to NPE?
10	A.	Yes. While Avista acknowledges that CCA costs are a source of uncertainty that
11		"can only serve to increase NPE forecast error," it refers to Ecology's "free
12		allowance grant true-up process for electric load-serving entities," implying that it
13		will receive a full allocation of allowances trued-up to match its requirements. ¹⁸
14		Relying on this view, Avista intends to exclude allowance costs from its dispatch
15		decisions. ¹⁹
16		However, Avista later clarifies that because Ecology's final rules have not
17		been "finalized," CCA costs "have the potential to be very large." ²⁰ Nonetheless, this
18		potential for very large costs is not considered in Avista's NPE forecast or in its
19		dispatch operations, other than in the portfolio error adjustment. Avista's focus on

¹⁷ It is likely that Avista will remain a net seller if it includes an appropriate carbon price in its unit dispatch and power purchase decisions.
¹⁸ Kalich, Exh. CGK-1T at 31:3.
¹⁹ JDW-7 (Avista's Response to Staff DR No. 32, part (e)).
²⁰ JDW-8 (Avista's Response to Staff DR No. 119).

"opportunities for Avista to eliminate or reduce the associated allowance costs,"²¹ 1 2 which all appear to be accounting (not operational) actions, fails to give proper 3 weight to Ecology's intentions in two important ways. First, it is my understanding that the Department of Ecology does not intend 4 5 for the "true-up" process to be a one-for-one true-up of emissions with no-cost 6 allowances. Ecology staff explained during an interview that even though the 7 Department will make adjustments to future year allowances based on information about the utility's actual emissions relative to allocated allowances, that true-up will 8 9 not be one-for-one. 10 Ecology staff have not begun drafting these methods. Ecology staff explained 11 that future allocation decisions will be based on concepts such as the magnitude of 12 the difference between actual and allocated emissions in the historical year and 13 reasons for the difference (e.g., whether it is a high, normal, or low hydro year). 14 Second, it is my understanding that the Department of Ecology intends for 15 the no-cost allowances allocated to Washington utilities to be exposed to markets, 16 and that the utilities have an opportunity for financial gains or losses that would be 17 either passed through to their customers or reflected on their balance sheets. 18 Ecology's process allows for a significant lag between the allocation of no-cost 19 allowances, the emissions period (year), and the two compliance account dates. 20 Utilities are authorized to buy and sell allowances based on their interests and in 21 bilateral or any structured market, but may only sell no-cost allowances through

²¹ JDW-7 (part (e)).

1		Ecology-administered auctions. Thus, there is a significant period of time in which
2		Avista may hold allowances because of the limited auction opportunities.
3		
4	Q.	Is Avista tracking its allowances consistent with the CCA?
5	A.	It does not appear that Avista's carbon allowances are being tracked consistently
6		with the CCA. Avista provided its CCA Compliance Model in response to a data
7		request. According to that model (as confirmed in an informal conversation with
8		Avista staff), Avista expects that its no-cost allowances are intended to be used both
9		for emissions associated with serving retail load and for emissions associated with
10		wholesale sales whose revenues benefit its retail customers. ²²
11		However, that understanding appears to be incorrect. According to WAC
12		173-446-230, "Ecology will use utility-specific demand forecasts that provide
13		estimates of retail electric load." Avista, in fact, acknowledged this in its filing of its
14		retail load service-based forecast of carbon emissions filed with and approved by the
15		Commission, and accepted by Ecology. ²³ Ecology has allocated no-cost allowances
16		to Avista based on its requirements to serve Washington retail load; Avista remains
17		responsible for obtaining allowances for its wholesale load.
18		To the extent that Avista is relying on the understanding that Ecology is
19		allocating no-cost allowances to Avista for emissions associated with wholesale
20		sales, I believe that such reliance is likely to lead to imprudent decisions.

 ²² JDW-9 (Avista's Response to Staff DR No. 118(C), Confidential Attachment A, Tab CCA Daily Estimates, Column AV ("Allowance Grants Avail For Wholesale Sales")).
 ²³ See generally in re Petition of Avista Corp., Docket UE-220770, Petition of Avista Corp. (June 22, 2023).

- 1Q.Do Ecology's rules allow Avista to use no-cost allowances for emissions2associated with wholesale sales?
- 3 A. Yes. Even though Ecology's allocation of no-cost allowances is based on 4 Washington retail load, that does not restrict Avista or other utilities from using no-5 cost allowances for other purposes or even to sell them at auction. Thus, Avista is not 6 prohibited from using no-cost allowances to cover emissions associated with 7 wholesale load. Ecology's intent is to allocate sufficient no-cost allowances to avoid 8 a cost burden on retail load, and for those allowances to be used prudently by Avista 9 in a manner that benefits its retail customers. Avista may find opportunities to cost-10 effectively reduce emissions associated with serving retail load, thus freeing up 11 allowances to reduce the cost of selling power on the wholesale market, with the net 12 revenues accruing to the benefit of its retail customers through NPE. 13 **B**. **Avista's CCA Allowance Forecast** 14 15 16 Q. Does Avista have sufficient no-cost allowances to comply with the CCA? 17 A. Avista currently forecasts sufficient no-cost allowances to comply with the CCA, but 18 there are aspects of its compliance forecast that are perplexing at best. 19 As a fundamental point, Avista's allocation of no-cost allowances could 20 exceed or fall short of actual emissions due to external factors, such as a high or low
- 21 hydro year. This is not perplexing and has been anticipated by all involved.
- Yet even on a forecast basis, it appears that the Department of Ecology's
 2023 allocations (based on Avista's October 2022 forecast) allocate more no-cost

