Legislative Review Draft

Oregon Coastal Salmon Restoration Initiative

Executive Summary

February 24, 1997

This restoration plan has been developed to supplement the first draft of the Oregon Coastal Salmon Restoration Plan, which was released for public and scientific peer review in August 1996. Through a series of eight community briefings held throughout western Oregon, public input was gathered to improve the plan. In November 1996, a group of respected scientists was asked to review the plan and suggest improvements. Over the last six months, the many agency staff working on the Coastal Salmon Restoration Initiative have been meeting with staff of the National Marine Fisheries Service and other key partners to improve and strengthen the plan. This draft is the result of those efforts.

This draft will be presented in Legislative hearings in late February 1997. A final draft of Oregon's Coastal Salmon Restoration Plan will be submitted to the National Marine Fisheries Service on March 12, 1997. This plan will be useful in NMFS's decision on potential listings of coastal coho salmon under the federal Endangered Species Act. This decision is expected on April 25, 1997.

The plan is still a draft. It will change and improve based on constructive suggestions from the public and partners, and particularly based on suggestions of the Oregon Legislature. Over the long term, it will continue to change as we implement the plan and gather results from monitoring.

Overview

Oregon's conservation plan, including both protection and restoration elements, is designed to restore salmon to a sustainable level at which they can once again be a part of people's lives. The emphasis is on coho salmon in coastal river basins. However, it is a model that will expand to include all salmon and trout throughout the state. Although the plan is focused on salmon, it will conserve and restore functional elements of natural systems that support not only fish but also wildlife and communities.

In contrast to many endangered species plans which rely primarily on regulatory approaches, this plan represents a new way of restoring natural systems …the "Oregon Approach." This approach meshes scientifically sound actions with local watershed level public support. It relies on teamwork among the various levels of government and is dependent on monitoring and accountability for results. Strong enforcement of existing laws and regulations are a foundation upon which voluntary and cooperative actions can be built. We believe that this is the only approach—one which will generate the support and commitment across all sectors, from landowners and industry to government agencies—to restore the salmon and their natural systems.

Oregon's Conservation Plan

- Coordinated agency programs
- Community based action
- Monitoring
- Appropriate corrective measures

The measures and budget portions of this plan include both salmon habitat and water quality actions. Efforts to improve water quality are inextricably linked to salmon restoration and will also help meet the requirements of the Clean Water Act. Improved salmon habitat will lead to better water quality from our watersheds. This plan will require an unprecedented level of cooperation and coordination among local, state and federal partners. It represents the commitment of all Oregonians to the fish, the watersheds, and our children.

The table of contents for the plan supplement follows this summary (Pg. 10). This document outlines some of the more significant improvements to the plan.

Historical Review of Restoration

The section on the history of salmon restoration efforts highlights that this is not a new problem. Government has launched many meetings, commissions, initiatives and reviews of the salmon problem over the last 100 years. However, most of these have been unsuccessful due to inadequate scientific foundation, inaccurate target projections, lack of integrated decision making, lack of monitoring and accountability, and/or lack of sustained political priority. History has offered us an opportunity to demonstrate that the CSRI can overcome these challenges to success.

Conceptual Foundation

In order to overcome the historical tendency for unfounded optimism for technical solutions, the CSRI is based on three basic principles:

1. Restoration of salmon must address natural and cultural systems,
2. Salmon require complex and interconnected habitats which are created, altered and maintained by natural physical processes, and
3. Life history diversity, genetic diversity, and metapopulation organization (patterns of populations) are ways salmon adapt to their complex and interconnected habitats.

These principles are similar to those underlying the restoration efforts for salmon on the Columbia River System.

Independent Science Team

Offers:

- *Independent audit*
- *Accountability*

An independent team of 4-5 scientific experts will be established to help the CSRI partners base restoration efforts on the most sound science available. The team will provide an independent audit each year on the strengths and weaknesses of the CSRI. They will particularly focus on the adaptive process of compiling new information and results into a review of goals, objectives, strategies and approaches. Accountability was one of the strongest points raised by NMFS, the public and peer reviewers. The science team will help hold the plan accountable to its goals.

