IDENTIFICATION OF STOCKS NOT MEETING ESCAPEMENT GOALS FOR THREE CONSECUTIVE YEARS

Situation: The identification of salmon stocks not meeting escapement goals for three consecutive years is the first step in the Council's current salmon plan to prevent overfishing. This is also part of the process under amendment 14 to the salmon plan, approved by the Council on March 12, 1999. Amendment 14 also contains other specifications and requirements to prevent overfishing which are responsive to the Sustainable Fisheries Act of 1996. Since the Council expects amendment 14 to be implemented by National Marine Fisheries Service in the near future, staff has provided the complete "Overfishing Concern" section from Amendment 14 in Attachment C.2.a.

At the meeting, the Salmon Technical Team (STT) will identify any of the natural salmon stocks with conservation objectives in Table 3-1 of draft amendment 14 that have failed to meet their spawner escapement objective in each of the past three years (Table 3-1 is also reproduced in appendix A of *Preseason Report I*). For any stock so identified, amendment 14 requires the STT and Habitat Steering Group to work with state and tribal fishery managers to complete an assessment of the cause of the conservation shortfalls and, if the stocks are not exceptions to the overfishing concern, provide recommendations for stock recovery. For stocks which are not exceptions, the Council must take actions to end the overfishing and begin rebuilding the stock within one year (see Section 3.2.3.2 of Attachment C.2.a.).

Council Action: Based on the report of the STT, identify stocks requiring review under the overfishing concern procedures of amendment 14. For any stock so identified, establish assignments to complete the required actions necessary to prevent overfishing in time for the 2001 salmon season.

Reference Materials:

1. Excerpt from Section 3.2.3 (Overfishing Concern) of draft amendment 14 (Attachment C.2.a.).
2. Supplemental STT Report C.2.

PFMC
03/21/00

SCIENTIFIC AND STATISTICAL COMMITTEE REPORT ON IDENTIFICATION OF STOCKS NOT MEETING ESCAPEMENT GOALS FOR THREE CONSECUTIVE YEARS

Mr. Doug Milward of the Salmon Technical Team (STT) identified stocks that failed to meet their escapement goals for the past three years. All stocks that failed to meet escapement goals, with the exception of Queets River fall coho, were exempted from the overfishing criteria. Exempted stocks are either harvested at rates less than 5% in Council-managed fisheries or listed as threatened or endangered under the Endangered Species Act.

The Queets River fall coho escapement has been less than the 5,800 floor the past three years. During this time period Washington Department of Fish and Wildlife and the Quinault Indian Nation agreed on yearly escapement targets that were less than 5,800 fish. In one of the three years the coho escapement met the target. It is our understanding this stock would not be considered overfished under the current plan; however, under Amendment 14 it would qualify as overfished.

In general, setting the escapement goal equal to the escapement floor is a strategy with a high risk of falling beneath the floor. The mandatory overfishing reviews and rebuilding plans are an expensive consequence of such management. The Scientific and Statistical Committee recommends the Council manage fisheries with buffers above the floors. This principle also applies to groundfish and other fisheries.

PFMC
04/03/00

Table C-2. Assessment of spawner escapements for natural stocks with conservation objectives in Table 3-1 of Amendment 14. Bolded numbers indicate a failure to meet the conservation objective for Amendment 14. (Page 1 of 4)

Stock and Conservation Objective (thousands of spawners; spawners per mile; impact or replacement rate)	**Observed or Projected Conservation Achievement** (postseason estimates of thousands of spawners or spawners per mile; pre- or postseason impact or replacement rate)						**Overfishing Criteria**		
	1995	1996	1997	1998	1999[a/]	2000[b/]	Alert[c/]	Concern[d/]	Exception[e/]
CHINOOK									
Sacramento River Fall 122.0 - 180.0 hatchery and natural spawners	267.8	244.4	323.9	237.5	273.3	≥281.1	No	No	
Sacramento River Spring - threatened Meet preseason jeopardy standard for Sacramento River winter chinook.	-	-	-	-	-	-	No	No	✓
Sacramento River Winter - endangered Jeopardy standard: preseason 1.77 adult spawner replacement rate; a 31% increase relative to 1989-1993 mean. Postseason estimates in parentheses.	-	-	1.77 (3.14)	1.77 (1.38)	1.77 (1.45)	≥1.77	No	No	✓
Klamath River Fall - no less than 35.0 adult spawners	161.8	81.3	46.1	42.5	**18.6**	35.0	No	No	
Klamath River Spring - undefined Impacts limited by allowable exploitation rate on Klamath River fall chinook.	-	-	-	-	-	-	No	No	
California North Coast - threatened Jeopardy standard in 2000: preseason age-4 ocean harvest rate of 17% or less on Klamath River fall chinook.	-	-	-	-	-	≤14%	No	No	✓
Southern, Central and Northern Oregon Coast No less than 60 adult spawners/mile[f/].	93.3	135.0	92.6	101.6	107.0	>60	No	No	
North Lewis River Fall - threatened MSY goal of 5.7 adult spawners. Jeopardy standard beginning year 2000: ≤0.65 adult equivalent brood year exploitation rate on Coweeman tules	11.8	13.9	11.2	6.6	**3.7**	**≤2.6**	No	No	✓
Upper Columbia River Bright 43.5 adults over McNary Dam Base period impacts <4%.	68.2	73.9	67.1	63.8	78.4	>43.5	No	No	✓
Upper Columbia River Summer 80.0 to 90.0 adults over Bonneville Dam. Base period ocean impacts <2%. Long history of dam passage and habitat losses.	**14.6**	**15.5**	**27.6**	**21.1**	**25.7**	**≤33.3**	Limited[e/]	Limited[e/]	✓

Table C-2. Assessment of spawner escapements for natural stocks with conservation objectives in Table 3-1 of Amendment 14. Bolded numbers indicate a failure to meet the conservation objective for Amendment 14. (Page 2 of 4)

Stock and Conservation Objective (thousands of spawners; spawners per mile; impact or replacement rate)	**Observed or Projected Conservation Achievement** (postseason estimates of thousands of spawners or spawners per mile; pre- or postseason impact or replacement rate)						**Overfishing Criteria**		
	1995	1996	1997	1998	1999[a/]	2000[b/]	Alert[c/]	Concern[d/]	Exception[e/]
CHINOOK (Continued)									
Klickitat, Warm Springs, John Day and Yakima River Spring Undetermined within objective for upper river springs of 115,000 adults over Bonneville Dam. Base period ocean impacts <1%. Long history of dam passage and habitat losses.	-	-	-	-	-	-	Limited[e/]	Limited[e/]	✓
Snake River Fall - threatened Jeopardy standard: preseason estimate of adult equivalent age-3/age-4 exploitation rate for all ocean fisheries ≤0.70 of 1988-1993 average.	-	0.63	0.70	0.53	0.65	≤0.64	No	No	✓
Willapa Bay Fall - undetermined	10.2	6.3	11.0	7.1	NA	≤4.2	No	No	✓
Grays Harbor Fall - 14.6 adult spawners (MSP)	12.7	20.2	18.2	**12.5**	10.4	>14.6	NA	No	✓
Grays Harbor Spring - 1.4 adult spawners	2.1	4.5	4.4	2.3	**1.3**	>1.4	NA	No	✓
Queets Fall - no less than 2.5 adult spawners (MSY)	2.9	3.4	2.5	3.9	**1.9**	<2.5	NA	No	✓
Queets Spring/Summer - no less than 0.7 adult spawners	**0.63**	0.78	**0.54**	**0.49**	**0.37**	<0.7	NA	Limited[e/]	✓
Hoh Fall - no less than 1.2 adult spawners (MSY)	2.2	3.0	**1.8**	4.3	**2.0**	>1.2	NA	No	✓
Hoh Spring/Summer - no less than 0.9 adult spawners	1.1	1.4	1.8	1.3	1.0	0.8	Limited[e/]	No	✓
Quillayute Fall - no less than 3.0 adult spawners (MSY)	5.5	7.3	5.4	6.4	3.9	NA	NA	No	✓
Quillayute Spring/Summer - 1.2 adult spawners (MSY)	1.3	1.2	**0.9**	1.6	1.6	NA	NA	No	✓
Puget Sound Chinook - threatened Jeopardy standard beginning in 2000: not available at this time, incorporated within the agreements by parties to U.S. v. Washington made in North of Cape Falcon Forum and April Council meeting. Average exploitation rate in base period ocean fisheries <2%.		-	-	-	-	-	No	No	✓

Table C-2. Assessment of spawner escapements for natural stocks with conservation objectives in Table 3-1 of Amendment 14. Bolded numbers indicate a failure to meet the conservation objective for Amendment 14. (Page 3 of 4)

Stock and Conservation Objective (thousands of spawners; spawners per mile; impact or replacement rate)	**Observed or Projected Conservation Achievement** (postseason estimates of thousands of spawners or spawners per mile; pre- or postseason impact or replacement rate)						**Overfishing Criteria**		
	1995	1996	1997	1998	1999[a/]	2000[b/]	Alert[c/]	Concern[d/]	Exception[e/]
COHO									
Central California Coast - threatened Jeopardy standard: since 1998, no retention off CA and ≤0.13 preseason marine exploitation rate on RK hatchery coho.	-	-	-	0.12	0.05	≤0.07	No	No	✓
Northern California - threatened Jeopardy standard: since 1998, no retention off CA & ≤0.13 preseason marine exploitation rate on RK hatchery coho.	-	-	-	0.12	0.05	≤0.07	No	No	✓
Oregon Coastal Natural - threatened Jeopardy standard: since 1998, preseason marine and freshwater exploitation rate per Amendment 13 (≤0.13 in 1998; ≤0.15 in 1999 and 2000). Postseason estimates in parentheses.	0.12 (0.12)	0.13 (0.08)	0.11 (0.12)	0.12 (0.08)	0.09 (NA)	0.09	No	No	✓
Columbia River Natural (undefined)	-	-	-	-	-	-	No	No	
Grays Harbor - 35.4 adult spawners (MSP)	47.4	63.6	**22.4**	35.6	NA	>35.4	No	No	
Queets - 5.8 to 14.5 adult spawners (MSY range)[g/] Includes supplemental adults.	6.2	9.0	**2.1**	**5.5**	**5.3**	**≤3.3**	**Yes**[c/]	**Yes**[d/]	
Hoh - 2.0 to 5.0 adult spawners (MSY range)	4.7	4.9	**1.4**	4.9	4.9	≥3.2	No	No	
Quillayute Fall - 6.3 to 15.8 adult spawners (MSY range)	10.0	11.0	**4.6**	15.0	9.4	≥8.0	No	No	
Western Strait of Juan de Fuca - 11.9 adult spawners		**3.7**	**4.1**	15.1	15.1	**<11.9**	**Yes**[c/]?	No	
Eastern Strait of Juan de Fuca - 0.95 adult spawners		2.03	1.69	1.39	**0.8**	**<0.95**	**Yes**[c/]?	No	
Hood Canal - 21.5 adult spawners (MSP)	40.3	37.1	96.4	101.0	**16.3**	>21.5	No	No	
Skagit - 30.0 adult spawners (MSP)	**13.4**	**8.3**	32.6	76.8	**25.2**	**<30.0**	**Yes**[c/]	No	
Stillaguamish - 17.0 adult spawners (MSP)	21.9	**10.2**	**11.0**	27.2	**7.0**	**<17.0**	**Yes**[c/]	No	
Snohomish - 70.0 adult spawners (MSP)	110.3	**53.1**	**58.2**	150.0	**61.0**	**<70.0**	**Yes**[c/]	No	

Table C-2. Preliminary assessment of overfishing criteria in 2000 for natural stocks with Council conservation objectives in Table 3-1 of Amendment 14. Bolded numbers indicate a failure to meet the conservation objective. (Page 4 of 4)

a/ Preliminary estimates.

b/ Preliminary approximations based on projections of ocean escapements in the Council's March salmon management options.

c/ **Conservation Alert** - triggered during the annual preseason process if a natural stock or stock complex, listed in Table 3-1 of the salmon FMP, is projected to fall short of its conservation objective (MSY, MSY proxy, MSP, or floor in the case of some harvest rate objectives [e.g., 35,000 natural Klamath River fall chinook spawners]).

Actions for Stocks that are not Exceptions (beginning in 2001 as Amendment 14 not implemented early enough in 2000) - The Council will close salmon fisheries within its jurisdiction which impact the stocks, except in the case of Washington coastal and Puget Sound salmon stocks and fisheries managed under U.S. District Court orders. In these cases, the Council may allow fisheries which meet annual spawner targets developed through relevant U.S. v. Washington, Hoh v. Baldrige, and subsequent U.S. District Court ordered processes and plans, which may vary from the MSY or MSP conservation objectives. For all natural stocks which meet the conservation alert criteria, the Council will notify pertinent fishery and habitat managers, advising that the stock may be temporarily depressed or approaching an overfishing concern (depending on its recent conservation status), and request that state and tribal fishery managers identify the probable causes, if known. If the stock in question has not met its conservation objective in the previous two years, the Council will request the pertinent state and tribal managers to do a formal assessment of the primary factors leading to the shortfalls and report their conclusions and recommendations to the Council no later than the March meeting prior to the next salmon season.

d/ **Overfishing concern** - triggered if, in three consecutive years, the postseason estimates indicate a natural stock, listed in Table 3-1 of the salmon FMP, has fallen short of its conservation objective (MSY, MSP, or spawner floor as noted for some harvest rate objectives).

Actions required for Stocks that are not Exceptions - Within one year, the STT to recommend and the Council to adopt management measures to end the overfishing concern and recover the stock in as short a time as possible, preferably within ten years or less. The HSG to provide recommendations for habitat restoration and enhancement measures within a suitable time frame.

e/ **Exception** - strict application of the conservation alert and overfishing criteria and subsequent Council actions do not apply for (1) hatchery stocks, (2) natural stocks with a cumulative adult equivalent exploitation rate of less than 5% in ocean fisheries under Council jurisdiction during the FRAM base periods, and (3) stocks listed under the ESA.

Conservation Alert and Overfishing Concern Actions for Natural Stocks that are Exceptions (those with exploitation rates of less than 5% in base period Council-area ocean fisheries) - Utilize expertise of STT and HSG to confirm negligible impacts of proposed Council fisheries, identify factors which have led to the decline or low abundance (e.g., fishery impacts outside Council jurisdiction, or degradation or loss of essential fish habitat) and monitor abundance trends and total harvest impact levels. Council action will focus on advocating measures to improve stock productivity, such as reduced interceptions in non-Council managed fisheries, and improvements in spawning and rearing habitat, fish passage, flows, and other factors affecting overall stock survival.

f/ Based on the sum of south/local and north migrating spawners per mile weighted by the total number of miles surveyed for each of the two components (2.2 miles for south/local and 9.2 miles for northern stocks).

g/ Comparison of Queets coho postseason spawner escapement with preseason agreed upon annual spawner target:

Queets Coho Spawners	1997	1998	1999
Wild:			
Expected	2.1	3.5	3.4
Actual	1.9	4.1	4.8
Supplemental:			
Expected	-	0.6	2.4
Actual	-	1.4	0.5
Total:			
Expected	2.1	4.0	5.7
Actual	1.9	5.5	5.3

Quinault Indian Nation
POST OFFICE BOX 189 ☐ TAHOLAH, WASHINGTON 98587 ☐ TELEPHONE (360)276-8211

March 31, 2000

Pacific Fisheries Management Council
Attention: Mr. Jim Lone – Chairman
2130 S.W. Fifth Avenue, Suite 224
Portland, Oregon 97201

Dear Mr. Lone:

The spawning escapements for Queets wild coho have not been within established ranges for the past three years. However, the stock is not overfished under the Council's criteria.

The Draft Final Pacific Coast Salmon Plan under chapter 3 Conservation section 3.1.1. Basis specifically states: "Under those orders for Washington coastal and Puget Sound stocks (U.S. v. Washington, 626 F. Supp. 1405 [1985] and Hoh v. Baldrige No. 81-742 [R] C), the treaty tribes and WDFW may agree to annual spawner targets that differ from the MSP or MSY objectives"

Given the recent variations in marine survival in recent years, both the Quinault Nation and Washington Department of Fish & Wildlife, as co-managers of the Queets wild coho, have annually agreed to fishing regimes that were anticipated to result in escapements below the established range. The following table summarizes those expectations and provides estimates of actual spawning escapement levels since 1997:

Year	Preseason Ocean Abundance	Agreed to Terminal Spawning Escapement Expectation	Actual Terminal Spawning Escapement
1997	4,341 wild	2,121 wild	1,851 wild
1998[1]	4,225 wild 694 supplemental 4,919 total	3,466 wild 564 supplemental 4,030 total	4,102 wild 1,413 supplemental 5,515 total
1999[2]	4,263 wild 3,037 supplemental 7,300 total	3,351 wild 2,398 supplemental 5,749 total	4,791 wild 521 supplemental 5,312 total

1 – Pre-terminal and terminal areas managed for wild and supplemental combined.

2 – QIN managed for wild and supplemental combined and WDFW managed based on wild.

EXCERPT FROM AMENDMENT 14

* * * * * * * * * * *

3.2.3 Overfishing Concern

> *"For a fishery that is overfished, any fishery management plan, amendment, or proposed regulations . . . for such fishery shall–(A) specify a time period for ending overfishing and rebuilding the fishery that shall–(I) be as short as possible, taking into account the status and biology of any overfished stocks of fish, the needs of the fishing communities, recommendations by international organizations in which the United States participates, and the interaction of the overfished stock within the marine ecosystem; and (ii) not exceed 10 years, except in cases where the biology of the stock of fish, other environmental conditions, or management measures under an international agreement in which the United States participates dictate otherwise. . ."*
>
> *Magnuson-Stevens Act, § 304(e)(4)*

The Magnuson-Stevens Act requires overfishing be ended and stocks rebuilt in as short a period as possible and, depending on other factors, no longer than ten years. For healthy salmon stocks which may experience a sudden reduction in production and/or spawner escapement, the limitation on fishing impacts provided by the Council's MSY or MSY proxy conservation objectives provide a stock rebuilding plan that should be effective within a single salmon generation (two years for pinks, three years for coho, and three to five years for chinook). However, additional actions may be necessary to prevent overfishing of stocks suffering from chronic depression due to fishery impacts outside Council authority or from habitat degradation or long-term environmental fluctuations. Such stocks may meet the criteria invoking the Council's overfishing concern.

3.2.3.1 Criteria

The Council's criteria for an overfishing concern are met if, in three consecutive years, the postseason estimates indicate a natural stock has fallen short of its conservation objective (MSY, MSP, or spawner floor as noted for some harvest rate objectives) in Table 3-1. It is possible that this situation could represent normal variation, as has been seen in the past for several previously referenced salmon stocks which were reviewed under the Council's former overfishing definition. However, the occurrence of three consecutive years of reduced stock size or spawner escapements, depending on the magnitude of the short-fall, could signal the beginning of a critical downward trend (e.g., Oregon coastal coho) which may result in fishing that jeopardizes the capacity of the stock to produce MSY over the long term if appropriate actions are not taken to ensure the automatic rebuilding feature of the conservation objectives is achieved.

3.2.3.2 Assessment

When an overfishing concern is triggered, the Council will direct its STT to work with state and tribal fishery managers to complete an assessment of the stock within one year (generally, between April and the March Council meeting of the following year). The assessment will appraise the actual level and source of fishing impacts on the stock, consider if excessive fishing has been inadvertently allowed by estimation errors or other factors, identify any other pertinent factors leading to the overfishing concern, and assess the overall significance of the present stock depression with regard to achieving MSY on a continuing basis.

Depending on its findings, the STT will recommend any needed adjustments to annual management measures to assure the conservation objective is met, or recommend adjustments to the conservation objective which may more closely reflect the MSY or ensure rebuilding to that level. Within the constraints presented by the biology of the stock, variations in environmental conditions, and the needs of the fishing communities, the STT recommendations should identify actions that will recover the stock in as short a time as possible, preferably within ten years or less, and provide criteria for identifying stock recovery and the end of the overfishing concern. The STT recommendations should cover harvest management, potential enhancement activities, hatchery practices, and any needed research. The STT may identify the need for special programs or analyses by experts outside the Council advisors to assure the long-term recovery of the salmon population in question. Due to a lack of data for some stocks, environmental variation, economic and social impacts, and habitat losses or problems beyond the control or management authority of the Council, it is likely that recovery of depressed stocks in some cases could take much longer than ten years.

In addition to the STT assessment, the Council will direct its Habitat Steering Group (HSG) to work with federal, state, local, and tribal habitat experts to review the status of the essential fish habitat affecting this stock and, as appropriate, provide recommendations to the Council for restoration and enhancement measures within a suitable time frame.

3.2.3.3 Council Action

Following its review of the STT report, the Council will specify the actions that will comprise its immediate response for ensuring that the stock's conservation objective is met or a rebuilding plan is properly implemented and any inadvertent excessive fishing within Council jurisdiction is ended. The Council's rebuilding plan will establish the criteria that identify recovery of the stock and the end of the overfishing concern. In some cases, it may become necessary to modify the existing conservation objective/rebuilding plan to respond to habitat or other long-term changes. Even if fishing is not the primary factor in the depression of the stock or stock complex, the Council must act to limit the exploitation rate of fisheries within its jurisdiction so as not to limit recovery of the stock or fisheries, or as is necessary to comply with ESA jeopardy standards. In cases where no action within Council authority can be identified which has a reasonable expectation of providing benefits to the stock unit in question, the Council will identify the actions required by other entities to recover the depressed stock. Upon review of the report from the HSG, the Council will take actions to promote any needed restitution of the identified habitat problems.

For those fishery management actions within Council authority and expertise, the Council may change analytical or procedural methodologies to improve the accuracy of estimates for abundance, harvest impacts, and MSY escapement levels, and/or reduce ocean harvest impacts when shown to be effective in stock recovery. For those causes beyond Council control or expertise, the Council may make recommendations to those entities which have the authority and expertise to change preseason prediction methodology, improve habitat, modify enhancement activities, and re-evaluate management and conservation objectives for potential modification through the appropriate Council process.

3.2.3.4 End of Overfishing Concern

The criteria for determining the end of an overfishing concern will be included as a part of any recovery plan adopted by the Council. Additionally, an overfishing concern will be ended if the STT stock analysis provides a clear finding that the Council's ability to affect the overall trend in the stock abundance through harvest restrictions is virtually nil under the "exceptions" criteria below for natural stocks.

3.2.4 Exceptions

"Conservation and management measures shall take into account and allow for variations among, and contingencies in, fisheries, fishery resources, and catches."
Magnuson-Stevens Act, National Standard 6

This plan contains three exceptions to the application of overfishing criteria and subsequent Council actions for stocks or stock complexes with conservation objectives in Table 3-1: (1) hatchery stocks, (2) stocks for which Council management actions have inconsequential impacts, and (3) stocks listed under the ESA.

3.2.4.1 Hatchery Stocks

Salmon stocks important to ocean fisheries and comprised exclusively of hatchery production generally have conservation objectives expressed as an egg-take or the number of spawners returning to the hatchery rack to meet program objectives. This plan recognizes these objectives and strives to meet them. However, these artificially produced stocks generally do not need the protection of overfishing criteria and special Council rebuilding programs to maintain long-term production. Because hatchery stocks can generally sustain significantly higher harvest exploitation rates than natural stocks, ocean fisheries rarely present a threat to their long-term survival. In addition, it is often possible to make temporary program modifications at hatcheries to assure adequate production to sustain the stock during periods of low abundance (e.g., sharing brood stock with other hatcheries, arranging for trapping at auxiliary sites, etc.). If specialized hatchery programs are approved in the future to sustain listed salmon stocks, the rebuilding programs would be developed and followed under the ESA .

3.2.4.2 Natural Stocks With Minimal Harvest Impacts in Council-Managed Fisheries

Several natural stock components identified within this FMP are subject to minimal harvest impacts in Council fisheries because of migration timing and/or distribution. As a result, the Council's ability to affect the overall trend in the abundance of these components through harvest restrictions is virtually nil. Components in this category are identified by a cumulative adult equivalent exploitation rate of less than five percent in ocean fisheries under Council jurisdiction during base periods utilized by the fishery regulation assessment models (1979-1982 for chinook and 1979-1981 for coho). Council action for these components, when a conservation alert or an overfishing concern are triggered, will consist of confirming negligible impacts of proposed Council fisheries, identifying factors which have led to the decline or low abundance (e.g., fishery impacts outside Council jurisdiction, or degradation or loss of essential fish habitat), and monitoring of abundance trends and total harvest impact levels. Council action will focus on advocating measures to improve stock productivity, such as reduced interceptions in non-Council-managed fisheries, and improvements in spawning and rearing habitat, fish passage, flows, and other factors affecting overall stock survival.