1		allowances than Avista forecasts will be required as of November 2023. For
2		example, Ecology allocated Avista 1,672,626 tons of carbon allowances for 2024,
3		but Avista now forecasts just tons of carbon emissions associated with its
4		retail load. ²⁴ While historical variation is to be expected, Ecology's allocation of no-
5		cost allowances exceeds Avista's emissions forecast for each year in the 2023 to
6		2026 compliance period.
7		The main reason that the Department of Ecology has issued more no-cost
8		allowances to Avista than will be required for emissions associated with its retail
9		load is that Avista's CEIP-regulated retail load forecast appears to have decreased, as
10		shown in the same materials as referenced above. It is unclear why Avista's CEIP-
11		regulated retail load forecast has decreased.
12		
13	Q.	Should Avista address the decrease in its CEIP-regulated retail load forecast?
14	A.	Yes. The Commission's Order 01 in Docket UE-220770 (paragraph 10) requires that
15		"the Company must notify the Commission if there are any substantive changes, as
16		that term may be defined by the Commission in a subsequent proceeding." I am not
17		aware that the Commission has defined substantive change at this time.
18		I understand that PacifiCorp recently filed an update to its supply and
19		demand forecast due to a change in its fuel forecast in Docket UE-220789.

²⁴ In re Petition of Avista Corp., Docket UE-220770, *Petition for an Amended Order Approving Its Revised Four-Year Demand and Resource Supply Forecast Pursuant to the Climate Commitment Act*, 5, Table 2 (June 22, 2023); JDW-9 (Avista's Response to Staff DR No. 118(C), Confidential Attachment A, Tab Summary, Column Q ("Interm. 441 Allowance Need")). Note that this figure is projected as of November 2023, but Avista staff confirmed the final value is similar in an informal conversation.

1		Considering that the emissions impact of the change to Avista's load forecast could
2		be larger than PacifiCorp's, it seems reasonable to expect that Avista would also file
3		an update to its supply and demand forecast pursuant to RCW 70A.65.120.
4		
5		C. Avista's CCA Compliance Forecast
6		
7	Q.	Has Avista placed too much confidence in the "true-up" process in its
8		compliance forecast?
9	A.	Yes. First, it is reasonable to anticipate that Ecology will make adjustments to reduce
10		or eliminate Avista's current "surplus" position. According to WAC 173-446-230(j):
11 12 13 14 15 16 17		The schedule of allowances will be updated by October 1st of each calendar year as necessary to accommodate the requirements of the adjustment processes described in this subsection. In addition, if a revised forecast of supply or demand is approved in a form and manner consistent with the requirements of this section by July 30th of the same calendar year, then ecology may adjust the schedule of allowances to reflect the revised information provided by an updated forecast.
18		Thus, Avista's revised load forecast will be taken into account during the October
19		2024 update. Based on Ecology's goals, it seems likely that Ecology would reduce
20		Avista's no-cost allowances to be consistent with its current load forecast.
21		Second, if Ecology were planning to operate the "true-up" process as a one-
22		for-one true-up of emissions with no-cost allowances, then it might be reasonable for
23		Avista to exclude allowance costs from its least-cost dispatch operation. As noted
24		above, Ecology anticipates that future allocation decisions will be based on concepts
25		such as the reasons for the difference between forecast and actual emissions (e.g.,
26		whether it is a high, normal, or low hydro year), as well as the expectation that

1		allowance costs will be a factor in dispatch, as discussed further below. Considering
2		this information, it seems likely that over the four-year compliance period, the no-
3		cost allowances allocated to Avista by Ecology will be less than its emissions
4		associated with Washington retail load.
5		Ecology is almost certainly not going to issue substantially more no-cost
6		allowances than Avista will require for compliance associated with its actual retail
7		load. Therefore, given Ecology staff's statement that the true-up will not be one-for
8		one, Avista may need to purchase some allowances for its retail load and especially
9		for its wholesale load, unless those loads are served by energy that does not incur a
10		CCA compliance obligation.
11		This strongly suggests that Avista should consider the price of carbon
12		allowances in its dispatch decisions and, hence, in its NPE forecast.
13		Furthermore, Avista's no-price dispatch approach puts its allocation of no-
14		cost allowances at risk. Given that Ecology is going to consider the reasons for any
15		difference between allocated allowances and actual emissions, if Avista excludes the
16		cost of carbon allowances from its dispatch decisions, Ecology staff will likely look
17		unfavorably on a request to fully true-up Avista's allowances.
18		
19	Q.	Is the CCA likely to be a material driver of decarbonization?
20	A.	Yes. According to Department of Ecology staff, Ecology expects the CCA to be a
21		significant driver of decarbonization. During my interview of Department of Ecology
22		staff, I understood that Ecology intends to design the carbon allowance program to
23		ensure active allowance trading by Washington's electric utilities. Ecology staff

1		appear to view the active participation of the electric utilities in Washington's carbon
2		allowance market as necessary for it to function smoothly. Ecology views electric
3		utility participation in the market as providing necessary liquidity for other market
4		participants. Ecology intends that further rules and guidance will result in electric
5		utilities buying and selling a significant number of allowances.
6		This demonstrates that Avista's view of CCA allowance costs is incorrect.
7		Avista states that, "[r]equiring CCA allowance costs to be included in system [sic]
8		would make the CCA the primary driver of electric utility decarbonization (versus
9		CETA), which is not the intent of the CCA." ²⁵ While technically true (Department of
10		Ecology staff also view CETA as the primary driver), I understand that Ecology's
11		expectation is that CCA allowance costs will be included in system dispatch.
12		
13		D. Prudency Review of CCA Compliance Costs
14		
15	Q.	Does Ecology's intention to effectively condition the magnitude of the "true-up"
16		based on reasons for the difference between forecast and actual emissions raise
17		any concerns?
18	A.	Yes. As an opening comment, it seems highly problematic for Ecology to conduct
19		what amounts to a prudency review of the dispatch decisions of Washington utilities,
20		including Avista. It appears to me that the Department of Ecology lacks the requisite
21		staff and process to conduct such a review. The fact that Ecology has not developed

²⁵ JDW-7 (part (b)).

