



550 Capitol St. NE Salem, OR 97301 Phone: 503-378-4040 Toll Free: 1-800-221-8035

FAX: 503-373-7806 www.oregon.gov/energy

MEMORANDUM

To: Energy Advisory Work Group Members

From: Janine Benner, Director

Date: January 12, 2022

Re: Materials for January 19, 2022 Meeting

Happy New Year! I am looking forward to our meeting next week to share updates on ODOE's work and to receive your feedback and guidance as we turn to the start of the 2022 Legislative session.

On our agenda (below), we have time set aside for a roundtable discussion among Work Group members — we'd like to hear about what you're watching for and what your priorities are for the session, as well as whether you're following or planning to pursue funding under the bipartisan infrastructure bill. Our team will also brief you on the bills we're tracking for 2022, and provide a high-level look-ahead at the process for developing 2023 legislative session concepts and ODOE's next biennial budget. As you know, ODOE's 2021-2023 budget looks very different than recent years, thanks to new programs created by the Legislature. We've updated our Budget History document and explainer of How We're Funded if you'd like to see the latest.

We have provided additional background materials below for discussion, in case you have the opportunity to read them ahead of the meeting and can be thinking about any questions you might have. We are excited to update you on the implementation of our Strategic Plan, and officially kick off development of the 2022 Biennial Energy Report. We'd love to know if you have suggestions for topics to cover in the next edition of the report – and we are starting with sharing information and seeking feedback about Energy By the Numbers, Energy Resource and Technology Reviews, and the History Timeline. We plan to ask for feedback on Energy 101s and Policy Briefs after the 2022 legislative session.

We'll also spend some time reviewing the latest information about potential federal funding coming to Oregon. In particular, we'd like to hear your feedback on how the state should

prioritize funding potential projects and programs. We created a helpful breakdown of energy-related funding we expect from the <u>2021 Federal Infrastructure Bill</u> (also available in a <u>PDF</u>) on our blog.

As we near two full years working in a remote world, we continue to try new ways to improve our public meetings. For our meeting this month, non-EAWG members will also be able to control their own video and audio buttons, see who else is in attendance, and participate through the WebEx "chat" function. Thanks for your patience as we continue to experiment with our meeting format to increase transparency and help interested parties engage more during EAWG meetings.

Finally, in case you missed it, check out our <u>2021 Year in Review</u> to see the milestones and celebrations from the past year. Also attached to this memo are two letters that the agency sent recently on regional energy issues, which we thought might be of interest. Thank you, as always, for your participation on the Energy Advisory Work Group – I look forward to another great year working together!



OREGON DEPARTMENT OF ENERGY

550 Capitol St. NE Salem, OR 97301 Phone: 503-378-4040 Toll Free: 1-800-221-8035

FAX: 503-373-7806 www.oregon.gov/energy

AGENDA

Energy Advisory Work Group

DATE: January 19, 2022

TIME: 1 – 3 p.m.

Oregon Department of Energy – via WebEx

https://odoe.webex.com/odoe/j.php?MTID=m525baa4a1e95e43a6019197a8736e9b9

Password: EAWG

Call-in number: 1-408-418-9388; Meeting ID 2334 054 6193

Time	Topic	Lead
1:00 p.m.	Director's Update	Janine Benner, Director
1:10 p.m.	EAWG Roundtable	EAWG Members
1:45 p.m.	2022 and 2023 Legislative Sessions	Christy Splitt, Government Relations Coordinator
1:55 p.m.	2022 Biennial Energy Report	Ruchi Sadhir, Associate Director, Strategic Engagement
2:05 p.m.	Federal Funding	Janine Benner, Director
2:50 p.m.	Strategic Plan	Ruchi Sadhir, Associate Director, Strategic Engagement

Oregon's 2022 Biennial Energy Report

The Oregon Department of Energy is seeking input for the **2022 Biennial Energy Report**. The report is legislatively required (ORS 469.059) and produced by our agency every even-numbered year to inform local, state, and regional energy policy, planning, and investments. It includes basic facts about energy in Oregon, reviews of resources and technologies, foundational information on key topics, a timeline of Oregon's energy history, and policy briefs on timely and relevant issues.

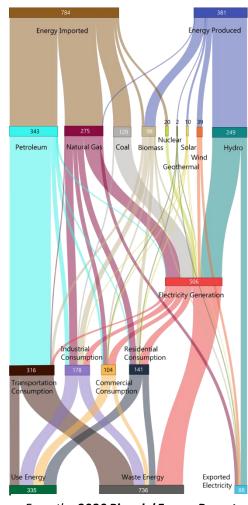
The project team plans to address required topics through a data-driven process, incorporation of equity considerations, and assessment of the policy landscape. The 2018 and 2020 Energy Reports are archived online.¹

Topics Required in ORS 469.059

- Consumption, generation, transmission and production of energy, including fuel energy
- Energy costs
- Energy sectors, markets, technologies, resources and facilities
- Energy efficiency and conservation
- The effects of energy use, including effects related to greenhouse gases
- Local, state, regional and federal regulations, policies and planning activities
- Emerging opportunities, challenges, and impacts

The report may also include recommendations for:

- Development and maximum use of cost-effective conservation methods and renewable resources, consistent with the energy policies stated in <u>ORS 469.010, 469.310</u>, and the <u>Northwest</u> <u>Power and Conservation Council's plans</u>.
- Proposed research, development and demonstration projects and programs necessary to further the energy policies stated in ORS 469.010 and 469.310.



From the **2020 Biennial Energy Report**Oregon's energy flow (page 1)

¹ https://www.oregon.gov/energy/Data-and-Reports/Pages/Biennial-Energy-Report.aspx



Project Timeline & How to Provide Input

January – March 2022: Public Survey and Stakeholder Input Sessions

January – April 2022: Updating *Energy By The Numbers* and *Technology and Resource Reviews* sections from the 2020 Report with current data

February – April 2022: Updating and expansion of timeline for Oregon Energy History

April – June 2022: Drafting for remaining sections of the Report – *Energy 101* and *Policy Briefs*. Will include ongoing stakeholder feedback and input.

July – August 2022: Peer Review and Fact Check

August - September 2022: Final reviews and revisions

September – November 2022: Formatting and Publication

Based on this timeline, we hope to gather all substantive input on your ideas for the 2022 Energy Report **by March 31**, **2022**. ODOE staff is happy to discuss your input or receive it via email or our comment portal:



You can submit input via this comment portal: tinyurl.com/BER-Portal



You can send input via email or request a meeting to discuss an idea with us by emailing AskEnergy@oregon.gov

.....

Questions to Guide Input

Energy By the Numbers. A section of the Report that serves as quick-reference energy facts and infographics with concise explanations about energy resources, energy sectors, and electricity use, direct fuel use, and transportation fuel use in Oregon. The 2022 Report will update much of the <u>2020 report section</u> to reflect current data.



The 2022 Report's Energy By the Number section will largely address the same types of questions and data as an update of the 2020 Report's "Energy By The Numbers" -- Are there other questions that are best addressed through energy facts and infographics? Are there different data sources that the Department should evaluate?



Energy Technology and Resource Reviews. A section of the Report that provides concise information about energy technologies and resources used in Oregon – how much, trends, potential, and non-energy implications such as equity considerations, greenhouse gas emissions, and information about the economy and jobs. It's meant to serve as a quick guide, but also to support your own discussions with your stakeholders.

The 2022 Report will build on <u>Technology and Resource Reviews from the 2020 Report</u> with updated data and several new Technology and Resource Reviews.

Existing Energy Technology and Resource Reviews from the 2020 Report to be updated with most recently available data	New Energy Technology and Resource Reviews ODOE is considering for the 2022 Report
 Hydropower Conduit Hydropower Natural Gas Wind Coal Solar Biomass Biogas and RNG Geothermal Utility-Scale Energy Storage Residential Energy Storage Nuclear Small Modular Reactors Demand Response Advanced Meter Infrastructure Combined Heat and Power Electric Vehicle Chargers Electric Vehicles Hydrogen Fuel Cell Vehicles Resilience Microgrids Marine Energy Carbon Capture and Storage Power to Gas 	 Transportation Fuels (e.g., gasoline, diesel, natural gas, renewable fuels) Building Technologies (e.g., smart appliances, EV chargers, smart thermostats) Heat pumps Water Heaters Heating fuels (e.g., natural gas, propane, biomass, geothermal) Energy Storage (e.g., pumped hydro, battery storage, thermal) Distributed Energy Resources



Are there additional types of energy resources or technologies that would be helpful to include that are not in the existing or new lists above? What questions have you, your organization, or your stakeholders had about energy resources and technologies in Oregon? Are there different data sources that the Department should evaluate when developing these Reviews?