3.2.4.3 Stocks Listed Under the Endangered Species Act

The Council regards stocks listed as endangered or threatened under the ESA as a third exception to the application of overfishing criteria of the Magnuson-Stevens Act. The ESA requires federal agencies whos actions may jeopardize listed salmon to consult with NMFS. Because NMFS implements ocean harvest regulations, it is both the action and consulting agency for actions taken under the FMP. To ensure there is no jeopardy, NMFS conducts internal consultations with respect to the effects of ocean harvest on listed salmon. The Council implements NMFS' guidance as necessary to avoid jeopardy, as well as in recovery plans approved by NMFS. As a result of NMFS' consultation, an incidental take statement may be issued which authorizes take of listed stocks under the FMP that would otherwise be prohibited under the ESA.

The Council believes that the requirements of the ESA are sufficient to meet the intent of the Magnuson-Stevens Act overfishing provisions. Those provisions are structured to maintain or rebuild stocks to levels at or above MSY and require the Council to identify and develop rebuilding plans for overfished stocks. For many fish species regulated under the Magnuson-Stevens Act, the elimination of

excess fishing pressure is often the sole action necessary to rebuild depressed stocks. This is, however, not the case for many salmon stocks and, in particular, for most listed populations.
Although harvest has certainly contributed to the depletion of West Coast salmon populations, the primary reason for their decline has been the degradation and loss of freshwater spawning, rearing and migration habitats. The quality and quantity of freshwater habitat are key factors in determining the MSY of salmon populations. The Council has no control over the destruction or recovery of freshwater habitat nor is it able to predict the length of time that may be required to implement the habitat improvements necessary to recover stocks. While the Council could theoretically establish new MSY escapement goals consistent with the limited or degraded habitat available to listed species, adoption of revised goals would potentially result in an ESA-listed stock being classified as producing at MSY and; therefore, not overfished under the Magnuson-Stevens Act. The Council believes that the intent of the ESA and the Magnuson-Stevens Act is the recovery of stocks to MSY levels associated with restored habitat conditions.

The Council considers the jeopardy standards and recovery plans developed by NMFS for listed populations as interim rebuilding plans. Although NMFS' jeopardy standards and recovery plans may not by themselves recover listed populations to historical MSY levels within ten years, as required under the Magnuson-Stevens Act, they are sufficient to stabilize populations until freshwater habitats and their dependent populations can be restored and estimates of MSY developed consistent with recovered habitat conditions. As species are delisted, the Council will establish conservation objectives with subsequent overfishing criteria and manage to maintain the stocks at or above MSY levels.

* * * * * * * * * *

METHODOLOGY REVIEWS FOR 2000

Situation: The Scientific and Statistical Committee (SSC) has lead responsibility for reviewing the merits of the many models and technical tools used in developing the Council's salmon management measures. Council Operating Procedure 15 states:

> . . . . During the March and April meetings or at other appropriate times, the SSC, in conjunction with the Salmon Technical Team (STT), will identify methodology issues which merit a full review.
>
> The SSC will inform the Council of the methodologies selected for review and request travel funds for meetings. The SSC also will notify the Council of assistance needed from management entities to accomplish the review.
>
> The role of the SSC is primarily one of oversight. The appropriate management entities are expected to provide background information on procedures and data bases for methodologies undergoing full review, as well as early notification and documentation of anticipated changes in procedures for methodologies not under full review in a particular year. . . .

In the 1999 review year, a review was completed on:

- Hooking mortality and encounter rates.

Models slated for review in 1999 for which little progress was made include:

- Klamath Ocean Harvest Model.
- Coho salmon cohort analysis project.
- Coho Fishery Regulatory Assessment Model (FRAM) modifications for selective fisheries (previously, the SSC approved changes for temporary use).
- Chinook FRAM modifications for selective fisheries.

Changes to the Chinook FRAM to allow it to evaluate selective fisheries were not completed for the 2000 season. Other changes to the Chinook FRAM were reviewed and found to have minor implications for Council fisheries. In November 1999, the SSC requested a special meeting with pertinent STT members and modelers involved with the FRAM to improve SSC understanding of the model.

A supplemental SSC report will provide recommendations for model reviews to be conducted in the coming year.

Council Action: Provide any needed guidance to the SSC with regard to priorities and methodologies to be addressed. Request affected agencies develop and provide needed materials to the SSC, as appropriate.

Reference Materials:

1. Supplemental SSC Report C.3.

PFMC
03/20/00

SCIENTIFIC AND STATISTICAL COMMITTEE REPORT ON METHODOLOGY REVIEWS FOR 2000

Mr. Bill Tweit of Washington Department of Fish and Wildlife (WDFW) reviewed the current status of the coho cohort analysis project. This is a cooperative project between WDFW, Oregon Department of Fish and Wildlife, U.S. Fish and Wildlife Service, Northwest Indian Fish Commission, and Treaty Tribes of Western Washington. The objective of this project is to reconstruct coho salmon cohorts for the 1986 through 1991 time period. One important product of this project will be estimates of exploitation rates which should be less biased than those currently used by the coho fishery regulatory assessment model (FRAM). This project is ongoing and has no projected completion date. The Scientific and Statistical Committee (SSC) identifies this as a very important project that requires completion. The database produced by the project should be the basis for any new models developed to address fishery management, including coho FRAM. The SSC recommends this project be given the highest priority by the agencies involved and completed as soon as possible. The SSC looks forward to reviewing the results of this project in the near future.

There has been no recent progress on the new Klamath Ocean Harvest Model (KOHM). This new model is badly needed and should receive the highest priority for completion. The SSC expects to see documentation of the new KOHM in September, prior to the October Council meeting.

In November, the SSC was informed that changes to the chinook FRAM to accommodate selective fisheries were not complete. The SSC needs a demonstration of the performance of the new chinook FRAM as part of its review process. Review of the new chinook FRAM needs to occur in October if the model is to be used for management in the 2001 season.

Three specific areas of possible bias related to the data used in the current chinook FRAM were brought to the attention of the SSC. These were:

1. Coded wire tags used to represent Lower Columbia River wild chinook stocks.
2. Spring chinook stock composition in the non-treaty troll fishery.
3. Encounter and shaker mortality rates in the treaty troll summer chinook fishery.

The demonstration of the performance of the new chinook FRAM should address these issues, but should not be limited to these three items. It should be much broader and include a demonstration of the robustness of the model to changes in the data and other model parameters.

Documentation of changes to methodologies proposed for the 2001 salmon management season should be submitted to the Council office no later than September 29, 2000. This will ensure the SSC has adequate time for proper review.

It has been at least eight years since the SSC last reviewed the methodologies used for preseason salmon abundance forecasts. Methodologies and data used for many of these forecasts have changed substantially since that time. The SSC recognizes that formal documentation of the forecast methodologies is a significant project for the agencies involved. The SSC anticipates conducting reviews of coast-wide forecast methodologies for coho and chinook salmon in October 2001 and requests that affected agencies plan accordingly.

PFMC
04/03/00

TENTATIVE ADOPTION OF 2000 OCEAN SALMON MANAGEMENT MEASURES FOR ANALYSIS

Situation: In this action, the Council must narrow the March management options to the final season recommendations. To allow adequate analysis before final adoption, the tentatively adopted recommendations should resolve any outstanding conflicts and be as close as possible to the final management measures. This is especially important this year since final adoption is scheduled for Thursday afternoon rather than Friday.

The Council's procedure provides any agreements by outside parties (e.g., North of Cape Falcon Forum, etc.) which are to be incorporated into the Council's management recommendations, must be presented to the Council in writing prior to adoption of the tentative options. The procedure also stipulates any new options or analyses must be reviewed by the Salmon Technical Team (STT) and public prior to the Council's final adoption.

In addition to adoption of the annual management measures, the Council must annually approve definitions for commercial and recreational fishing gear. For 2000, no new definitions were proposed in the adopted options. The 1999 definitions are provided in Attachment C.4.a.

If necessary, the STT will check back with the Council on Wednesday (Agendum C.5.) or at other times to clarify any questions or obvious problems with the tentative measures. The Council must settle all such issues on Wednesday to allow STT analysis and meet the final adoption deadline of Thursday afternoon.

Public comment letters received at the Council office by noon on March 22 are included in Public Comment C.4. Summaries of the testimony presented at the public hearings will be provided at the meeting in the supplemental reports noted below.

Council Action: **Adopt tentative treaty Indian commercial and non-Indian commercial and recreational management measures for STT analysis, including any proposed changes to the definitions for commercial and recreational fishing gear (Attachment C.4.a.).**

Reference Materials:

1. Definitions of fishing gear (Attachment C.4.a.).
2. *Preseason Report II Analysis of Proposed Regulatory Options for 2000 Ocean Salmon Fisheries* (mailed prior to the hearings and available at meeting).
3. Written public comment (Public Comment C.4.).
4. Summary of public hearings (Supplemental Public Hearing Reports C.4.[1]. through C.4.[6].).

PFMC
03/21/00

TO: PACIFIC FISHERY MANAGEMENT COUNCIL 3-12-00
SUITE 224
2130 SW FIFTH AVE
PORTLAND, OREGON 97201

DEAR SIR:

I JUST READ YOUR PROPOSAL FOR THE 2000 SAMON SEASONS. I WILL NOT BE ABLE TO ATTEND YOUR MARCH 27TH MEETING DUE TO WORK, BUT I WOULD LIKE TO PROPOSE THE FOLLOWING.

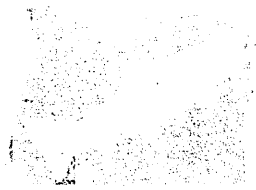
LAST YEAR YOU ALLOWED US WITH LIMITED BOATS TO HAVE A SHORT OCEAN SPORT SEASON INSIDE OF 3 MILES OFF WESTPORT EARLY IN THE SEASON. THERE ARE A FEW KING'S AROUND THE INSIDE THAT TIME OF YEAR AND NO COHO. SOME OF US ENJOY OCEAN FISHING BUT ARE LIMITED BY OUR BOATS AND EQUIPMENT TO STAY INSIDE. I APPRICIATE THE OPPORTUNITY TO TRY AND CATCH A FEW QUALITY FISH THIS WAY.

PLEASE CONSIDER THIS TYPE OF FISHING FOR US AGAIN THIS YEAR.

RESPECTFULLY:

NICHOLAS P. ADSKIM
PO BOX 383
GRAYLAND, WASH. 98547

HM: 360-267-2118
WK: 360-267-2119



O R E G O N T R O U T

March 15, 2000

Oregon Fish & Wildlife Commission
P. O. Box 59
Portland, OR 97207

RECEIVED
[illegible]
PFMC

Subject: 2000 Ocean Salmon Seasons

Dear Commissioners:

Oregon Trout supports the position of the Independent Multidiciplinary Science Team regarding ocean coho salmon fisheries this year. We concur that OCN coho stocks are not replacing themselves and that any sport or commercial fishery targeting coho salmon will unnecessarily impact OCN stocks. Therefore, all ocean fisheries that target coho salmon should be avoided.

If the Pacific Fishery Management Council fails to follow this precautionary principle for the recovery of OCN coho stocks, Oregon Trout asks the Oregon Fish and Wildlife Commission to not concur with this decision and to take action to close all state jurisdictional waters to coho angling in 2000.

Any allowable fishery targeting coho salmon should be limited to terminal fisheries that harvest only hatchery coho salmon.

Sincerely,

Jim Myron
Conservation Director

Cc: Roy Hemmingway, Governor's Office
Independent Multiciplinary Science Team
McIsaac, PFMC

KFMC Reccomendations to the PFMC

The KFMC passed the following motions on April 3, 2000:

The KFMC recommends to the PFMC, for all salmon except coho, the following season for the KMZ sport fishery Humbug Mountain to Horse Mountain: an opening from May 27 to July 6, with 1 fish/day, no more than 4 fish/7 consecutive days, and an opening from July 29 to September 10, with 2 fish/ day, no more than 4 fish/7 consecutive days. Other restrictions listed in the Preseason Report II, Table 2, Option 2, page 14, apply.

The KFMC recommends to the PFMC that a member of the KFMC be recognized at PFMC salmon fishery public meetings regarding salmon regulations when they occur in the Southern Oregon/Northern California area.

MANAGEMENT OPTION PUBLIC COMMENT RECEIVED AT THE COUNCIL OFFICE

We received 19 public comment letters at the Council office between March 15 and March 30, 2000. An index of the letters and comments is provided below. The complete letters are attached for your review (letters #1 and #19 are contained in Public Comment C.4., distributed earlier in the briefing book mailing).

Conservation Concerns

All five letters express a pressing need to limit impacts on listed coho stocks to allow them to rebuild. Two letters focus on other listed stocks as well and problems with Council salmon abundance estimation methods.

1. Mr. Jim Myron, Oregon Trout, Portland, OR, March 15 (Letter contained in Public Comment C.4.)

   Supports the position of the Independent Multidisciplinary Science Team that ocean fisheries should not target coho salmon until the stocks are rebuilt. At present, they are not replacing themselves.

2. Mr. Jim Myron, Oregon Trout, Portland, OR, March 23

   Against all options as they contain directed fisheries for coho salmon before the natural stock has been rebuilt. Concerned the Council's proposed regulations do not properly acknowledged the Oregon State listing of lower Columbia River coho as endangered.

3. Mr. Paul Engelmeyer, National Audubon Society, Yachats, OR, March 20

   Models predicting Oregon coastal natural (OCN) coho abundance have over predicted in 13 of the last 14 years. The adults in 2000 will be returning from the second lowest spawning abundance on record. No discussion of fishery impacts on state listed lower Columbia River coho. Rogue system did not achieve replacement of coho spawners in 1999 and Council's options exceed last year's level on Rogue/Klamath hatchery coho (indicator for threatened southern Oregon/northern California coho). Concerned that expected ocean escapement of Queets coho is less than 50% of the low end of the spawner objective range. Listed chinook stocks in Puget Sound and the lower Columbia do not appear to be adequately protected by National Marine Fisheries Service (NMFS) jeopardy standards and the Council needs a conservation buffer above the floor spawner objective for Klamath River fall chinook.

4. Mr. Ian Tattam, Portland, OR, March 29

   Abundance predictions for OCN coho are not reliable. Management of 2000 fisheries should be more reflective of depressed will stocks such as OCN coho and lower Columbia River wild fall chinook. Adopt Option III south of Cape Falcon for both Sport and Commercial Fisheries to provide the least risk to OCN coho.

5. Mr. Dike Dame, Yachats Area Watershed Council, Yachats, OR, March 29

   Yachats River coho are at extremely low levels (about 2 spawners per mile in 1999). We need a conservative approach in ocean fisheries and, therefore, support implementation of Option III which is the most conservative option proposed.

California Commercial Fishery

6. Mr. Gary D. Manners Ph.D., El Sobrante, CA, March 26

   Provides extensive rationale against requiring circle hooks in the commercial fishery off California when fishing by any means other than trolling (a newly proposed restriction for 2000).

Oregon Commercial Fishery

South of Cape Falcon, comments primarily involve changes to Option I in the Oregon portion of the Klamath management zone (KMZ). Primary concerns north of Cape Falcon involve maintaining a commercial selective fishery for coho that is accessible to Oregon fishers.

7. Mr. Kevin Bastien, Oregon Salmon Commission, Lincoln City, OR, March 23

   Supports Option I with: an increased landing limit north of Cape Falcon of 200 coho per opening; maintenance of 50/50 sharing of troll impacts on Klamath River fall chinook with California; impact limits on listed coho of no more than the jeopardy standards--15% for OCN coho and 13% for Klamath/Rogue hatchery coho; incidental halibut landing restrictions of one halibut per trip, plus one halibut for each two salmon up to a limit of 50 halibut per trip (Option I).

8. Mr. Don Stevens, Oregon Troll Salmon Advisory Subpanel Member, Newberg, OR, March 28

   Supports Option I north and south of Cape Falcon, including the incidental halibut harvest, with the following salmon management changes: expand the August fishery from Sisters Rocks to Mack Arch south to the Oregon-California border and add a landing limit of 30 fish per day; place a quota (2,100 chinook) on the May fishery south of Humbug Mountain, close the fishery May 29 and reopen June 1 for as long in June as Klamath impacts allow under impact adjusted preseason quota constraint.

9. Mr. John A. Fraser and Mr. Thomas M. Fraser, Brookings, OR, March 21

   Request a May, June, and August through September fishery in the Oregon portion of the KMZ to help small boat fishermen who are losing the rock cod fishery.

The following two letters recommend: maintenance of the 50/50 split of Klamath River fall chinook with California and, for the Oregon portion of the KMZ, (1) extend the May season into June, and (2) expand the August fishery south to the California border.

10. Mr. Ralph Dairy, Brookings, OR, March 28

11. Mr. Mike Nelson, Port of Gold Beach, Brookings, OR, March 28

The following four letters strongly support the proposed selective coho fishery north of Cape Falcon that allows access by Oregon commercial fishers.

12. Mr. Gerald Johnson, F/V JJ, March 24

13. Mr. Jerry Branch, Wilsonville, OR, March 27

14. Mr. Cindy Beckman, Ecola Seafoods Restaurant and Market, Cannon Beach, OR, March 24

15. Jay Beckman, F/V Legacy, Cannon, Beach, OR, March 22

California Recreational Fishery

16. Mr. Jim Childs, Eureka, CA, March 29

    In favor of Option I for the KMZ due to the two fish bag limit.

North of Cape Falcon Recreational Fishery

17. Mr. Mark Cedergreen, Westport Charterboat Association, Westport, WA, March 28

    Supports the ocean harvest level of Option I which meets conservation objectives and urges equity in outside/inside harvest allocation (letter provides stock-by-stock detail and supporting information).

18. Mr. Bruce Ogren, South Bend, WA, March 26

    Supports Option III, but no selective fishery. The bag limit should be the first two coho caught.

19. Mr. Nicholas Adskim, Grayland, WA, March 12 (letter contained in Public Comment C.4.)

    Allow short, early ocean season off Westport inside 3 miles for small boats to access kings.

PFMC
03/31/00

O R E G O N T R O U T

March 23, 2000

Dr. Don McIsaac
Pacific Fishery Management Council
2130 S. W. Fifth Av., Suite #224
Portland, OR 97201

Dear Dr. McIsaac:

Oregon Trout has reviewed the proposed regulatory options for 2000 ocean salmon fisheries and we cannot support any of the alternatives because all of them contain directed fisheries for coho salmon. Since rebuilding of OCN coho stocks is yet to occur, we do not believe that any directed coho fishery is warranted. That includes proposed ocean fisheries south of Cape Falcon, north of Cape Falcon, and the Buoy 10 fishery.

We fail to find any reference in the "Preseason Report II" document of the fact that the state of Oregon has listed lower Columbia River coho salmon as an "endangered" species under the Oregon Endangered Species Act. Can the PFMC simply ignore the fact that Oregon has listed these fish under the state act, or must you take that listing into consideration as you construct schemes for harvest that impact these fish?

State listed lower Columbia River coho salmon are present in the ocean during the time that directed coho fisheries have been proposed. These fish are also present in the area of Buoy 10 during the time that this fishery is proposed. What will the encounter rate be on these listed lower Columbia River coho salmon and what will the mortality rate be for these stocks under the proposed fishing schemes? Has the Pacific Fishery Management Council obtained an incidental take permit from the Oregon Fish and Wildlife Commission under the state ESA in order to allow any of these proposed fisheries to take place?

Please provide a copy of these comments to all Council members. Thank you.

Sincerely,

Jim Myron
Conservation Director

Cc: Greer, DeHart, King, ODFW
Oregon Fish & Wildlife Commission

National Audubon Society

Ten Mile Creek Sanctuary
P. O. Box 496
Yachats, OR 97498
(541) 547-4227

Fax: (541) 547-3229

March 20, 2000

Don McIsaac, Executive Director
Pacific Fisheries Management Council
2130 SW Fifth Ave., Suite 224
Portland, OR 97201

SUBJECT: Comments concerning the 2000 salmon season

Dear Mr. McIsaac;

On behalf of National Audubon Society and it's 90,000 members throughout the region I would like to take this opportunity to comment on the proposed 2000 salmon season. There are a number of concerns that I would like to draw to your attention.

Model forecasts

The models for predicting Oregon Coastal Natural (OCN) coho abundances have shown to be inaccurate. The total OCN coho preseason prediction has over predicted the abundances 13 out of the last 14 years. The fact that the last three brood cycles have not achieved stock replacement in the majority of the basins nor at the total aggregate scale indicates there are significant problems with present management model forecasts. I am very concerned that the predictor model does not take into account factors in natural production such as; parental spawner stock size nor the recent flooding and storm events which create significant impacts with regards to overwintering survival and natural production.

The prediction for OCN River coho of 43,900 in 2000 represents a threefold increase in abundance relative to parental spawner abundance. While this increase may be possible the Council must remember this year's impacts will be on the recruits from second lowest spawning abundance in history 14,068 returning adults to all streams (excluding the lakes) in all four management subunits from the Necanicum to the Coquille Rivers (see SRS escapement data). I am very concerned that once again the model will be over predicting ocean abundances especially when one reviews the data from the ODFW Report from the Salmonid Life-Cycle Monitoring Project. The Report indicates the estimated number of downstream migrant salmonid smolts and juveniles at both survival and index monitoring sites in the Oregon coast range, spring

1998 and 1999. The enclosed Tables 1 & 2 of the Report clearly verifies my concern that this year's fishing season will be impacting adults from the very low 1999 out migrant abundance estimates. For a few examples;

Location	1998	1999
N. Nehalem out migrants	42,427	21,702
Upper Nehalem	51,900	10,409
Mill Creek, Yaquina	6,698	2,225
West Fork Smith	22,412	10,942

While the ODFW Commission recently listed Lower Columbia and Clackamas / Sandy River coho under the State Endangered Species Act there is no discussion or analysis concerning impact rates or abundance estimates for these populations in spite of the fact of their endangered status. It appears as if the spawner escapement goal for the Columbia River coho is to meet hatchery egg-take goals only, with no discussion on the naturally produced spawners from the Washington side of the Columbia as well. This type of management is not based in sound science.

The Lower Columbia River coho, the Clackamas, Sandy Rivers and the Northern and North Central subunits are so depressed (3/fish per mile in the majority of basins) I cannot endorse any directed coho fishery on fin-clipped hatchery fish anywhere. The risks of driving the already severely depressed populations closer to extinction are just too high. ODFW has described these populations as being in an extinction vortex.

I am also not pleased with the fact that the State of California and NMFS continues to use the Rogue / Klamath hatchery coho as a surrogate for the ESA listed Transboundary coho. If you review the last year's ODFW spawner abundance data the Rogue system did not achieve stock replacement even at this assumed low impact rate of 4.91%. From a parent brood in 1996 of 5,400 spawners there was return of only 2,400 adults in 1999. How did the other ESA listed coho respond to the assumed 1999 impact rate of 4.91%? Are other basins in both Evolutionarily Significant Units achieving stock replacement or not? If the federal and state agencies do not know the status of these ESA listed coho populations the Council is managing with inadequate analysis.

At the March PFMC meeting in Sacramento NMFS appeared to give the Council clear direction concerning keeping the impacts to the Rogue / Klamath coho the same as 1999. It is also my understanding that the total impact in 1999 was 4.91% and yet the most conservative option has projected impact of 5.1%.

I urge the Council, NMFS, and the States to develop and implement, conservation objectives, abundance estimates, and impact rates for the ESA listed Transboundary and Central California coho instead of using the surrogate Rogue / Klamath hatchery coho.

With regards to the Washington coho stocks it is very depressing to see the Council put forward preliminary directions for analysis in which 5 out of 9 natural coho stocks will not achieve their conservation objectives in any of the options. The fact that under the conservative option III the Queets wild coho is projected to be 2,500 returning adults which is less than 50% of the low end of the objective range of 5,800-14,500 indicates that the Council has not yet embraced the precautionary principal concepts put forward in the Sustainable Fisheries Act.

I am pleased to see that the State of Washington is forecasting Willapa Bay hatchery and wild coho abundance estimates separately. But, I am concerned with use of the optimistic estimated marine survival of 6% to project the preseason abundance of 9,900 natural coho adults.