1	even a draft of the methods it could use in such a review is particularly troubling
2	given that it places immediate cost risk on Avista and its customers.
3	But in terms of the Commission's review of the forecast and actual NPE,
4	there are important procedural matters that Avista's approach to CCA-related costs
5	fails to address. A key complication is that Ecology's compliance requirements do
6	not occur at the end of each calendar year, but require partial and then final surrender
7	of required allowances over a four-year compliance period. The question is, will the
8	Commission expect Avista to record costs (or benefits) of its allowances such that it
9	shows full CCA compliance on a calendar year basis?
10	If so, then Avista's actual NPE would include the actual net cost of CCA
11	allowance transactions in its annual NPE filing and, for any surplus or deficit in
12	allowance transactions, Avista would determine an additional net cost on a mark-to-
13	market basis. This option would have at least two disadvantages: the methods for
14	pricing its unsold (or unpurchased) allowances would need to be developed and
15	reviews and the resulting net value would need to be carried forward to subsequent
16	years. Nonetheless, this option would have the advantages of providing the
17	Commission with a clear opportunity to review the prudence of Avista's transactions
18	and pricing decisions.
19	If not, then Avista could simply record its actual net transaction costs for the
20	year and defer the valuation of any allowance surplus or deficit to the future. This
21	option would be far more administrable, and eliminate the need to develop a mark-
22	to-market pricing method. However, since it is my understanding that Avista would
23	only encounter a compliance date at which it is required to fully account for its

1		emissions by surrendering allowances every four years, the Commission could find it
2		more challenging to review the prudence of Avista's transactions and pricing
3		decisions.
4		
5	Q.	Is a prudence review for CCA costs something that the Commission should
6		anticipate?
7	A.	Yes, for two reasons. First, as discussed above, Avista is currently, and proposes to
8		continue, excluding carbon allowance costs from dispatch. It has the opportunity to
9		sell those allowances, so using them during periods when the unit would not dispatch
10		if the costs were included results in excess costs for Washington customers. Second,
11		the potential magnitude of CCA costs that could appear in a future NPE true-up is
12		very large.
13		
14	Q.	When should the Commission review the prudence of Avista's CCA allowance
15		use and transactions?
16	A.	In my opinion, the Commission will find it most efficient to review the prudence of
17		Avista's CCA allowance use and transactions in annual NPE review proceedings.
18		Avista's decisions to buy, sell, hold, or use allowances are intertwined with its unit
19		dispatch and power purchase decisions. The CCA requires Avista to include the
20		relevant carbon allowance price and emissions allowance obligation in all unit
21		dispatch and power purchase decisions. (I will explain this requirement below.)
22		Accordingly, in future NPE proceedings, Avista should demonstrate that throughout
23		the year it has identified an appropriate carbon allowance price and that its unit

1	dispatch and power purchase decisions were prudent, which should include a
2	showing that those decisions were consistent with its current estimate of the carbon
3	allowance price.

4	In future NPE proceedings, Avista will also need to demonstrate that its
5	purchase or sale of allowances is prudent. This showing will rely on Avista's
6	forecast of carbon allowance prices since it is not required to demonstrate sufficient
7	carbon allowances to meet its obligations until the end of the four-year compliance
8	period. Thus, it would be reasonable for the Commission to review the prudence of
9	Avista's carbon allowance transactions (or lack thereof) in either the annual NPE
10	proceeding or a post-CCA compliance period proceeding, or some combination of
11	the two.
12	Considering the analysis above suggests five factors that the Commission
13	should weigh when determining how to review the prudence of CCA use and
14	transactions:
15	• Administrative simplicity;
16 17 18 19	• Necessity of reviewing the allowance price and other factors that should be considered in unit dispatch and power purchase decisions during the annual NPE proceeding;
20 21 22 23	• Consideration that decisions to transact (or not transact) in the carbon market and carbon auctions depends on the reasonableness of the carbon price estimate and carbon price forecast as it existed during the year;
24 25 26 27	• Consideration that it is preferable to account for the costs (or benefits) resulting from decisions to transact (or not transact) in the year in which those transactions affect NPE (using mark-to-market valuations for unused allowances, as discussed above); and

1 2 3	• Consideration that it will be easier to review the reasonableness of a utility's carbon price forecasting method after that method is exposed to a variety of real-world circumstances, which may take several years to manifest.
5	The first three factors clearly weigh in favor of reviewing all carbon allowance topics
6	during the annual NPE. The fourth factor is more ambiguous, as Avista may buy or
7	sell allowances in 2024 that are (or could have been) applied to its 2025 obligations,
8	for example. Finally, the fifth factor weighs in favor of reviewing carbon allowance
9	transactions at the end of the four-year compliance period.
10	Notwithstanding the fourth and fifth factors, in my opinion, the Commission
11	will find it most efficient to review the prudence of Avista's CCA allowance use and
12	transactions in annual NPE review proceedings. However, the Commission may also
13	find it reasonable to review the prudence of Avista's CCA allowance use in annual
14	NPE review proceedings but defer review of all or some portion of CCA transactions
15	to the end of the four-year compliance period. If the Commission selects this
16	alternative approach, the net proceeds of the CCA transactions that are deferred for
17	review would be subject to adjustment during the prudence review, with credit or
18	recovery being applied in the next rate case or annual NPE review proceeding.
19	This alternative approach is suggested in the Commission's Order 01 in
20	Docket UE-240141 (paragraph 10), which states:
21 22 23 24 25 26	While we agree with Staff that the Schedule 700 charge and credit rates that Cascade proposes in this docket should be authorized, we make no finding regarding the prudence of these charges and credits at this time. Instead, we authorize the proposed rates on a provisional basis, subject to later review and possible refund. The prudency of the rates will be examined in a dedicated proceeding at a later date when CCA
27 28	compliance costs and revenues over the entire four-year compliance period may be reviewed.

