

Columbia Basin Fish Recovery

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Location:

Columbia River Basin

Biological Objective:

Increase spawning and rearing habitat for listed and non-listed fish

Project Partners:

- Bonneville Power Administration
- Bureau of Reclamation
- U.S. Fish & Wildlife Service
- U.S. Forest Service

ESA Protected Species:

- Columbia River chum
- Snake River fall chinook
- Snake River spring/summer chinook
- Snake River sockeye
- Snake River steelhead
- Lower Columbia chinook
- Lower Columbia coho
- Lower Columbia steelhead
- Upper Columbia spring chinook
- Upper Columbia steelhead
- Mid Columbia steelhead
- Willamette River chinook
- Willamette River steelhead
- Kootenai River white sturgeon
- Bull trout

For more information visit
www.salmonrecovery.gov

Habitat Restoration Means Business

How the work to recover salmon works for the Pacific Northwest economy

Throughout the Columbia Basin, federal agencies, states and tribes are restoring critical salmon habitat that has been degraded through years of logging, grazing, diking and diversions.

They are working with farmers to restore flows to streams by purchasing and leasing water rights and implementing more efficient irrigation practices.

They are restoring stream channels and floodplains back to their natural state. They are creating meanders and natural refuge areas for young salmon. They are removing invasive weeds and planting native vegetation and trees.

Because of this, salmon are returning to tributaries and streams where they have not been seen for decades. And the Pacific Northwest economy is benefitting. Last year alone, the federal caucus agencies invested \$103 million in habitat projects to help Columbia Basin fish.



Construction crews prepare channel for culvert that will re-open historic tidal wetlands in the Columbia River estuary.

Economic benefits extend through the community.

A recent University of Oregon study¹ found that every \$1 million invested in forest and watershed contracting created 15-24 jobs, depending on the type of restoration work involved. A study by the University of Montana had similar conclusions.²

The economic benefits of habitat restoration extend far beyond the jobs for the men and women working in the streams and watersheds. Those jobs create a ripple effect through the community, multiplying the benefits. In addition to the businesses that provide the labor, other businesses provide landscaping supplies, excavation equipment and building materials. The employees of all these businesses spend their wages on household goods, food, fuel and entertainment – contributing to other businesses in their local community.

In addition, economists recognize that even more benefits accrue as those dollars cycle through the economy – a factor they refer to as multiplier effect. The U of O study estimated that every \$1 million invested generated an additional 1.4 to 2.4 times the amount of economic output, contributing to the growth of our economy.



Based on the findings from these studies, the habitat restoration investments of the federal caucus created 1,751 jobs last year and \$154,500,000 of economic output.³

Partners help increase the benefits.

The federal agencies contract with states, tribes, local watershed groups and conservation agencies, land trusts and other entities to manage the habitat restoration. In turn, those agencies contract with local businesses and suppliers to carry out the work.

Often, these partners bring their own dollars to the table. This cost-sharing further increases the economic benefits and helps the federal investment go much further.

This work benefits fish.

This work is helping salmon. Here are a few examples:

- In central Idaho, water transactions restored clean, cold water to streams that feed into the Pahsimeroi River. The following year, State fisheries biologists identified 42 salmon redds (nests), in streams that had once gone dry each summer. They also counted hundreds of fish – including cutthroat trout, rainbow trout, bull trout, mountain whitefish and juvenile chinook salmon – in 17 different tributaries that ran into the adjoining Salmon River, attracted to the newly-added cold water.
- In southeast Washington, salmon fry were swimming in Russell Spring Creek for the first time in decades after the Umatilla Tribes restored a spring-fed creek that flows into the Tucannon River.
- In Trout Creek in the Wind River range, the Forest Service removed an obsolete dam and restored the lake behind it to a natural creek bed. The next year, steelhead returned to the creek for first time since the 1930s.

¹ University of Oregon, Institute for a Sustainable Environment, Ecosystem Workforce Program Briefing Paper Number 23, Spring 2010.

² Montana Department of Labor and Industry, Research and Analysis Bureau, An Estimation of Montana's Restoration Economy, September 2009.

³ Calculated on investments of \$103M and 17 jobs per million invested and an economic multiplier of 1.5.

⁴ U of O, Ibid.

Economic effects per \$1 million invested in forest and watershed projects⁴

Project Types	Definition	Jobs	Economic Output (multiplier effect)
In-stream	Enhancing stream habitat and function	14.7	\$2,203,851
Riparian	Enhancing and restoring native riparian vegetation	23.1	\$2,310,128
Wetland	Restoring wetland and estuarine habitat	17.6	\$2,259,422
Fish Passage	Removing barriers to fish passage (culverts and dams), screening to protect fish from water withdrawals	15.2	\$2,240,281
Upland	Managing agricultural water, juniper, and noxious weeds	15.0	\$2,476,290
Others	Undertaking multiple activities in one comprehensive restoration project	14.7	\$2,270,862
All (aggregate)		16.3	\$2,311,468