Guy Norman Chair Washington

KC Golden Washington

> Jim Yost Idaho

Jeffery C. Allen Idaho



Doug Grob Vice Chair Montana

Mike Milburn Montana

Ginny Burdick Oregon

Louie Pitt, Jr. Oregon

Council Meeting Summary December 14, 2022 via Webinar

This a summary of the agenda items that came before the Council at its December 14, 2022, public meeting and, where appropriate, the actions the Council decided upon. The summary is intended to provide a general synopsis only for each agenda item. For further details, the complete set of information for the meeting includes the meeting agenda, the packet and presentation material for each item, the recording of each agenda item during the meeting, and subsequent documentation of any decisions by the Council. These meeting materials are posted with this summary at https://www.nwcouncil.org/calendar/council-meeting-december-13-2022/.

December 14, 2022

Council Chair Guy Norman brought the meeting to order at 9:02 a.m. Council Members Jeffery Allen, Doug Grob, Ginny Burdick, KC Golden, Jim Yost, Louie Pitt Jr., and Mike Milburn were in attendance via webinar. Council Members Jim Yost was not in attendance. The next Council meeting is scheduled for January 10-11, 2023, in Portland, Oregon and via webinar.

Reports from Committees Chairs and Executive Director

Fish and Wildlife Committee

Member Allen, Fish and Wildlife Committee Chair, reported on the Fish and Wildlife Committee Meeting held on December 13, 2022.

1. Briefing on the Columbia Basin Habitat Research, Monitoring and Evaluation Strategy

Council staff Leslie Bach and Jody Lando from Bonneville Power Administration provided the Committee with an overview of the recent regional efforts to produce a research, monitoring and evaluation strategy for tributary habitat mitigation actions in the Columbia River Basin. The presenters provided background on the Council's long-standing interest in an effort to develop a regional habitat Research, Monitoring and Evaluation (RM&E) strategy. The Committee heard a summary of the strategy development process and a description of the intent and approach of the strategy components. Chair Allen reiterated that a plan is being drafted that will work for the entire region. Staff noted that further work is needed to determine how to incorporate elements of this strategy into Council tasks.

For the report and the presentation materials, see https://www.nwcouncil.org/fs/18113/2022 1213 f1.pdf.

Power Committee

Member Grob and Member Golden, Power Committee Members, reported on the Power Committee Meeting held on December 13, 2022.

1. Draft Final Adequacy Report

The preliminary resources adequacy evaluation for the operating year 2027 was summarized for the Committee by Council staff, who also put out a new regional adequacy criteria for the Council to take into consideration. The assessment team delivered their results and early observations. Their findings indicated that the power supply will not be sufficient in 2027 in the absence of additional resources or investments in energy efficiency. The resources and energy efficiency savings recommended by the resource strategy in the plan will result in an adequate supply by 2027.

For the report and the presentation materials, see https://www.nwcouncil.org/fs/18120/2022 1213 p1.pdf.

2. USDOE Home Energy Rebate Program

Danielle Walker, a program analyst with the US Department of Energy's Office of State and Community Energy Program, was introduced by Annika Roberts, a Council staff member. The speaker described how the Inflation Reduction Act (IRA), which was recently passed, includes \$8.8 billion in rebates for home energy and electrification projects. Walker gave a brief description of the State and Community Energy Program (SCEP). The SCEP program is still in its early stages of development, and it is currently working with stakeholders to inform program design and create a successful program for distributing this funding to the states.

For the report and the presentation materials, see https://www.nwcouncil.org/fs/18119/2022 1213 p2.pdf.

3. Future direction of building codes

Council staff, Tina Jayaweera, Power Planning Resources Manager, introduced Mark Lyles from New Buildings Institute to present to the Committee the work that the New Buildings Institute (NBI) is doing to enhance building codes. According to Lyles, the specifications for new construction will educate contractors, who can then apply similar techniques to the retrofitting of existing facilities to increase their efficiency and resistance to extreme weather events or power outages. Adopting these practices will enhance tenants' interior comfort and air quality.

For the report and the presentation materials, see https://www.nwcouncil.org/fs/18121/2022 1213 p3.pdf.