Lower Columbia River Chinook

The preliminary direction put forward by NMFS concerning the Recovery Exploitation Rate for the Coweeman population of 65% as part of the Pacific Salmon Treaty appears to be too high to ensure self-sustaining naturally produced stocks. The North Fork Lewis River once again will be significantly less than the conservation objective of 5,700. I urge the Council and NMFS to revisit this direction for the Lower Columbia River ESU using the concepts put forward in the National Research Council's Upstream Report (NRC,1995) for protecting genetic diversity and the recognition of the importance of demes.

Klamath Chinook

Once again the Council is allowing a fishery management that shoots for a floor of 35,000 4-year old natural spawners basin wide. The floor should be hard number not a target that has a fifty/fifty chance of success. Past performance of this type of Council management indicates failure to hit this low target or floor 6 out of 10 times. Where is the precautionary approach to this type of management?

When one acknowledges the fact that the Klamath chinook are also the surrogate for the ESA listed Northern California Chinook it becomes clear that this type of management is unacceptable. How can anyone allow failure on a listed stock over 50% of the time? It is time for the Council, NMFS, and the states to establish conservation objectives, impact rates and abundance estimates for the North Coast chinook as well as spring chinook in Klamath, Trinity and Oregon coast. I urge the Council to develop conservation buffers instead of shooting for the floor as well as develop options that truly protect the listed Northern California chinook.

Puget Sound Chinook

There are many ESA listed Puget Sound chinook stocks some of which are contributors to the North of Falcon fisheries but at this time have no jeopardy standard / recovery plan established by NMFS;

Eastern Strait of Juan de Fuca (Summer/Fall)
Skokomish (Summer/Fall)
Nooksack (Early)
Skagit (Summer/Fall)
Skagit (Spring)
Stillaquamish (Summer/Fall)
Snohomish (Summer/Fall)
Cedar River (Summer/Fall)
White River Spring
Green River (Summer/Fall)
Nisqually River (Summer/Fall)

The fact that only four natural Puget Sound summer/fall chinook stocks have met escapement goals at least once in the last five years (Hoko, Snohomish, Green, and Nisqually) and that two of those stocks have significant numbers of hatchery fish that stray into natural spawning areas and are counted as natural fish is of huge concern as the Council attempts to protect these 'at risk' populations.

In light of the fact that;

- OCN coho abundance in 1997 was at record low levels throughout most of their range, approximately 4 fish per mile (see enclosed Stratified Random Sampling (SRS) population estimates);

- Forecasts indicate that the 2000 abundance levels will be a threefold increase over parent brood but fails to take into account parental spawner stock size or data concerning low out-migrant production from the Life-Cycle Monitoring project.

- There are over 300 local watershed groups working to restore their local salmon populations and not taking a conservative approach is counter-productive to their efforts;

- Many basins within the Lower Columbia and Oregon Coast Evolutionarily Significant Units (ESU) have a severe conservation problem and because of their low coho populations any impacts push them closer to being at risk of irreparable harm and localized extinction.

I believe in the near term the Council's highest priority must be to maximize spawner escapement and ensuring stock replacement at the population scale. I urge the Council to take precautionary approach when setting the 2000 fishing season and adopt Option III with some modifications;

1) Reduce impacts to the Rogue /Klamath coho (surrogate for the listed coho in N. CA).
2) Create a conservation buffer on the Klamath Chinook objective in order to protect the N. CA listed chinook.
3) Establish conservation objectives for spring chinook in the Klamath/Trinity/OR Coast.
4) Establish conservation objectives and impact rates for ESA listed Transboundary and Central California coho.

If I can be of any assistance in the development or implementation of a regional salmon recovery strategy do not hesitate to call.

Sincerely,

Paul Engelmeyer
NW Policy Analyst
Living Oceans Program

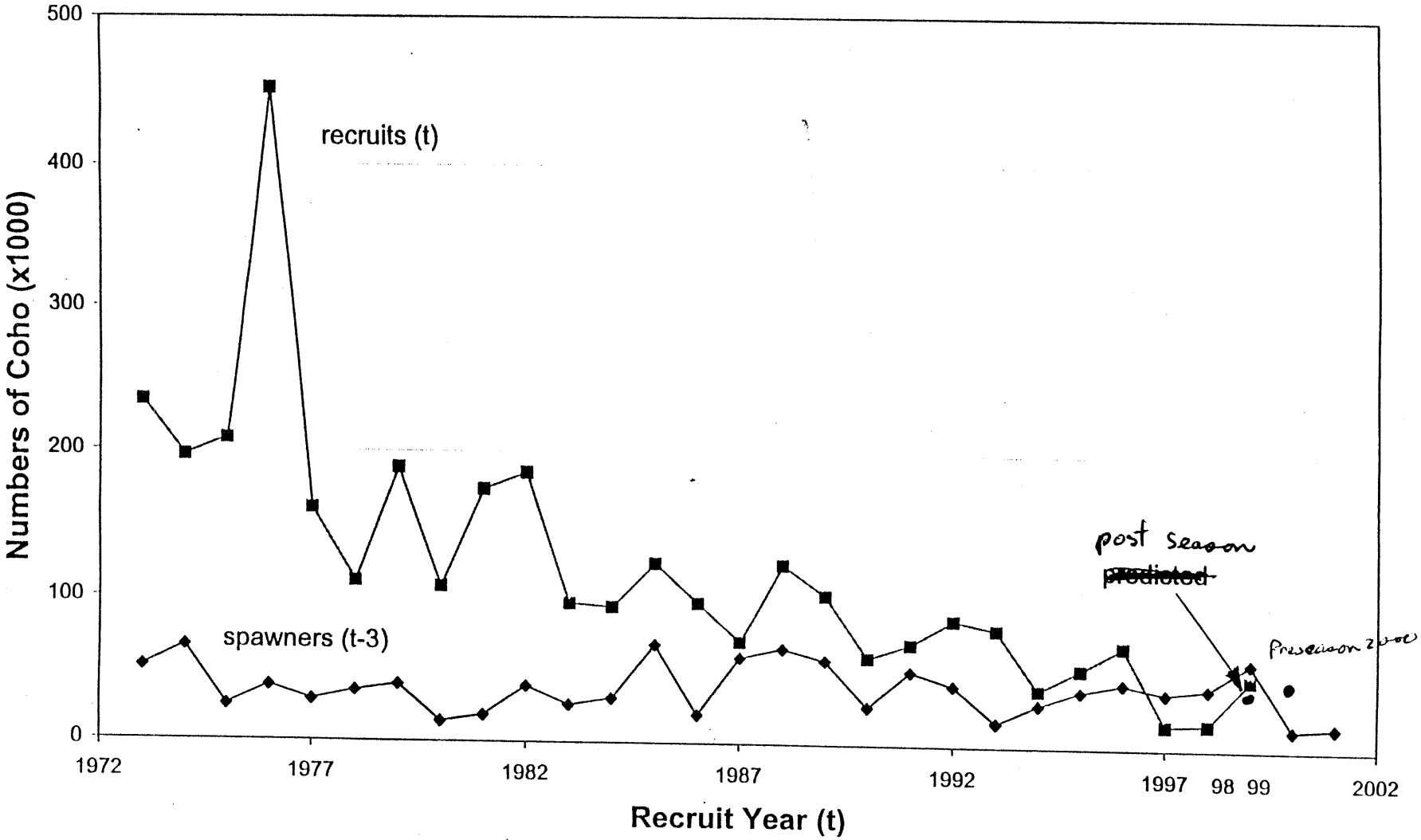
cc. Will Stelle, NMFS
Rod Mcinnis, NMFS
Governor Kitzhaber
Governor Locke
Governor Davis
Mike Sherwood, Earthjustice Legal Defense Fund

Annual estimates of wild coho spawner abundance in coastal river basins within the Oregon Coastal ESU, 1990-99.

Gene Conservation Area, Basin/Group	Spawner Abundance by Return Year									
	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999[a]
North Coast:										
Necanicum R. & Elk Creek	191	1,135	185	941	408	211	768	253	946	656
Nehalem R.	1,552	3,975	1,268	2,265	2,007	1,463	1,057	1,173	1,190	3,410
Tillamook Bay	265	3,000	261	860	652	289	661	388	271	2,119
Nestucca R.	189	728	684	401	313	1,811	519	271	169	2,117
Sand Lake & Neskowin Cr		240	24	41	77	108	275	61	0	42
Miscellaneous	-	204	-	-	-	-	-	-	-	
Total	**2,197**	**9,282**	**2,422**	**4,508**	**3,457**	**3,882**	**3,280**	**2,146**	**2,576**	**8,345**
Mid Coast:										
Salmon R.	385	39	28	364	107	212	271	237	8	116
Siletz R.	441	984	2,447	400	1,200	607	763	336	394	1,203
Yaquina R.	381	380	633	549	2,448	5,668	5,127	384	365	2,248
Devil's Lk.& Beaver Cr.	23	-	756	500	1,259	-	1,340	425	1,041	3,198
Alsea R.	1,189	1,561	7,029	1,071	1,279	681	1,637	680	213	1,923
Yachats R.	280	28	337	287	67	117	176	99	102	65
Siuslaw R.	2,685	3,740	3,440	4,428	3,205	6,089	7,625	668	1,089	2,617
Miscellaneous	207	-	700	180	250	231	1,188	13	71	0
Total	**5,591**	**6,732**	**15,370**	**7,779**	**9,815**	**13,605**	**18,127**	**2,842**	**3,283**	**11,512**
Umpqua:										
Lower Umpqua R. & Smith R.	589	1,316	1,759	4,804	1,689	6,803	4,904	935	5,118	2,406
Mainstem Umpqua	455	-	192	1,431	1,240	352	339	397	444	1,240
Elk & Calapooya Cr.	185	-	-	-	708	2,315	1,709	196	379	435
South Umpqua	2,508	2,284	-	2,415	579	755	1,885	512	1,807	1,213
Cow Creek			201	661	269	1,124	1,112	193	678	1,177
Total	**3,737**	**3,600**	**2,152**	**9,311**	**4,485**	**11,349**	**9,749**	**2,233**	**8,426**	**6,471**
Mid-South Coast:										
Coos Bay & Big Cr.	2,273	3,813	16,545	15,284	14,685	10,351	12,128	1,127	3,167	4,676
Coquille	2,712	5,651	2,115	7,384	5,035	2,116	16,169	5,720	2,466	3,044
Total	**4,985**	**9,464**	**18,660**	**22,668**	**19,720**	**12,467**	**28,297**	**6,847**	**5,633**	**7,839**
Oregon Coastal ESU	**16,510**	**29,078**	**38,604**	**44,266**	**37,477**	**41,303**	**59,453**	**14,068**	**19,816**	**34,166**

a Estimates for 1999 are preliminary.

OCN Rivers Coho Spawners and Recruits
return years 1973-1999



SALMONID LIFE-CYCLE MONITORING PROJECT

Mario F. Solazzi
Steven L. Johnson
Bruce Miller
Tim Dalton

DRAFT

Funds provided in part by:
Oregon Department of Fish and Wildlife
Sport Fish and Wildlife Restoration Program administered by the U.S. Fish and Wildlife Service
Bureau of Land Management Salem and Coos Bay Districts
Oregon Plan for Salmon and Watersheds
Tillamook Bay National Estuary Program
Oregon Department of Forestry

Table 1. The estimated number of downstream migrant salmonid smolts and juveniles at seven survival monitoring sites in the Oregon coast range, spring 1998 and 1999.

Location Year	Estimated number of downstream migrants Coho	Chinook[a]	Steelhead[b]	Cutthroat[c]
N. Scappoose				
1999	1,453	--	407	346
N. Nehalem				
1998	42,427	984,449	6,706	724
1999	21,702	496,371	4,572	633
L. Nestucca				
1998	3,672	80,844	7,957	565
Mill Cr. Siletz				
1998	9,534	--	1,017	514
1999	8,409	--	240	686
Mill Cr. Yaquina				
1998	6,698	7,063	240	36
1999	2,225	34	347	32
Cascade Cr.				
1998	1,404	26	110	168
1999	557	1	50	153
W. Fk. Smith				
1998	22,412	127,726	6,388	--
1999	10,942	10,349	2,895	75[d]

[a] Chinook $\leq$ 60 mm.
[b] Steelhead $\geq$ 120 mm.
[c] Cutthroat $\geq$ 160 mm.
[d] Number captured.

in 1999, allowing for better growth in years when abundance is low. Cutthroat trout average lengths are more variable between years than the other two species and no distinct trends are evident. The seasonal average lengths for the four species are presented in Table 5.

Adult Trapping and Tagging

North Fork Scappoose Creek

After accounting for fallbacks, 33 adult steelhead and one rainbow trout were counted in the trap at Bonnie Falls between 11 January and 9 April 1999. Seventeen were females and 16 were males. Of the females, 13 were of hatchery origin and of the males, 9 were hatchery fish. All fish were passed above the falls.

North Fork Nehalem River

Coho salmon, both wild and hatchery reared were caught throughout October and most of November. Fish were captured at the Waterhouse trap during the first two weeks of sampling in October and during the first two weeks of November (Figure 1). Numbers of salmonids captured at this trap are shown in Table 6.

For the 45 coho salmon adults captured in the upstream trap or found as carcasses on spawning surveys, 12 had been marked with floy tags. An estimate of adult coho salmon spawners was made using an adjusted Petersen Mark-Recapture methodology:

$$N = ((M + 1)(C + 1)) / (R + 1)$$

where:

M = 218, the number of adult coho salmon marked with floy tag(s). Nine fish were passed without tags.

C = 45, the number of adult coho salmon captured in the upstream trap or found as carcasses on spawning surveys.

R = 12, the number of adult coho salmon marked with floy tag(s) captured in the upstream trap or found as carcasses on spawning surveys.

Using this methodology, the spawning escapement of adult coho salmon in the North Fork Nehalem watershed was estimated to be 775 fish. The ratio between wild and hatchery reared fish caught in the Waterhouse trap was used to estimate the number of these that were wild (550) and that were hatchery reared (225). Bootstrap methodology bound the wild fish estimate with a 95% confidence interval that had 994 as the upper limit and 326 as the lower limit. The number of males and females were similarly estimated by their ratio among Waterhouse trap captures. Among the wild fish, 297 were males and 253 were females, and among the hatchery reared fish, 115 were males and 110 were females.

Table 2. The estimated number of downstream migrant salmonid smolts and juveniles at index monitoring sites in the Oregon coast range, spring 1998 and 1999.

Location	Estimated number of downstream migrants			
Year	Coho	Chinook[a]	Steelhead[b]	Cutthroat[c]
Upper Nehalem				
1998	51,900	255,720	3,759	1,295
1999	10,409	--	1,257	120
Little N. Fk. Wilson				
1998	3,345	1,175,423	13,885	524
1999	330	451,236	3,524	422
Little S. Fk. Kilchis				
1998	571	106,896	1,418	143
1999	385	30,948	1,948	475
Bales				
1998	1,624	249,308	--	197
1999	508	50,261	2	5
E. Fk. Lobster				
1998	1,286	--	--	--
1999	909	--	--	--
U. Mainstem Lobster				
1998	2,913	--	--	--
1999	1,481	--	--	--
N. Fk. Coquille				
1998	2,486	38,199	4,438	310
Winchester				
1999	2,208	--	144	351
Fall				
1999	1,610	4,883	326	89
Bottom				
1999	2,574	2,965	160	364

[a] Chinook $\leq$ 60 mm.

[b] Steelhead $\geq$ 120 mm.

Table 6. Summary of adult salmonids caught in the North Fork Nehalem River trap at Waterhouse Falls, winter 1998-99.

	Coho	Chinook	Steelhea	Cutthroat[a]
Wild Adult Males	123	74	54	-
Wild Adult Females	104	90	45	-
Wild Adult Sex Unknown	0	0	0	-
Wild Jacks	53	3	-	-
Hatchery Adult Males	81	-	31	-
Hatchery Adult Females	77	-	19	-
Hatchery Adult Sex Unknown	0	-	1	-
Hatchery Jacks	125	-	-	-
Total				

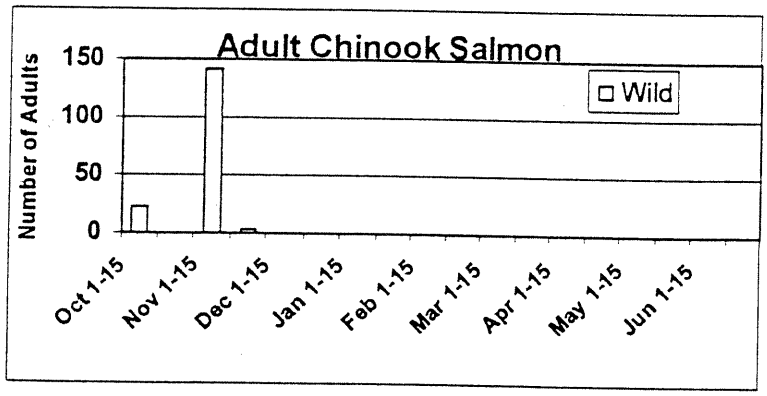
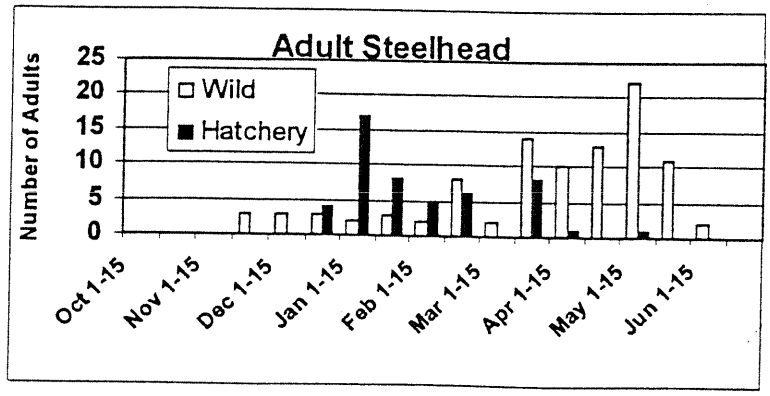


Figure 2. The distribution of adult chinook salmon captured in the North Fork Nehalem River between October 1998 and June 1999.



Ian Tattam
4602 SW 55th Pl.
Portland, OR 97221
(503) 297-4338

March 29, 2000

MEMORANDUM

To: Pacific Fishery Management Council
From: Ian Tattam
Re: Proposed Regulatory Options for 2000 Ocean Salmon Fisheries

I appreciate this opportunity to review and provide comments on the 2000 Ocean Salmon Fishery Regulatory Options proposed by the Salmon Technical Team (STT).

South of Cape Falcon

The Council should adopt Option III for both sport and commercial fisheries South of Cape Falcon. This option presents the least risk to Oregon Coastal Natural coho (OCNs) due to restricted commercial seasons and the absence of a sport coho-directed fishery. Management of fisheries in this area which have a high likelihood of impacting OCNs, such as sport fisheries directed at marked coho, should be conducted as conservatively as possible due to the depressed status of the OCN stock and the variable nature of the preseason predictions.

Preseason predictions have overestimated OCN abundance for the last three years in a row (STT 2000). The prediction for 2000 also seems to have a high probability of error. The model used to predict OCN recruits does not incorporate parent spawner escapements (STT 2000), while this may be acceptable for years or populations of a reasonable spawner abundance, application to a very small spawner population may give inaccurate results. Low spawner densities, as were observed in 1997, can result in recruitment rates which are lower than normally expected due to several processes. Spawners can have difficulty in finding mates, populations can be more susceptible to negative random events (both genetic and environmental), and the low import of marine derived nutrients can depress the growth and consequently survival of juveniles (Bilby et al. 1996). The latter problem is a positive feedback mechanism which can exert substantial influence on recruitment rates as shown by analysis of sockeye populations (Schmidt et al. 1998).

The OCN prediction of 55,900 recruits, which equates to approximately 1.81 recruits per spawner (from STT 2000), seems very optimistic when the aforementioned

processes are considered and given that the stock has been below replacement levels (i.e. <1.0 recruits per spawner) for the last three years in a row. If the OCN prediction is an overestimate, as seems probable, then fishery impacts from selective fisheries and commercial fisheries could be greater than predicted. These fisheries would further reduce OCN escapement and continue the current weak brood cycle.

North of Cape Falcon

Sport and commercial fisheries North of Cape Falcon should be structured to minimize impact impact on Snake River fall chinook, and fall chinook in the Lewis and Sandy rivers, returns to both of which were potentially impacted by extensive 1996 floods. Returns to this are are predicted to be extremely low for the second consecutive year (STT 2000). Low spawner levels of fall chinook reduce stock productivity by destabilizing gravel beds, and consequently increasing the susceptibility of redds to scour (Montgomery et al. 1996). This can result in a positive feedback cycle, with negative consequences for the chinook stocks.

The Council should attempt to minimize this problem by adopting Option III for fisheries North of Cape Falcon. However, this option could also be modified by increasing the coho TAC to levels similar to Options I and II.

Conclusion

Management of ocean fisheries in 2000 needs to be more reflective of depressed wild stocks such as OCN coho and Lower Columbia wild fall chinook. These stocks could likely be at levels where even small increases in fishery impacts would be undesirable. Thus, in the case of OCNs, fisheries directed at hatchery coho should not be allowed. Similarly, the harvest of Lower Columbia wild chinook should be minimized. These actions will help facilitate conservation and recovery of these wild stocks.

Sincerely,

Ian Tattam

References

Bilby, R.E., B.R. Fransen and P.A. Bisson. 1996. Incorporation of nitrogen and carbon from spawning coho salmon into the trophic system of small streams: evidence from stable isotopes. Canadian Journal of Fisheries and Aquatic Sciences 53: 164-173.

Montgomery, D.R., J.M. Buffington, N.P. Peterson, D. Schuett-Hames and T.P. Quinn. 1996. Stream-bed scour, egg burial depths, and the influence of salmonid spawning on bed surface mobility and embryo survival. Canadian Journal of Fisheries and Aquatic Sciences 53: 1061-1070.

Schmidt, D.C., S.R. Carlson, G.B. Kyle, and B.P. Finney. 1998. Influence of Carcass-Derived Nutrients on Sockeye Salmon Productivity of Karluk Lake, Alaska: Importance in the Assessment of an Escapement Goal. North American Journal of Fisheries Management 18: 743-763.

STT (Salmon Technical Team). 2000. Preseason Report I: Stock Abundance Analysis for 2000 Ocean Salmon Fisheries. Pacific Fishery Management Council, Portland.

5

YACHATS AREA WATERSHED COUNCIL
P.O. BOX 28
YACHATS, OREGON 97498

2000

March 29, 2000

Don McIsaac, Executive Director
Pacific Fishery Management Council
2130 SW Fifth Street, Suite 224
Portland, OR 97201

Dear Mr. McIsaac:

The Yachats Area Watershed Council (YAWC) welcomes the opportunity to open up a dialogue with you and the Pacific Fishery Management Council concerning issues related to the PFMC's responsibility to manage salmon regionally. The YAWC believes that improved Pacific salmon management cannot be achieved unless there is an informed, constructive public involvement component in the decision-making process.

The YAWC's goals and objectives include:

- Assessing the conditions of the Yachats area watersheds;
- Implementing and monitoring scientifically based projects which promote the protection or restoration of healthy fish and wildlife resources, water quality and quantity, and overall watershed health;
- Establishing an open framework for education, cooperation, and citizen involvement in the protection and restoration of the overall health of the Yachats area watersheds; and
- Improving communications by providing a forum to facilitate the coordination of decisions made among affected land owners, concerned citizens, and representatives of local, state, and federal agencies.

Oregon Department of Fish and Wildlife has established a long-term spawner escapement goal of 42 fish per mile in standard index survey sites. Their own spawning population estimates for our local Yachats River coho populations are about 2 fish per mile. (See enclosed Stratified Random Sampling data sheet.) As you can see, spawning population estimates for all three brood years are hovering right at 100 adults for the whole Yachats basin, with the 1999 brood year being the weakest with a spawning estimate of 65 returning adults. A conservative approach in the ocean fishery could potentially translate into an additional 10-20% of a total population

returning to spawn naturally. For these reasons, the YAWC supports Option III for the 2000 salmon fishing season. In light of the critical status of our coho populations, we could not envision supporting any option other than the most conservative. If you would like additional data on the status of the salmon populations in our area, we'll be glad to provide it for you. We have been gathering much needed data on fish distribution and summer fry densities for coho that we would like to share with the technical teams of the PFMC.

We acknowledge the difficult decisions facing the Council concerning reversing the decline in salmon populations regionally. You can be assured that we are committed to working 'on the ground' to once again have abundant salmon and steelhead in our watersheds. If we can be of any assistance, or if you have any questions, please contact us.