Oregon Energy History. A section of the Report that shares relevant history about energy in Oregon to help create a foundation for ongoing policy discussions and to help educate stakeholders that may be new to energy policy in Oregon. The 2022 Report will build on the timeline in the 2020 Report with additional history points of reference and/or deeper content.



What, if any, major energy history references or events are missing from the <u>2020 Report's Energy History Timeline</u>? What references on the timeline could be expanded with more information and content (such as interviews, photographs, summaries, or other media?)?

Energy 101. A section of the Report that is made up of short summaries of key foundational topics, with the intent to help bring energy education to a level playing field across stakeholders.



ODOE Staff will be tracking policy discussions during the 2022 session to consider topics that might benefit from an "Energy 101" summary. ODOE staff will seek input from stakeholders on this section of the Energy Report after the 2022 session. Stay tuned!

Policy Briefs on Key Energy Questions. A section of the Report that is made up of overviews of relevant policy issues, each providing information and considerations for key energy questions that have been or are likely to be discussed over the next two years in Oregon.



ODOE Staff will be tracking policy discussions during the 2022 session to consider topics that might benefit from a <u>Policy Brief</u>. ODOE Staff will seek input from stakeholders on this section of the Energy Report after the 2022 session. Stay tuned!



Infrastructure Investment & Jobs Act

Energy-Related Funding

The Infrastructure Investment and Jobs Act provides funding for energy-related programs and infrastructure. Some of these funds may become available to communities in Oregon.

Select opportunities in the Infrastructure Investment and Jobs Act include:

Energy Efficiency and Conservation Block Grant: Larger counties, larger cities, and tribes will
receive direct funding to support energy efficiency planning and implementation. Some of this
funding will be provided to ODOE to distribute to smaller communities.

Estimated amount: \$395 million across the U.S.

- **2. Transmission Related Funding:** Considerable funding opportunities exist for transmission-related funding under the IIJA. Under a handful of funding opportunities, utilities, grid operators, states, and local governments can receive funding to strengthen the existing grid, increase grid resilience, and promote efficiency. Some funding opportunities include:
 - Transmission Facilitation Program and Fund (\$50 million in competitive funding; \$2.5 billion in loan funding)
 - Grid Infrastructure, Resilience, and Reliability (\$2.5 billion to be distributed to states; \$2.5 direct grants to utilities)
 - "Program Upgrading Our Electric Grid and Ensuring Reliability and Resiliency" (\$5 billion)
 - Energy Improvement in Rural or Remote Areas and energy Infrastructure Resilience Framework (\$1 billion)

Estimated amount: Approximately \$11 billion across the U.S.

These are new programs, and additional information will be coming from US DOE in the future.

3. SMART Grid Investments: Competitive funding available to utilities and governments to cover up to 50 percent of the cost of upgrades to transmission, distribution, manufacturing, and customer systems. To read about projects funded previously through the program during the American Recovery and Reinvestment Act, visit http://www.smartgrid.gov/recovery_act/

Estimated amount: \$3 billion across the U.S.

4. Zero Emissions School Buses: Competitive funding for the replacement of diesel-fueled school buses to Zero Emission Vehicles.

Estimated amount: \$5 billion across the U.S.

5. Port Resilience: Funding for projects that improve the resilience of ports and port electrification, such as EV charging and hydrogen fueling infrastructure for drayage, trucks, and locomotives at ports, and grid related upgrades.

Estimated amount: \$2.25 billion across the U.S.

6. Hydrogen Commercialization and Deployment: \$8 billion in funding to create Regional Clean Hydrogen Hubs and \$500 million for the Clean Hydrogen Manufacturing and Recycling Program.

Estimated amount: \$8 billion across the U.S.

7. Carbon Capture and Utilization: Several funds to support the development and implementation of Carbon capture and sequestration, storage and transportation technology, and implementation. Programs include grants to 1) procure products that demonstrate significant net reductions in greenhouse gases (\$300 million); 2) programs to design and engineer CO2 transport infrastructure (\$100 million); 3) provide loans and loan guarantees (\$2.4 billion); and 4) establish four regional direct air capture hubs (\$3.5 billion).

Estimated amount: \$6.3 billion across the U.S.

- 8. Grants to Public School Facilities for Energy Efficiency and Renewable Energy Improvements
 Estimated amount: \$500 million across the U.S.
- **9. Building Energy Codes:** Competitive funding available to states and tribal energy offices in partnership with energy codes stakeholders to identify and adopt more efficient energy building codes.

<u>Estimated amount:</u> \$225 million across the U.S. *ODOE is an eligible applicant for these funds.*

10. Electric Vehicle Charging Infrastructure: Funding to government entities to install alternative fuel infrastructure and electric vehicle charging stations along designated Alternative Fuel Corridors.

Estimated amount: \$7.5 billion across the U.S.

11. Battery Recycling: Funding for various phases of battery lifecycles including manufacturing, collection, recycling, and reprocessing.

Estimated amount: \$200 million across the U.S.

12. Manufacturing Technology: The law provides funds to support expansion of Industrial Assessment Centers and training. There is also competitive funding (up to \$2 million per state) available to states to establish Smart Manufacturing technology implementation programs.

Estimated amount: \$600 million across the U.S.

Please Note: Funding estimates are provided at a national level only. Some programs will be distributed by formulas and others will be through competitive application only. Many programs must be first established at the federal level before more information is known regarding the method fund disbursal. This list is not exhaustive but seeks to highlight major energy opportunities from the Infrastructure Investment and Jobs Act.



2021-2024 Strategic Plan

The Oregon Department of Energy helps Oregonians make informed decisions and maintain a resilient and affordable energy system. We advance solutions to shape an equitable clean energy transition, protect the environment and public health, and responsibly balance energy needs and impacts for current and future generations.



Imperatives	Objectives	Initiatives
Expand and Improve Stakeholder Engagement	 Increase diversity of agency stakeholder groups, rulemaking, oversight, and advisory boards Year-over-year increase in agency engagement with organizations representing historically and currently underserved populations and communities Year-over-year increase in the external use of agency produced reports, studies, and presentations 	 Conduct assessment of current agency decision-making and advisory bodies to identify opportunities for more diverse representation Develop a communication plan and engagement process collaboratively with historically and currently underserved populations and communities that includes actively listening, being responsive, and incorporating feedback in the development of programs, policies, and other areas of work Build on existing tribal engagement efforts by expanding internal responsibilities and resources, and reaching out to tribes to assess and amplify shared interests and priorities Work with external entities to assess their needs and priorities to strengthen relationships and better inform Oregon's energy policies and programs Strengthen staff capacity within ODOE to serve as liaisons and ambassadors with communities, stakeholder groups, and Tribes.
Build Practices and Processes to Achieve More Inclusive and Equitable Outcomes	of Color. • Year-over-year increase in the percent of historically and	 Enhance ODOE's internship program to provide benefits to interns, such as paid positions and greater access to educational credits, to help build a more diverse network of ODOE and energy industry employees Develop a Diversity, Equity, and Inclusion Action Plan in partnership with historically and currently underserved populations and communities Create inclusive, multi-lingual communications to increase accessibility of agency program information and services Conduct agency-wide DEI assessment and training to measure and increase employee knowledge, awareness, and skills
Assess and Enhance Organizational Data Capabilities	 100% of specified agency products (e.g., produced reports, studies, and analyses) use standardized agency data methodologies or tools Year-over-year increase of collection, review, and analysis of data Year-over-year increase in data sharing relationships 	 Establish and internally communicate agency data standards and tools Assess and enhance agency data management roles, responsibilities, and internal structures Enhance staff data analysis and visualization skills to bring more interactive, value-add products (e.g. external data dashboards) to stakeholder Audit agency datasets to identify gaps and ensure they support implementation of state programs and priorities Collect and analyze demographic data to better inform ODOE's work and to identify barriers to achieving equitable energy outcomes Identify, catalog, and conduct outreach with data-holders across the state and among stakeholders
Assess and Modernize Agency Programs and Activities	 100% of ODOE programs and activities align with ODOE mission and position statements Complete assessment of ODOE work in the context of the state's energy ecosystem to identify redundancies and gaps 	 Conduct a strategic evaluation of each program and activity. Share the outcomes of the strategic evaluation and describe the alignment of programs and activities with ODOE's mission and position statements. Where necessary, identify actions to achieve better alignment. Collaborate with energy stakeholders to identify Key Energy Indicators and state priorities and objectives (including statutory targets and goals, executive orders, non-energy goals like job creation, other executive guidance like the Equity Framework) Create dashboard(s) to monitor and report on status of Key Energy Indicators Build on collaborative effort to assess how other agencies and organizations in the state are working toward Key Energy Indicators and state priorities, and identify areas where ODOE's work may overlap with other entities or where there might be gaps in state efforts.