1		Application of the precedent in the Cascade decision to an electric utility is
2		complicated by the fact that an electric utility's decisions to buy, sell, hold, or use
3		allowances are intertwined with its unit dispatch and power purchase decisions.
4		However the Commission determines to conduct its prudence review, it
5		should find that Avista is obligated to manage its CCA allowances and compliance
6		obligations in a prudent manner. The net cost or benefit of Avista's allowance
7		transactions will have an impact on NPE.
8		
9		E. Cost Risk Associated with Avista's CCA Compliance Practices
10		
11	Q.	What is the potential magnitude of CCA costs for Avista?
11 12	Q. A.	What is the potential magnitude of CCA costs for Avista? Avista has not estimated CCA costs. However, in response to a data request, Avista
11 12 13	Q. A.	What is the potential magnitude of CCA costs for Avista? Avista has not estimated CCA costs. However, in response to a data request, Avista provided an illustration of how CCA costs might affect the ERM. In its illustration,
11 12 13 14	Q. A.	What is the potential magnitude of CCA costs for Avista? Avista has not estimated CCA costs. However, in response to a data request, Avista provided an illustration of how CCA costs might affect the ERM. In its illustration, Avista suggests that a "bad case, representing approximately a 25% overrun of
 11 12 13 14 15 	Q. A.	What is the potential magnitude of CCA costs for Avista? Avista has not estimated CCA costs. However, in response to a data request, Avista provided an illustration of how CCA costs might affect the ERM. In its illustration, Avista suggests that a "bad case, representing approximately a 25% overrun of current (2023) allowance grant levels" would result in an annual cost of as much as
 11 12 13 14 15 16 	Q. A.	What is the potential magnitude of CCA costs for Avista? Avista has not estimated CCA costs. However, in response to a data request, Avista provided an illustration of how CCA costs might affect the ERM. In its illustration, Avista suggests that a "bad case, representing approximately a 25% overrun of current (2023) allowance grant levels" would result in an annual cost of as much as \$30 million. ²⁶
 11 12 13 14 15 16 17 	Q. A.	What is the potential magnitude of CCA costs for Avista? Avista has not estimated CCA costs. However, in response to a data request, Avista provided an illustration of how CCA costs might affect the ERM. In its illustration, Avista suggests that a "bad case, representing approximately a 25% overrun of current (2023) allowance grant levels" would result in an annual cost of as much as \$30 million. ²⁶ Avista's \$30 million "bad case" only considers the risk of higher allowance
 11 12 13 14 15 16 17 18 	Q. A.	What is the potential magnitude of CCA costs for Avista? Avista has not estimated CCA costs. However, in response to a data request, Avista provided an illustration of how CCA costs might affect the ERM. In its illustration, Avista suggests that a "bad case, representing approximately a 25% overrun of current (2023) allowance grant levels" would result in an annual cost of as much as \$30 million. ²⁶ Avista's \$30 million "bad case" only considers the risk of higher allowance requirements than forecast. It does not consider the risks associated with trading in
 11 12 13 14 15 16 17 18 19 	Q. A.	What is the potential magnitude of CCA costs for Avista? Avista has not estimated CCA costs. However, in response to a data request, Avista provided an illustration of how CCA costs might affect the ERM. In its illustration, Avista suggests that a "bad case, representing approximately a 25% overrun of current (2023) allowance grant levels" would result in an annual cost of as much as \$30 million. ²⁶ Avista's \$30 million "bad case" only considers the risk of higher allowance requirements than forecast. It does not consider the risks associated with trading in allowances. If Avista has an opportunity to purchase low-cost allowances, passes it

²⁶ JDW-11 (Avista's Response to Staff DR No. 171 Supplemental).

1		It is very likely that Avista will be an active participant in Washington's
2		allowance market. Thus, it is reasonable to view CCA cost risk as being substantially
3		more than \$30 million in a "bad case."
4		
5	Q.	Are Avista's dispatch practices optimally designed to manage CCA cost risk?
6	A.	No. Avista incorrectly concludes that "least cost operations for Avista customers is
7		to not include carbon costs in generation dispatch and maximize the value of its
8		generation fleet." ²⁷ Avista elaborated on this in comments in a Commission
9		workshop:
10 11 12 13 14 15 16 17 18 19 20 21 22 23		First, it is important to remember that the driver of electric utility decarbonization is through the Clean Energy Transformation Act (CETA). Adding Greenhouse Gas (GHG) costs to dispatch will greatly lower surplus sales revenues and artificially accelerate the decommissioning of assets that would otherwise have significantly longer economic lives. As a result, Avista's customers in Washington would pay hundreds of millions more for their electricity if an interpretation that GHG costs should be included in dispatch modeling. Second, Avista has resources with shared ownership by customers in Idaho. Adding GHG costs in dispatch where the only viable wholesale marketplace for liquidating surplus power is located in Washington at the Mid-C, greatly disadvantages those Idaho customers. As stated above, a GHG adder would lower surplus sales revenues and compromise the economic lives of our thermal fleet. ²⁸
24		In contrast, PacifiCorp's implementation of the CCA is more reasonable, as
25		follows:

²⁷ JDW-7 (part (e)).