Sincerely,

Dike Dame

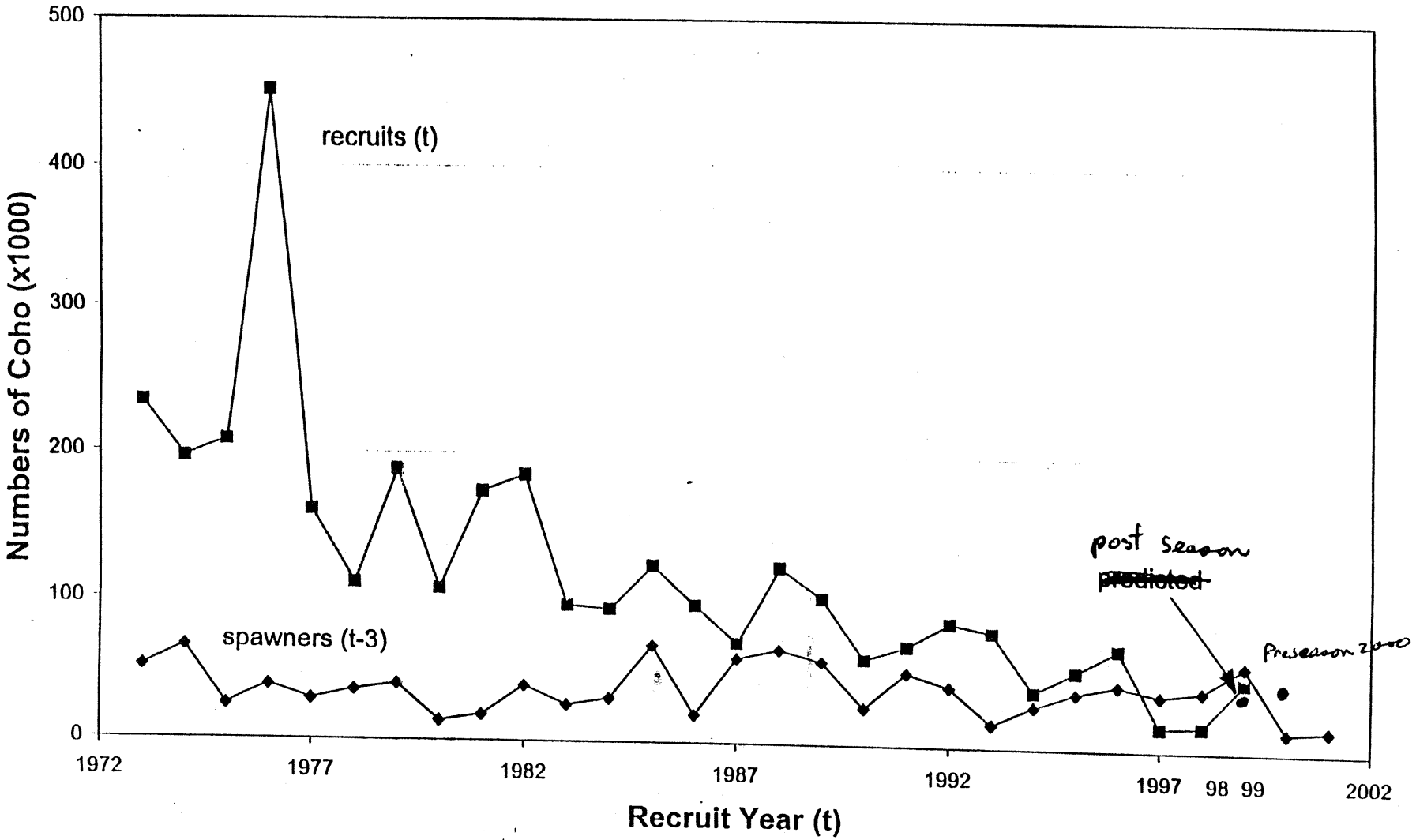
Dike Dame, Co-Chair
541/547-4868

Annual estimates of wild coho spawner abundance in coastal river basins within the Oregon Coastal ESU, 1990-99.

Gene Conservation Area, Basin/Group	Spawner Abundance by Return Year									
	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999[a]
North Coast:										
Necanicum R. & Elk Creek	191	1,135	185	941	408	211	768	253	946	656
Nehalem R.	1,552	3,975	1,268	2,265	2,007	1,463	1,057	1,173	1,190	3,410
Tillamook Bay	265	3,000	261	860	652	289	661	388	271	2,119
Nestucca R.	189	728	684	401	313	1,811	519	271	169	2,117
Sand Lake & Neskowin Cr		240	24	41	77	108	275	61	0	42
Miscellaneous	-	204	-	-	-	-	-	-	-	
Total	**2,197**	**9,282**	**2,422**	**4,508**	**3,457**	**3,882**	**3,280**	**2,146**	**2,576**	**8,345**
Mid Coast:										
Salmon R.	385	39	28	364	107	212	271	237	8	116
Siletz R.	441	984	2,447	400	1,200	607	763	336	394	1,203
Yaquina R.	381	380	633	549	2,448	5,668	5,127	384	365	2,248
Devil's Lk.& Beaver Cr.	23	-	756	500	1,259	-	1,340	425	1,041	3,198
Alsea R.	1,189	1,561	7,029	1,071	1,279	681	1,637	680	213	1,923
Yachats R.	280	28	337	287	67	117	176	99	102	65
Siuslaw R.	2,685	3,740	3,440	4,428	3,205	6,089	7,625	668	1,089	2,617
Miscellaneous	207	-	700	180	250	231	1,188	13	71	0
Total	**5,591**	**6,732**	**15,370**	**7,779**	**9,815**	**13,605**	**18,127**	**2,842**	**3,283**	**11,512**
Umpqua:										
Lower Umpqua R. & Smith R.	589	1,316	1,759	4,804	1,689	6,803	4,904	935	5,118	2,406
Mainstem Umpqua	455	-	192	1,431	1,240	352	339	397	444	1,240
Elk & Calapooya Cr.	185	-	-	-	708	2,315	1,709	196	379	435
South Umpqua	2,508	2,284	-	2,415	579	755	1,885	512	1,807	1,213
Cow Creek			201	661	269	1,124	1,112	193	678	1,177
Total	**3,737**	**3,600**	**2,152**	**9,311**	**4,485**	**11,349**	**9,749**	**2,233**	**8,426**	**6,471**
Mid-South Coast:										
Coos Bay & Big Cr.	2,273	3,813	16,545	15,284	14,685	10,351	12,128	1,127	3,167	4,676
Coquille	2,712	5,651	2,115	7,384	5,035	2,116	16,169	5,720	2,466	3,044
Total	**4,985**	**9,464**	**18,660**	**22,668**	**19,720**	**12,467**	**28,297**	**6,847**	**5,633**	**7,839**
Oregon Coastal ESU	**16,510**	**29,078**	**38,604**	**44,266**	**37,477**	**41,303**	**59,453**	**14,068**	**19,816**	**34,166**

a *Estimates for 1999 are preliminary.*

OCN Rivers Coho Spawners and Recruits
return years 1973-1999



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2524 Heide Court
El Sobrante, CA 94803
March 26, 2000

Pacific Fishery Management Council
2130 S.W. Fifth Ave. Suite 224
Portland, OR 97201

MAR 2 9 2000

Management Council Meeting April 3, 2000, Agenda Item: C4.b.

Dear Chairman Lone and Members of the Council:

I am a part-time commercial rod and reel salmon fishermen who utilizes mooching to land salmon in the California commercial salmon fishery. In this communication, I wish to express my opposition and the opposition of other California commercial rod and reel salmon fishermen to the requirement to use circle hooks in the non-troll commercial salmon fishery as stated in two of the season options for the 2000 commercial troll season for California. The basis of our opposition to this proposed hook requirement is grounded in the future viability of the rod and reel fishery, the lack of data to support the requirement, and the limited contribution of J hook hooking mortality to the total hooking mortality in the commercial salmon fishery in California. It is our contention that the imposition of this requirement will unnecessarily remove these fishermen from the fishery and correspondingly remove an important niche market these fishermen have developed. Below, I have prepared answers to the salient questions about the impact of this proposal on the fishery and the participants in this fishery. We hope that you will consider these answers in relation to your decisions on the inclusion of this requirement in the final structure of the 2000 California commercial salmon season.

Why will the circle hook requirement force fishermen out of the commercial salmon mooching fishery?

The answer to this question is based mostly on economics. For the most part, commercial salmon moochers fish by themselves in order to maximize the return of a trip. Their markets are small, generally requiring a fewer than 10 fish per trip, with a high return per fish since they can place premium fish in the hands of the consumer within 24 hours, or sooner. A high efficiency of hook-up and landing of salmon, afforded by the use of J hooks, insures that they will more efficiently meet their market needs in a shorter time span. The J hooks allow a single fisherman to have a better chance of hooking fish quickly and a better chance of managing multiple hook-ups. The circle hooks have a lower hook-up efficiency and require much more attention per rod to get a fish hooked up. In the case of fishermen fishing to meet specific orders, like myself, higher efficiency means lower fuel costs and safer trips. The fishery is economically marginal and the few who remain in it persist because they have generated solid markets with customers who will pay up to $4.00/lb for the premium fish they deliver.

What hooking mortality has been established for this fishery?

No hooking mortality studies have been conducted in the commercial salmon mooching fishery. Hooking mortalities studies have been conducted in the recreational fishery and circle hook restrictions have been imposed in that fishery based upon those studies. Commercial salmon mooching fishermen have long contended that the hooking mortality in their fishery is not the same as the recreational fishery. Imposing a restriction on the commercial mooching fishery based upon the recreational results would be invoking regulations on the basis of anecdotal evidence (All dogs bark, but all animals that bark are not dogs). The California Dept. of Fish and Game has clearly stated that no studies of hooking mortality have been conducted in the commercial fishery.

What is the impact of commercial salmon mooching hooking mortality on the total hooking mortality of the commercial salmon fishery in California?

First, there is little data to determine the actual number of commercial mooching fishermen active in the commercial salmon fishery in California. The California Dept. of Fish and Game landing tickets provide a space to designate if fish are landed by mooching methods. A recent request for that information from the Dept. was not fulfilled. I estimate that fewer than 50 commercial fishermen still utilize mooching as the primary method for landing salmon in the commercial fishery. I personally know of only four fishermen who currently utilize this method to fish commercially outside of the Golden Gate and I would estimate less than 10 fishermen currently are commercial salmon moochers in the Gulf of the Faralones. It would behoove the Council to have the Dept. provide data to characterize the extent of this fishing method in the California commercial salmon fishery.

In an effort illustrate the degree of impact of commercial mooching contributes to the total hooking mortality in the commercial salmon fishery in California, I would like to provide the Council with a mathematical exercise. This exercise is based upon an idealized snapshot of a fishing day in the troll/mooching commercial salmon fishery. Let us assume that at a moment in time of the 1999 salmon fishing season in California all of the 645 boats which landed salmon in California in 1999 were fishing. We will further assume that every boat was fishing in 50 fathoms, each boat had maximum gear in the water and that every boat concurrently hooked a fish on every available hook. Let us further assume that all of the boats landed all of the hooked fish except those that succumbed because of hooking mortality. And finally, let us assume that among that fleet of 645 boats 30 boats were mooching. A commercial troller fishing with full gear in 50 fathoms of water could be expected to have about 60 hooks in the water, a commercial moocher would have a maximum of 6 hooks in the water. The total number of hooks in the water for this fleet of boats would be 37080 hooks of which 180 hooks would be mooching J hooks. The J hooks would constitute 0.48% of the total hooks in the water. Applying a 31% hooking mortality to the troll fishery, 11439 of the salmon hooked by the trolling boats would not survive. Applying a 50% hooking mortality to the mooching fishery, based upon anecdotal evidence in the recreational fishery, these fishermen would land 90 salmon. The 90 salmon succumbing to hooking mortality in the commercial mooching fishery represents 0.78% of the total hooking mortality of the snapshot catch.

This idealized mathematical exercise illustrates the contention of commercial mooching fishermen that even at a higher hooking mortality than the general troll fishery, the contribution of commercial mooching impacts to total hooking mortalities within the commercial salmon fishery in California is not significant, contributing less than 1% to the total mortality of the fishery.

Conclusion

Commercial salmon moochers find little evidence to support the imposition of circle hooks in the commercial salmon mooching in California. There is no data to determine the degree of mortality of the technique in the commercial fishery and the impact within the commercial fishery is probably insignificant. Based upon personal observations, non-compliance with hook requirement regulations in the recreational fishery probably has a greater impact in hooking mortality than does the use of J hooks in the commercial fishery. We therefore ask the Council to forego the imposition of the imposition of the circle hooks in the California commercial salmon fishery in its final salmon season recommendations for 2000.

Sincerely,

Gary D. Manners Ph.D.

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P.O. Box 983
Lincoln City, OR 97367

Ph/Fax: (541) 994-2647

OREGON SALMON COMMISSION

March 23, 2000

Pacific Fishery Management Council
2130 SW Fifth Avenue, Suite 224
Portland Oregon 97201

Attn: Chairman Jim Lone & Council Members,

The Oregon Salmon Commission would like to provide the following comments and guidance in support of Commercial Troll Management Option I.

The Oregon Salmon Commission supports North of Falcon Option I with the following changes:

1. Increase the landing and possession limit from 100 coho to 200 coho per opening.

The Oregon Salmon Commission supports South of Falcon Troll Option I maintaining the following guidelines:

1. Maintain the Oregon, California Troll sharing of Klamath impacts at 50/50 or as close as possible that also provides 50% to in-river Treaty Harvest while meeting established PFMC guidelines for KMZ sport harvest, Klamath in-river sport harvest and meeting the established escapement goal of 35,000 Klamath Fall Chinook.

2. Comply with ESA guidance or jeopardy standard for OCN Coho less than or equal to 15% Marine and Freshwater exploitation rate.

3. Comply with ESA guidance or jeopardy standard for Klamath/Rogue Coho less than or equal to 13% Marine exploitation rate.

In addition, the Oregon Salmon Commission supports the incidental troll halibut retention of 2 salmon to 1 halibut with the first halibut not required to meet the ratio and the trip limit of 50.

Thank you for providing the opportunity to comment on the proposed salmon and halibut options for 2000.

Kevin Bastien, Chairman
Oregon Salmon Commission.

KB/nf

8

MAR 2 9 2000

March 28, 2000

Pacific Fishery Management Council
Public Hearing @ Tillamook Oregon

Subject: Additional options to be considered by PFMC for the 2000 Salmon Troll Season.

1. Forgo the **Sisters Rocks to Mack Arch fishery in August**, and consider an Impact Neutral change to a **Sisters Rock to the Oregon California Boarder in the same time frame, August 1 to August 31 or Quota, with an additional landing restriction of 30 fish per day . All salmon must be landed and delivered to Gold Beach, Port Orford or Brookings within 24 hours of closure.**

I

2. Change the **Humbug Mt. to Oregon-California Border** fishery starting May 1 thru May 31 to a Quota fishery and place **the appropriate quota for full fishing in May. Open May 1 thru May 29, closing for two days and re-opening June 1 with the appropriate Klamath calculations to apply any left over Quota from May into June.**

An Example would be inserting the KOHM forecast of 2100 chinook for the month of May (13% Klamath contribution rate), catching less than 50 fish as was the case in 1999 , re-calculating the impact to the higher 35% June Klamath Contribution rate on any left over quota and rolling that into June.

At this time I would request the STT to take a look at these two additional options from the Oregon South Coast fishermen.

In Addition I ask the PFMC to support Option 1 North of Cape Falcon, and Option 1 South of Cape Falcon. Maintaining the ESA guidelines of ≤15% harvest rate on OCN Coho and ≤13% harvest rate on ROGUE/KLAMATH Coho, while maintaining the Council's **intent** of equal sharing of Klamath Fall Chinook impacts at **50%** between Oregon and California.

Thank-you

Don Stevens
SAS/Oregon Troll
4505 E. Portland Rd
Newberg, Oregon 97132
503 537 0976
e-mail: kdds@gte.net

P.S. Support for Option 1 on Incidental Halibut in the Troll fishery ie. 2 Salmon to 1 Halibut, 50 trip limit and the first halibut not meeting the ratio.

file

99388 Stateline Lane
Brookings, Oregon 97415
21 March 2000

To Whom It May Concern:

I am a concerned commercial fisherman out of the Port of Brookings-Harbor, Oregon.

Due to the devastation of the Rock Cod fisheries; some of the little boats will not be able to go up North for the salmon season. I would like to see a May, June, and August until the end of September salmon season. And I would like to see it from the Oregon California border up to Humbug Mountain.

All my fish is sold locally to help out the community and local businesses.

Respectfully,
John A. Fraser
Thomas M Fraser

10

MAR 2 8 2000

Ralph Dairy
F/V TAMMY B
96465 coverdell rd #45
Brookings Or 97415
541 469-5900
Email; troller@wave.net
March 28, 2000

Jim Lone, Chair
Pacific Fishery Management Council
2130 SW 5th
Portland OR 97201

Dear Mr Lone,

I a Brookings commercial fisherman , am in support of the fish management strategy to be incorporated in the 2000 commercial Salmon season.

1. Asking that option #1 with a 50/50 split between Oregon and California commercial fisheries are implemented
2. Extend the may Season into June.
3. Expand the August fishery to include from sister Rock to the California border.

The local fish processor's and fisherman supports this option because of the direct impact of the commercial fishing season to the ports of Gold Beach and Brookings Harbor districts economy. It is very important that we keep equity in the Pacific Fishery Management Council process for all fishers and all coastal communities. I believe that with this strategy we can achieve this goal.

Sincerely

Ralph Dairy
Owner operator
F/V TAMMY B

PORT OF GOLD BEACH

29891 HARBOR WAY P.O. BOX 1126
GOLD BEACH, OR 97444
541-247-6269 FAX: 247-6268
E-MAIL: portgb@wave.net

March 28, 2000

Jim Lone, Chair
Pacific Fishery Management Council
2130 SW 5th
Suite 224
Portland, OR 97201

MAR 2 8 2000

Dear Mr. Lone;

The Port of Gold Beach supports the following fish management strategy to be incorporated in the 2000 commercial salmon season.

1. Support Option #1 with a 50/50 split between Oregon and California commercial fisheries.
2. Extension of the May season into June.
3. Expansion of the August fishery to include from Sister Rock to the California border.

The Port of Gold Beach supports this strategy because of the direct impact of the commercial fishing season to the Port of Gold Beach district's economy. It is important that we keep equity in the Pacific Fishery Management Council process for all fishers and all of our coastal communities. We believe that with this strategy we can achieve this goal.

Sincerely,

Mike Nielson
Port Manager

ATTN:
Mr. Jim Lone
Dr. Hans Radtke

March 24, 2000

Dear Sirs:

I'm writing to encourage the Pacific Fishery Management Council members to support a commercial coho fishery North of Falcon in area 1 this year.

I further emphasize that it be a "coho fishery" and not connected with a chinook caught ratio.

It certainly would be an economic opportunity for many in the fishing industry and also would provide troll caught data for management.

Thank you for your consideration.

Sincerely,
Gerald H. Johnson
F/V JJ

13

MAR 2 8 2000

March 27, 2000

Mr. Jim Lone
Chairman
Pacific Fishery Management Council

Dear Sir:

In reviewing the 2000 troll salmon fishing options, it appears thata selective fishery for hatchery coho north of Cape Falcon is possible. As the owner of a dory (a 22 foot open boat), I heartily support the opportunity to fish for coho again.

While open seasons for chinook are numerous, the chances of actually catching many fish on the northren Oregon coast for the small boat fleet is very limited. Coast Guard safety required gear is economically prohibitive to fish outside of 12 miles. Those of us who have retained troll permits have not had the chance to fish for coho in several years. Also, a coho troll season will give the non-fishing public the opportunity to buy and eat some fresh, non-pen reared salmon.

I hope that the Council approves a coho fishing option which includes some fishing time between mid August and early September, when the Columbia River hatchery coho are the largest, and at their prime. Thankyou for your consideration of this issue.

Sincerely,

Jerry Branch

Jerry Branch
28690 SW 35th DR.
Wilsonville, OR 97070

K4

March 24, 2000

Dear Mr. Jim Lone and Dr. Hans Radtke:

I own a small seafood restaurant and market in Cannon Beach. I recently heard that you are considering a selective coho fishery off our coast. This would be wonderful. For the last 6 ½ years that I have owned this business the most asked question is "What is fresh and caught right here?". It would be a tremendous boast for our business to be able to buy and sell fresh whole coho salmon (filets and steaks, too).

Our customers often ask if we have salmon that is not farmed. Our customers are very partial to ocean troll caught products and would eat fish more often if I could provide a larger variety of local ocean troll caught products.

In addition, Halibut -the highest demand fish and chips item we sell - is currently being brought in to us from Alaska or Canada, we would love to be able to support the local fishermen by being able to buy their Halibut. And the local product is far superior to being held on the big Alaskan/Canadian boats 3-7 days then air freighted down here. Please consider giving the small trollers a better ratio of Salmon to Halibut so we have the opportunity to buy some of these fish on a continual basis (vs one time openers).

Your consideration is greatly appreciated. Our success as a small business is directly impacted by the important decisions you make regarding all the Oregon fisheries.

Sincerely,

Cindy

Cindy Beckman
Ecola Seafoods Restaurant and Market
208 N. Spruce
Cannon Beach, OR 97110

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March 22, 2000

Attention: Mr. Jim Lone and Dr. Hans Radtke

I have been commercial fishing for 24 years now and looking at the options that Don Stevens sent me I see we finally have an opportunity to fish above falcon to ledbetter in the summer.

This would be a great opportunity for the small boat fleet to gather scientific data for the selective fishing for coho by the troll industry.

Please do not trade our coho for additional chinook to Washington like has been done in the past since we haven't been able to fish up here for about the last ten years and it would provide some economic opportunities for communities along the northern Oregon coast.

I also support an April 1st through October 31st chinook season south of falcon and the adoption of the 2 to 1 halibut option. Don said someone from your department might want to observe on my boat for a selective coho season this would be fine with me.

It would be best to have the fishing begin July 15th and have the option 1 100-200 fish per opening and maybe a 30-50 limit on kings so they wouldn't be caught before we had a chance to catch the coho. Please allow us 4 spreads per wire with barbless hooks but no other gear restrictions.

Thanks,

Jay Beckman

Jay Beckman
F/V Legacy

P.S. We also want to keep the line at falcon not Tillamook Rock unless it was that way for the entire season for chinook fishing April 1st - October 31st.
Thanks for your consideration.

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JIM CHILDS
NORTHERN CALIFORNIA
SPORT FISHING NEWS
PO BOX 221
EUREKA, CA 95502-0221
PHONE & FAX- (707) 442-3701

March 29, 2000

Pacific Fisheries Management Council
Attn: Jim Lone and Council Members
Fax # (503) 324-6831

Re: Written Comments for Y2000 Recreational Ocean Salmon Fisheries.

Dear Council Members;

As publisher and editor of Northern California Sport Fishing News (NCSFNews) I would like to take this opportunity to give my support for Option I of the proposed management options for the area of Humbug Mt. to Horse Mt. for this years ocean salmon season.

I attended the PFMC's public meeting in Eureka on March 28 and want to echo the voices of those that spoke. All were in favor of Option 1, basically because it would allow a much preferred two-fish limit.

In fact, in over six years of publishing NCSFNews, I have spoke with countless local anglers, and never once heard a person say they like a one fish limit.

Further, I understand that the recreational ocean fisheries has, for the past several years, not reached it's impact quota. I feel anything less than a 2 fish bag limit will continue to unjustly over-regulate fishermen in the KMZ area.

Thank you for your careful consideration of this matter.

Sincerely,

Jim Childs

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WESTPORT CHARTERBOAT ASSOCIATION

P. O. BOX 654 • WESTPORT, WASHINGTON 98595

March 28, 2000

MAR 2 8 2000

Pacific Fishery Management Council
2130 SW Fifth Avenue
Suite 224
Portland, OR 97201
Attn: Jim Lone, Chairman

Re: Year 2000 Ocean salmon regulations, Agenda item C(4)L

My Name is Mark Cedergreen and I represent the Westport Charterboat Association.

Our Association supports the Ocean harvest levels for Chinook and Coho as contained in OCEAN OPTION ONE. As I write this, there remains another North of Falcon meeting later this week and I will reserve my testimony on the more specific aspects of ocean management this year to the public comment period during the April Council meeting. Those more specific details could include area closures, modified bag limits, and similar proposals designed to optimize the economic and social value of this year's allowable harvest.