Public Affairs Committee

Member Pitt, Public Affairs Committee Chair, reported on the Public Affairs Committee Meeting held on December 12, 2022. Pitt informed the Council that the committee discussed a need to focus on key audiences and reported on Ann E Gravatt's, Public Affairs Director, trip to Washington DC and discussed a summer congressional tour.

Executive Director Report

Bill Edmonds, Council's Executive Director, reported to the Council on Council's staff work by highlighting four accomplishments from this year. Edmonds indicated the importance of the Power Plan adopted in February 2022. Edmonds expressed that the entire region has engaged with the plan, and the Council is beginning this process with a reliability assessment. Edmonds also highlighted the Fish and Wildlife program and its successful 40-year retrospective. Edmonds mentioned the field trips the Council has taken throughout the year and reiterated the importance of continuing these trips to understand the region better. Finally, Edmonds noted the successful changes to the staff that positions the Council to continue its work for years to come.

Council Meeting Agenda Items

1. Overview and update of Sylix (Sockeye) Salmon Restoration in the Okanagan Basin

Fish and Wildlife Director, Patty O'Toole, introduced Kirkt Truscott, Anadromous Division Program Manager, Casey Baldwin, Sr. Research Scientist and Chris Fisher, Principal Biologist, all of the Colville Confederated Tribes, and Ryan Benson, Fisheries Biologist and Skaha Lake Sockeye Reintroduction Program Coordinator, of the Fisheries Department of Okanagan Nation Alliance to present an overview and update on the restoration activities of sockeye salmon in the Okanagan Basin.

Truscott provided information and the history of the Colville Confederated Tribes. Truscott informed the Council of Colville's efforts in ecosystem management, mitigation, and enhancements of its habitats. Baldwin gave an overview of the sockeye population and the challenges for the fish to get to the tributary. He noted that the fish swim through the US portion of the Okanagan River to reach British Columbia. Since the dam construction era, there has been a resurgence in sockeye abundance since 2010, 80% of it coming from the Okanogan River. The average number of sockeye since 2010 has been approximately 310,000, with the highest number recorded in 2022 at 663,252. Baldwin noted that the Colville Confederated Tribe's average sockeye harvest was 8,750 from 2008-2022. Baldwin explained that due to a 2.7°C difference in water temperature in the McNary Dam in 2015, there was only a 37% survival rate; he noted that under climate change, the sockeye would face migration delays and extreme stress.

Fisher presented to the Council the in-basin water management and habitat actions contributing to the increase in sockeye salmon in the Okanagan River Basin. Fisher explained that a robust 3-year risk assessment conducted in the early 2000s helped provide a successful management plan to reestablish sockeye to historical ranges. Fisher provided an overview of the risk assessment and some of the actions taken to enhance the population of the sockeye. Fisher explained that at the same time the risk assessment was being conducted, the Okanagan Fish & Water Management Tool was being developed, which is a model of when it is best to release water from Okanagan Lake. Fisher reiterated the success of the Okanagan Fish & Water Management Tool through the substantial increase in the juvenile sockeye population and the increase of returning sockeye. Fisher explained to the Council how fish passage was created at the McIntyre Dam, which gave the fish access to Skaha Lake. Fisher mentioned that Priest Rapids Mitigation in the Okanagan River supported four spawning platforms. Fisher indicated that this is a rare success story in Columbia River salmon recovery but its highly vulnerable due to the increase of water temperature.

Benson provided an overview of the sockeye salmon experimental reintroduction program. Benson informed the Council of the Okanagan Nation Alliance, which consists of 7 Tribal Council members and the Colville Confederated Tribes. Benson highlighted the history of the relationship between sockeye and the basin's people and explained how the salmon is integral to the Okanagan culture. The reintroduction program includes reintroduction hatchery and outplants to increase fry release. Benson further explained the type of monitoring and evaluation that is done by the program. The Okanagan Lake Program has a potential for high natural production, exceeding Skaha and Osoyoos combined. Benson completed the presentation by recapping milestones of the experimental program.