 ²⁸ In re Commission Led Workshop Series on the Climate Commitment Act, Docket U-230161, Avista's Comments Regarding the Commission's Rulemaking Regarding Investor-Owned Utility Obligations Under the Climate Commitment Act, at 3 (November 3, 2023).

1 2 3 4		The Company includes CCA allowance costs into Chehalis' dispatch cost and then offsets the allowance costs with no-cost allowances. This allows for the CCA to achieve reductions in carbon pollution while mitigating the impact to customer rates through no-cost allowances. ²⁹
5		Although Avista includes a carbon adder on Boulder Park, its only
6		Washington-sited thermal plant required to comply with the CCA, it does not include
7		a carbon adder on other generation (e.g., imports). ³⁰ This is in spite of the fact that
8		Washington utilities must purchase allowances for any emissions from emitting
9		resources that generate electricity sold in the wholesale market or delivered to other
10		utilities in Washington.
11		The only valid issue raised by Avista is the impact of the CCA on the Idaho
12		customers of the Boulder Park unit. The impact of the CCA on Idaho customers is
13		outside the jurisdiction of the Commission.
14		
15	Q.	Have you identified any other potential issues with the methods that Avista is
16		using to tracking its allowances consistent with the CCA?
17	A.	Yes, Avista's use of Idaho renewable energy certificates (RECs) is not clearly
18		supported by documentation supplied by Avista. In addition to using no-cost
19		allowances when complying with CCA regulations, Avista's CCA Compliance
20		Model also includes use of Idaho RECs. According to that model (as confirmed in an
21		informal conversation with Avista staff), Avista expects that energy imported from
22		Avista's Idaho generation resources can be matched with RECs generated from those

²⁹ JDW-12 at 13:7-11 (Testimony of Ramon J. Mitchell, Docket UE-230172, Exh. RJM-3T. ³⁰ Kalich, Exh. CGK-1T at 14:18-19.

same resources during the same hours, with the combination of the generation and
 RECs representing zero-emission generation that can be used to meet CCA
 obligations.³¹

In response to a data request requesting verification that this method is 4 5 accepted by Ecology, Avista stated that the "lesser of methodology" informally 6 approved by the Department of Ecology allows Avista to avoid an allowance obligation when it has "enough renewable energy to meet [its] Clean Energy 7 Transformation Act (CETA) obligation."³² However, I did not find that information 8 in my review of the "lesser of methodology" documentation provided by Avista. 9 Instead, the attachments to the data request show that Ecology informally approved 10 methods for identifying electricity imports that should be reported under the CCA 11 12 and an approach for identifying the appropriate electricity importer. The documents 13 do not mention renewable energy, RECs, or CETA.

14

15 Q. Are you concerned that Avista's lack of documentation for its use of Idaho

16 **RECs in its CCA compliance model is a material error?**

- 17 A. No. In my opinion, Avista's method appears reasonable and does not represent a
- 18 material risk to NPE. I understand that the import of clean energy to Washington
- 19 does not result in a carbon emissions obligation that requires the use of allowances.
- 20 Even though the CCA does not allow RECs to be used as allowances for compliance,
- 21 the combination of a REC generated by Avista-controlled generation and the

 ³¹ JDW-9 (Tab Summary, Column U ("CCA ID REC Purchase Cost")).
 ³² JDW-10.

1		delivery of generation from those same resources to Washington, on an hourly basis,
2		appears to me to adequately demonstrate the import of clean energy.
3		If Avista merely demonstrated the delivery of generation from non-emitting
4		generation sources outside the state, then the RECs associated with that generation
5		could be sold to other parties. This would represent a duplication of attribution that
6		should be avoided. Avista's approach of acquiring the RECs associated with the
7		relevant generation maintains the integrity of both the compliance process as well as
8		the broader REC market.
9		In order to verify that its approach is supported by the Department of
10		Ecology, I recommend that Avista document this method in a similar manner to the
11		documentation of the "lesser of methodology" and seek Ecology's guidance or
12		acceptance of the proposal. As I do not find that this issue represents a risk to
13		Avista's NPE forecast, I do not believe the Commission needs to take any action on
14		this issue.
15		
16		F. Recommendations for Commission Action on CCA Costs
17		
18	Q.	How do you recommend the Commission address CCA costs?
19	A.	The Commission should direct Avista to include CCA allowance costs in the
20		dispatch of its thermal generation plants, whether to serve customer load or to sell
21		electricity into the wholesale market. Avista should then offset the allowance costs
22		for its retail customer load with no-cost allowances.

 NPE. This will require new risk management policies and practices, and poten additional staff to manage the carbon allowance portfolio. While Avista is correct that including a carbon price in dispatch will los surplus sales revenues, this practice is consistent with Ecology's regulatory int Any other approach is likely to result in emissions that exceed the no-cost allowances allocated to Avista, incurring both direct costs for allowances as w costs associated with inefficient dispatch. Such additional costs would be impr With respect to a prudency review, it is my understanding that various have suggested a separate proceeding to review the prudency of Washington u carbon emissions and use of no-cost allowances. As I discuss above, in my opi it is most appropriate for the prudence of allowance costs to be reviewed in ear utility's respective NPE true-up proceeding —in Avista's case, its annual ERN proceeding. Variable environmental costs are commonly reviewed in power corproceedings, and there is no important difference between the carbon allowance other environmental costs that are subject to review in such proceedings. V. ENERGY RECOVERY MECHANISM A. Overview of the ERM 	inimize
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6 Any other approach is likely to result in emissions that exceed the no-cost 7 allowances allocated to Avista, incurring both direct costs for allowances as w 8 costs associated with inefficient dispatch. Such additional costs would be impr 9 With respect to a prudency review, it is my understanding that various 10 have suggested a separate proceeding to review the prudency of Washington u 11 carbon emissions and use of no-cost allowances. As I discuss above, in my opi 12 it is most appropriate for the prudence of allowance costs to be reviewed in each 13 utility's respective NPE true-up proceeding —in Avista's case, its annual ERN 14 proceeding. Variable environmental costs are commonly reviewed in power co 15 proceedings, and there is no important difference between the carbon allowance 16 other environmental costs that are subject to review in such proceedings. 17 18 V. ENERGY RECOVERY MECHANISM 19 20 A. Overview of the ERM 21 4 0	tent.
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21	
21	
22 Q. Please summarize Avista's current energy recovery mechanism (ERM).	
A. Avista witness Kinney summarizes the current ERM as follows:	