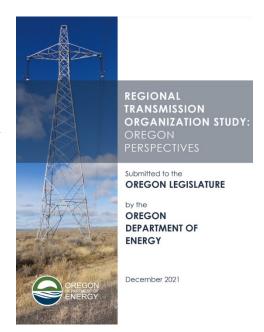
Optimize Organizational Efficiency and Impact

- Increase average Gallup Q12 engagement score to at least 4.0 (out of 5.0)
- Increase "Efficient and effective processes & procedures" (Whole Systems Model) survey score to at least 3.5
- Increase in Key Performance Measure customer satisfaction score to at least 95%
- Update and improve employee development and recognition plans and programs
- Create internal action teams to identify and implement cross-functional process improvements
- Evaluate and improve agency collaboration and communication culture
- Update ODOE's KPM customer satisfaction survey and implement timelier customer service evaluations

NEW ODOE STUDY OUTLINES OPPORTUNITIES AND CHALLENGES OF A REGIONAL TRANSMISSION ORGANIZATION

The Oregon Department of Energy published <u>a new study</u> in December outlining the opportunities, challenges, and barriers of a potential Regional Transmission Organization, or RTO, in Oregon and the Northwest.

An RTO is an independent, nonprofit organization designed to ensure reliability of the bulk power system, and to optimize supply and demand for wholesale electricity. One of the primary functions of an RTO is operation of the electric transmission grid across a large, often multi-state area. RTOs can influence how energy is bought and sold to meet customer demand, how to ensure resources are adequate to serve future demand, and how utilities create sufficient transmission to maintain reliable delivery of energy to customers.



In 2021, the <u>Oregon Legislature directed</u> ODOE to develop the study, which includes a literature review of recent relevant studies and outlines helpful stakeholder expertise and feedback the agency heard throughout report development.

An RTO Advisory Committee and other public comments provided valuable feedback and expertise for the report, including: identifying a need for balancing competing interests; discussing how an RTO could economically benefit Oregon retail customers as long as barriers are addressed; noting that an RTO could benefit the transmission system, but wouldn't necessarily solve cost, siting, and permitting challenges; and acknowledging that RTOs typically haven't addressed equity, environmental justice, and resilience issues, but could during RTO design. Stakeholders provided input on several other areas – dive into the report to learn more.

ODOE's report doesn't include a specific recommendation for RTO formation. Rather, it's designed to help Oregon's policymakers, utilities, and other stakeholders better understand how an RTO could affect our energy landscape. From the rapid deployment of wind and solar generation, to the retirement of coal plants and the adoption of aggressive decarbonization policies, the electric sector is undergoing significant transformation. A potential RTO is another path leaders can consider as we build on the current momentum to explore increased regional collaboration and coordination in the electric sector.

The study is available on **ODOE's website**.





550 Capitol St. NE Salem, OR 97301 Phone: 503-378-4040 Toll Free: 1-800-221-8035

FAX: 503-373-7806 www.oregon.gov/energy

November 19, 2021

Northwest Power and Conservation Council 851 SW 6th Avenue #1100 Portland, Oregon 97204

Council Members and Staff:

The Oregon Department of Energy ("Department") welcomes the opportunity to offer written feedback to the Northwest Power and Conservation Council's ("Council" or "NWPCC") draft of the 2021 Northwest Power Plan ("2021 Plan"). The Department helps Oregonians to make informed decisions and maintain a resilient and affordable energy system. We advance solutions to shape an equitable clean energy transition, protect the environment and public health, and responsibly balance energy needs and impacts for current and future generations.

I. Introduction

Our comments are informed by the state's commitment to deep decarbonization through both executive action and legislation. Executive Order 20-04 directs state agencies to take actions to reduce greenhouse gas emissions to 80 percent below 1990 levels by 2050. Meanwhile, House Bill 2021, signed into law in July 2021, requires Oregon's large investor-owned utilities and electricity service suppliers to reduce greenhouse gas emissions associated with electricity sold to Oregon consumers to 80 percent below baseline emissions levels by 2030, 90 percent below baseline emissions levels by 2035, and 100 percent below baseline emissions levels by 2040. It is in this context that the Department looks to the 2021 Plan to offer the type of comprehensive and objective regional analysis that only the Council can provide to identify the optimal regional resource strategy for Oregon to achieve its aggressive climate policy objectives.

While the Department is supportive of several additions to the 2021 Plan compared to previous Plans, the Department also has significant concerns with other elements of the Plan as currently drafted. Our comments below focus on some of these concerns, including in the following areas: the need for more robust regional decarbonization analysis; historically low targets for energy efficiency; low natural gas price forecast; the treatment of energy storage and distributed energy resources; and resource adequacy. In sum, the Department believes it is critical for the region to have robust, objective analysis of the range of tools available to the power sector to meet its clean energy and climate objectives in a manner that can alleviate pressure on the hydropower system and minimize the potential adverse impacts of energy development.

II. Support for New Additions to the 2021 Plan

The Council has taken significant steps forward in several areas with the 2021 Plan, including the incorporation of climate impacts into baseline forecasting; the development of more granular modeling of the regional hydropower system; and considerations of equity.

Climate Impacts. It is clear Oregon's climate is already changing. In 2021 alone, Oregon has been visited again by catastrophic wildfires, historic ice storms that knocked out power to hundreds of thousands of customers in the Willamette Valley, and temperatures in late June that soared above 115 degrees in the Portland metro region. ODOE supports Council's incorporation of the direct and indirect impacts of climate change in its projections of temperature, precipitation, and river flow for its forecasts of regional electricity demand and hydropower system operations.¹

We agree with the Council's determination that this method better predicts future conditions than using the observed 80-year historical records, which had been the previous practice. Furthermore, we appreciate Council staff's effort to develop regional-specific climate impact estimates using

.

¹ Draft 2021 Power Plan, page 4-24.

downscaled projections from the well-vetted General Circulation Models.² These efforts add considerably to the value of the 2021 Plan and can help guide other modeling efforts for the region.

Modeling Hydropower Flexibility. The accelerated deployment of wind and solar generation to meet our climate objectives demands that the electric sector adapt to integrate these variable output resources. Gas turbines and battery storage systems can provide the type of flexibility necessary to do this, but so too can the northwest's robust, carbon-free hydropower resource. We appreciate the Council investing significant resources to redevelop its GENESYS model to improve its modeling of the flexibility of the region's hydropower system.

It is critical that Oregon understand the true limits of the hydropower system to integrate renewable generation as we push to meet our climate goals in the years ahead. However, the Department has heard from several stakeholders concerns that this new modeling has now attributed too much flexibility to the region's hydropower resource compared to its historic operations, or what would be prudent in the future to achieve the multiple objectives of the region's hydropower system. While we support efforts to develop a more granular understanding of the flexibility of the hydropower system, we also appreciate the need for accuracy and encourage the Council to continue refining its modeling in this regard.