With regard to COHO:

Model runs done to date show that Option One is acceptable from the standpoint of constraints on wild coho stocks.

Specifically:

- **OCN coho impacts are no greater than in 1999**
- **Queets coho impacts by non-Treaty Ocean fisheries are well under the constraints dictated by the Washington wild salmonid policy**
- **The Westport/Columbia River area impacts on weak Puget Sound runs are minimal**
- **Selective fishing in all areas minimizes impacts on wild Coho**

With regard to CHINOOK:

Model runs done to date show that the SNAKE RIVER FALL (SRF) CHINOOK impact resulting from Option One is significantly lower than the Federal standard of a 30 percent reduction from the 1988-1993 base period.

Although NMFS has not raised a red flag with regard to LOWER RIVER WILD (LRW) CHINOOK (see letter from Bill Robinson to PFMC dated March 7, 2000), once updated Canadian and Treaty Troll catch values are used in the model, Ocean Option One should be at, or less than, 1999 Ocean impacts. 1999 ocean impacts on LRW's were around 4 percent. The WDF&W Wild Salmonid Policy mandates less than a 10 percent impact. This leaves up to 6 percent, or 50 percent more than the ocean fisheries, for inside fishery impacts.

BONNEVILLE POOL HATCHERY (BPH) and LOWER RIVER HATCHERY (LRH) CHINOOK need to be shared inside/outside. That sharing needs to be fair and reasonable. Inside management measures should include conducting commercial fisheries at times and in areas where UPRIVER BRIGHT (URB) harvest can be maximized to catch as much of the non-Treaty share as practicable while minimizing impacts on LRH and BPH Chinook stocks.

Recreational fisheries in the Columbia river should surely be subject to the same constraints that recreational fisheries on the Ocean are limited by, namely, a One (1) Chinook bag within the overall bag limit of 2 salmon. Inside recreational fisheries should also be managed through time and area constraints to minimize impacts on LRH and BPH Chinook. OUTSIDE fisheries are already allowed, at most, only half of the 1999 allowable level (25,000 in Option I as opposed to 50,000 last season. To date, full fisheries have been modeled inside).

Finally, the objective to reach an LRH (hatchery) spawning escapement goal, while desired, should not be a critical issue.

1) **This stock is not overfished – it's under-produced! Lack of funding through the Mitchell Act and the reprogramming of stocks are the cause for low production.**

2) **Over the past 5 years LRH Chinook have been under-predicted by an average of 30 percent! In other words, LRH's have averaged a 45 percent higher return post-season than predicted preseason. BPH stocks have returned an average of 12 percent higher than pre-season predictions over the same time span.**

3) **Ocean survival also plays a large role in the productivity of these hatchery stocks.**

4) **In some areas, trapping and transferring of brood stock can be used to supplement egg take.**

5) **Higher survival rates and/or continued under-prediction of these hatchery stocks could certainly mitigate a spawning escapement shortfall of 10-15 percent.**

Our Association urges you to place FAIRNESS in inside/outside sharing as your top priority this season, regardless of any other issues that may or may not impact the harvest of Columbia River Chinook.

Thank you,

Mark Cedergreen

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MAR 3 0 2000

March 26, 2000

Bruce Ogren
P.O. Box 412
South Bend, WA 98586

Pacific Fishery Management Council
Suite 224
2130 SW Fifth Ave.
Portland, Ore. 97201

Re: Ocean salmon fishing in 2000 option proposals

I support Option #3 with no hook and release added to recreational Coho harvest. This will limit the hooking mortality from catch and release. Therefore, the daily bag limit would be confined to the first two Coho caught, whether they are hatchery or wild stock.

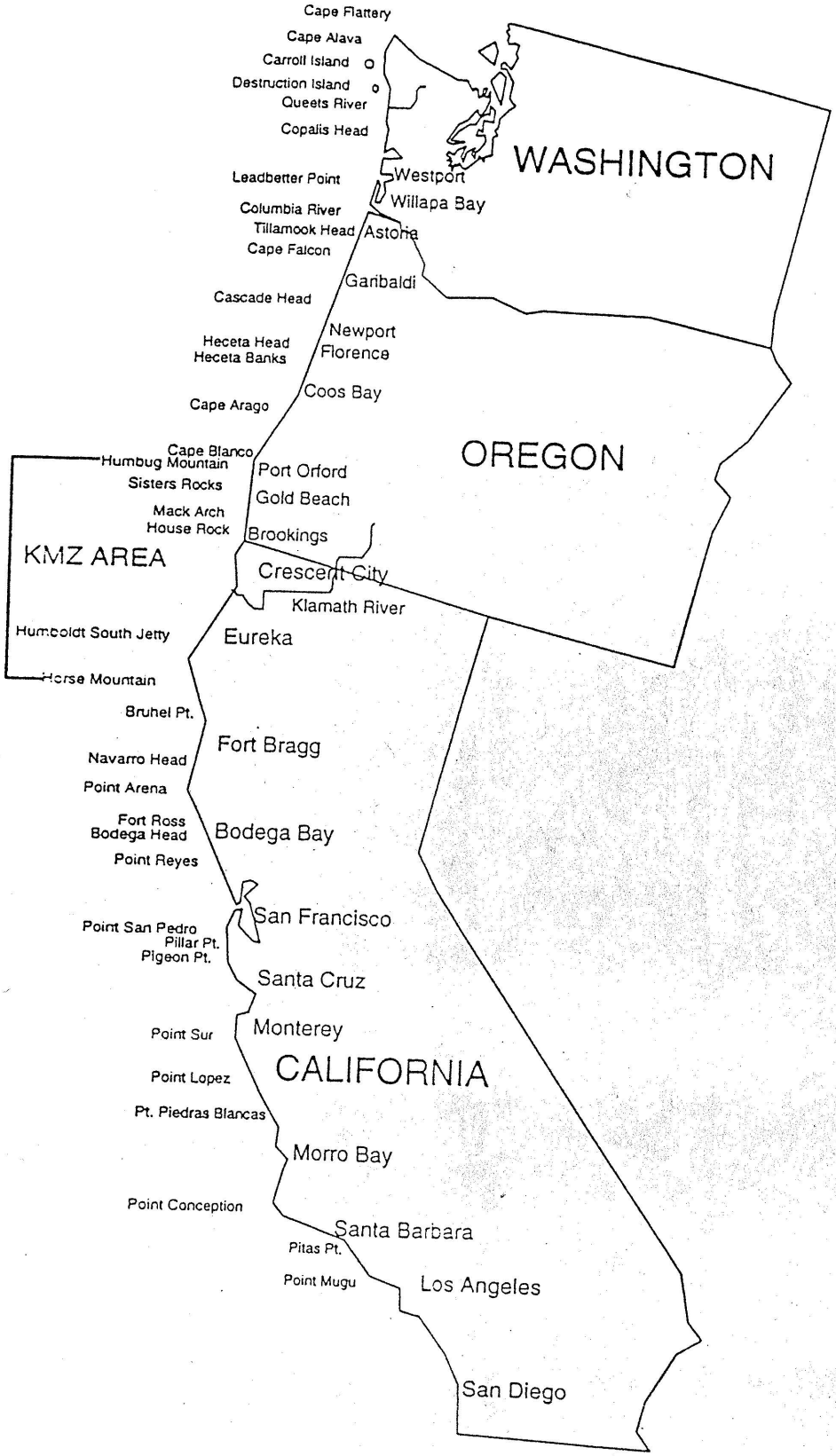
I feel it would be fair to divide the 50,000 Coho equally between sport and commercial fishermen with 25,000 fish available for each group.

Sincerely,

Bruce Ogren

Bruce Ogren

Duncan MacLean's Public Testimony
11:13 A.M. 4/4/00
April 2000



Thank you Mr. Chairman, for the record I am Duncan MacLean , your California Troll representative on the Salmon advisory sub-panel. As I do represent the salmon industry for the state of California I hope you can see your way clear to afford me a little extra time on what is a difficult but important issue. I will try to be brief.
Before we go much further developing the year 2000 Salmon management options it is critical that the council understand exactly what has been submitted from the California and Oregon troll industries. To better display the differences in the California Preferred an the Oregon preferred options it is best to compare them from the same perspective so for comparison purposes, and I stress comparison only, I have modeled California's season with the maximum area approach(Oregon models for maximum area while California strives to provide continuous opportunity) Both approaches have their inherent benefits and drawbacks but that issue is not germane to this discussion so we'll leave that debate for another time. I have zero'd the KMZ troll fisheries and have modeled the comparison between the SOC and entire state of Oregon outside the KMZ. I chose this approach because Ft Bragg has not had much fishing since the institution of the tribal allocation and, however inappropriate, has all but been forgotten in this process when comparing California with Oregon. I might point out here that California and Oregon have basically 2 management zones each. In Oregon it is the NOR and CSB and the California counterparts are SOC and FTB respectively.[1] The issue here is one of allocation, equity and opportunity for all of the participants. The California season when modeled for 50/50 as in Opt I with maximum area for the period of April thru August, which is the time frame covered by the KOHM, provides Oregon with a virtually uninterupted season while in California we are faced with closing the SOC for the month of June and 8 days in July. That coupled with the April 1 opener in Oregon makes for 68 days of opportunity lost in California.[2] Once again I would remind you that Ft Bragg where 32% of the 86-90 landings in the State occurred is not counted here. Now if 50/50 is supposed to represent equity between the States surely opportunity, or time on the water, should be relatively equal. This is obviously not the case and in fact demonstrates the inequity of 50/50. The reason I tie opportunity to equity is simple. Catch rates, weather, impacts rates all carry little significance to the argument because of the variability associated to them. Opportunity in the pre-season process is the only reasonable approach to equity in harvest rate management. In fact that was the essence of the gentlemens agreement made between two honorable men as the then SAS representatives to this council. The decision to start with full fishing, recognizing Oregons fleet to be 80% of Californias, and scaling back proportionately until all of the constraints were met. Through time that philosophy had numbers attached to it and ironically, in recent years, we have had to scale up from no fishing. The concepts , however, are still just as valid. When we look at the model and attempt to reach 50/50[3] there are a few things that stand out. In Oregon there is uninterrupted five months of fishing but in order to achieve the 50/50 not only does California have substantial closures but 3300 Klamath fish are left on the table. The meaning... even with full fishing Oregon can not impact 50% of the fish. In fact according

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[1] See illustration # 1

[2] sheet 9 - Days opened @ 50/50 SOC vs. Or.

[3] KOHM proposed 50/50

to the model the best they can achieve is 34% under full fishing[4] This is primarily caused by this councils recognition of the reduced effort in the Coos Bay cell and rightly so. The one thing that was not recognized by everyone(present company included) was the defacto re-allocation of fish that shook out of the change.

Where do we go from here?, I would like to submitt the following. Taking full fishing and scaling back proportionally as was the original agreement is as applicable today as it was when the agreement was struck. It is unfortunate that Oregons fleet was so dramatically reduced, California's isn't far behind but that doesn't mean we should help it along. Taking the 66/34 split and scaling it back does have the look of reasonable fairness[5] but that is not what I am proposing. That concept can be supported by the number of vessels and the effort of the respective fleets[6] I still believe the council was correct in allowing flexibility in the determinations agreed upon by the individuals representing their respective industry. The reality of todays season shaping process has far to many variables to develop hard line approaches to the distribution of the fish that are available for harvest. Cooperation amongst all affected parties will bring about satisfactory solutions far more affectively than statutory delegations. I have always appreciated the councils willingness to let the spirit of Nat and Scott's agreement prevail. However it is the responsibility of the council to guard that spirit and whenever it is appropriate, call to question anyone deviating from it dramatically.

You know, I am a fisherman and as such my job here is to shape a season that affords my industry maximum opportunity with the least impact on critical or stressed stocks. Like in the North of Falcon process, this year we got an unprecedented early start on evaluating our potential options. The department, NMFS SW region, the tech team reps, all deserve credit for a job done well and beyond the call. We came in to this years process with a position that I felt was ahead of the curve. The Option we presented in March while maybe needing some impact neutral polishing is responsible to the fisheries, reasonable to all parties and responsive to the resource. I stand fast on its concepts and delegations and hope this council recognizes it as such enough to forward Option II to the team for final analysis. Thank you.

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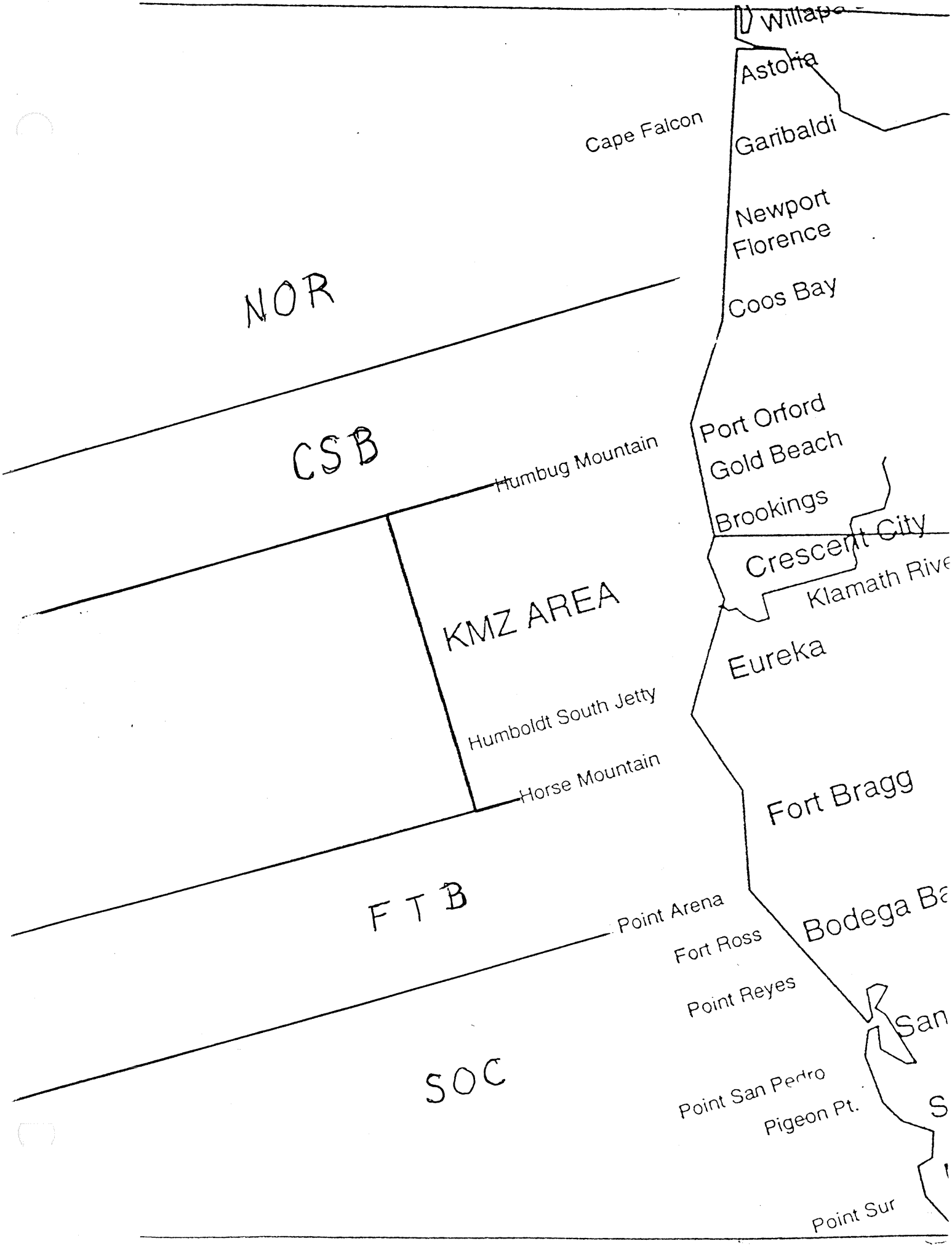
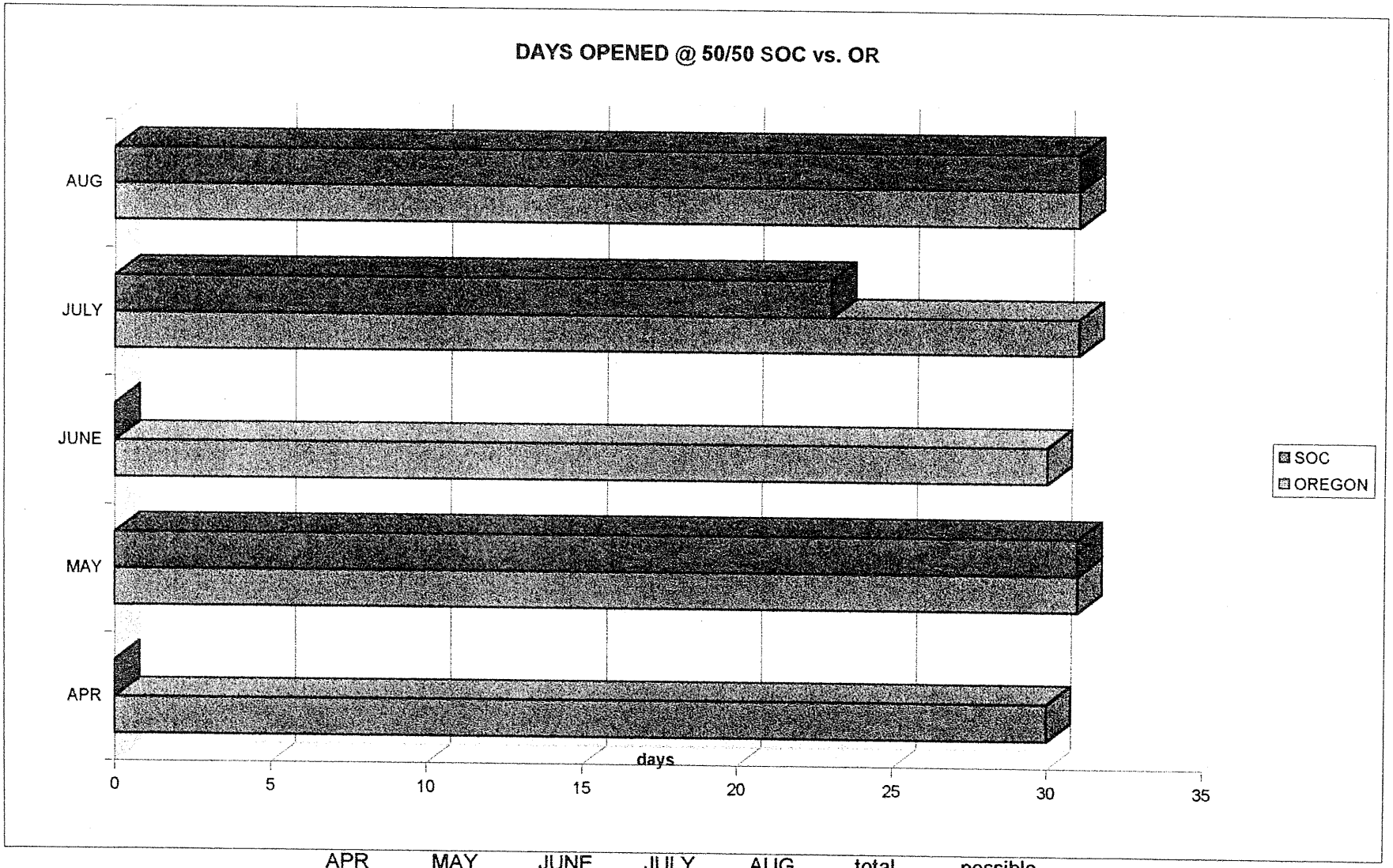
[4] KOHM

[5] sheet 8 Days opened @ 65/35

[6] sheet 10 effort and vessels


Willapa
Astoria
Cape Falcon
Garibaldi
Newport
Florence
NOR
Coos Bay
CSB
Port Orford
Gold Beach
Humbug Mountain
Brookings
Crescent City
KMZ AREA
Klamath Rive
Eureka
Humboldt South Jetty
Horse Mountain
Fort Bragg
FTB
Point Arena
Bodega Ba
Fort Ross
Point Reyes
San
SOC
Point San Pedro
Pigeon Pt.
S
Point Sur



	APR	MAY	JUNE	JULY	AUG	total	possible
OREGON	30	31	30	31	31	153	153
SOC	0	31	0	23	31	85	

KLAMATH OCEAN HARVEST MODEL:
EXPLOITATION RATE
USING 86-90 BASE PERIOD

VERSION: 2000_0
DATE: 05/15/80
TIME: 10:11 AM

EXPLOITATION RATE CHANGE FROM BASE PERIOD: a(.jk)

	FALL-99	MAY-00	JUNE-00	JULY-00	AUG-00		
OR	1.000	2.000	1.000	1.000	1.000	50%	% OR
CSB	1.000	0.200	0.100	0.100	0.100		
KMZ-T	1.000	0.000	0.000	0.000	0.000		
KMZ-S	1.000	0.065	1.000	0.161	1.000	17%	% KMZ-S
FTB	1.000	0.030	0.030	0.011	0.030		
SOC	1.000	1.120	0.200	0.950	1.000	50%	% CA
				Aug KMZ-T	0		

2000 Start: Scott and Nat's Proposal			
NON-TRIBAL HARVEST		**25400**	25363
INRIVER SPORT	15%	3800	3804
OCEAN		21600	21559
AGE 4 HARVEST RATE		12.5%	12.46%
TRIBAL HARVEST		**25400**	25363
OCEAN ESCAPEMENT		86200	86205
TOTAL SPAWNERS		54800	54754
NATURAL SPAWNERS		**38300**	38325

KLAMATH LANDINGS - ESTIMATES: L(ijk)

AGE 3	FALL-99	MAY-00	JUNE-00	JULY-00	AUG-00	TOTAL
NOR	0	10	60	1120	1210	2400
CSB	0	110	130	1680	1970	3890
KMZ-T	0	0	0	0	0	0
KMZ-S	0	20	1950	390	690	3050
FTB	0	60	200	130	50	440
SOC	0	2300	1210	3600	600	7710
AGE3 TOT	0	2500	3550	6920	4520	17490
AGE 4	FALL-99	MAY-00	JUNE-00	JULY-00	AUG-00	TOTAL
NOR	20	90	70	330	120	630
CSB	0	140	70	520	260	990
KMZ-T	20	0	0	0	0	20
KMZ-S	0	0	180	100	300	580
FTB	0	30	60	20	10	120
SOC	0	710	280	490	60	1540
AGE4 TOT	40	970	660	1460	750	3880

CATCH PROJECTIONS BASED ON EXPLOITATION RATE SHIFTS

	FALL-99	MAY-00	JUNE-00	JULY-00	AUG-00	TOTAL
NOR	1650	11700	11250	21586	16495	61032
CSB	3800	3287	1627	8789	7426	21129
KMZ-T	3100	0	0	0	0	0
KMZ-S	900	51	7959	2010	5101	15121
FTB	2300	1087	2367	1044	1179	5677
SOC	4800	192506	26989	89319	42042	350856
TOTAL	16550	208630	50193	94271	72244	441888

KLAMATH CONTRIBUTION-AGE 3+4 COMBINED

AREA	FALL-99	MAY-00	JUNE-00	JULY-00	AUG-00
NOR	0.15%	0.85%	1.16%	6.72%	8.06%
CSB	0.00%	7.61%	12.29%	25.03%	30.03%
KMZ-T	0.35%	13.27%	35.30%	34.28%	23.77%
KMZ-S	0.00%	39.53%	26.76%	24.38%	19.41%
FTB	0.00%	8.28%	10.98%	14.37%	5.09%
SOC	0.00%	1.56%	5.52%	4.58%	1.57%

KLAMATH OCEAN HARVEST MODEL:
EXPLOITATION RATE
USING 86-90 BASE PERIOD

VERSION: 2000_0
DATE: 05/15/80
TIME: 10:00 AM

EXPLOITATION RATE CHANGE FROM BASE PERIOD: a(.jk)

	FALL-99	MAY-00	JUNE-00	JULY-00	AUG-00		
NOR	1.000	2.000	1.000	1.000	1.000	34%	% OR
CSB	1.000	0.200	0.100	0.100	0.100		
KMZ-T	1.000	0.000	0.000	0.000	0.000		
KMZ-S	1.000	0.065	1.000	0.290	1.000	13%	% KMZ-S
FTB	1.000	0.030	0.030	0.011	0.030		
SOC	1.000	1.120	1.170	1.280	1.000	66%	% CA
				Aug KMZ-T	0		