New Information: *Expectations for Production & Probability of Persistence*

A life cycle model of coho populations has been improved based on actual habitat capacity. This model suggests that total production, proportion of habitat utilized and spawner needs vary dramatically based on cycles of ocean survival. When long cycles of low ocean survival occur due to weather patterns, the coho populations contract into pockets of the best

freshwater habitat. Fewer spawners are needed to seed these pockets, and the production expectations should be reduced. When ocean patterns change and survival improves, coho are able to replace themselves and will expand into more marginal freshwater habitat. More spawners are needed to seed this habitat and expectations for total production increase.

This work suggests that production might vary from 168,000 to 430,000 coho during periods of low and moderate ocean survival respectively. Spawning goals for adjusting harvest rates have been updated based on this improved model.

Linked to:

Monitoring
Enforcement

The model has also been used to estimate the probability of persistence under various assumptions. The model shows that populations with the poorest freshwater habitat, such as the Tillamook Bay system will experience higher risk of extinction if population numbers fall below 300, if habitat quality declines significantly and/or if ocean productivity declines further from current rates. Populations from basins with better freshwater habitat, such as the Yaquina system, show low probability of extinction at current or improved ocean conditions even if habitat declined in quality. The Rogue populations have not yet been modeled.

Habitat improvement is important in order to increase production of coho for any level of ocean survival and to help ensure persistence if ocean conditions drop below current levels. Improved habitat and greater numbers of coho in the populations will also help ensure persistence if our assumptions about how coho survive in underseeded streams prove too optimistic.

Monitoring

Provides:

- *Continued improvements*
- *Adaptive management*

There is almost unanimous response from NMFS, the public and peer reviewers on the critical role of monitoring to assure accountability, adaptive learning and credibility. Over 60 different groups, including tribes, agency staff and watershed councils, have been working with stakeholders and staff in a series of scoping meetings to develop the next iteration of the monitoring plan.

The current plan describes 15 distinct tasks from monitoring habitat quality/quantity, to fish abundance and even estimating ocean productivity levels. The monitoring plan includes provisions for more intensive monitoring in some core production and index areas. Other parts of the monitoring plan will cover a broader geographic scope. Monitoring results will be summarized by the team, including state/federal agency staff and interested groups, annually for Oregon's report to the people and the federal government on the progress of restoration efforts.

Voluntary public participation in the monitoring program is a key element to the success of these efforts. The training for the monitoring program will provide great educational benefits. Participants such as landowners, educators, children and conservation groups will be more interested in the results of CSRI if they have participated in the monitoring.

Education and Outreach

Establishes:

- *Tone for future decisions by lawmakers and citizens*
- *Public "ownership" of stewardship efforts*

CSRI outreach efforts are focused on educating the public about natural resource issues. This includes creating ownership of the plan through stewardship activities and facilitating new partnerships at the local level. The value of education to protection and restoration efforts cannot be measured by data collection and monitoring—but is measured by the number of citizens who come forward to volunteer their time to help implement the plan and build stewardship for the future. The outreach and education section of the plan has moved from informing the public, to facilitating the development of education tools for private and public citizens to use to help implement the plan.

The Outreach Team has developed a compendium of salmon/watershed education programs, services and activities resulting from a survey of educators (individuals, groups, agencies and organizations) conducted in January 1997. The survey also identified needs, barriers, successes and failures to improve outreach efforts and develop strategies for education activities. This survey, together with an OSU survey of coastal residents and leaders, provides valuable insight about the willingness of Oregonians to be involved in salmon restoration and how to improve this involvement.

The Outreach Team partnered with Oregon State University Extension Service and seven state agencies to host a Salmon and Watershed Education Workshop in February 1997. Approximately 200 leaders came together to review the compendium and survey results. Participants also identified ways to effectively deliver existing education programs to key audiences, and focus on new education opportunities including: establishing a clearinghouse for salmon and watershed education materials, finding ways to broadly distribute existing model curriculum, developing how-to training materials, creating incentive programs for involvement, facilitating local communication networks and seeking more secure funding for education.

Watershed Councils

Ties into:

Soil and Water Conservation Districts

The section on watershed councils has been rewritten from the August 1996 draft. Oregon now has over 60 watershed councils working with local Soil and Water Conservation Districts and landowners. The revised draft highlights the key role for these partners in identifying basin assessments, understanding limiting factors and involving landowners. Watershed Councils are developing action plans and monitoring programs at the local level.