Equity Considerations. The Department also supports the Council's efforts to address the existing data gap related to diversity, equity, and inclusion in the power planning process for the first time. Section 5 of the 2021 Plan, for example, addresses conservation standards and the need to ensure equity in the adoption of energy efficiency measures. We would like to see additional consideration given to inequities associated with the supply-side of the system. Specifically, proximity of historically underrepresented and low-income communities to local air pollution from generating facilities, or land-

² Draft 2021 Power Plan, page 3-12.

use impacts from transmission infrastructure. Incorporating this type of information could help states across the region to prioritize future investments or retirements of existing assets in the power sector.

III. Areas of Concern with the 2021 Plan

While the Department recognizes the immense amount of work—by the Council members, their state advisory staff, the Council's power division, and the region's many stakeholders—that went into the development of the 2021 Plan, we have identified several areas of concern that should be addressed to improve the value of this Plan for the region. Ideally, ODOE would like for the Council to revisit these issues before publication of the final 2021 Power Plan. If it is not practical to address these issues given the timeframe required to finalize the Plan, we encourage the Council to open investigations into these issues as soon as possible upon completion of the 2021 Plan.

Deep Decarbonization. The Council's decarbonization scenario is not sufficiently aggressive to model the level of GHG reductions necessary in Oregon to achieve its climate policy objectives. The Department supports the inclusion of a Pathways to Decarbonization scenario in the Plan, which appears to model a reduction in GHG emissions of approximately 40 percent below 1990 emissions by 2050. We appreciate that the reason the Plan includes this decarbonization scenario is that the incremental demand on the electric system from a more aggressive decarbonization scenario led to a resource expansion path beyond the capabilities of the structure of the analysis. We further acknowledge that the scenario modeled does provide a directional analysis of the possible impacts expected from decarbonization.

However, Oregon is committed to an 80 percent reduction in economy-wide emissions below 1990 levels by 2050, as well as 100 percent decarbonization of the power sector by 2040. We also note that Washington has adopted a goal of net-zero emissions by 2050, and that many other states across the west have adopted similarly aggressive decarbonization goals. As a result, there is an urgent need in

these states, including in Oregon, for independent modeling (the type the Council can provide) to understand the likely significant impacts on the identified optimal resource strategy (e.g., higher loads due to electrification, more energy efficiency, more storage, more aggressive renewable build out).

Other research efforts have modeled aggressive decarbonization scenarios including the Clean Energy Transition Institute Northwest Deep Decarbonization Pathways Study, and E3 Pacific Northwest Pathways to 2050.

Notably, we believe that the Council is uniquely situated with its decades of northwest-specific modeling experience, its highly regarded reputation in the region, and its extensive engagement with regional stakeholders to build upon these efforts to provide meaningful guidance to Oregon and the region. Analysis by the Council that reflects an 80 percent economy-wide emissions reduction below 1990 levels by 2050 would add considerably to this existing body of work, and lend credibility and relevance to the Council's regional power planning. If not feasible to include this type of analysis in the 2021 Plan, we encourage the Council to engage in this type of analysis as soon as practical after publication of the Plan.

Energy Efficiency. The Council's work is crucial to ensuring Oregon and the region identify and pursue all cost-effective energy efficiency. The region has saved over 7,200 average megawatts from energy efficiency since 1978, which is 20 percent more electricity than the entire state of Oregon consumed in 2019. The Council's decades of work have established the region as a national leader on energy efficiency by consistently meeting increased demand for electricity through energy efficiency. We offer two recommendations on energy efficiency: (1) adoption in the 2021 Plan of a regional energy efficiency target of at least 1,000 aMW, and (2) a re-evaluation of the Council's cost-effectiveness methodology for energy efficiency following publication of the 2021 Plan.

The Department encourages the Council to adopt a regional energy efficiency target for the Action Plan period of the 2021 Power Plan of *at least* 1,000 aMW, which we note would still represent a

significant reduction from the target adopted in the previous Power Plan. We encourage adoption of this target now, along with further near-term evaluation to quantify the many diverse benefits of energy efficiency. Adopting a range instead of a single target would make it challenging to measure success and would remove the incentive to acquire resources beyond the low end of the target. This could result in leaving energy efficiency on the table that could deliver additional benefits to meeting capacity and decarbonization objectives simply because those benefits are not adequately captured by current modeling. A higher-end, single point target is important because it would support stable but significant regional energy efficiency efforts, infrastructure, and jobs. In 2019, there were nearly 43,000 jobs in the energy efficiency in Oregon alone.³ This type of target would help to mitigate the risk of backsliding should there be a large scale-down of efficiency programs and activities. Reduced capacity to deliver energy efficiency over time cannot be easily replaced or ramped up.

The diverse benefits of energy efficiency that current modeling may not adequately capture include:

- Decarbonization. Saving 7,200 aMW from energy efficiency since 1978 with little to no environmental footprint enabled the region to avoid building many new power plants. According to the Council's analysis, this annually avoids greenhouse gas emissions of approximately 22 million metric tons of carbon dioxide. Energy efficiency is a pillar of the region's and Oregon's decarbonization plans.
- <u>Capacity</u>. There is value to the power grid in the reduction of kWh of energy from
 investments in energy efficiency, but there is also significant value in the kW capacity
 reductions in the coincident peak demand that can accompany investments in energy
 efficiency.
- Resilience, Reliability, and Reserves. Low-probability, high-impact events can be very
 expensive. Reduced system demand from more efficient buildings and equipment could
 mitigate some of the impacts of these types of events. Energy efficiency also provides

_

³ Oregon Department of Energy, 2020 Biennial Energy Plan: Energy by the Numbers. Page 39. Available online: https://www.oregon.gov/energy/Data-and-Reports/Documents/2020-BER-Energy-by-the-Numbers.pdf#page=39

resilience benefits for individual customers who can better withstand severe weather events in well-insulated buildings with high-efficiency appliances. Energy efficiency also makes our electrical system more reliable, dependable, and can help mitigate transmission constraints. Energy efficiency also works as a highly valued reserve, and how it functions as a reserve should be fully analyzed.

- <u>Economic Impacts</u>. Investment in energy efficiency increases local economic growth and jobs. Energy efficiency has also been shown to improve health outcomes from less air pollution, and can help reduce the energy burden on disadvantaged communities.
- Enabling Flexibility. Increasingly, investments in energy efficiency measures may be paired with demand response capabilities to provide new flexibility to the electric grid. This type of flexibility will become more important in the years ahead to cost-effectively integrate the growth in output from variable wind and solar projects, as well as distributed energy resources, that is necessary to meet clean energy policy objectives.

For the 2021 Plan, adoption of a single target of at least 1,000 aMW would allow the Council to send a clear signal that the region continues to prioritize energy efficiency and that it recognizes the varied benefits of energy efficiency beyond the traditional metric of kWh of energy saved, even if those benefits are not adequately quantified with current tools. Going forward, the Department encourages the Council to engage with regional stakeholders in a public process to reconsider how its cost-effectiveness methodology for energy efficiency can better represent the full range of benefits that investments in efficiency can deliver.

Natural Gas Price Forecast. The assumed price of natural gas affects the resource strategies selected by models. Given the historic volatility of natural gas prices in the United States, combined with expanding liquefied natural gas exports, the Department suggested in our comments to the Mid-Term Assessment of the Seventh Power Plan that the Council should revise its natural gas price forecast to evaluate more risk of higher gas prices in the near-term future.

The Department notes that the natural gas price forecast adopted by the Council shows a highend price of approximately \$5/mmBtu by 2025.⁴ Meanwhile, according to the U.S. Energy Information Administration, natural gas spot prices have been steadily climbing since Summer 2020, with prices eclipsing \$5.50/mmBtu in October 2021.⁵ The Council's mid-range forecast for 2021 is less than \$3.00/mmBtu. While EIA shows continued robust domestic production of natural gas,⁶ there has been a significant increase in U.S. exports of LNG in the last two years.⁷ Given global demand and significantly higher natural gas prices in foreign markets, the Department expects upward pressure to remain on domestic natural gas prices. As a result, we believe that the Council should revisit its natural gas price forecast to ensure that the 2021 Plan adequately captures the risk of higher gas prices on the identified resource strategy.