1 2 3 4 5 6 7 8 9 10 11 12 13 14 15		Each calendar year, the Company absorbs the first \$4 million of the difference between certain actual and authorized power supply related costs, either in the surcharge or rebate direction. This is referred to as the "deadband," as costs are absorbed by the Company until this band is exceeded. When actual costs exceed authorized costs by more than \$4 million (surcharge direction), 50% of the next \$6 million difference is absorbed by the Company, and 50% is deferred for future recovery from customers. When actual costs are less than authorized costs (rebate direction), 25% of the next \$6 million difference above the \$4 million deadband is absorbed by the Company, and 75% is deferred as a rebate to customers. If the difference in the actual and authorized costs exceeds \$10 million, either in the surcharge or rebate direction, 10% of the amount above \$10 million is absorbed by the Company, and 90% is deferred. ³³
16	Q.	What is the purpose of the ERM?
17	А.	According to Avista witness Kinney, "[t]he intent of the ERM is to share risk
18		between the Company and customers and provide a financial incentive for Avista to
19		reduce or to better manage power supply costs." ³⁴
20		
21		B. Avista's Proposal to Modify the ERM
22		
23	Q.	Please summarize Avista's proposal to revise the ERM.
24	A.	Avista proposes to eliminate the \$4 million deadband and use a single, symmetrical
25		sharing mechanism of 95% of the difference rebated to or recovered from customers,
26		and the remaining 5% absorbed by Avista, which it refers to as "95/5 sharing." ³⁵

 ³³ Kinney, Exh. SJK-1T at 51:2-12.
 ³⁴ Kinney, Exh. SJK-1T at 52:22-23.
 ³⁵ Kinney, Exh. SJK-1T at 50:3-6.

1	Q.	What is Avista's justification for modifying the ERM?
2	A.	Its arguments are essentially the same as those supporting its proposed portfolio
3		forecast error cost, as discussed in Section III. Avista also argues that customers have
4		not actually benefited from the current ERM structure. Avista provides data
5		suggesting that customers would have benefited from the 95/5 sharing over the 2011-
6		2022 time period, but the Company also admits that customers would not have
7		benefitted over the more recent 2018-2022 time period. ³⁶
8		
9		C. Recent Commission Decision on PacifiCorp PCAM
10		
11	Q.	Please summarize the Commission's recent decision in the PacifiCorp general
11 12	Q.	Please summarize the Commission's recent decision in the PacifiCorp general rate case (GRC) on revising PacifiCorp's Power Cost Adjustment Mechanism
11 12 13	Q.	Please summarize the Commission's recent decision in the PacifiCorp general rate case (GRC) on revising PacifiCorp's Power Cost Adjustment Mechanism (PCAM).
 11 12 13 14 	Q. A.	Please summarize the Commission's recent decision in the PacifiCorp generalrate case (GRC) on revising PacifiCorp's Power Cost Adjustment Mechanism(PCAM).In the PacifiCorp GRC, PacifiCorp proposed eliminating its power cost mechanism's
 11 12 13 14 15 	Q. A.	Please summarize the Commission's recent decision in the PacifiCorp generalrate case (GRC) on revising PacifiCorp's Power Cost Adjustment Mechanism(PCAM).In the PacifiCorp GRC, PacifiCorp proposed eliminating its power cost mechanism'sdead and sharing bands, making all power costs subject to credit or surcharge; I
 11 12 13 14 15 16 	Q. A.	Please summarize the Commission's recent decision in the PacifiCorp generalrate case (GRC) on revising PacifiCorp's Power Cost Adjustment Mechanism(PCAM).In the PacifiCorp GRC, PacifiCorp proposed eliminating its power cost mechanism'sdead and sharing bands, making all power costs subject to credit or surcharge; Irecommended a 90/10 sharing band and the elimination of deadbands. The
 11 12 13 14 15 16 17 	Q. A.	Please summarize the Commission's recent decision in the PacifiCorp generalrate case (GRC) on revising PacifiCorp's Power Cost Adjustment Mechanism(PCAM).In the PacifiCorp GRC, PacifiCorp proposed eliminating its power cost mechanism'sdead and sharing bands, making all power costs subject to credit or surcharge; Irecommended a 90/10 sharing band and the elimination of deadbands. TheCommission rejected both proposals.
 11 12 13 14 15 16 17 18 	Q. A.	Please summarize the Commission's recent decision in the PacifiCorp generalrate case (GRC) on revising PacifiCorp's Power Cost Adjustment Mechanism(PCAM).In the PacifiCorp GRC, PacifiCorp proposed eliminating its power cost mechanism'sdead and sharing bands, making all power costs subject to credit or surcharge; Irecommended a 90/10 sharing band and the elimination of deadbands. TheCommission rejected both proposals.In its decision, the Commission stated that, without the strong PCAM
 11 12 13 14 15 16 17 18 19 	Q.	Please summarize the Commission's recent decision in the PacifiCorp generalrate case (GRC) on revising PacifiCorp's Power Cost Adjustment Mechanism(PCAM).In the PacifiCorp GRC, PacifiCorp proposed eliminating its power cost mechanism'sdead and sharing bands, making all power costs subject to credit or surcharge; Irecommended a 90/10 sharing band and the elimination of deadbands. TheCommission rejected both proposals.In its decision, the Commission stated that, without the strong PCAMstructure, PacifiCorp would "no longer ha[ve] an economic stake in a major resource

³⁶ Kinney, Exh. SJK-1T at 55, Table 10.