The Southwest Oregon Salmon Restoration Initiative document is an excellent example of a collaborative effort of state and federal agencies working with nine watershed councils. This work was coordinated by the Rogue Valley Council of Governments and is included in the plan.

In order for watershed councils to continue restoration efforts, they have many ongoing needs These include: long term funding for coordinators, adequate technical support, cost share grants and incentives for landowners. In addition, action plans need to be more holistic/comprehensive, and some watershed councils need broader landowner and stakeholder support.

Key measures

- More trees in riparian areas
- Habitat conservation plans
- Water quality management
- Improved enforcement
- Improved fish passage
- More fish screens
- Better hatchery management
- Improved physical habitat

State Agency Measures and Workplans

State Agency measures represent commitments by various agencies and their stakeholders. The workplans show how agencies are already implementing measures with their current staff and budgets. Specific assignments, due dates and products to be produced are listed.

The entire list of state agency measures was reformatted for this draft by categories of "Factors for Decline." This allows the reader to understand how the measures relate to specific objectives designed to address one of the eleven major factors which have caused the decline of salmon. The factors for decline include: loss/degradation of riparian areas, channel morphology, substrate changes in streams, loss of instream roughness (structure), fish passage impediments, loss of estuarine rearing habitat, loss of wetlands, water quality degradation/sedimentation, changes in flow, elimination of habitat and direct take of salmonids such as fishing mortality or predation.

The agencies and their stakeholders have listed over 200 measures and actions to address these factors and to achieve the objectives in order to restore salmon and watersheds. In most cases, we've listed specific numerical objectives and timelines for achievement. We understand that in some cases, numerical objectives are not available or need to be developed at the watershed or regional level to be most applicable. In these cases the agencies will work with stakeholders, watershed council/SWCD and NMFS staff to develop the appropriate objective and achievement schedule. A key factor is that the monitoring plan needs to be able to track these objectives and schedules by watershed, region and coastwide as appropriate.

Some of the most significant measures include:

- **Trees:** increased numbers of conifers left in riparian areas on state and private land, beyond the requirements of the Forest Practices Act.
- **Habitat conservation:** plans developed for the Elliott State Forest and in development for the Tillamook/Clatsop State Forest.
- **Road issues:** commitment to evaluate road sedimentation risks and to correct problems on state and private forest roads that may threaten salmon streams.
- **Water quality management:** SB1010 will be used by the Department of Agriculture to work with landowners to develop water quality management plans. These water quality management plans will be used to develop best management practices to meet water quality standards in agricultural areas.
- **Water quantity:** variety of tools to maintain and enhance streamflows such as better enforcement of illegal water diversions, as well as water conservation programs, instream water rights, off stream storage, and water right transfer and leases will be used to meet the flow needs of fish, while still respecting senior water rights.
- **Fill and removal:** laws enforced more strongly in salmon production areas, particularly in core production areas.

The measures, workplans and proposed budget packages have been developed cooperatively across agency boundaries. This was necessary to prevent duplication and promote interagency partnering. Some measures may appear redundant or even duplicative—but they are in fact focused on the resource mandated by the agencies mission e.g. ODFW=fish, DEQ=water quality.

- **Fish passage:** will be restored where man-made barriers are blocking access to historic range. Culverts and push-up dams are priority focus areas.
- **Fish screens:** will be needed on irrigation diversions which are impacting coastal salmon. ODFW has a program in progress. Accelerated funding and implementation will be required.
- **Fishery management:** spawning escapement needs will require very restrictive management of fisheries in order to rebuild population numbers. Marking hatchery fish to provide for selective fisheries and to identify strays on spawning grounds will be accomplished. Strict limits on strays are in place.
- **Hatchery production:** will be reduced and new broodstocks will be developed to ensure compatibility with natural stocks.
- **Water quality:** DEQ will intensify it's work with the Departments of Agriculture and Forestry to en sure water quality standards are met. Water quality standards will continually be updated through the triennial review process. Monitoring programs will be strengthened.
- **Habitat:** private forest and agricultural landowners will continue and intensify efforts to restore habitat structure and off channel habitat through watershed council, SWCD and industry sponsored initiatives.