2000 Start: Scott and Nat's Proposal			
NON-TRIBAL HARVEST		**35100**	35127
INRIVER SPORT	15%	5300	5269
OCEAN		29900	29858
AGE 4 HARVEST RATE		17.3%	17.28%
TRIBAL HARVEST		**35100**	35127
OCEAN ESCAPEMENT		82000	82014
TOTAL SPAWNERS		38500	38456
NATURAL SPAWNERS		**26900**	26913

KLAMATH LANDINGS - ESTIMATES: L(ijk)

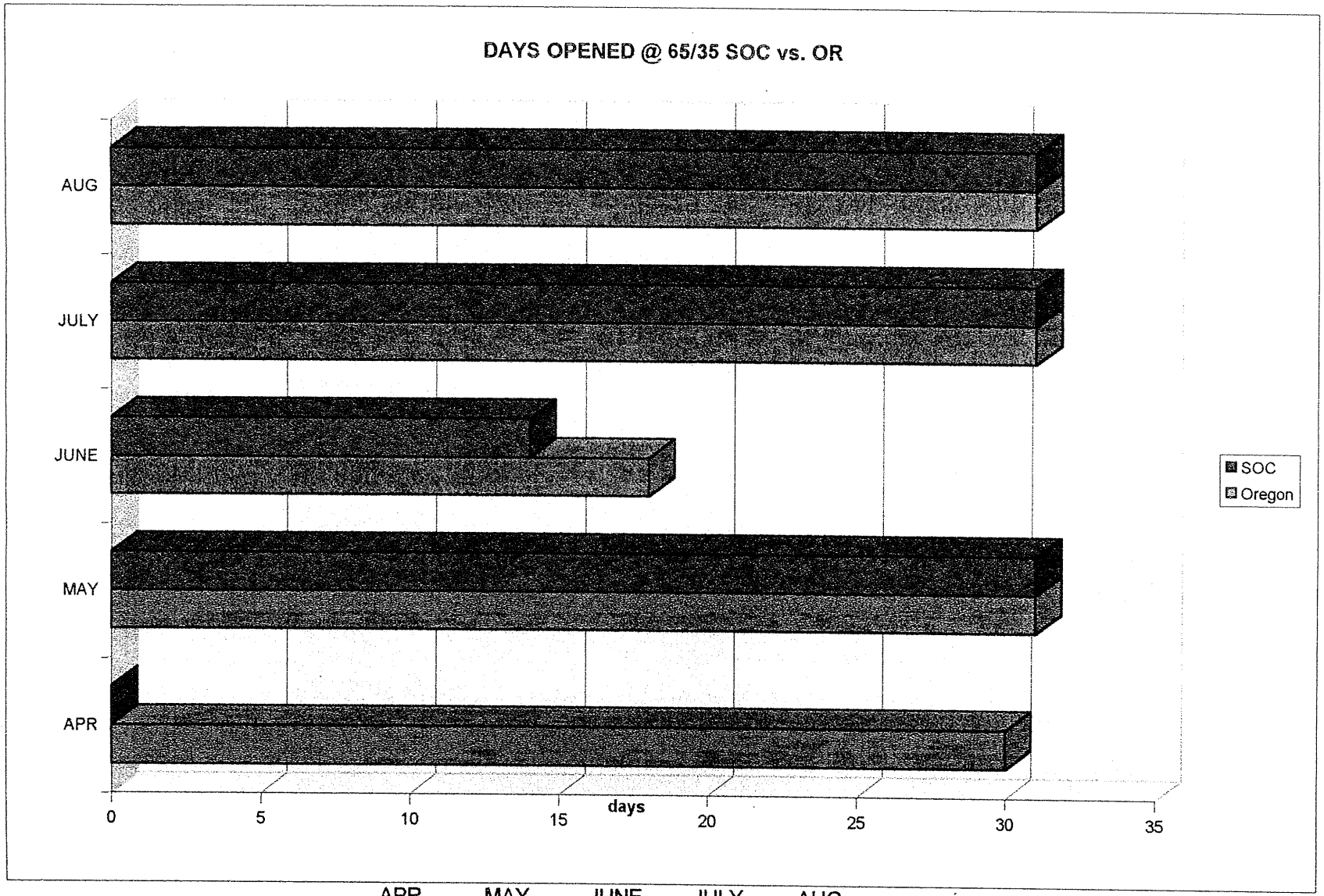
AGE 3	FALL-99	MAY-00	JUNE-00	JULY-00	AUG-00	TOTAL
NOR	0	10	60	1060	1130	2260
CSB	0	110	130	1590	1850	3680
KMZ-T	0	0	0	0	0	0
KMZ-S	0	20	1950	680	660	3310
FTB	0	60	200	130	50	440
SOC	0	2300	7060	4620	570	14550
AGE3 TOT	0	2500	9400	8080	4260	24240
AGE 4	FALL-99	MAY-00	JUNE-00	JULY-00	AUG-00	TOTAL
NOR	20	90	70	320	110	610
CSB	0	140	70	500	250	960
KMZ-T	20	0	0	0	0	20
KMZ-S	0	0	180	180	290	650
FTB	0	30	60	20	10	120
SOC	0	710	1630	620	60	3020
AGE4 TOT	40	970	2010	1640	720	5380

CATCH PROJECTIONS BASED ON EXPLOITATION RATE SHIFTS

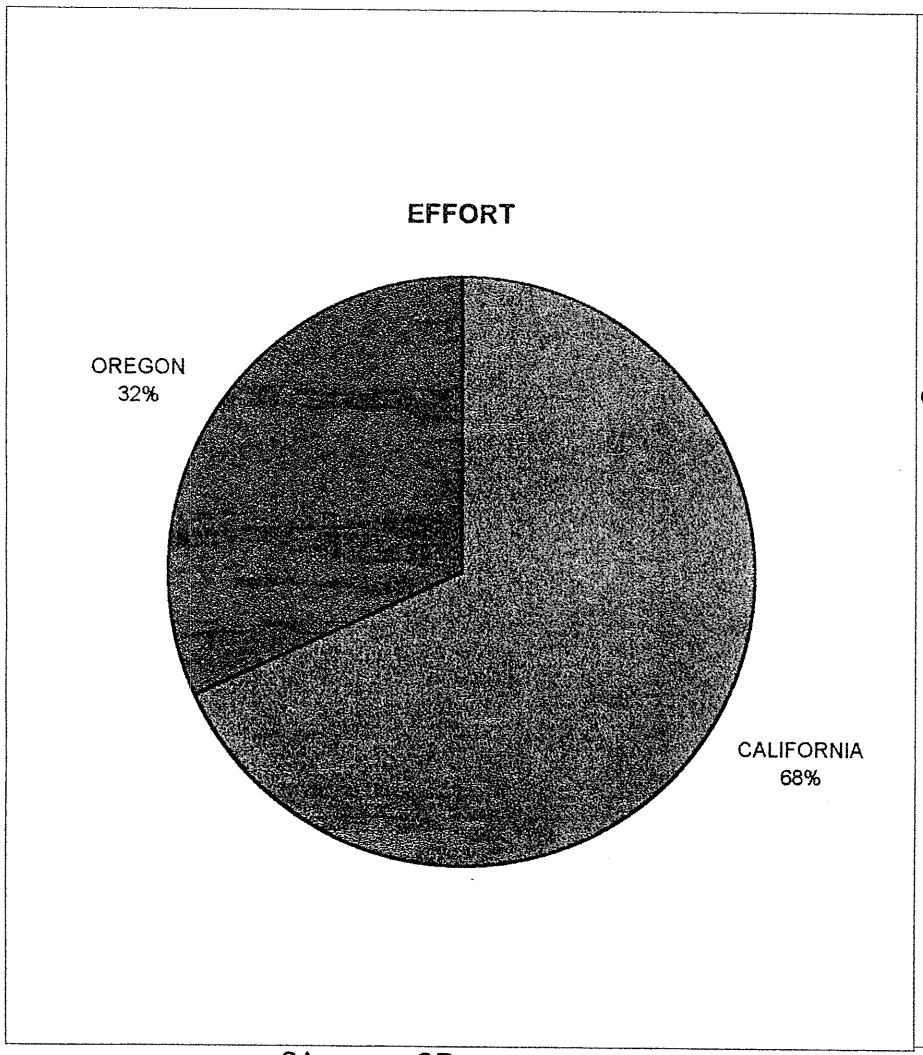
	FALL-99	MAY-00	JUNE-00	JULY-00	AUG-00	TOTAL
NOR	1650	11700	11250	20544	15379	58873
CSB	3800	3287	1627	8350	6993	20257
KMZ-T	3100	0	0	0	0	0
KMZ-S	900	51	7959	3527	4895	16432
FTB	2300	1087	2367	1044	1179	5677
SOC	4800	192506	157404	114433	40131	504474
TOTAL	16550	208630	180608	94271	68578	568637

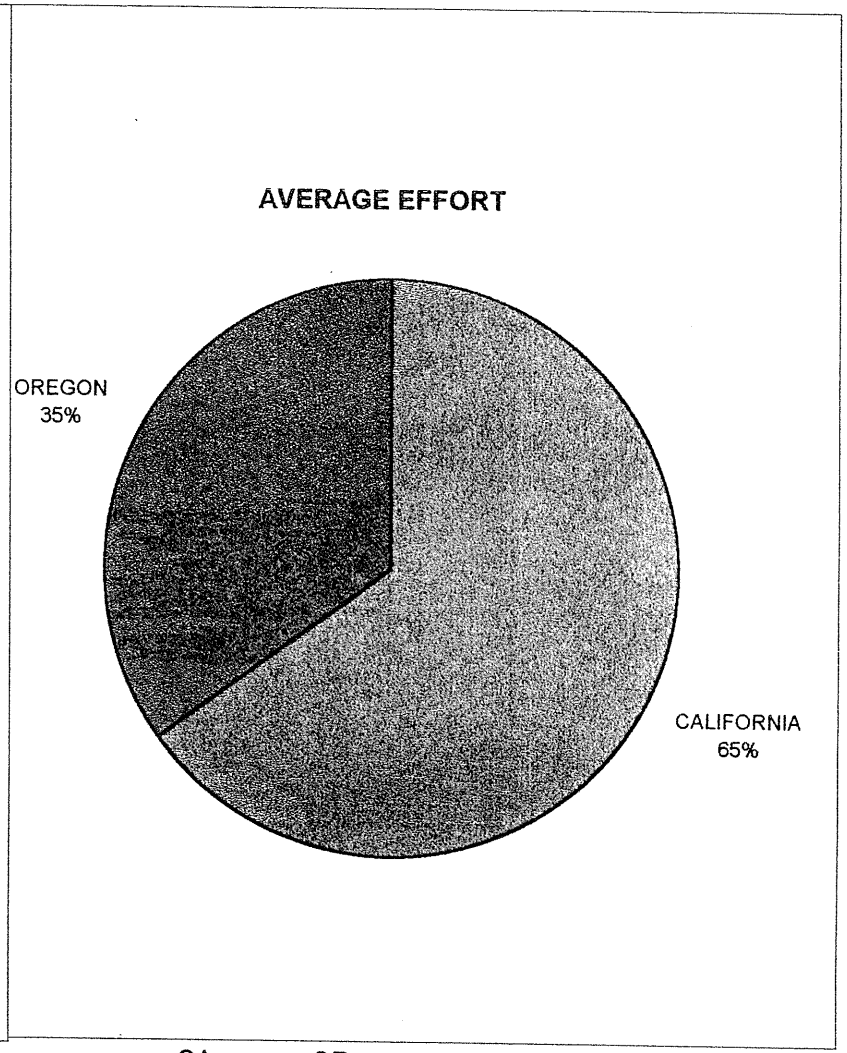
KLAMATH CONTRIBUTION-AGE 3+4 COMBINED

AREA	FALL-99	MAY-00	JUNE-00	JULY-00	AUG-00
NOR	0.15%	0.85%	1.16%	6.72%	8.06%
CSB	0.00%	7.61%	12.29%	25.03%	30.03%
KMZ-T	0.35%	13.27%	35.30%	34.28%	23.77%
KMZ-S	0.00%	39.53%	26.76%	24.38%	19.41%
FTB	0.00%	8.28%	10.98%	14.37%	5.09%
SOC	0.00%	1.56%	5.52%	4.58%	1.57%



	APR	MAY	JUNE	JULY	AUG
Oregon	30	31	18	31	31
SOC	0	31	14	31	31





year	CA	OR	
1997	18770	7905	70%
1998	12658	7321	63%
1999	13885	5228	72%
average	15104.3	6818	68.33%

	CA	OR	
1997	835	433	65%
1998	670	373	64%
1999	645	328	66%
average	716.6	378	65%

SALMON ADVISORY SUBPANEL

PROPOSED
OCEAN SALMON MANAGEMENT MEASURES
FOR TENTATIVE ADOPTION
2000

April 4, 2000

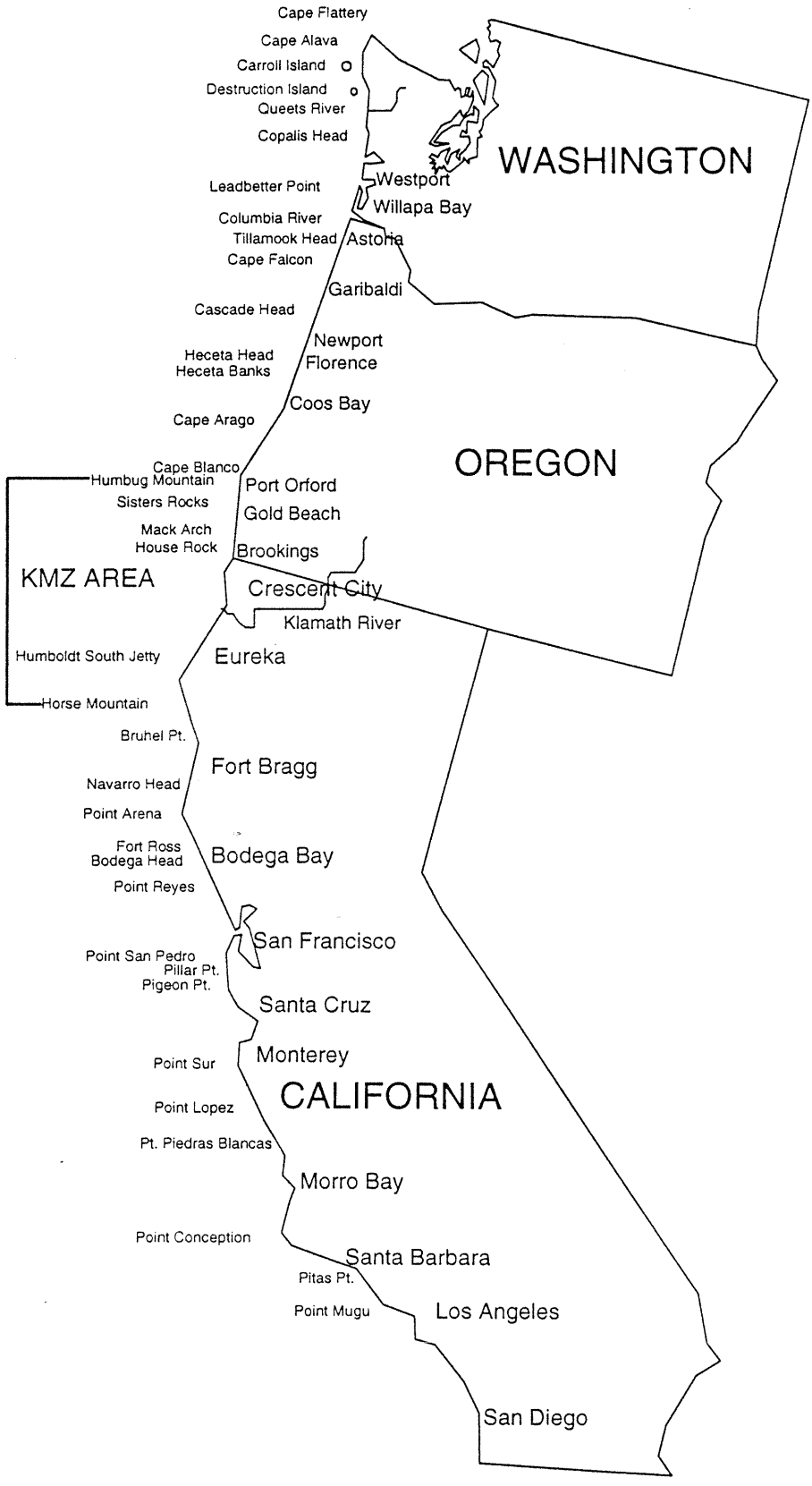

Cape Flattery
Cape Alava
Carroll Island
Destruction Island
Queets River
Copalis Head
WASHINGTON
Leadbetter Point
Westport
Willapa Bay
Columbia River
Tillamook Head
Astoria
Cape Falcon
Garibaldi
Cascade Head
Newport
Heceta Head
Heceta Banks
Florence
Coos Bay
Cape Arago
OREGON
Cape Blanco
Humbug Mountain
Port Orford
Sisters Rocks
Gold Beach
Mack Arch
House Rock
Brookings
KMZ AREA
Crescent City
Klamath River
Humboldt South Jetty
Eureka
Horse Mountain
Bruhel Pt.
Fort Bragg
Navarro Head
Point Arena
Fort Ross
Bodega Head
Bodega Bay
Point Reyes
San Francisco
Point San Pedro
Pillar Pt.
Pigeon Pt.
Santa Cruz
Monterey
Point Sur
CALIFORNIA
Point Lopez
Pt. Piedras Blancas
Morro Bay
Point Conception
Santa Barbara
Pitas Pt.
Point Mugu
Los Angeles
San Diego

TABLE 1. **Commercial troll** management measures proposed by the SAS for non-Indian ocean salmon fisheries, 2000. (Page 1 of 3)

A. SEASON OPTION DESCRIPTIONS

North of Cape Falcon

Projections and Assumptions:

1. ESA listed species: Snake River fall chinook SRFI of __ % for all ocean fisheries relative to 1988-1993 average (≤70% required).
2. WCVI mortality of 1,200 coho; PST chinook harvest level in SE Alaska; 1999 estimated chinook harvest rate in Canadian fisheries, except 72,000 harvest for WCVI troll.
3. Treaty Indian commercial ocean troll quotas of: _____ chinook (_____ in May and June; _____ for all-salmon season Aug.-Sept. 15); _____ coho.
4. Overall non-Indian TAC: 25,000 chinook; 100,000 coho. (No trade)
5. Non-Indian Troll TAC: 12,500 chinook and selective fishery impacts associated with a landed catch of 25,000 marked hatchery coho.

U.S.-Canada Border to Cape Falcon

• May 1 thru earlier of June 15 or 11,000 chinook guideline (see B.8.a.). All salmon except coho. Option II Columbia Control Zone closed (B.5.) Inseason actions may modify harvest guidelines in later fisheries to achieve or prevent exceeding the overall allowable troll harvest impacts.

Queets River to Cape Falcon

• Aug. 4 thru earliest of Sept. 30 or the overall chinook quota (preseason 1,500 chinook guideline; see B.8.a.) or 25,000 marked coho quota. All salmon (all retained coho must have a healed adipose fin clip). Cycle of 4 days open/3 days closed. Trip limits, gear restrictions, and harvest guidelines may be instituted or adjusted inseason. Vessels must land and deliver their fish within 24 hours of any closure of this fishery within the area or adjacent closed area. Option II Columbia River Control Zone is closed (B.5.).

South of Cape Falcon

Projections and Assumptions:

1. ESA listed species:
   OCN coho total incidental marine and freshwater harvest impact of % (limit of ≤15%);
   Rogue/Klamath coho incidental marine harvest impact of % (limit of ≤13%);
   Sacramento winter chinook age-3 adult spawner increase in mean brood replacement rate of % (goal ≥31%).
2. Klamath River fall chinook:
   50% of harvestable surplus (fish) for tribes with federally recognized fishing rights (Hoopa Valley; Yurok);
   % age-4 ocean harvest rate;
   35,000 natural spawners (floor = 35,000);
   15% of non-Indian impacts to Klamath River sport fishery;
   / CA/OR sharing of age-4 ocean harvest outside the KMZ sport fishery;
   17% of ocean impacts to KMZ ocean sport fishery.

Cape Falcon to Humbug Mt. Aug. 1.

• Apr. 1 thru July 25, and Sept. 1 thru Oct. 31. All salmon except coho. See Oregon State regulations for a description of the closed area at the mouth of Tillamook Bay. [**Note:** Incidental retention of halibut is not allowed during April.]

Humbug Mt. to OR-CA Border

• May 1 thru May 31. All salmon except coho.

Sisters Rocks to Oregon-California Border

• 8/1 thru earlier of 8/31 or 1,000 chinook quota. All salmon except coho. Possession and landing limit of 30 fish per day. All salmon must be landed and delivered to Gold Beach, Port Orford or Brookings within 24 hours of closure.

House Rock, OR to Humboldt South Jetty

• Sept. 1 thru earlier of Sept. 30 or 7,000 chinook quota. All salmon except coho. Possession and landing limit of 30 fish per day. All fish caught in this area must be landed within the area. Klamath Control Zone closed (see B.5.). Within the 7,000 chinook quota is a harvest guideline limiting landings at the port of Brookings to no more than 1,000 chinook. If this guideline is reached prior to the overall quota, the fishery will close north of the Oregon-California border. When the fishery is closed north of the Oregon-California border and open to the south, Oregon State regulations provide for the following action: Vessels with fish on board caught in the open area off California may seek temporary mooring in Brookings, Oregon prior to landing in California only if such vessels first notify the Chetco River Coast Guard Station via VHF channel 22A between the hours of 0500 and 2200 and provide the vessel name, number of fish on board, and estimated time of arrival.

TABLE 1. **Commercial troll** management options proposed by the SAS for non-Indian ocean salmon fisheries, 2000. (Page 2 of 3)

A. SEASON OPTION DESCRIPTIONS (Continued)

Horse Mt. to Pt. Arena (Fort Bragg)
• Sept. 1 thru Sept. 30. All salmon except coho.

Pt. Arena to Pt. Reyes (Bodega Bay)
• July 18 thru Sept. 30. All salmon except coho. Minimum size limit 27 inches.
Fort Ross to Pt. Reyes (test fishery inside 6 nm)
• July 1 thru earlier of July 15 or 4,500 chinook quota. All salmon except coho. Fishery closed July 4. Minimum size limit 26 inches (to be consistent with 1998 and 1999 test fisheries). Open only inside 6 nautical miles. Possession and landing limit of 30 fish per day. All fish caught in this area must be landed in Bodega Bay. Fish taken outside this area may not be landed at Bodega Bay while this fishery is open.

Pt. Reyes to Pt. San Pedro
• May 7 thru Sept. 30. All-salmon-except-coho. Minimum size limit 26 inches thru June 30 and 27 inches thereafter.

Pt. San Pedro to Pigeon Pt.
• May 1 thru Sept. 14. All salmon except coho. Minimum size limit 26 inches thru June 30 and 27 inches thereafter.

Pigeon Pt. to U.S.-Mexico Border
• May 1 thru Aug. 31. All salmon except coho. Minimum size limit 26 inches thru June 30 and 27 inches thereafter.

B. GENERAL REQUIREMENTS, DEFINITIONS, RESTRICTIONS OR EXCEPTIONS

1. Compliance with Minimum Size or Other Special Restrictions - All salmon on board a vessel must meet the minimum size or other special requirements for the area being fished and the area in which they are landed if that area is open. Salmon may be landed in an area that is closed only if they meet the minimum size or other special requirements for the area in which they were caught.

2. Minimum size limits in inches (when seasons are open):

	Chinook		Coho		
Area (when open)	Total Length	Head-off	Total Length	Head-off	Pink
North of Cape Falcon	28.0	21.5	16.0	12.0	None
Cape Falcon to Pt. Arena*	26.0*	19.5*	-	-	None
South of Pt. Arena prior to July 1*	26.0*	19.5*	-	-	None
South of Pt. Arena after June 30*	27.0*	20.25*	-	-	None

* Chinook not less than 26 inches (19.5 inches head-off) taken in open seasons south of Cape Falcon may be landed north of Cape Falcon only when the season is closed north of Cape Falcon.

3. Transit Through Closed Areas with Salmon on Board - It is unlawful for a vessel to have troll gear in the water while transiting any area closed to salmon fishing while possessing salmon.