1	First, the Commission could have meant that the PCAM forces PacifiCorp to
2	bear some responsibility for past resource planning decisions. Yet, as Avista has
3	argued, its past resource decisions have resulted in lower NPE expenses and more
4	capacity than its peers. Avista argues that because it is in "a surplus capacity position
5	relative to its capacity deficient peers, such as Puget Sound Energy and
6	PacifiCorp, [the Company] can manage that surplus position for the benefit of
7	reducing NPE for its customers." ³⁷ In this sense, Avista's circumstances differ
8	materially from those of the other Washington utilities, which the Commission may
9	find to be relevant to the design of Avista's ERM.
10	Or, second, the Commission could have meant that it sees the PCAM as
11	forcing PacifiCorp to bear some responsibility for current operational decisions.
12	Washington legislation is currently providing strong direction to the resource
13	decisions being made to serve Washington customers. Nonetheless, as applied here,
14	a majority of the nameplate capacity that Avista currently plans to build in its
15	Preferred Resource Strategy is either natural gas or hydrogen to ammonia CT. ³⁸
16	Because those planned resources will have costs in NPE, the Commission may wish
17	to preserve a degree of accountability for the fuel cost risk associated with these
18	resources through the ERM.
19	Considering Avista's circumstances, I am unconvinced that the current
20	sharing/deadband schedules provide it with material incentives that affect its current
21	resource decisions. In the near term, only 373 MW of 1227 MW of nameplate

³⁷ JDW-13 (Avista's Response to Staff DR No. 222).
³⁸ Kinney, Exh. SJK-1T at 4:10-23.

1		capacity additions are natural gas, and likely to contribute to NPE. Considering both
2		base rates and NPE, the cost-effectiveness of Avista's wind and hydropower
3		procurements could easily have a more substantial rate impact than the natural gas
4		plants. But once procured, any impacts of wind and hydropower on NPE are largely
5		indirect and outside a utility's control.
6		In any event, the Commission has oversight and the opportunity to consider
7		the risks associated with the resources proposed by Avista in the IRP process.
8		Regardless, in the PacifiCorp order, the Commission pointed out that the
9		effect of the sharing/deadband schedules is to insulate customers from cost increases
10		and provide a balancing effect between years in which power costs are under-or
11		over-forecast. This is a reasonable policy position to take. As the Commission has
12		focused on it in a recent decision, I give it strong deference.
13		
14	Q.	Did the Commission's decision in the PacifiCorp GRC indicate flexibility as to
15		the terms of the PCAM and ERM?
16	A.	Yes. In the PacifiCorp decision, the Commission encouraged parties to discuss when
17		adjustments to the deadband/sharing band thresholds should be made. This suggests
18		the Commission remains open to adjusting the PCAM or ERM structure, provided
19		that the basic structure of a deadband and a sharing mechanism is retained.

- 20
- D.

Recommendations to Simplify Avista's NPE Mechanism

1

What is your recommendation? Q.

2	A.	Consistent with my testimony and the Commission's decision in the PacifiCorp case,
3		I recommend simplifying the current sharing portion of the mechanism to a
4		symmetric 90/10 sharing. This sharing ratio equitably shares risk between customers
5		and Avista, while continuing to provide the Company with a reasonable incentive to
6		manage or control power costs.
7		With respect to the deadband, I recommend reducing the deadband from \$4
8		million to \$3 million. The Commission retained the \$4 million deadband in the
9		PacifiCorp case, which is approximately 2% of its net power costs. Avista's
10		proposed NPE is much smaller than that of PacifiCorp, so it is inequitable to expose
11		Avista to a relatively larger deadband risk. A \$3 million deadband would still be
12		slightly higher than that of PacifiCorp, in relative terms.
13		
14		VI. ERRORS IN PROPOSED NPE
15		
16	Q.	What errors in its proposed NPE has Avista acknowledged?
17	А.	Avista has acknowledged the following four errors:
18 19 20		• Avista acknowledged that it used an incorrect rate for BPA's open access transmission tariff. ³⁹
21 22		• Avista acknowledged that the rates for its natural gas transportation contracts have changed since August 2023. ⁴⁰

³⁹ JDW-14 (Avista's Response to Staff DR No. 174, part (b)).
⁴⁰ JDW-15 (Avista's Response to Staff DR No. 183 Supplemental).

1 2 3 4 5 6 7 8		 In response to a data request, Avista identified a "bug with the Aurora modeling software where the start fuel mmBTUs are underreported." Correcting this bug resulted in an increase in net power supply costs by \$365,000.⁴¹ A financial contract was inadvertently omitted from Aurora. Correcting this error results in a decrease in NPE of \$597,506.⁴²
9	Q.	What additional errors in proposed NPE have you identified?
10	А.	I have identified one potentially large error related to the Western Energy Imbalance
11		Market (WEIM), and three additional small errors that could affect the proposed
12		NPE related to Colstrip fuel costs, the Lancaster PPA, and the Rattlesnake Flats
13		Wind Project.
14		
15	Q.	Please explain the Western Energy Imbalance Market (WEIM) error.
16	A.	Avista does not explicitly represent WEIM charges and revenues in its NPE forecast.
17		Instead, Avista models power supply expenses at 5-minute granularity. ⁴³ For
18		forecasting purposes of energy transaction costs, this seems reasonable.
19		While the majority of WEIM costs from 2022 to early 2024 were energy
20		imbalance revenues, Avista also paid congestion and other WEIM charges. It appears
21		that Avista has neglected to consider these expenses and revenues in its NPE
22		forecast. Over the roughly three-year period that Avista has participated in the
23		WEIM, it has averaged about \$1 million per year in non-energy charges that appear
24		to be absent from the WEIM.