Member Grob asked about issues on the population overlap between sockeye and kokanee salmon. Benson indicated that they are still looking at the genetics; he mentioned that they are detecting hybrids in the population. Benson reiterated that they have always coexisted. Member Golden asked whether the 2015 warm water event was low flow or high summer temperature. The presenters mentioned that it was the warm water in the Columbia River. Member Pitt thanked the presenters for their work in the reintroduction of sockeye.

Presentation materials are at: https://www.nwcouncil.org/fs/18115/2022 1213 1.pdf.

2. Report on Sea Lion Predation and Management in the Columbia Basin

Council staff, Mark Fritsch, introduced Doug Hatch, Interim Manager Fishery Science Department and Senior Fisheries Scientist at Columbia River Inter-Tribal Fish Commission, and Casey Clark, Marine Biologist at Washington Department of Fish and Wildlife, to present on sea lion impacts and management in the Columbia River. Hatch provided background and historical information about the predation program. Hatch informed the Council that 238 sea lions had been removed under the Marine Mammal Protection Act §120 and 90 under §120(f) from the Columbia River, sparing the lives of 10s of thousands of salmon. Hatch highlighted regulation, litigation, legislation, and teamwork to the program's success. Hatch explained that the two species of interest are the Steller sea lion and the California sea lion. California sea lion populations grew exponentially under the 1972 Marine Mammal Protection Act with similar growth for the Steller Sea Lions; Hatch reiterated that removing a few hundred males will have zero impact biological to the sea lion populations.

Hatch continued by presenting a timeline of how the sea lions appeared at Bonneville Dam. By 2019 3.3% of spring run taken by pinnipeds in the tailrace. In 2020 NOAA issued the §120(f) permit, which includes the tribes and states as eligible entities, the removal of both Steller and California sea lions, and an area-based management instead of individual sea lion-based management. Hatch informed the Council about the individual removal program from 2008 to 2020 and the new area removal program from 2020. Hatch provided data on predation loss impacts at Bonneville and the lower river. Hatch highlighted that there has been a considerable uptick of sea lions along the Colombia River in the recent past, sometimes doubling in numbers.

Clark presented on the implementation of the program, its successes, and its future plans. Clark explained that floating traps are used to catch sea lions. Currently, the traps include cellular cameras, alarms, and electromagnetic locks. Once the animals are trapped, they are transferred to a barged and then humanely euthanized. Clark informed that California sea lion abundance at Bonneville Dam is on the decline, but Steller sea lion abundance has increased. Under §120, Clark demonstrated success by estimating what predation would be like if no sea lions were removed, which is estimated to have saved 54,657 salmon. With the implementation of §120(f) since August 2020 it is estimated that more than 20,086 salmon were saved from predation. Clark mentioned that predation in the Columbia is impactful for fish due to fewer obstacles for adult fish passing at Bonneville and increasing fish on spawning grounds. Clark highlighted the success at Willamette Falls, after two seasons of sea lion removals steelhead rebound extinction risk dropped to 11%.

Member Grob asked regarding the intelligence and social characteristics of sea lions and if there are other ways of euthanizing the animals that will naturally drive the others away. Clark mentioned that they had discussed different methods to euthanize the animals. Clark informed that they are explicitly forbidden from using firearms. Member Burdick asked about sea lions' natural predators. Clark mentioned that great white sharks and mammal-eating killer whales are natural predators, but none are found in the Columbia River. Member Allen is encouraged by the sea lion predation program and asked about the program's funding. The presenters indicated that funding is a challenge at the federal and state levels. Member Norman thanked the presenters for their work.

Presentation materials are at: https://www.nwcouncil.org/fs/18114/2022 1213 2.pdf.

3. Briefing on the Columbia Basin Water Transaction Program

Leslie Bach, Council's Fish & Wildlife Senior Program Manager introduced Femke Freiberg, National Fish and Wildlife Foundation and Matthew Schwartz, Bonneville Power Administration, to provide an overview of the Columbia Basin Water Transaction Program (CBWTP), including background on the program and a description of how it is implemented.