Many of the objectives have been developed using the habitat survey database. A reasonable baseline already exists to track habitat and water quality status for coastal basins. Maintaining and expanding this effort is a key part of the monitoring program and will provide accountability and feedback on the results of these measures.

Federal Measures & Workplans

Provides:

- *Technical support*
- *Education*
- *Studies effects of protected predators on salmon*

Federal agencies have included measures and workplans in this draft to support the CSRI. The aquatic conservation strategy associated with the Northwest Forest Plan should dramatically improve fish habitat, watershed stability and water quality over time. This is one of the major anchors of the CSRI restoration strategy. Additionally, federal agencies will provide support for monitoring, watershed council activities and technical efforts such as watershed assessment and for education. Federal Agencies will work with Oregon to determine the effect of federally protected predators on salmon and what measures might address identified problems.

Local Government Measures: Cities, Counties and Ports

The Association of Oregon Counties, League of Oregon Cities, Oregon Public Ports Association and the Oregon Coastal Zone Management Association are partners in the CSRI. The counties and cities have summarized their measures in terms of biological benefit to fish. While only a small fraction of coho streams are currently in urban development areas, local government can have a profound impact in the future as residential growth expands based on local land use plans, and water sources are developed to facilitate this growth.

Examples:

- *Port of Brookings*
- *Port of Garibaldi*
- *Southwest Salmon Restoration Initiative*
- *Umpqua Basin Fisheries Restoration Initiative*

Over 50 individual projects are listed in this report by the counties and cities. The Rogue and Umpqua Basins are among the places where local governments can have the most impact on salmon. The involvement and commitment of the local governments in the Rogue Basin are demonstrated by the salmon restoration plan submitted by the Rogue Valley Council of Governments. Douglas County was highlighted in the report as setting an excellent example of commitment to salmon as exemplified by the Umpqua Basin Fisheries Restoration Initiative (UBFRI) which was established by the county in 1992.

The Oregon Public Ports Association has also summarized their measures and provided important specific examples. The ports of Brookings and Garibaldi are examples of "salmon friendly" ports, whose projects go beyond dredging, pollution control at marinas and general land use input. These ports are sponsoring habitat restoration, fish passage projects, and regional coordination between local governments.

Enforcement

Feedback from the public, peer reviewers and NMFS also reinforced the critical role of enforcement in the CSRI. Building on the foundation of current law and regulation with voluntary and cooperative efforts, necessarily implies the commitment to enforce the current baseline effectively. The enforcement section of the supplement focuses on three major new initiatives.

First, we recognize that voluntary compliance with environmental laws requires the right balance of education, enforcement action and compliance monitoring. The Fish and Wildlife Division of the Oregon State Police has always supported habitat protection and environmental law enforcement in addition to enforcing hunting and fishing laws. Because of reductions in hunting and fishing fee dollars, 13 officers were unfunded for the 1997-99 biennium. General fund dollars were added to the division budget in the Governor's recommended budget with direction to shift workload priorities to support the CSRI. Some of these officers may be relocated to ensure effective enforcement support of the CSRI.

Accomplishes:

- *Improves compliance with existing laws*
- *Avoids need for new regulation*
- *Prioritizes actions by potential benefit to fish*

In addition to state police support, state natural resource agencies are committed to effective enforcement and education of their habitat protection regulations. Each agency will be responsible for demonstrating the compliance level for key laws and regulations. Examples include the Department of Forestry, which will statistically monitor the compliance rate for forest operations relating to the rules of the Forest Practices Act. Since the OSP has been monitoring compliance with fish and wildlife laws for years, they will be able to provide valuable assistance to agencies in designing these programs.

The OSP have been setting regional workload priorities in consultation with regional fish and wildlife biologists for years. This program is known as the Cooperative Law Enforcement Program and has been nationally recognized for leadership. This approach will be expanded to the Cooperative Interagency Enforcement Plan which will identify enforcement priorities for the

agencies involved in CSRI. Using this information, the OSP and agency field staff can support one another and develop enforcement workplans which reflect the regional priorities.

These programs will be monitored and compliance rates evaluated as part of the CSRI monitoring plan.