Modeling of Battery Storage. The cost of lithium ion battery storage systems continues to decline at a rapid pace, with prices declining 13 percent in 2020 alone according to Bloomberg New Energy Finance.⁸ This decline in costs has made it difficult to keep up with the changing pace of expected deployment of grid-connected battery storage systems.

For example, the California Independent System Operator had approximately 550 MW of grid-connected battery storage on its system at the end of 2020. In September of this year, however, CAISO had 1,500 MW of connected battery storage capacity, and expects to reach 3,000 MW by the end of

⁴ Draft 2021 Power Plan, page 6-50.

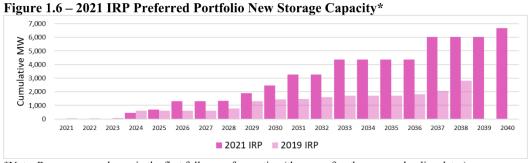
⁵ U.S. Energy Information Agency, *Henry Hub Natural Gas Spot Price*. Available online: https://www.eia.gov/dnav/ng/hist/rngwhhdm.htm

⁶ U.S. Energy Information Agency, *U.S. Natural Gas Marketed Production*. Available online: https://www.eia.gov/dnav/ng/hist/n9050us2a.htm

⁷ U.S. Energy Information Agency, *Liquefied U.S. Natural Gas Exports*. Available online: https://www.eia.gov/dnav/ng/hist/n9133us2m.htm

⁸ Bloomberg New Energy Finance, *Electric Vehicle Outlook 2021*. Available online: https://about.newenergyfinance.com/electric-vehicle-outlook/

2021–22 Transmission Planning Process, which includes more than 9,300 MW of battery capacity in its base case (compared to little more than 1,000 MW in its 2020-21 Transmission Planning Process). Department staff also closely track the integrated resource plans of Oregon's investor-owned utilities and are beginning to see similar trends here. The following figure from PacifiCorp's 2021 IRP, for example, shows the dramatic increase in the selection of battery storage in its identified preferred portfolio between its 2019 and 2021 IRPs: 11



*Note: Resources are shown in the first full year of operation (the year after the year-end online dates).

While the Council's decarbonization scenario selects 800 MW of battery storage, ¹² battery storage does not appear in the Council's recommended resource strategy. We do not have an adequate understanding of how the Council modeled battery storage to understand why the recommended resource strategy did not select it. That said, given the rapid decline in battery storage costs, and what we are observing in CAISO and utility IRPs in Oregon, we encourage the Council to revisit its assumptions

⁹ California Independent System Operator, *California ISO Shows Dramatic Impact of Storage Added to the Grid*. Press Release: September 13, 2021. Available online: http://www.caiso.com/Documents/California-ISO-Shows-Dramatic-Impact-of-Storage-Added-to-the-Grid.pdf

¹⁰ Bishara, J., *Preliminary Policy and Economic Assessment and Study Updates*. Presented at 2021-2022 Transmission Planning Process Stakeholder Meeting. November 18, 2021. Slides 23 & 25 on pages 11-13. Available online: http://www.caiso.com/InitiativeDocuments/Presentation-2021-2022TransmissionPlanningProcess-Nov18-2021.pdf

¹¹ PacifiCorp, *2021 Integrated Resource Plan*. Pages 11-12. Available online: https://www.pacificorp.com/content/dam/pcorp/documents/en/pacificorp/energy/integrated-resource-plan/2021-irp/Volume%20I%20-%209.15.2021%20Final.pdf

¹² Draft 2021 Power Plan, page 6-84.

on its modeling of energy storage. We believe that battery storage is likely to contribute significantly to the region's resource mix in the years ahead, and can provide a key source of flexibility to help maintain system reliability and integrate wind and solar resources while alleviating pressure on the region's hydropower system and reducing the need to dispatch gas peaker plants.

Treatment of Distributed Energy Resources. The 2021 Plan treats customer-sited DERs as a reduction in demand, rather than as a resource to meet load, as is done with utility-scale generation and energy efficiency. As DERs become more prevalent in the northwest, we encourage the Council to characterize DERs as a resource that can help to meet system needs, rather than as simply a source of demand reduction.

Portland General Electric and PacifiCorp are both piloting programs to operate customer-sited solar and storage resources for grid services. For example, PGE has partnered with Virtual Peaker to operate up to 525 customer-sited facilities. Similarly, PacifiCorp will be expanding its Wattsmart batteries program to Oregon customers. In addition, in its recently-filed Distribution System Plan, PGE estimates that as much as 25 percent of the flexibility needed by its system to accommodate HB 2021's 100 percent clean energy supply requirements could come from customers and DERs. Characterizing customer-sited DERs as supply-side resources will better enable planning for the potential benefits as well as integration challenges associated with DERs.

Resource Adequacy. The Department appreciates the objective, independent analysis of the adequacy of the regional power system that the Council provides. We have feedback on four separate

¹³ PGE UM 1856 PGE Draft Storage Potential Evaluation 2021 Annual Energy Storage Update. https://edocs.puc.state.or.us/efdocs/HAD/um1856had162631.pdf

¹⁴ Rocky Mountain Power, Wattsmart Batteries program. https://www.rockymountainpower.net/savings-energy-choices/utah-wattsmart-battery-program.html

¹⁵ Portland General Electric, *Distribution System Plan Part* 1. October 2021. Page 9. Available online: https://assets.ctfassets.net/416ywc1laqmd/i9dxBweWPkS2CtZQ2lSVg/b9472bf8bdab44cc95bbb39938200859/DS
P 2021 Report Full.pdf

elements of the Council's resource adequacy analysis: hydropower flexibility, transmission constraints, unit commitment, and climate resilience.

Hydropower flexibility: As noted above, we appreciate the Council's effort to develop hourly-specific hydroelectric system constraints to better represent the actual flexibility of that system, ¹⁶ which will be particularly relevant to the integration of increasing levels of wind and solar generation in the years ahead. We are aware that some stakeholders have identified concerns with the degree of flexibility—particularly large intra-day swings in output—associated with individual hydropower projects in the Council's redeveloped GENESYS model. It is our understanding that these concerns are centered on the potential adverse impacts on fish species in the Columbia River Basin that may result from these types of operations.

The Department does not have a perspective on whether the Council's hourly-specific hydroelectric modeling has adequately hit the mark in terms of accurately representing the real-world flexibility that exists at these projects, or that is practical or feasible going forward. That said, given the importance of this type of analysis to the integration of wind and solar on the power system, combined with concerns about adverse impacts on non-power objectives of the river system, we encourage the Council to revisit its assumptions on modeling of the hydropower system. Moreover, ODOE is aware that the Council held a three-day technical conference in August 2021 focused largely on this very issue. ¹⁷ We would encourage the Council to consider ways to engage regional stakeholders in a discussion of the parameters for modeling hydropower flexibility in a less technical, more accessible manner.

<u>Transmission constraints</u>: Given the scale of new wind and solar development anticipated in the northwest and across the west in the decades ahead, the region may need to develop new transmission assets to ensure the deliverability of these generation resources to meet loads during times of system

¹⁶ Draft 2021 Power Plan, page 4-24.

¹⁷ RAAC/SAAC – Adequacy/GENESYS Technical Conference. August 4-6, 2021. Available online: https://www.nwcouncil.org/meeting/raacsaac-adequacygenesys-technical-conference-august-4-2021

peak. These constraints may become more consequential as a result of increased electric loads driven by electrification of end-uses, including transportation. As an alternative to new transmission investment, some of these constraints could be mitigated by the deployment of battery storage or the strategic deployment of DERs, including energy efficiency. The Department encourages the Council to engage with regional stakeholders to identify these types of transmission constraints and to collect data from transmission providers to provide some regional expectation of the level of investment necessary (in transmission or in alternative mitigation solutions) to ensure the deliverability of these generating resources to contribute to maintaining resource adequacy.