Schwartz commented that BPA with the Council and its partners have been able to grow the framework for the CBWTP from an idea to a model that has helped environmental problem solving for the rest of the country. CBWTP aims to restore flows to key fish habitats through voluntary water transactions and other incentive-based approaches through partnerships. Schwartz informed that the program was founded in 2002, with 661 transactions through \$132 million investment that has protected 2.3 million acre-feet of water. Schwartz mentioned that the program exists due to the 1980 Northwest Power Act, the Endangered Species Act, and the FCRPS Biological Opinion; it is a collaborative effort with the National Fish and Wildlife Foundation (NFWF), states, and native people. According to Schwartz, the program prioritizes ESA-listed salmon and steelhead species and ESA-listed resident U.S. Fish and Wildlife Service species of concern.

Femke explained the program approach. The three major components are to build capacity, acquire water, and account for outcomes. Femke indicated that the first water trust was created in Oregon in the 1990s; they are highly complex and time-consuming. CBWTP provides capacity-building funding to organizations and funds water transactions through a state administrative process or a legally enforceable agreement between private parties. Femke noted two types of funding under CBWTP in their program programmatic and transactional. Femke reiterated that due to the program's

voluntary nature, the key to a successful implementation is building trust with landowners. Femke informed about the water transaction tools and the transaction proposal review process. Femke indicated that ongoing enforcement and monitoring is a significant area of focus for the program, which includes contractual compliance and effectiveness monitoring. Femke explained that in 2015 NFWF, CBWTP and partners created a four-tier flow restoration accounting framework to analyze water transactions and ecological functions. Femke summarized the future of the program by explaining that climate change threatens progress and there is ongoing work to integrate water transactions with habitat restoration to expand impact.

Member Allen thanked Leslie Bach for her contributions to this program, having been involved in some capacity since its inception, and asked if tax ramifications keep people from using the program and if there are land management plans that go along with the water conservation. Femke responded that on the tax question, the program helps analyze laws and policies at an individual transaction level. Femke mentioned that site visits are performed to analyze any land management concerns. Chair Norman asked how the program starts conversations with landowners. Femke indicated that qualified local entities usually already have a relationship with the landowners.

For the report and the presentation materials, see https://www.nwcouncil.org/fs/18117/2022 1213 3.pdf.

4. Policy Update: Infrastructure Act and Inflation Reduction Act

Annika Roberts, Council's Resource Policy Analyst, presented to the Council a highlevel policy update on the Infrastructure Investment Law/Infrastructure Investment & Jobs Act (BIL) and the Inflation Reduction Act (IRA). Roberts indicated that the Council and the bills align with the Council's goal. Roberts mentioned that the \$1.2 trillion BIL passed on November 2021. The BIL focuses on manufacturing and industrial transformation through clean energy projects, infrastructure, and manufacturing, among others. The main provisions include a methane reduction infrastructure, energy efficiency, and grid resiliency. The IRA was passed on August 2022 as a budget reconciliation bill and invests \$370 billion in climate and clean energy over the next ten years. According to Roberts, the IRA focuses on tax credits and grants via Committee on Finance and clean tech manufacturing, industrial transformation, and EV deployment, among others. Roberts provided highlights, similarities, and differences between the BIL and IRA. Roberts highlighted that the BIL and IRA work together and will impact the federal goal of 50% greenhouse gas emissions below 2005 levels in 2030. Robert indicated that we have barely scratched the surface and depth of this new legislature, which is early in the implementation phase.

Member Golden mentioned that the IRA tax credits are available in a direct-pay format which means that organizations without a significant tax burden can utilize the funds. Roberts added that the BIL and the IRA encourage electrification production. Member Grob asked if there was a hard start date, and Robert answered that the start date depends on the different programs and that funds from the BIL are already available.

Presentation materials are at https://www.nwcouncil.org/fs/18116/2022 1213 4.pdf.

5. Markets 101: Exploring Day Ahead Markets

Jennifer Light, Council's Director of Power Planning, introduced Dan Williams and Chris Devon, Directors at CES MarketsIQ West, to provide a brief and broad overview to the Council of the current market tool options in the Northwest, including bilateral transfers and participation by many utilities in the organizes real-time market EIM (Energy Imbalance Market). Williams provided background on Customized Energy Solutions (CES) does. Established in 1998, through its MarketlQservice, CES helps clients manage and keep up with changes in all North American wholesale and retail electricity and natural gas markets. CES also provides top-tier hosted energy market operations platforms and services in the California markets, including scheduling services, energy storage optimization, and congestion revenue rights management. William informed that a wide range of clients in the West are served by CES' MarketlQservice, which covers market and policy development activity involving the California ISO's markets and Southwest Power Pool's Markets Plus (M+) effort. These clients range from conventional vertically integrated utilities to cutting-edge energy storage developers.

