



January 22, 2019

Senator Michael Dembrow, Chair
Senate Committee on Environment and Natural Resources

Re: Trout Unlimited and Hydropower Reform Coalition Comments on SCR 1

Dear Chair Dembrow and Members of the Committee,

Thank you for the opportunity to present testimony on Senate Concurrent Resolution (SCR) 1. My name is Chandra Ferrari and I represent Trout Unlimited, a non-profit organization dedicated to the conservation of cold-water fishes, such as trout and salmon, and their habitats. Trout Unlimited has more than 300,000 members and supporters nationwide including over 3,000 in Oregon. Trout Unlimited is also a member of the Hydropower Reform Coalition (HRC), a diverse coalition of more than 160 national, regional and local organizations with a combined membership of more than one million people. HRC members jointly have an interest in protecting and restoring rivers that are impacted by hydropower dams.

Efforts to diversify our energy supplies and reduce our nation's reliance on carbon emitting resources have led to an increase in renewable energy sources such as wind and solar. These technologies pose a challenge for power managers and distributors given the intermittent nature of wind and solar resources. To help better integrate these resources into the grid, and to increase reliability of power supply, many developers and managers are looking toward energy storage opportunities – including pumped storage hydro projects. Pumped storage projects operate by pumping water uphill during times of low-market rates or when intermittent resources are producing excess power to the system. That water is then stored and released to produce a nearly instantaneous peak power supply to fill gaps in supply that result when the wind stops blowing or the sun stops shining.

TU and HRC support Oregon exploring a role for pumped storage as a means of bringing new renewable energy sources online. However, each pumped storage project and its impacts, whether classified as “open loop” or “closed loop,” are different. It is important to recognize that pumped storage projects are net consumers of energy and can have significant impacts on ground and surface water supplies, as well as impacts to instream and riparian habitats and the fish and wildlife they support. Consequently, the potential environmental impacts of proposed pump storage facilities should be fully evaluated and, if such facilities are built, they should be sited and operated to minimize environmental harm.

TU and HRC caution against a resolution expressing blanket support for all closed-loop pumped storage projects. Rather, the resolution should acknowledge the site-specific nature of such projects and note that each project should be considered on its own merits including but not

limited to, whether the project has adverse impacts to public values such as water quality, water quantity, flow regime, fish and wildlife, cultural resources, and/or recreation. While we acknowledge that pumped storage projects classified as “closed loop” are generally less likely to have impacts to these values, it is inappropriate to use that assumption to suggest that all current and future closed-loop pumped storage projects will make sense and should be supported. Accordingly, we recommend that SCR-1 be amended to reflect that the Senate supports the exploration of closed-loop pumped storage projects (as opposed to supporting the development of such projects) and that the Senate encourages regulators and utilities to consider how closed-loop storage projects can best be utilized to meet Oregon’s energy needs moving forward.

At present, the language suggests that regulators and utilities should always be encouraged to support closed-loop pumped storage projects. TU and HRC suggest that that such projects should only be supported when they make sense from an environmental, economic, cultural and regulatory standpoint and otherwise meet regulatory standards. To better reflect that sentiment, the resolution should contain language that clarifies that projects should be sited to minimize disturbance of fish and wildlife habitat, avoid harmful instream flow impacts, avoid unnecessary expansion of transmission lines and avoid impacts to cultural and recreation resources. Additionally, the resolution should note that an objective and thorough analysis of the need for the energy that would be produced by such projects and the availability and relative benefits or drawbacks of alternative means of addressing that need (e.g., improved operational agreements integrating site-based renewables and integration into local/regional system¹; improved transmission capacity) should be completed before any project is approved. Other means of achieving energy storage are rapidly advancing and may be more appropriate than pumped storage projects in certain circumstances.

Additionally, while TU and HRC did not directly engage in the Goldendale or Swan Lake processes, we do believe that it is appropriate for those processes to complete their respective regulatory reviews prior to the legislature expressing support for these projects.

TU and HRC appreciate the opportunity to comment on SCR 1. We look forward to engaging in constructive discussions regarding how closed-loop pumped storage projects can contribute to meeting Oregon’s energy needs.

Thank you for the opportunity to testify.



Chandra Ferrari
Senior Policy Advisor
cferrari@tu.org
(916) 214-973