Unit commitment: The re-developed GENESYS model identified potential challenges to maintaining the Council's adequacy criteria for the power system in the near-term. The reason for this was driven not by insufficient capacity being online, but rather insufficient market prices (driven by increasing levels of renewables, particularly mid-day solar) causing units not to commit to service in the market.¹⁸ While the suppression of mid-day prices in the wholesale markets by solar output is a real phenomenon, we question whether market operators would actually de-commit units from the market mid-day if operators know that those units will be needed to maintain reliability later in the day. The Council acknowledged that re-running its analysis and forcing those thermal units to commit to the market regardless of available price resulted in a power system that met the Council's adequacy criteria. We encourage the Council to supplement its findings from the GENESYS model in this regard with analysis from market operators that own thermal units (such as PGE or PacifiCorp) to provide insight into how they might actually operate their units in the market under the circumstances described.

Climate resilience events: Climate change is increasing the frequency and severity of extreme weather events in Oregon and the northwest—from hundreds of thousands losing power due to a

¹⁸ Draft 2021 Power Plan, page 4-24 to 4-25.

severe ice storm,¹⁹ to the temperature in Portland peaking at 115 degrees (exceeding its previous all-time record high set in 1965 by +9 degrees),²⁰ to wildfire smoke knocking the AC intertie from the northwest-to-California offline.²¹ And these three severe-impact events all occurred in Oregon this year within the span of approximately 150 days.

The Department does not have a specific recommendation for how the Council's analysis of regional power system adequacy should consider these types of severe impact events, but we believe strongly that a regional conversation about how to do so needs to occur. Going forward, we encourage the Council to consider how to better incorporate an analysis of these types of events into its modeling of power system adequacy. We recognize that a broader consideration of outlier events (though given the increasing frequency of these types of severe events, it is becoming less clear how much of an outlier they may actually be in the future) may result in analysis suggesting significant new investments are necessary to maintain an adequate regional power system. We also recognize that there may be innovative ways to address these issues, such as through a more granular analysis of local resource adequacy and a consideration of the role of distributed energy resources to meet system needs.

IV. Conclusion

The Oregon Department of Energy commends the Council, its state advisory staff, and the Power Division staff for the hard work that went into the development of the Draft 2021 Power Plan.

The Council is the only entity capable of providing the type of regional, objective analysis of the

¹⁹ AP Staff and OPB Staff, *Northwest storm leaves hundreds of thousands without power*. February 14, 2021. Available online: https://www.opb.org/article/2021/02/14/northwest-storm-leaves-hundreds-of-thousands-without-power/

²⁰ Goldberg, Jamie, *Portland records all-time high temperature of 116, setting new record for third day in a row.* June 29, 2021. Available online: https://www.oregonlive.com/weather/2021/06/portland-records-all-time-high-temperature-of-113-setting-new-record-for-third-day-in-a-row.html

²¹ Sickinger, Ted. *Oregon wildfire robs California of critical electricity supply from Pacific Northwest during heatwave*. July 16, 2021. Available online: https://www.oregonlive.com/wildfires/2021/07/oregon-wildfire-robs-california-of-critical-electricity-supply-from-pacific-northwest-during-heatwave.html

northwest power system that is so critical to informing efforts in states like Oregon in pursuit of our aggressive clean energy and climate change policy objectives. In summary, we encourage the Council to make changes to the 2021 Power Plan in the following areas:

- Deep Decarbonization. Model an economy-wide 80 percent reduction in GHG emissions from 1990 levels by 2050 to identify an optimal resource strategy for the northwest.
- *Energy Efficiency*. Adopt a single-point target of at least 1,000 aMW in the 2021 Plan, and re-evaluate the Council's cost-effectiveness methodology for energy efficiency to account for the diversity of benefits provided by investments in efficiency beyond kWh savings.
- Natural Gas Price Forecast. Revisit the Council's natural gas price forecast to represent significantly more upside risk of higher prices in the near-term and into the future.
- Modeling of Battery Storage. Revisit the Council's assumptions about battery storage given rapid advancements and cost declines, and trends in CAISO and utility IRPs.
- Treatment of Distributed Energy Resources. Characterize DERs, like utility-scale projects and energy efficiency, as a resource to meet system needs rather than as a reduction in demand.
- Resource Adequacy. Build on existing analysis to refine modeling of hydropower flexibility,
 evaluate transmission constraints, more accurately characterize unit commitment issues,
 and consider how to incorporate climate resilience into power system adequacy analysis.

Finally, the Department notes that this is the first time that since 1983 that an "action plan" is not included in the Power Plan. Without clear targets and actions, it is difficult for the many entities in the region – stakeholders, utilities, state agencies, and other organizations – to understand their part in the path the Council has developed for the region. An action plan would be helpful in laying out the actions needed to address issues and uncertainties in the analysis, and the Department encourages inclusion of an action plan in the 2021 Power Plan.

As noted throughout this document, we would prefer that the Council address the issues we have highlighted in our comments to the maximum extent practical before finalizing the 2021 Power

Plan. Recognizing that in some cases it may not be possible, we encourage the Council to revisit these issues as soon as possible following publication of the 2021 Power Plan, with priority given (1) to modeling a more robust deep decarbonization scenario for the region, and (2) to initiating a process to re-evaluate its cost-effectiveness methodology for energy efficiency.

We appreciate your consideration of our comments to the 2021 Power Plan. Please contact

Adam Schultz (adam.schultz@energy.oregon.gov), Lead, Electricity & Markets Policy Group, with any

follow up questions or if the Department can provide assistance as the Council finalizes the 2021 Power Plan.

Sincerely,

Janine Benner, Director

Jane Be

Northwest Power Pool
7505 NE Ambassador Place, Suite R
Portland, Oregon 97220

Re: Northwest Power Pool's Western Resource Adequacy Program Governance

Dear Northwest Power Pool Steering Committee:

The signatory states to these remarks appreciate the opportunity to submit comments on the governance of the Northwest Power Pool's (NWPP) Western Resource Adequacy (RA) Program. These comments are the result of a series of NWPP-State/Provincial Governance Workshops and State/Provincial Meetings to discuss the NWPP's draft governance provisions for the Western RA Program. Eleven western states and the province of British Columbia participated in these workshops and meeting discussions. We appreciate the time and effort the NWPP has committed to working with the participating jurisdictions to define the important role of states and to refine governance details for the Western RA Program.

Maintaining resource adequacy is a critically important issue to regulators and policy makers in the West. States have historically been responsible for making determinations about reserve margins and resource capacity contributions; determinations that, indirectly, respond to state policies. It is important now that the NWPP and the Western states continue to work in collaboration toward the continued success of the Western RA Program and with a clearly defined role for how states will contribute to and participate in this effort. Effective engagement of policy makers in the Western RA Program will help to ensure the Program's long-term stability in light of diverse and rapidly evolving state policy choices regarding resources and markets.

These comments are submitted to the NWPP by representatives of Arizona, California, Colorado, Idaho, Nevada, Oregon, Washington, and Wyoming, in an effort to share with the NWPP their concerns with, and suggestions to improve, the Draft Governance Provisions and to better define the role of states in the Western RA Program.

NWPP BOARD OF DIRECTORS

The Board's Role in Decision-Making

Signatory states to these comments (hereinafter referred to as "Signatories") feel strongly that the NWPP's Western RA Program Governance Provisions must empower the Board of Directors to function as a <u>truly</u> independent Board. The NWPP proposes to restructure its Board to be comprised of independent Directors that are "independent of any participant or stakeholder in the RA Program, either

by employment or affiliation."¹ Additionally, the NWPP proposes Director term limits, providing that Directors may serve up to two three-year terms.²

Signatories agree that the NWPP Board must operate independently of RA Program participants and stakeholders and believe that term limits would further support original thinking and independence amongst Directors. However, Signatories are concerned that, as drafted, the Governance Provisions do not establish a truly independent role for the Board. Instead, the Governance Provisions create the perception, if not actuality, that the Board is merely a rubber stamp for actions approved by the RA Participants Committee (RAPC), giving the RAPC primary control over decision-making for the RA Program. As provided in the Detailed Design Document, "[i]f the RAPC approves an action and such action is not appealed to the [Board], the action is deemed to be approved by the [Board][.]"