Williams underlined the necessity of an effective governing body that safeguards the interests of all participants and a level playing field for all participants for any market mechanism to be successful. Williams also emphasized that establishing confidence requires ensuring prospective market participants are fairly compensated for all ancillary services rendered by their resources. The goal of CES is to decrease costs, increase reliability and adapt to change successfully. Williams continued by outlining the current situation that makes thinking about organized market offerings appealing, noting the long history of attempts in the Northwest to create organized markets. He explained to the Council that the need to be more effective and more deliberate about how power is delivered is being driven by the changing resource mix, tightening capacity in the Northwest, tightening transmission deliverability, difficulties with gas deliverability, and the availability of existing resources. Williams went into great detail about the status of the real-time markets that are currently in the West, as well as the extra advantages that

a day-ahead market may bring to the Northwest - and the hurdles that still need to be overcome.

Member Grob was curious as to how utilities with various criteria for greenhouse gas emissions might interact in a market. Williams retorted that no market's objective is to influence certain results or regulations. For utilities and states without greenhouse gas policies to reap the rewards of market involvement for their customers, each market offering will ensure that utilities and states with greenhouse gas regulations do as well. Williams also underlined the need for participating entities to pass a resource sufficiency check and have faith in a market's governing body. Members Golden and Grob discussed how the Northwest has previously struggled to advance any structured market system. According to Golden, it's fair to say that some residents of the Northwest are wary of complete or expedited market growth because they are worried about how the expansion of the Federal power system would affect them. According to Williams, creating a market structure where players feel secure and certain that their resources will be valued and handled properly is the key. In order to get over the obstacles that previous market attempts ran into, he added, it is essential to make sure that the value streams that the hydroelectric system provides are paid.

Presentation materials are at https://www.nwcouncil.org/fs/18118/2022 1213 5.pdf.

6. Council Business

Approval of November 2022 Council Meeting Minutes

Vice-Chair Grob moved that the Council approve for the signature of the Vice-Chair the minutes of the November 15-16, 2022, Council Meeting held at Portland, Oregon and via webinar, as presented by staff.

Member Allen seconded.

No discussion.

Voice vote – all in favor, none opposed.

Motion was approved.

The approved minutes of the November 2022 Council meeting and other materials from that meeting are at https://www.nwcouncil.org/fs/18127/2022 1213 6minutes.pdf.

Approval of Motion to Submit Letter to DEO Regarding Water Heating Efficiency Standard

Vice-Chair Grob moved that the Council approve a letter of support to DOE on a proposal regarding a set of recommendations on amended energy conservation standards for consumer water heater efficiency standards, as presented by staff.

Member Golden seconded.

No discussion.

Voice vote – all in favor, none opposed.

Motion was approved.

Public Comment on any issue before the Council

Lauren McCloy, Policy Director, NW Energy Coalition McCloy thanked the Council for the approved motion to submit a letter to DEO regarding water heating efficiency standards and to inform the Council of the 2022 State Energy Efficiency Scorecard that the American Council for an Energy-Efficient Economy issued last week, reviewing how the region compares to others in terms of state energy efficiency policy and performance may be done using this useful resource. McCloy reiterated that all four states are moving in the wrong direction compared to 2020. McCloy explained that the Council can help with that by recommending higher energy efficiency targets for BPA and the region, updating the portfolio model to fully value energy efficiency's contribution to system reliability, flexibility, and resilience, and protecting against the risk that supply-side resources may not be available and reliable in the time needed. McCloy also wanted to draw the Council's attention to a new tool the US Department of Energy has created to assess the worth of energy efficiency and other distributed energy resources. The tool includes end-use load profiles and savings forms that are representative of the U.S. building stock, are publicly available, calibrated, and verified.

Chair Norman adjourned the meeting at 2:08 p.m.