4. Line, Spread and Gear Restrictions:

   a. Single point, single shank barbless hooks are required.
   b. Off **Oregon south of Cape Falcon**, no more than 4 spreads are allowed per line. ***Spread defined:*** A single leader connected to an individual lure or bait.
   c. Off **California**, no more than 6 lines are allowed per vessel.
   d. Option II Off **California** - barbless **circle** hooks are required when fishing by any means other than trolling. ***Trolling defined:*** Angling from a boat or floating device that is making way by means of a source of power, other than drifting by means of the prevailing water current or weather conditions, except when landing fish. **(New proposal for 2000)**

5. Control Zone Definitions:

Option I Columbia Commercial Control Zone - The ocean area at the Columbia River mouth bounded by a line extending for 6 nautical miles due west from North Head along 46°18'00" N to 124°13'18" W, then southerly to 46°13'24" N and 124°11'00" W (green, Columbia River Entrance Lighted Bell Buoy #1), then southerly to 46°11'06" N and 124°11'00" W (red, Columbia River Approach Lighted Whistle Buoy), then northeast along red buoy line to the tip of the south jetty.

Option II Columbia Control Zone (same as recreational control zone as modified in 1999) - An area at the Columbia River mouth bounded on the west by a line running northeast/southwest between the red lighted Buoy #4 (46°13'35" N/124°06'50" W) and the green lighted Buoy #7 (46°15'09' N/124°06'16" W); on the east by the Buoy #10 line which bears north/south at 357° true from the south jetty at 46°14'00" N/124°03'07" W to its intersection with the north jetty; on the north by a line running northeast/southwest between the green lighted Buoy #7 to the tip of the north jetty (46°14'48" N/124°05'20" W) and then along the north jetty to the point of intersection with the Buoy #10 line; and on the south by a line running northeast/southwest between the red lighted Buoy #4 and the tip of the south jetty (46°14'03" N/124°04'05" W) and then along the south jetty to the point of intersection with the Buoy #10 line.

TABLE 1. **Commercial troll** management options proposed by the SAS for non-Indian ocean salmon fisheries, 2000. (Page 3 of 3)

B. GENERAL REQUIREMENTS, DEFINITIONS, RESTRICTIONS OR EXCEPTIONS (continued)

Klamath Control Zone - The ocean area at the Klamath River mouth bounded on the north by 41°38'48" N. (approximately 6 nautical miles north of the Klamath River mouth), on the west by 124°23'00" W. (approximately 12 nautical miles off shore), and on the south by 41°26'48" N (approximately 6 nautical miles south of the Klamath River mouth).

6. Notification When Unsafe Conditions Prevent Compliance with Regulations: If prevented by unsafe weather conditions or mechanical problems from meeting special management area landing restrictions, vessels must notify the U.S. Coast Guard and receive acknowledgment of such notification prior to leaving the area. This notification shall include the name of the vessel, port where delivery will be made, approximate amount of salmon (by species) on board and the estimated time of arrival. This stipulation will be implemented by state regulations for California, Oregon and Washington, as required.

7. Incidental Halibut Harvest - The operator of a vessel that has been issued an incidental halibut harvest license may retain Pacific halibut caught incidentally in Area 2A, during authorized periods, while trolling for salmon. License applications for incidental harvest must be obtained from the International Pacific Halibut Commission (phone 206/634-1838). Applicants must apply prior to April 1 of each year. Incidental harvest is authorized only during **May and June** troll seasons and after July 31 if quota remains and if announced on the NMFS hotline (phone 800-662-9825). ODFW and WDFW will monitor landings and if they are projected to exceed the 23,490 pound preseason allocation or the Area 2A non-Indian commercial halibut TAC, NMFS will take inseason action to close the incidental halibut fishery.

   Option I: License holders may land no more than 1 halibut per each 2 chinook, except 1 halibut may be landed without meeting the ratio requirement, and no more than 50 halibut may be landed per trip. Halibut retained must meet the minimum size limit of 32 inches.

8. Inseason Management - In addition to standard inseason actions or modifications already noted under the season description, the following inseason guidance is provided to NMFS:

   a. In the overall non-Indian commercial chinook quota, 1,000 chinook were assessed at the July/August impact rate and moved into the May/June harvest guideline. Inseason, these 1,000 chinook may be rolled into the July/ August fishery at a one-to-one rate if not taken in the May/June fishery.

   b. At the March 2001 meeting, the Council will consider inseason recommendations to: (1) open commercial seasons for all salmon except coho prior to May 1 in areas off Oregon, and (2) identify the areas, season, quota, and special regulations for any experimental April fisheries (proposals must meet Council protocol and be received in November 2000).

9. Consistent with Council management objectives, the State of Oregon may establish additional late-season, chinook-only fisheries in state waters. Check state regulations for details.

10. For the purposes of CDFG Code, Section 8232.5, the definition of the KMZ for the ocean salmon season shall be that area from Humbug Mt., Oregon to Horse Mt., California.

TABLE 2. **Recreational** management measures proposed by the SAS for non-Indian ocean salmon fisheries, 2000. (Page 1 of 3)

A. SEASON OPTION DESCRIPTIONS

North of Cape Falcon

Projections and Assumptions:

1. ESA listed species: Snake River fall chinook SRFI of __ % for all ocean fisheries relative to 1988-1993 average (≤70% required).
2. WCVI mortality of 1,200 coho; PST chinook harvest level in SE Alaska; 1999 estimated chinook harvest rate in Canadian fisheries, except 72,000 harvest for WCVI troll.
3. Neah Bay/La Push agreed coho allocation of 80%/20% adjusted for Area 4B add-on.
4. Area 4B add-on fishery of 8,000 coho (chinook nonretention) opens later of ocean closure or Aug. 28.
5. Buoy 10 fishery opens Aug. 1 with an expected landed catch of 32,400 coho in Aug. and 22,500 coho in Sept. All retained coho must have an adipose fin clip.
6. Overall non-Indian TAC: 25,000 chinook; 100,000 coho. (No trade)
7. Recreational TAC: 12,500 chinook and selective fishery impacts associated with a landed catch of 75,000 marked hatchery coho.

U.S.-Canada Border to Cape Alava (Neah Bay)

• July 3 thru earlier of Sept. 30 (7 days per week) or 6,600 coho subarea quota. All salmon, except see note below concerning Area 4B. 2 fish per day, but only 1 chinook and all retained coho must have a healed adipose fin clip. Inseason management may be used to sustain season length and keep harvest within a guideline of 500 chinook.
Note: While ocean fishery is open, no retention of chinook is allowed in Area 4B.

Cape Alava to Queets River (La Push)

• July 3 thru earlier of Sept. 30 (7 days per week) or 1,950 coho subarea quota. All salmon. 2 fish per day, but only 1 chinook and all retained coho must have a healed adipose fin clip. Inseason management may be used to sustain season length and keep harvest within a guideline of 300 chinook.

Queets River to Leadbetter Pt. (Westport)

• Sun. thru Thurs. July 3 thru earlier of Sept. 30 or 28,950 coho subarea quota. All salmon. 2 fish per day, but only 1 chinook and all retained coho must have a healed adipose fin clip. Closed thru Thurs., Aug. 10 inside the area defined by a line drawn from the lighthouse to Buoy 2 to Buoy 3 to the Grays Harbor north jetty. Inseason management may be used to sustain season length and limit harvest within a guideline of 7,400 chinook.

Leadbetter Pt. to Cape Falcon (Columbia River)

• Sun. thru Thurs. July 10 thru earlier of Sept. 30 or 37,500 coho subarea quota. All salmon. 2 fish per day, but only 1 chinook and all retained coho must have a healed adipose fin clip. **Coho retention is prohibited** between Tillamook Head and Cape Falcon beginning Aug. 1 (i.e., all salmon except coho and a daily bag limit of 1 chinook). Closed in Recreational Columbia Control Zone (newly defined in 1999, see B.6.). Inseason management may be used to sustain season length and limit harvest within a guideline of 4,300 chinook.

South of Cape Falcon

Projections and Assumptions:

1. ESA listed species:
   OCN coho total incidental marine and freshwater harvest impact of % (limit of ≤15%);
   Rogue/Klamath coho incidental marine harvest impact of % (limit of ≤13%);
   Sacramento winter chinook age-3 adult spawner increase in mean brood replacement rate of % (goal ≥31%).
2. Klamath River fall chinook:
   50% of harvestable surplus (fish) for tribes with federally recognized fishing rights (Hoopa Valley; Yurok);
   % age-4 ocean harvest rate;
   35,000 natural spawners (floor = 35,000);
   15% of non-Indian impacts to Klamath River sport fishery;
   / CA/OR sharing of age-4 ocean harvest outside the KMZ sport fishery;
   17% of ocean impacts to KMZ ocean sport fishery.

TABLE 2. **Recreational** management options proposed by the SAS for non-Indian ocean salmon fisheries, 2000. (Page 2 of 3)

A. SEASON OPTION DESCRIPTIONS (Continued)

South of Cape Falcon

Cape Falcon to Humbug Mt

• Except as provided below during the selective fishery, the season will be: Apr. 1 thru Oct. 31. All salmon except coho. 2 fish per day. No more than 6 fish in 7 consecutive days. Legal gear limited to artificial lures and plugs of any size, or bait no less than 6 inches long (excluding hooks and swivels). All gear must have no more than 2 single point, single shank barbless hooks. Divers are prohibited and flashers may be used only with downriggers. See Oregon State regulations for a description of a closure at the mouth of Tillamook Bay.

Selective fishery:

• Sun., Tue., Wed., Thur., and Sat. of each week, July 1 thru earlier of July 31 or a landed catch of 25,000 coho. All salmon. 2 fish per day, all retained coho must have a healed adipose fin clip. No more than 6 fish in 7 consecutive days. No special gear restrictions except B.3. (barbless hooks). Open days may be adjusted to utilize the available quota. **Note:** On closed days during the selective fishery, no angling for any species of salmon is allowed. All salmon except coho season reopens the earlier of Aug. 1 or attainment of the coho quota.

Humbug Mt. to Horse Mt.

• May 27 thru July 6, one fish per day; and July 29 thru Sept. 10, two fish per day. All salmon except coho. No more than 4 fish in 7 consecutive days. Klamath Control Zone (B.6.) closed. Gear restrictions B.4. and B.5.a. apply (one rod per angler and no more than 2 hooks).

Horse Mt. to Pt. Arena

• Feb. 12 thru July 6 and July 29 thru Nov. 12. All salmon except coho. 2 fish per day. Minimum size limit 24 inches thru May 31 and 20 inches thereafter. Gear restrictions B.4., B.5.a., and B.5.b. apply (one rod per angler; no more than 2 hooks; circle hooks required when fishing by any means other than trolling).

In 2001, season opens Feb. 17 (nearest Sat. to Feb. 15) for all salmon except coho. 2 fish per day, 24 inch minimum size limit and the same gear restrictions as in 2000.

Pt. Arena to Pigeon Pt.

• Apr. 15 thru Nov. 5. All salmon except coho. 2 fish per day. Minimum size limit 24 inches thru May 31 and 20 inches thereafter. One rod per angler. Gear restrictions B.4., B.5.a., and B.5.b. apply (one rod per angler; no more than 2 hooks; circle hooks required when fishing by any means other than trolling).

In 2001, the season will open Apr. 14 for all salmon except coho. 2 fish per day, 24 inch minimum size limit and the same gear restrictions as in 2000.

Pigeon Pt. to U.S.-Mexico Border

• Apr. 1 thru Oct. 1. All salmon except coho. 2 fish per day. Minimum size limit 24 inches thru May 31 and 20 inches thereafter. Gear restriction B.5.a (circle hooks when not trolling). North of Pt. Conception, gear restrictions B.4., B.5.a., and B.5.b. apply (one rod per angler; no more than 2 hooks; circle hooks required when fishing by any means other than trolling).

In 2001, season opens March 31 for all salmon except coho, 2 fish per day, 24 inch minimum size limit and the same gear restrictions as in 2000.

B. GENERAL REQUIREMENTS, DEFINITIONS, RESTRICTIONS OR EXCEPTIONS

1. Compliance with Minimum Size or Other Special Restrictions - All salmon on board a vessel must meet the minimum size or other special requirements for the area being fished . Salmon may be landed in an area that is closed only if they meet the minimum size or other special requirements for the area in which they were caught.

2. Minimum size limits (total length in inches) when areas are open:

Area (when open)	Chinook	Coho	Pink
North of Cape Falcon	24.0	16.0	None
Cape Falcon to Horse Mt.	20.0	16.0	None, except 20.0 off CA
South of Horse Mt.*	20.0*	-	20.0

* **Except** 24.0 inches from opening day thru May 31.

3. Hooks: Single point, single shank barbless hooks are required for all fishing gear north of Pt. Conception, California. ODFW regulations in the state-water fishery off Tillamook Bay may allow the use of barbed hooks to be consistent with inside regulations.

4. Restriction on Number of Fishing Rods North of Pt. Conception, California: All persons fishing for salmon, and all persons fishing from a boat with salmon on board, may use no more than one rod per angler.

TABLE 2. **Recreational** management options proposed by the SAS for non-Indian ocean salmon fisheries, 2000. (Page 3 of 3)

B. GENERAL REQUIREMENTS, DEFINITIONS, RESTRICTIONS OR EXCEPTIONS (Continued)

5. Special Gear Restrictions off California:

   a. California North of Pt. Conception: Anglers must use no more than 2 single point, single shank barbless hooks. **(New proposal for 2000)**

   b. Between Horse Mt. and Pt. Conception, California: Single point, single shank, barbless **circle** hooks must be used if angling by any means other than trolling and no more than 2 such hooks shall be used. When angling with 2 hooks, the distance between the hooks must not exceed 5 inches when measured from the top of the eye of the top hook to the inner base of the curve of the lower hook, and both hooks must be permanently tied in place (hard tied). A circle hook is defined as a hook with a generally circular shape and a point which turns inward, pointing directly to the shank at a 90° angle such that the shank bend and point should lie flat on a flat surface. Circle hooks are not required when artificial lures are used without bait. ***Trolling defined:*** Angling from a boat or floating device that is making way by means of a source of power, other than drifting by means of the prevailing water current or weather conditions, except when landing a fish.

6. Control Zone Definitions:

   Columbia Recreational Control Zone (modified in 1999) - An area at the Columbia River mouth bounded on the west by a line running northeast/southwest between the red lighted Buoy #4 (46°13'35" N/124°06'50" W) and the green lighted Buoy #7 (46°15'09' N/124°06'16" W); on the east by the Buoy #10 line which bears north/south at 357° true from the south jetty at 46°14'00" N/124°03'07" W to its intersection with the north jetty; on the north by a line running northeast/southwest between the green lighted Buoy #7 to the tip of the north jetty (46°14'48" N/124°05'20" W) and then along the north jetty to the point of intersection with the Buoy #10 line; and on the south by a line running northeast/southwest between the red lighted Buoy #4 and the tip of the south jetty (46°14'03" N/124°04'05" W) and then along the south jetty to the point of intersection with the Buoy #10 line.

   Klamath Control Zone - The ocean area at the Klamath River mouth bounded on the north by 41°38'48" N (approximately 6 nautical miles north of the Klamath River mouth), on the west by 124°23'00" W (approximately 12 nautical miles off shore), and on the south by 41°26'48" N (approximately 6 nautical miles south of the Klamath River mouth).

7. Inseason Management: Regulatory modifications may become necessary inseason to meet preseason management objectives such as quotas, harvest guidelines and season duration. Actions could include modifications to bag limits or days open to fishing, and extensions or reductions in areas open to fishing. NMFS may transfer coho inseason among recreational subareas North of Cape Falcon to help meet the recreational season duration objectives (for each subarea) after conferring with representatives of the affected ports and the Salmon Advisory Subpanel recreational representatives north of Cape Falcon.

   At the November 2000 meeting, the Council will consider the proposed March 17, 2001 opening date for the recreational fishery south of Pt. Lopez in view of its impacts on endangered Sacramento River winter and threatened Sacramento River spring chinook.

   At the March 2001 meeting, the Council will consider an inseason recommendation to open seasons for all salmon except coho prior to May 1 in areas off Oregon.

8. Additional Seasons in State Territorial Waters: Consistent with Council management objectives, the states of Washington and Oregon may establish limited seasons in state waters. Oregon state-water fisheries are limited to chinook salmon. Check state regulations for details.

COMPARISON OF OREGON AND CALIFORNIA COMMERCIAL SEASONS
UNDER VARIOUS KLAMATH RIVER FALL CHINOOK ALLOCATIONS

	51:49 (Option I)	55:45	57:43	59:41
Oregon - July	31 days 167.8 fish	25 days 160.8	22 days 157.3 ~~descending~~	NOR: 20 days Coos: 19 days 10 at 14,000 (154.2)
San Francisco - June	10 days 314	19 days —	27 days 328	30 days plus 12 days in May 342

All options meet 35,000 Klamath River fall chinook floor.

fish on page 18 of preseason Rpt.

Curt Melcher gave explanation 4:41 pm 4.4.00

Report of Jim Harp
On the 2000 North of Cape Falcon Process

Mr. Chairman, I'd like to give a brief report on this year's North of Cape Falcon (NCF) meetings. As you know, each year the managers representing the states of Oregon and Washington and the treaty tribes of the Washington Coast, Puget Sound, and the Columbia River meet with the affected constituents to consider the condition of the resource and determine allowable fisheries that are possible under the circumstances. This year, we met on March 15 and 16 in Portland and again on March 28, 29 and 30 in Tukwila.

This year the tribal and state co-managers also held a meeting with Canadian fisheries managers on March 14 to exchange information on our respective forecasts of abundance and expected fisheries plans. This exchange provided the co-managers much more certainty than in past years upon which to base assumptions concerning Canadian fisheries in our modeling of impacts during our NCF process. This improved pre-season planning relationship with Canada is a direct result of the 1999 PST agreement, and the commitment of the parties to more closely mesh their respective fisheries planning processes.

Under the best of conditions, this is a difficult process to shape the Treaty Indian and Non-Treaty fisheries for areas from the ocean to in-river for the various stocks of concern. This year's process has been particularly difficult because of the very low forecasted abundance for most coho and some chinook stocks, and because of the additional species that have been listed under the ESA this past year.

For 2000, the forecast for most wild coho and some hatchery coho stocks is for run sizes below desired optimum escapement levels. Of particular concern on the Washington coast is the Queets River and in Puget Sound the Skagit, Stillaguamish and Snohomish Rivers. In addition, the hatchery run to South Puget Sound, a normally strong contributor to our fisheries, is forecasted to be weak. This situation has necessitated the need to develop very restrictive fishery plans in both the ocean and inside areas to achieve acceptable escapement levels.

As part of this pre-season planning process, the tribes and WDFW have developed a Puget Sound chinook fishing strategy to meet the requirements of the ESA. The implementation of this plan through the NCF process is expected to result in a Section 7 "no jeopardy" determination by NMFS. Similarly, ocean fishery plans are expected to meet the ESA standards that have been established by NMFS for listed Columbia River stocks.

Our NCF work is not yet completed. The tribes and WDFW will be working throughout this week to complete a package of agreed fisheries plans. We are confident that an agreement will be reached that meets the needs of the resource and provides some level of fishing opportunity for all fishing interest.

TESTIMONY OF
THE COLUMBIA RIVER TREATY TRIBES
BEFORE PACIFIC FISHERIES MANAGEMENT COUNCIL
APRIL 4, 2000
PORTLAND, OR

Good afternoon Mr. Chairman and members of the Council. My name is Raphael Bill. I am a member of the Fish and Wildlife Committee of the Umatilla Tribes. I am here today to present comments on behalf of the four Columbia River treaty tribes: the Yakama, Warm Springs, Umatilla and Nez Perce tribes.

The Columbia River treaty tribes have reviewed the information in Preseason Report II. The objective criteria that the tribes are looking at are the Snake River Fall Chinook Index and the projected escapement for the other Columbia River fall chinook stocks. All chinook options meet the Snake River wild fall chinook criteria. The range in projected Columbia River fall chinook escapements between options is relatively small. However, Option Three for North of Cape Falcon is preferred because more fish will be passed through to the river.

The management of this year's fall chinook return to the Columbia River presents a tremendous challenge for the tribes and the other co-managers. In order to achieve the full 50% harvestable share of fall chinook entitled to the tribes under the *U.S. v. Oregon* case law, the tribes would need to take virtually all the allowable Snake River fall chinook impacts. This leaves almost nothing for the non-Indian in-river fishery. The tribes are willing to work with the other co-managers to explore alternatives. However, there must be some incentive and hope for the future that provides fishing opportunity and that is consistent with the case law.

Regarding the ocean catch of Columbia River coho, the states are required to pass at least 50% of the upriver coho upstream of Bonneville Dam. Catch and release mortalities must also be included as part of the non-tribal allocation. The tribes remain concerned about the catch and release mortality rates assumed in the coho ocean models and for barbed hooks in the Buoy 10 fishery. The tribes support monitoring of the catch and escapements to better determine the effects of selective fisheries on stock restoration.

The 50% coho passage requirement could be jeopardized if the assumed ocean catch and release mortality rates are unrealistically low. Our preliminary analyses indicates that if PFMC Option One is chosen, then the states of Oregon and Washington may need to reduce lower river fisheries in order to ensure that the 50% minimum objective is met.

Some hatchery stocks, such as the Lower Columbia River coho and Spring Creek tule fall chinook still provide harvestable numbers of fish. However, most naturally spawning stocks are not rebuilding as we had hoped. One notable exception is the fall chinook

returning to the Hanford Reach. The purpose of this meeting is to consider ocean fisheries. However, harvest management is not the only tool for rebuilding. If we work together, we can influence the outcome in other mortality sectors, such as the hydropower system, habitat, and hatcheries. The conservation burden can not be fairly shared until all mortality factors have been considered.

We mention hatcheries as a mortality sector because some programs are designed to only maintain fisheries through programs of mass marking and selective fisheries. Other programs depend on wild fish for brood stock requirements. Neither type of program benefits the wild fish. The tribes have made tremendous efforts to improve conditions at the subbasin level. Supplementation programs for fall chinook in the Snake River, spring chinook in the Umatilla, Yakima, and Hood rivers, and coho in the Clearwater, Umatilla and Yakima rivers have all demonstrated benefits. Nevertheless, tribal plans for other restoration activities are often met with institutional resistance geared to maintain the status quo. We do not know about other fishing interests, but the status quo is not acceptable to the tribes.

We have seen the elimination of many fisheries, but the wild salmon runs have not rebuilt. This proves that the other mortality sectors must contribute to rebuilding if wild salmon are to have a future in the Columbia River Basin and the rest of the Pacific Northwest. It is unfortunate that the welfare of the fish suffers at the hands of human desires to meet short-term economic interests that ignore the long-term needs of providing a sustainable environment for future generations

This concludes my statement. Thank You.

DEFINITIONS OF FISHING GEAR

The Council's March options include a proposed new gear restriction for commercial fisheries off California which would require circle hooks when fishing by any means other than trolling. Should this option be implemented, Council staff recommends it be handled in the annual regulations (Table 1) under the areas in which it applies. Unless new information or a new proposal emerges during public review, Council staff believes last year's gear definition, as provided below, should be adopted for the 2000 regulations.

The March options also include a new proposal for allowing California recreational anglers to use no more than two hooks. As in the past, the special restriction can be placed in Table 2 of the annual regulations under the areas in which it is in effect. Unless new information or a new proposal emerges during public review, Council staff believes last year's gear definition, as provided below, should be adopted for the 2000 regulations.

Commercial Troll Fishing Gear

1999 Regulation

(Allows trolling or mooching off California.)

> **Troll fishing gear** for the fishery management area (FMA) is defined as one or more lines that drag hooks behind a moving fishing vessel.
>
> In that portion of the FMA off Oregon and Washington, the line or lines must be affixed to the vessel and must not be intentionally disengaged from the vessel at any time during the fishing operation.

Recreational Fishing Gear

1999 Regulation

(Allows trolling or mooching and only one rod and line north of Point Conception when fishing for or possessing salmon.)

> **Recreational fishing gear** for the FMA is defined as angling tackle consisting of a line with no more than one artificial lure or natural bait attached.
>
> In that portion of the FMA off Oregon and Washington, the line must be attached to a rod and reel held by hand or closely attended; the rod and reel must be held by hand while playing a hooked fish. No person may use more than one rod and line while fishing off Oregon or Washington.
>
> In that portion of the FMA off California, the line must be attached to a rod and reel held by hand or closely attended. Weights directly attached to a line may not exceed four pounds (1.8 kg). While fishing off California north of Point Conception, no person fishing for salmon, and no person fishing from a boat with salmon on board, may use more than one rod and line.
>
> Fishing includes any activity which can reasonably be expected to result in the catching, taking or harvesting of fish.