 ⁴¹ JDW-16 (Avista's Response to Staff DR No. 175(C) Supplemental).
 ⁴² JDW-17 (Avista's Response to Staff DR No. 184 Supplemental).
 ⁴³ JDW-18 (Avista's Response to Staff DR No. 219).

1

Q. Please explain the Colstrip fuel cost error.

2	A.	The Colstrip coal contract prices are set in tiers, and Avista models Colstrip dispatch
3		against an incremental fuel price that changes when a new tier is reached. ⁴⁴
4		However, the marginal fuel price for Colstrip is not the current tier but rather the
5		highest annual price, or the annual marginal price.
6		For example, if Avista's coal use in December is forecast to be priced based
7		on Tier N, then the marginal fuel price for January should also be the Tier N price,
8		not the Base Price charged in January. This is because an additional ton of fuel
9		consumption would increase annual fuel costs by the Tier N price, not the Base
10		Price, regardless of the month in which the additional ton of fuel is consumed.
11		Avista's error results in its Aurora model dispatching Colstrip at in
12		January compared to in December, or a fuel-weighted average price that is
13		than its annual marginal cost, with the effects more pronounced
14		in January through August.45
15		Avista argues that its model dispatch price is correct, because "Until the
16		Minimum Annual Volume is achieved, incremental tons are subject to Shortfall
17		penalties in addition to the Base Price, thus the dispatch price cannot be set at the
18		Tier Price for all months." ⁴⁶ If Avista's forecast indicates that there is a significant
19		risk of Shortfall penalties, then I would agree.

 ⁴⁴ JDW-20, (Avista's Response to Staff DR No. 176(C) Supplemental).
 ⁴⁵ JDW-20, Attachment A.

⁴⁶ JDW-20, part (c).

1		However, Avista's 2025 forecast indicates that its coal use will exceed the
2		Minimum Annual Volume by , with the exceedance beginning during
3		As Avista forecasts that its annual dispatch of Colstrip will significantly exceed the
4		Minimum Annual Volume, it is not reasonable to forecast NPE using a dispatch
5		price that relies on the improbable circumstance that Avista will be at risk of
6		Shortfall penalties in 2025. Accordingly, Avista should update its Aurora model to
7		use the annual marginal price for dispatch throughout 2020.47
8		
9	Q.	Does the Colstrip fuel cost error have implications for operations?
10	A.	Yes, Avista should ensure that Colstrip is dispatched to marginal cost. Avista did not
11		respond to a data request to verify the operational dispatch practice. ⁴⁸ However, if its
12		operational dispatch practices are aligned with the model forecast, then in my
13		opinion the dispatch is being conducted imprudently.
14		
15	Q.	Please explain the Lancaster PPA error.
16	A.	According to witness Kalich's Lancaster PPA workpaper, the Fired Hour Payment
17		begins in November 2026. Lancaster PPA costs are included in Account 555. The
18		Account 555 forecast power supply expense is \$180,305,257 for both 2025 and

 ⁴⁷ Note that the dispatch price forecast should also include CCA compliance costs, as discussed in Section IV.
 ⁴⁸ JDW-20, part (d).

1		2026. ⁴⁹ If the Fired Hour Payments were modeled by Avista to begin in November
2		2026, then Account 555 costs would be slightly higher in 2026 than in 2025.
3		It is unclear what error has occurred or how much it may affect forecast NPE.
4		Avista denied the existence of an error, ⁵⁰ but its explanation cannot be reconciled
5		with Exh. CGK-6.
6		
7	Q.	Please explain the Rattlesnake Flats Wind Project error.
8	A.	According to Avista, in its prior case, Avista relied on the manufacturer's estimate of
9		generation but in this case, Avista used three years of actuals. ⁵¹
10		There are two discrepancies between this explanation and Avista's filed data
11		for Rattlesnake Flats. First, it appears that Avista used slightly less than three years
12		of actual data, ⁵² but this is probably an immaterial error. Second, the average annual
13		historical generation is 383,756 MWh but the model output for Rattlesnake Flats is
14		344,923 MWh. ⁵³ Avista did not provide an explanation for the discrepancy in
15		generation between the model input and output.
16		
17	Q.	What are your recommendations?
18	A.	There are five model input errors (two acknowledged by Avista), two model output
19		errors acknowledged by Avista, and the failure to consider all WEIM costs in

⁴⁹ Kalich, Exh. CGK-6. Note that page 2 is the 2026 pro forma but is mislabeled as 2025.
⁵⁰ JDW-21 (Avista's Response to Staff DR No. 186).
⁵¹ JDW-22 (Avista's Response to Staff DR-189).
⁵² JDW-23 at Tab "historical gen," cell K1031 (Kalich, Rattlesnake Flat workpaper)).
⁵³ Kalich, Exh. CGK-2C Native, tab "Conf Aurora Portfolio Output," cells G710:G721.

1		forecast NPE. Also, as discussed in Section IV, Avista should include CCA
2		allowance costs in its modeled dispatch costs.
3		I recommend that the Commission direct Avista to reduce NPE by \$232,506
4		reflecting the net effect of the two model output errors.
5		I recommend that the Commission direct Avista to update its model to
6		address the five model input errors and to include both non-energy WEIM and CCA
7		allowance costs in modeled dispatch costs. This will affect NPE by an unknown
8		amount.
9		
10	Q.	Does this conclude your testimony?

11 A. Yes.