The Board should not be presumed to have approved items that have not come before it. Nor should the Board be presumed to have approved items that may not have been presented clearly or that, for other reasons, have not been appealed to the Board. Signatories feel strongly that the NWPP RA Program Governance Provisions should not contemplate such a passive role for the Board. Instead, the Governance Provisions should provide a framework in which: 1) actions approved by the RAPC are brought before the Board as initiatives or agenda items; and 2) the Board will actively and effectively engage in consideration, decision-making, and approval of all RA Program actions. The Governance Provisions should empower the Board to deliberate on RA Program actions, to consider various stakeholder perspectives, and to actively engage in informed decision-making processes regarding the RA Program before approving actions and authorizing the NWPP to submit related regulatory filings.

Further, while not in agreement with the proposed decision-making/appeal process, Signatories recognize that a formal process to appeal decisions-made by the RAPC is necessary and appropriate. Signatories are concerned that an appeals process is not clearly detailed in the draft governance documents. Signatories recommend that the NWPP continue to work with the states, other stakeholders, and program participants to draft an appeals process specifying, among other things, who has standing to appeal decisions of the RAPC or Board, when an appeal must be filed and with whom, what process the NWPP will use to respond to appeals, and who will make a final determination on decisions appealed.

The Board's Relationship to the RA Participant Committee

Signatories feel strongly that the NWPP RA Program Governance Provisions must empower the Board to hold the RAPC accountable for discharging its responsibilities. The RAPC is responsible for developing and recommending RA Program policies, procedures, and system enhancements.⁴ The RAPC can approve or reject proposed amendments to the RA Program Tariff and can also consider, approve, or reject RA Program rules.⁵

¹ NWPP Regional Resource Adequacy Program DRAFT Governance Provisions (Draft Governance Provisions)(July 22, 2021), 1.

² NWPP Resource Adequacy Program – Detailed Design (Detailed Design Document)(July 2021), 23.

³ Detailed Design Document, 36.

⁴ Id. at 34.

⁵ Id.

As provided in the Detailed Design Document, "[t]he [Board] will provide independent oversight of NWPP's administration of the RA Program[.]" In doing so, the Board must also provide effective oversight of the RAPC.

Signatories feel strongly that the NWPP RA Program Governance Provisions should empower the Board—in its role of providing independent oversight of the RA Program—to hold the RAPC accountable for its actions or inactions in fulfilling these responsibilities.

Closed Executive Sessions of the Board

On the matter of Closed Executive Sessions of the Board, Signatories feel strongly that the NWPP RA Program Governance Provisions must be clear as to what matters will be addressed in closed Board sessions. The Detailed Design Document provides that "[Board] meetings for the RA Program will be open and noticed to all stakeholders for all meetings except when in executive session. Executive sessions (open only to Directors and to parties invited by the Chair) will be held as necessary upon agreement of the [Board] to safeguard confidentiality of sensitive information."

Signatories recognize that issues will arise that can only be appropriately addressed in closed sessions of the Board; issues such as personnel and legal matters. However, we request that the Governance Provisions provide more clarity, creating some parameters and identifying more specifically the matters to be addressed in closed session.

BOARD OF DIRECTORS NOMINATING COMMITTEE

Membership & Voting

Signatories feel strongly that the Committee of State Representatives (COSR) should have a meaningful vote in selecting members of the independent Board. As proposed in the Draft Governance Provisions, the Nominating Committee (NC) will be comprised of 12 individuals and will be responsible for recommending a nominee (or nominees) for open positions on the [Board]; the COSR will have one non-voting member that would, however, vote in the event of a tie. Further, the Draft Governance Provisions provide that the NC will be "patterned after the NC framework used for the Western [Energy Imbalance Market (EIM)]."

Signatories appreciate and support the NWPP's proposal to pattern the NC after the EIM NC. The EIM NC strives to achieve consensus in its decisions and recommendations and, although once comprised of both voting and non-voting members, has extended voting privileges to all EIM NC members. This model has proven successful in identifying strong candidates for an effective and independent EIM Governing Body.

⁶ ld.

⁷ Detailed Design Document, 28.

⁸ Draft Governance Provisions, 1-2.

⁹ Id. at 1.

Like the EIM NC, Signatories expect that the NWPP NC will also strive to reach consensus in selecting and recommending a nominee(s) for open positions on the Board. Further, as with the EIM NC, Signatories feel strongly that all NWPP NC members—including the states—should have the same level of influence as other members of the NC, as well as a meaningful voice in helping to select members of the independent NWPP Board. We recommend that the governance documents be revised to reflect that all members of the NWPP Board NC will have a vote—specifically noting that the COSR Chair or Vice Chair will act as a *voting* member of the NC—and that the NC will strive to reach a consensus position in its decisions and recommendations.

COMMITTEE OF STATE REPRESENTATIVES

Appointment to the RA Participants Committee

Signatories recommend that the COSR be able to appoint at least one representative to the NWPP's RA Participants Committee (RAPC). In the Draft Governance Provisions document, "[t]he NWPP proposes to create a [COSR] to advise the NWPP and the [Board] on the governance and design of the Regional RA Program." The RAPC is responsible for developing and recommending RA Program policies, procedures, and system enhancements. 11

The COSR would be best positioned to effectively engage in these areas and to advise the NWPP and the Board on the governance and design of the Regional RA Program if it were able to appoint a COSR representative to the RAPC; a COSR-RAPC member with a role and vote in the design process. In the Midwest Independent System Operator (MISO), for example, states hold four voting seats on the MISO participants committee (the equivalent to the NWPP RAPC). A similar governance structure for the NWPP would better support COSR engagement on the governance and design of the RA Program.

Further, Signatories feel strongly that appointing a COSR representative to the RAPC would provide greater transparency and important insight into RAPC actions and efforts. The Detailed Design Document provides that, "[m]eetings of the RAPC are open to all interested parties . . .", however, "the RAPC may limit attendance during specific portions of a meeting by an affirmative vote of the RAPC in order to discuss issues that require confidentiality." ¹²

The RAPC holds significant control over the performance and direction of the RA Program. Signatories feel that active participation in RAPC actions and efforts is important and that, for the sake of transparency, the COSR should have some view into RAPC activities. Engagement with the RAPC when significant discussions are underway is more effective than commenting after the fact on a recommendation or decision on which participants have agreed. However, at this time, the Detailed Design Document provides that "[p]articipation in RAPC is limited to Participants." For purposes of effective engagement with, and transparency into, actions of the RAPC, we recommend that the

¹⁰ Draft Governance Provisions, 2.

¹¹ Detailed Design Document, 34.

¹² Id. at 36.

¹³ Id.

Governance Provisions provide that the COSR be entitled to appoint at least one representative to the RAPC.

FERC Section 205 Filing Rights

Regarding the issue of COSR Section 205 Filing Rights, Signatories feel strongly that this is an issue that is important now and that may become even more important over time as the Regional RA Program continues to evolve. Section 205 of the Federal Power Act provides that "[a]II rates and charges made, demanded, or received by any public utility for or in connection with the transmission or sale of electric energy subject to the jurisdiction of the Commission . . . shall be just and reasonable, and any such rate or charge that is not just and reasonable is hereby declared to be unlawful." With Section 205 filing rights, the states could file a rate or tariff change proposal at FERC.

States have historically been responsible for determining both reserve margin requirements for utility system planning and capacity contributions of various resources. These state decisions bear heavily on regulators' state-authorized and state-mandated duties, in various agencies, to ensure that utility customers are protected, pay just and reasonable rates, and receive reliable service in accordance with state policies. The Western RA Program will introduce a regional element, as well as FERC jurisdiction, into such determinations and may alter, or at least supplement, the processes through which such determinations are made going forward. As the Western RA Program is established and begins operations, it is important to ensure that states can continue to fulfill their responsibilities to utility customers as defined by state legislatures with an appropriate ability to influence the Western RA Program's effect on such determinations. Having Section 205 filing rights from the start will give states a clear voice in doing so. Both the Southwest Power Pool (SPP) and the Midwest Independent System Operator (MISO) utilize shared Section 205 filing rights between the participants committee and the states committee. In SPP, decisions such as those proposed to be made by the NWPP's RAPC are delegated entirely to the states committee, which holds primary Section 205 filing rights. In MISO, the states committee holds four voting seats on the participants committee—the primary body charged with policy decisions—as well as complementary Section 205 filing rights.

