Date: March 24, 2025

Re: Testimony in support of HB 3932

Submitted by: Bill Marlett 1977 NW 1st St Bend, OR 97703

I have over 40 years of professional experience in watershed, river and land-use management in Eastern Oregon.

Restoring beaver populations in watersheds where they were historically present would have profound and positive impacts on water quality and quantity. These benefits would translate to positive impacts to the restoration of degraded riparian areas, benefiting a multitude of other fish and wildlife species, especially in Eastern Oregon where climate models by Oregon State University predict a decline in annual precipitation. Morevoer, the impact on stream flow and groundwater recharge would positively support farmers and ranchers who depend on irrigation for their operations, whether from out-of-stream or groundwater sources.

As former executive director of the Oregon Natural Desert Association I was involved with efforts to support NOAA Fisheries' project to restore beaver populations in Bridge Creek in Wheeler County and with the Confederated Tribes of Warm Springs Indian Reservation to promote beaver recovery and restoring listed steelhead populations in the Tribe's Pine Creek Conservation Area, both which have been incredibly successful.

In short, positive actions by the State Legislature to facilitate the recovery of beaver populations in Oregon is a cost-effective and natural method to address the myriad water quality and quantity issues that need to be addressed in the State of Oregon.

For information, support, and assistance managing beaver conflicts:

NOAA Beaver Hotline beavers.wcr@noaa.gov

Living with Wildlife: American Beaver, Oregon Department of Fish and Wildlife www.dfw.state.or.us/wildlife/ living_with/docs/beaver.pdf

The Beaver Coalition www.beavercoalition.org info@beavercoalition.com

Working with Beaver to Restore Salmon Habitat, Northwest Fisheries Science Center www.nwfsc.noaa.gov/ research/divisions/fe/wpg/ beaver-assist-stld.cfm

Beaver Restoration Guidebook, U.S. Fish and Wildlife Service www.fws.gov/oregonfwo/promo. cfm?id=177175812



West Coast Region **Oregon Coast Branch** 2900 NW Stewart Parkway Roseburg, Oregon 97471 541-957-3385

www.fisheries.noaa.gov/about/ west-coast-region

Beaver Facts

- Beavers are usually most active at night, but can also work during the day.
- They use their heavy, flat tails for swimming, balance, and slapping the water to warn other beavers.
- Adult beavers are about three feet in length, weighing between 35 and 50 pounds.
- Beavers use a wide variety of trees, shrubs, rocks, and mud as construction material.
- In warmer months, beavers eat softer foods such as grasses, new woody shoots, clover, water lilies, and roots.
- In colder months, when there is little new growth on plants, beavers eat woody parts of many trees and shrubs.
- Beavers build dams to back water up, the water improves their food resources and provides them protection.
- Some beavers don't build dams because their streams already provide adequate food and shelter.

Beaver Myth Busting

- "They eat fish" Beavers are strict vegetarians.
- "They contaminate water" Sometimes called "beaver fever." the sickness giardia is most typically spread by humans, but is also spread by many animals including cows, sheep, beavers, and other rodents.
- "They are taking over" Approximately 200 million beavers lived in North America before trapping pushed them near extinction. Today, beaver populations are a fraction of their previous size at 10 million throughout North America.
- "They warm stream temperatures" Ponds receive more sun and may have a thin layer of warm water on the surface. However, water will be colder in the pond depths and downstream of the dam.

What Beavers Can Do

Clean water by filtering and processing fine sediment, organic material, and other contaminants

Reduce bank erosion by slowing water velocity and improving stream side vegetation





Putting Beavers to Work for You

Beavers are second only to humans in their ability to engineer the landscape. While their instinct to gnaw trees and construct dams can create conflicts. farmers, ranchers, and other landowners can harness their work to improve their property while minimizing damage.

> Elevate the water table for wells and irrigation

Reduce flooding by storing water

U.S. Department of Commerce I National Oceanic and Atmospheric Administration I National Marine Fisheries Service



Other Likely Benefits of Beaver Dams

- Raise water tables and saturate adjacent soils, resulting in lusher vegetation with reduced irrigation.
- Trap sediment, removing it from streams and leveling incised channels.
- Improve the stream and stream side vegetation to support abundant fish and wildlife.
- Transform intermittent streams back to perennial streams, in some cases.
- Reduce summer stream temperatures with their ponds, improving stream habitat for salmon and steelhead and create deep pools for these fish to rear.
- Help support healthy streams, riparian vegetation, grazing land, and meadows.

Potential Benefits With Beavers



Managing Beavers



Pond levelers* Piping system used to lower pond elevation when it threatens landowner property, structures, or safety.

taking advantage of the benefits they provide.

Culvert fencing* Heavy wire fences placed around culvert entrances to keep beavers from damming them.

*May require a permit from the U.S. Army Corps of Engineers, Oregon Department of State Lands, and/or Oregon Department of Fish and Wildlife.



Higher water level in wells

 $|\sqrt{}|$ In summer, groundwater seeps into streams, increasing low flows and decreasing water temperatures

Proven strategies to help manage beaver conflicts while



Tree protection Wire cylinders or sand-infused paint used around the base of tree trunks to keep beavers from gnawing them.