Funding

Funding will clearly be one of the most critical tests of commitment for the CSRI. The public, the peer reviewers and NMFS have reiterated that without substantial new funding and a long-term commitment, the CSRI has little chance of recovering the salmon and watersheds to sustainable, economically viable levels. More than any other item, funding serves as the litmus test of commitment.

Essential to:

- *Phase II measures*
- *Watershed councils*
- *Offset by volunteer efforts*

The Oregon Legislature is currently reviewing a proposal called the "Natural Resources Investment Package" which dedicates $30,140,387 in the 1997-99 biennium to salmon recovery and the healthy streams partnership (statewide water quality initiative). The Natural Resources Investment Package allocates roughly $20 million to cost share grants to landowners, Soil and Water Conservation Districts, watershed councils and others for watershed and salmon projects. Roughly $10 million is allocated to state agency staff to assist with water quality management plans, salmon restoration projects and monitoring. This amount would support 19 positions in the Department of Agriculture, 19 positions in the Department of Environmental Quality, 14 positions in the Department of Fish and Wildlife, 6 positions in the Department of Forestry , 4 positions in the Water Resources Department, and 1 position in the Department of Land Conservation and Development.

In addition to the Natural Resources Investment Package, state natural resource agencies were budgeted at current service levels of general fund, when many other agencies were required to take a 10% cut in the Governor's recommended budget. This reflects that all the natural resources agencies in total, only use about 1% of the general fund. A further general fund cut would seriously undermine the measures that agencies are currently implementing. A number of agencies have included policy option packages in the Governor's recommended budget to assist in implementing the CSRI plan.

Federal Funding

Federal agencies are already making substantial investments in salmon and watershed restoration. The Bureau of Land Management and the US Forest Service are involved in funding and implementing the Northwest Forest Plan, which is a cornerstone of the CSRI. Programs such as "Hire the Fishermen" and "Jobs in the Woods" are providing key support to watershed councils, SWCDs and other watershed restoration programs. Possible assistance from the Natural Resources Conservation Service through the

Appraisal of the Conservation Plan

Oregon concludes that the OSCRI plan is sufficient to prevent extinction and to achieve recovery of anadromous salmonids (especially coho) in coastal river basins especially in the northern ESU. This judgment is based on eight major points:

1. **Recovery**
   Several sources of information suggest that although coastal coho populations are not currently at desired levels, they remain sufficiently resilient to recover.
2. **Factors**
   Major factors for decline are being actively addressed by existing programs.
3. **Priorities**
   The conservation plan includes rationale and information to facilitate prioritization of conservation and restoration efforts.
4. **Timelines**
   Explicit objectives and timelines are stated in the conservation plan.
5. **Monitoring**
   A comprehensive monitoring program is in place.
6. **Certainty**
   The plan provides a high level of certainty that identified measures and actions will be implemented.
7. **Integration**
   The plan is founded on an active and ongoing integration and coordination of all government agencies and stakeholders.
8. **Evaluation**
   The plan includes an explicit process of evaluating whether sufficient progress is being made, overcoming institutional barriers and making future changes to the manner in which the plan is implemented.

Farm Bill and possible flood restoration funds might provide assistance.

Federal funding is needed to support the monitoring programs for federal lands, and to support federal participation with watershed councils and SWCDs. Federal funds are also needed to support research on the impact of federally protected predators on salmon.

The NMFS has supported the operation of "For the Sake of the Salmon," an organization which supports salmon and watershed restoration on a regional level.

Governor Kitzhaber will be accompanied by Senate President Adams and House Speaker Lundquist on a trip to Washington DC in the week of February 24 to visit with federal officials and federal legislators to discuss the CSRI and the potential ESA listing of coho salmon and to pursue funding support.

Summary

Oregon faces unprecedented natural resource management challenges. These challenges include restoring native fish populations and improving water quality in our rivers and streams. How we choose to meet these challenges will determine if we as Oregonians continue to control our own destiny or if we turn control over to the federal government. The CSRI represents a portion of the "Oregon Approach" which focuses on results through new and innovative ideas that rely on grassroots involvement. This draft of the CSRI plan is part of the continuing evolution of the Oregon Approach to collaborative problem solving. This initiative represents Oregon's spirit of natural resource citizenship, coupled with local involvement and government partnerships.

Draft Revision of the OCSRI Conservation Plan
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