Signatories feel strongly that Section 205 filing rights are important as the RA Program begins, favoring the use of Section 205 filing rights as a backstop mechanism, helping to ensure continued state authority over issues associated with state policy. Further, Signatories feel that Section 205 filing rights will continue to be important in the future, as the RA Program continues to evolve and potentially develop into a fully organized Western electricity market.

Designating COSR Members

Signatories feel strongly that the appropriate designation of representatives to serve on the COSR should be decided upon on a state-by-state basis. We appreciate NWPP's effort to reflect feedback already received on this issue in the Draft Governance Provisions¹⁴, which provide that, "[t]he [COSR] will be comprised of one representative from each state with a Load Responsible Entity (LRE) participating in the

¹⁴ Draft Governance Provisions, 2.

Regional Resource Adequacy Program, either from the public utility commission, a state energy office at each state's discretion or a state-funded consumer advocate."

States operate under different legal frameworks and may be positioned differently with respect to the responsibilities assigned and authorities granted to different agencies for energy regulation and policy. They also may be positioned differently with respect to staff and financial resources. Accordingly, the states are in the best position to determine how their representation can be best accomplished on the COSR. Signatories feel that the NWPP RA Program Governance Provisions should provide states with the flexibility necessary to identify the individual most appropriate and able to engage in performing this work, designating its COSR representative from the commission, the energy office, the office of the consumer advocate, or other state agency.

COSR Staffing and Funding

Signatories feel strongly that staff support for the COSR is an important issue that warrants further discussion. The NWPP has noted in the Detailed Design Document, "[t]he [COSR] will likely need support from staff" to remain informed and effectively engage on Regional RA Program matters.

Regarding staff support and funding, Signatories believe that: 1) engaging an independent staff to support COSR efforts in the RA Program is important; and 2) considerations should be made of associated costs that will be incurred and the reliability benefits that will be experienced by utility customers. The Signatories recognize that state participation in the RA Program is important and that staff support would be extremely beneficial and ensure that the COSR is able to engage early and more effectively in RA Program initiatives and efforts. It is important that the COSR have the staff support necessary to proactively track RA Program initiatives and activities and to effectively engage on these matters without further taxing limited state staff resources. Effective staffing means staff that can attend meetings, highlight important issues for consideration, and facilitate meaningful discussions on important RA Program matters. Still, Signatories recognize that the cost of staffing the COSR, regardless of the mechanism, will ultimately be passed on to utility customers.

Taking these observations into consideration, the Signatories agree that the Western Energy Imbalance Market Body of State Regulators (EIM-BOSR) provides a good model for engaging an independent staff, without the added costs associated with creating a new organization to perform this work. The EIM-BOSR once found itself in a similar situation; needing dedicated, independent staff resources to support an increased level of activity and engagement as the wholesale electricity market continued to rapidly expand through the West. The issues there were the same. The EIM-BOSR, needing independent support staff to effectively engage in the evolving EIM and recognizing that ratepayers would ultimately bear the cost of this support, elected to engage an existing regional organization with a focus on energy matters to conduct this work. This is an issue ripe for further discussion. The Signatories appreciate the NWPP's acknowledgement that this is an important issue¹⁵ and look forward to continuing this discussion and to collaborating with the NWPP to identify a path forward that is in the best interest of utility customers.

¹⁵ Detailed Design Document, 40.

Maintaining State Authority and Decision-Making

With regard to state participation in the Regional RA Program, Signatories feel it is essential that the NWPP RA Program Governance Provisions expressly state that federal preemption of state authority is neither intended or sought.

During the State/Provincial Meetings, participants discussed concerns that state participation in the Regional RA Program could potentially lead to a preemption of state authority and decision-making. As noted in the Draft Governance Provisions and Detailed Design Document, "[t]he [COSR] will advise the NWPP and the [Board] on the governance and design of the Regional RA Program" and provide "states' perspectives on matters such as integrated resource planning, reserve requirements, emerging policies concerning renewable generation, storage, efficiency and demand resources, and rules for retail choice . .." 17

Signatories feel strongly that it is important to engage in Regional RA Program processes and to provide an informed perspective on the overall Program. However, the states want to be clear that, in this process of engaging and having a say with respect to the Regional RA Program, they are not agreeing to federal preemption of state authority. Therefore, we ask that the governance documents include a clear statement that federal preemption is not intended or desired as a consequence of establishing a strong state role in the NWPP's Regional RA Program.

INFORMATION AND DATA SHARING

Signatories feel strongly that transparency, including sharing of information and data, is an important issue that warrants further discussion and deliberation. Western state regulators and energy offices need to have full confidence in the Western RA Program; assurances that Program participants are not only participating in the RA Program but are compliant with program requirements.

The Western RA Program will have interconnection-wide implications including for SPP, the California Independent System Operator (CAISO), and Canadian components of the overall Western Interconnection (WI) adequacy picture. Robust, time-relevant communications across the "seams" between adjacent RA programs, and with regional system operators, will be critical for maintaining a high level of situational awareness across the WI, especially in times of extreme west-wide weather events. The recent memo on Western RA Program Information Sharing recognizes in general terms this critical function of the Program Operator. We suggest that the Western RA Program contemplate codevelopment of and participation in a clearinghouse function for the entire WI, specifically for generation resources and their deliverability.

The Detailed Design Document proposes a role for an Independent Evaluator to "provide an outside, independent assessment of the performance of the program" and notes that "[e]very effort should be made to aggregate data in order to preserve confidentiality, while still effectively communicating program results to stakeholders."¹⁸

7

¹⁶ Draft Governance Provisions, 2.

¹⁷ Detailed Design Document, 40.

¹⁸ Id. at 39.

The Independent Evaluator function must serve to balance commercial sensitivities with the need to provide assurances to regulators and energy offices of participating jurisdictions that the program is able to deliver as expected. Signatories appreciate the need to protect sensitive data but feel strongly that information compiled by the NWPP and the Independent Evaluator provide sufficient detail to support any assurances or concerns that the Regional RA Program is functioning as intended and supports regional cooperation across RA program seams.

Signatories would like to continue to discuss the issue of information and data sharing with the NWPP in an effort to better understand the current design and scope of the Independent Evaluator role, to determine what additional sharing of data or information is necessary and appropriate to achieve confidence in RA Program deliverables, and to define appropriate access to that information without compromising confidentiality.

We sincerely appreciate the effort NWPP has made to engage Western representatives in a meaningful dialogue regarding the Western RA Program Governance Provisions and the role of states in this important Program. With these written comments, Signatories endeavor to reflect comments shared with the NWPP at the September 10th NWPP-State/Provincial Governance Workshop. We trust that the NWPP will receive and consider the comments provided in this letter as a continuation of this dialogue.

Lea May - Aten

Lea Márquez Peterson

Chairwoman Arizona Corporation Commission John Chatburn, Administrator

Ham Chathun

Idaho Governor's Office of Energy & Mineral Resources

J. Andrew McAllister

Commissioner

California Energy Commission

Ein Blank

Josel Colon Moder

On behalf of the Idaho Public Utilities Commission:

Paul Kellade

Paul Kjellander

President

Idaho Public Utilities Commission

Eric Blank Chairman

Colorado Public Utilities Commission

100

Hayley Williamson

Chair

Public Utilities Commission of Nevada

C.J. marthe

C.J. MantheCommissioner
Public Utilities Commission of Nevada

Tammy Cordova Commissioner

Public Utilities Commission of Nevada

Jane Be

On behalf of the Oregon Department of Energy:

Janine Benner*

Director

Oregon Department of Energy

On behalf of the Oregon Public Utility Commission:

Megan Decker

Chair

Oregon Public Utility Commission

SaidWann

Megan W Deck

David W. Danner

Chairman

Washington Utilities and Transportation

Commission

Ann Rendahl

Commissioner

Washington Utilities and Transportation

A. E. Rodell

Commission

Jay Balasbas

Commissioner

Washington Utilities and Transportation

4mBK

Commission

Chi B. Pets

Chris Petrie

Chairman

Wyoming Public Service Commission

Note: unless otherwise indicated, signatories have signed on in their individual capacity.

*Signatory added October 13, 2021.