PFMC
03/21/00

CLARIFICATION OF TENTATIVE 2000 MEASURES (IF NECESSARY)

Situation: If the Salmon Technical Team (STT) needs clarification of the tentative management measures before completing its analysis, Mr. Doug Milward, STT Chair, will address the Council in this agenda item.

Council Action: If requested, provide any needed guidance to assist the STT in its analysis of the tentative management measures.

Reference Materials: None.

PFMC
03/21/00

TABLE 7. Expected coastwide Oregon coastal natural (OCN) and Rogue/Klamath (RK) coho harvest mortality and exploitation rates by fishery for tentative management measures, 2000. (Page 1 of 1)

	Harvest Mortality and Exploitation Rate			
	OCN		RK	
Fishery	Number	Percent	Number	Percent
SOUTHEAST ALASKA	16	0.03	0	0.00
BRITISH COLUMBIA	2	0.00	0	0.00
PUGET SOUND/STRAITS	110	0.21	0	0.00
NORTH OF CAPE FALCON				
Treaty Indian Troll	106	0.20	0	0.00
Recreational	287	0.54	7	0.04
Non-Indian Troll	216	0.41	0	0.00
SOUTH OF CAPE FALCON				
Recreational:				
Cape Falcon to Humbug Mt.[a/]	555	1.05	15	0.08
Humbug Mt. to Horse Mt. (KMZ)	470	0.89	513	2.88
Fort Bragg	281	0.53	259	1.45
South of Pt. Arena	382	0.72	70	0.39
Troll:				
Cape Falcon to Humbug Mt.	945	1.79	17	0.09
Humbug Mt. to Horse Mt. (KMZ)	69	0.13	85	0.48
Fort Bragg	8	0.02	16	0.09
South of Pt. Arena	392	0.74	66	0.37
BUOY 10	103	0.20	20	0.11
ESTUARY/FRESHWATER	493	0.93	---	---
TOTAL	4,435	8.41	1,068	5.99
SPAWNERS (SRS accounting):				
2000	48,784	---	---	---
1999	46,800	---	—	---

a/ Under a 15,000 marked coho quota for the July selective fishery off central Oregon (rather than 25,000), the total impacts are 8.07% and 5.95% for OCN and RK coho, respectively.

TABLE 7. Expected coastwide Oregon coastal natural (OCN) and Rogue/Klamath (RK) coho harvest mortality and exploitation rates by fishery under the Council-adopted 1999 fisheries. (Page 1 of 1)

	Harvest Mortality and Exploitation Rate			
	OCN		RK	
Fishery	Number	Percent	Number	Percent
SOUTHEAST ALASKA	18	0.03	0	0.00
BRITISH COLUMBIA	126	0.22	0	0.00
PUGET SOUND/STRAITS	458	0.80	0	0.00
NORTH OF CAPE FALCON				
Treaty Indian Troll	196	0.34	0	0.00
Recreational	467	0.82	22	0.07
Non-Indian Troll	313	0.55	0	0.00
SOUTH OF CAPE FALCON				
Recreational:				
Cape Falcon to Humbug Mt.	455	0.79	26	0.08
Humbug Mt. to Horse Mt. (KMZ)	389	0.68	710	2.21
Fort Bragg	218	0.38	341	1.06
South of Pt. Arena	493	0.86	149	0.46
Troll:				
Cape Falcon to Humbug Mt.	819	1.43	25	0.08
Humbug Mt. to Horse Mt. (KMZ)	77	0.14	149	0.46
Fort Bragg	6	0.01	20	0.06
South of Pt. Arena	329	0.57	93	0.29
BUOY 10	99	0.17	37	0.11
ESTUARY/FRESHWATER	533	0.93	---	---
TOTAL	4,996	8.73	1,571	4.90

SALMON TECHNICAL TEAM

PRELIMINARY DISPLAY AND ANALYSIS OF COUNCIL-ADOPTED SALMON MANAGEMENT MEASURES FOR 2000 OCEAN FISHERIES

April 7, 2000

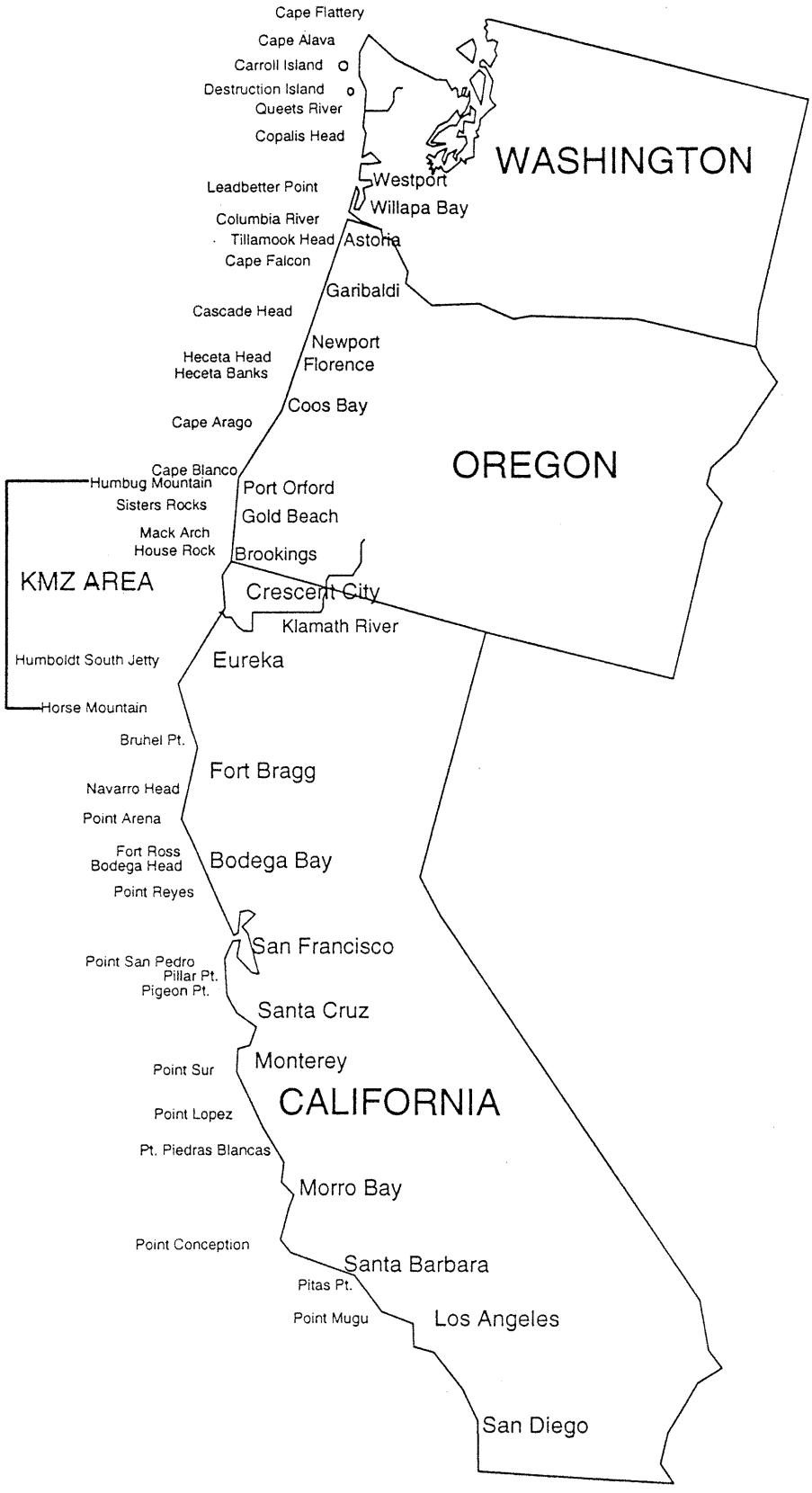

Cape Flattery
Cape Alava
Carroll Island
Destruction Island
Queets River
Copalis Head
WASHINGTON
Leadbetter Point
Westport
Willapa Bay
Columbia River
Tillamook Head
Astoria
Cape Falcon
Garibaldi
Cascade Head
Newport
Heceta Head
Heceta Banks
Florence
Coos Bay
Cape Arago
OREGON
Cape Blanco
Humbug Mountain
Port Orford
Sisters Rocks
Gold Beach
Mack Arch
House Rock
Brookings
KMZ AREA
Crescent City
Klamath River
Humboldt South Jetty
Eureka
Horse Mountain
Bruhel Pt.
Fort Bragg
Navarro Head
Point Arena
Fort Ross
Bodega Head
Bodega Bay
Point Reyes
San Francisco
Point San Pedro
Pillar Pt.
Pigeon Pt.
Santa Cruz
Monterey
Point Sur
CALIFORNIA
Point Lopez
Pt. Piedras Blancas
Morro Bay
Point Conception
Santa Barbara
Pitas Pt.
Point Mugu
Los Angeles
San Diego

TABLE 1. Council-adopted **non-Indian commercial troll** management measures for ocean salmon fisheries, 2000.
(Page 1 of 3)

A. SEASON DESCRIPTION

North of Cape Falcon

Projections and Assumptions:

1. ESA listed species: Snake River fall chinook SRFI of 58% for all ocean fisheries relative to 1988-1993 average (≤70% required).
2. WCVI mortality of 1,200 coho; Southeast Alaska harvest of 150,850 chinook per PST agreement; 1999 Canadian catches as described by Canada in March meeting with PFMC managers; WCVI troll catch of 72,000 chinook includes 56,000 chinook in the fall of 1999.
3. Treaty Indian commercial ocean troll quotas of: 25,500 chinook (20,000 for May/June; maximum of 5,500 for all-salmon season Aug.-Sept. 15); 20,000 coho.
4. Overall non-Indian TAC: 25,000 chinook; 100,000 coho. (No trade)
5. Non-Indian Troll TAC: 12,500 chinook and selective fishery impacts of a landed catch of 25,000 marked hatchery coho.

U.S.-Canada Border to Cape Falcon

• May 1 thru earlier of June 15 or 11,000 chinook guideline (see B.8.a.). All salmon except coho. Columbia Control Zone is closed (see B.5. for description of newly defined area for 2000 which is the same as the recreational control zone instituted in 1999). Inseason actions may modify harvest guidelines in later fisheries to achieve or prevent exceeding the overall allowable troll harvest impacts.

Queets River to Cape Falcon

• Aug. 4 thru earliest of Sept. 30 or the overall chinook quota (preseason 1,500 chinook guideline; see B.8.a.) or 25,000 marked coho quota. All salmon (all retained coho must have a healed adipose fin clip). Cycle of 4 days open/3 days closed. Each vessel may possess, land, and deliver no more than 50 chinook per open period. However, no possession or landing restrictions will initially apply if the chinook harvest guideline is at least 2,500 chinook as a result of the transfer of uncaught harvest from the May/June fishery. Trip limits, gear restrictions, and harvest guidelines may be instituted or adjusted inseason. Vessels must land and deliver their fish within 24 hours of any closure of this fishery within the area or adjacent closed area. Columbia River Control Zone is closed (see B.5. for description of newly defined area for 2000 which is the same as the recreational control zone instituted in 1999).

South of Cape Falcon

Projections and Assumptions:

1. ESA listed species:
   OCN coho total incidental marine and freshwater harvest impact of 8.4% (limit of ≤15%);
   Rogue/Klamath hatchery coho total incidental marine harvest impact of 6.0% (limit of ≤13%);
   Sacramento winter chinook age-3 adult spawner increase of 31.0% in mean brood replacement rate (goal ≥31%).
2. Klamath River fall chinook:
   50% of harvestable surplus (28,200 fish) for tribes with federally recognized fishing rights (Hoopa Valley; Yurok);
   13.8% age-4 ocean harvest rate;
   35,000 natural spawners (floor = 35,000);
   15% of non-Indian impacts to Klamath River sport fishery;
   57/43 CA/OR sharing of age-4 ocean harvest outside the KMZ sport fishery for 2000;
   17% of ocean impacts to KMZ ocean sport fishery.

Cape Falcon to Humbug Mt.

• Apr. 1 thru July 22; Aug. 1 thru Aug. 29; and Sept. 1 thru Oct. 31. All salmon except coho. See Oregon State regulations for a description of the closed area at the mouth of Tillamook Bay. [**Note:** Incidental retention of halibut is not allowed during April.]

Humbug Mt. to OR-CA Border

• May 1 thru May 31. All salmon except coho.

Sisters Rocks to Oregon-California Border

• Aug. 1 thru earlier of Aug. 31 or 1,300 chinook quota. All salmon except coho. Possession and landing limit of 30 fish per day. All salmon must be landed and delivered to Gold Beach, Port Orford or Brookings within 24 hours of closure.

House Rock, OR to Humboldt South Jetty

• Sept. 1 thru earlier of Sept. 30 or 7,000 chinook quota. All salmon except coho. Possession and landing limit of 30 fish per day. All fish caught in this area must be landed within the area. Klamath Control Zone closed (see B.5.). Within the 7,000 chinook quota is a harvest guideline limiting landings at the port of Brookings to no more than 1,000 chinook. If this guideline is reached prior to the overall quota, the fishery will close north of the Oregon-California border. When the fishery is closed north of the Oregon-California border and open to the south, Oregon State regulations provide for the following action: Vessels with fish on board caught in the open area off California may seek temporary mooring in Brookings, Oregon prior to landing in California only if such vessels first notify the Chetco River Coast Guard Station via VHF channel 22A between the hours of 0500 and 2200 and provide the vessel name, number of fish on board, and estimated time of arrival.

TABLE 1. Council-adopted **non-Indian commercial troll** management measures for ocean salmon fisheries, 2000.

A. SEASON DESCRIPTION (Continued)

Horse Mt. to Pt. Arena (Fort Bragg)
• Sept. 1 thru Sept. 30. All salmon except coho.

Pt. Arena to Pt. Reyes (Bodega Bay)
• July 18 thru Sept. 30. All salmon except coho. Minimum size limit 27 inches.
Fort Ross to Pt. Reyes (test fishery inside 6 nm)
• July 1 thru earlier of July 15 or 4,500 chinook quota. All salmon except coho. Fishery closed July 4. Minimum size limit 26 inches (to be consistent with 1998 and 1999 test fisheries). Open only inside 6 nautical miles. Possession and landing limit of 30 fish per day. All fish caught in this area must be landed in Bodega Bay. Fish taken outside this area may not be landed at Bodega Bay while this fishery is open.

Pt. Reyes to Pt. San Pedro
• May 29 thru Sept. 30. All-salmon-except-coho. Minimum size limit 26 inches thru June 30 and 27 inches thereafter.

Pt. San Pedro to U.S.-Mexico Border
• May 1 thru Aug. 27. All salmon except coho. Minimum size limit 26 inches thru June 30 and 27 inches thereafter.

B. GENERAL REQUIREMENTS, DEFINITIONS, RESTRICTIONS OR EXCEPTIONS

1. Compliance with Minimum Size or Other Special Restrictions - All salmon on board a vessel must meet the minimum size or other special requirements for the area being fished and the area in which they are landed if that area is open. Salmon may be landed in an area that is closed only if they meet the minimum size or other special requirements for the area in which they were caught.

2. Minimum size limits in inches (when seasons are open):

	Chinook		Coho		
Area (when open)	Total Length	Head-off	Total Length	Head-off	Pink
North of Cape Falcon	28.0	21.5	16.0	12.0	None
Cape Falcon to Pt. Arena	26.0 a/	19.5 a/	-	-	None
South of Pt. Arena prior to July 1	26.0 a/	19.5 a/	-	-	None
South of Pt. Arena after June 30	27.0 a/b/	20.25 a/b/	-	-	None

a/ Chinook not less than 26 inches (19.5 inches head-off) taken in open seasons south of Cape Falcon may be landed north of Cape Falcon only when the season is closed north of Cape Falcon.
b/ Except minimum size limit of 26 inches total length in the Bodega Bay test fishery.

3. Transit Through Closed Areas with Salmon on Board - It is unlawful for a vessel to have troll gear in the water while transiting any area closed to salmon fishing while possessing salmon.

4. Line, Spread, and Gear Restrictions:

a. Single point, single shank barbless hooks are required.
b. Off **Oregon south of Cape Falcon**, no more than 4 spreads are allowed per line.
Spread defined: A single leader connected to an individual lure or bait.
c. Off **California**, no more than 6 lines are allowed per vessel and barbless **circle** hooks are required when fishing by any means other than trolling.
Circle hook defined: A hook with a generally circular shape and a point which turns inward, pointing directly to the shank at a 90° angle.
Trolling defined: Fishing from a boat or floating device that is making way by means of a source of power, other than drifting by means of the prevailing water current or weather conditions, except when landing fish.

5. Control Zone Definitions **(modified description of Columbia Control Zone for 2000)**:

Columbia Control Zone (same as recreational zone as modified in 1999) - An area at the Columbia River mouth bounded on the west by a line running northeast/southwest between the red lighted Buoy #4 (46°13'35" N/124°06'50" W) and the green lighted Buoy #7 (46°15'09' N/124°06'16" W); on the east by the Buoy #10 line which bears north/south at 357° true from the south jetty at 46°14'00" N/124°03'07" W to its intersection with the north jetty; on the north by a line running northeast/southwest between the green lighted Buoy #7 to the tip of the north jetty (46°14'48" N/124°05'20" W) and then along the north jetty to the point of intersection with the Buoy #10 line; and on the south by a line running northeast/southwest between the red lighted Buoy #4 and tip of the south jetty (46°14'03" N/124°04'05" W) and then along the south jetty to the point of intersection with the Buoy #10 line.

Klamath Control Zone - The ocean area at the Klamath River mouth bounded on the north by 41°38'48" N. (approximately 6 nautical miles north of the Klamath River mouth), on the west by 124°23'00" W. (approximately 12 nautical miles off shore), and on the south by 41°26'48" N (approximately 6 nautical miles south of the Klamath River mouth).

TABLE 1. Council-adopted **non-Indian commercial troll** management measures for ocean salmon fisheries, 2000. (Page 3 of 3)

B. GENERAL REQUIREMENTS, DEFINITIONS, RESTRICTIONS OR EXCEPTIONS (continued)

6. Notification When Unsafe Conditions Prevent Compliance with Regulations: If prevented by unsafe weather conditions or mechanical problems from meeting special management area landing restrictions, vessels must notify the U.S. Coast Guard and receive acknowledgment of such notification prior to leaving the area. This notification shall include the name of the vessel, port where delivery will be made, approximate amount of salmon (by species) on board and the estimated time of arrival. This stipulation will be implemented by state regulations for California, Oregon and Washington, as required.

7. Incidental Halibut Harvest - The operator of a vessel that has been issued an incidental halibut harvest license may retain Pacific halibut caught incidentally in Area 2A, during authorized periods, while trolling for salmon. License applications for incidental harvest must be obtained from the International Pacific Halibut Commission (phone 206/634-1838). Applicants must apply prior to April 1 of each year. Incidental harvest is authorized only during **May and June** troll seasons and after July 31 if quota remains and if announced on the NMFS hotline (phone 800-662-9825). ODFW and WDFW will monitor landings and if they are projected to exceed the 23,490 pound preseason allocation or the Area 2A non-Indian commercial halibut TAC, NMFS will take inseason action to close the incidental halibut fishery.

   License holders may land no more than 1 halibut per each 3 chinook, except 1 halibut may be landed without meeting the ratio requirement, and no more than 35 halibut may be landed per trip. Halibut retained must meet the minimum size limit of 32 inches.

8. Inseason Management - In addition to standard inseason actions or modifications already noted under the season description, the following inseason guidance is provided to NMFS:

   a. In the overall non-Indian commercial chinook quota north of Cape Falcon, 1,000 chinook in the May/June harvest guideline are the result of impacts assessed at the July/August harvest impact rate. Inseason, these 1,000 chinook (or portion thereof) may be transferred to the July/ August harvest guideline at a one-to-one rate if not caught in the May/June fishery. Any chinook remaining in the May/June harvest guideline in excess of 1,000 may be transferred to the July/August harvest guideline on an impact equivalent basis.

   b. At the March 2001 meeting, the Council will consider inseason recommendations to: (1) open commercial seasons for all salmon except coho prior to May 1 in areas off Oregon, and (2) identify the areas, season, quota, and special regulations for any experimental April fisheries (proposals must meet Council protocol and be received in November 2000).

9. Consistent with Council management objectives, the State of Oregon may establish additional late-season, chinook-only fisheries in state waters. Check state regulations for details.

10. For the purposes of CDFG Code, Section 8232.5, the definition of the KMZ for the ocean salmon season shall be that area from Humbug Mt., Oregon to Horse Mt., California.

TABLE 2. Council-adopted **recreational** management measures for ocean salmon fisheries, 2000. (Page 1 of 3)

A. SEASON DESCRIPTION

North of Cape Falcon

Projections and Assumptions:

1. ESA listed species: Snake River fall chinook SRFI of 58% for all ocean fisheries relative to 1988-1993 average (≤70% required).
2. WCVI mortality of 1,200 coho; Southeast Alaska harvest of 150,850 chinook per PST agreement; 1999 Canadian catches as described by Canada in March meeting with PFMC managers; WCVI troll catch of 72,000 chinook includes 56,000 chinook in the fall of 1999.
3. Neah Bay/La Push agreed coho allocation of 80%/20% adjusted for Area 4B add-on.
4. Area 4B add-on fishery of 6,000 coho (chinook nonretention) opens later of ocean closure or Aug. 28.
5. Buoy 10 fishery opens Aug. 1 with an expected landed catch of 32,400 coho in Aug. and 22,500 coho in Sept. All retained coho must have an adipose fin clip.
6. Overall non-Indian TAC: 25,000 chinook; 100,000 coho. (No trade)
7. Recreational TAC: 12,500 chinook and fishery impacts of a landed catch of 75,000 hatchery coho with healed adipose fin clips.

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U.S.-Canada Border to Cape Alava (Neah Bay)

• July 3 thru earlier of Sept. 30 (7 days per week) or 6,900 coho subarea quota. All salmon, see note below concerning Area 4B. 2 fish per day, but only 1 chinook and all retained coho must have a healed adipose fin clip. Inseason management may be used to maintain season length and keep harvest within a guideline of 500 chinook.

Note: While ocean fishery is open in Area 4, no retention of chinook is allowed in Area 4B.

Cape Alava to Queets River (La Push)

• July 3 thru earlier of Sept. 30 (7 days per week) or 1,700 coho subarea quota. All salmon. 2 fish per day, but only 1 chinook. All retained coho must have a healed adipose fin clip. Inseason management may be used to maintain season length and keep harvest within a guideline of 300 chinook.

Queets River to Leadbetter Pt. (Westport)

• Sun. thru Thurs. July 3 thru earlier of Sept. 30 or 28,900 coho subarea quota. All salmon. 2 fish per day, but only 1 chinook. All retained coho must have a healed adipose fin clip. Closed thru Thurs., Aug. 10 inside the area defined by a line drawn from the lighthouse to Buoy 2 to Buoy 3 to the Grays Harbor north jetty. Inseason management may be used to maintain season length and limit harvest within a guideline of 7,400 chinook.

Leadbetter Pt. to Cape Falcon (Columbia River)

• Sun. thru Thurs. July 10 thru earlier of Sept. 30 or 37,500 coho subarea quota. All salmon. 2 fish per day, but only 1 chinook. All retained coho must have a healed adipose fin clip. **Coho retention is prohibited** between Tillamook Head and Cape Falcon beginning Aug. 1 (i.e., all salmon except coho and a daily bag limit of 1 chinook). Closed in Recreational Columbia Control Zone (newly defined in 1999, see B.6.). Inseason management may be used to maintain season length and limit harvest within a guideline of 4,300 chinook.

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South of Cape Falcon

Projections and Assumptions:

1. ESA listed species:
   OCN coho total incidental marine and freshwater harvest impact of 8.2% (limit of ≤15%);
   Rogue/Klamath coho total incidental marine harvest impact of 6.0% (limit of ≤13%);
   Sacramento winter chinook age-3 adult spawner increase of 31.0 % in mean brood replacement rate (goal ≥31%).
2. Klamath River fall chinook:
   50% of harvestable surplus (28,200 fish) for tribes with federally recognized fishing rights (Hoopa Valley; Yurok);
   13.8% age-4 ocean harvest rate;
   35,000 natural spawners (floor = 35,000);
   15% of non-Indian impacts to Klamath River sport fishery;
   17% of ocean impacts to KMZ ocean sport fishery.

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TABLE 2. Council-adopted **recreational** management measures for ocean salmon fisheries, 2000. (Page 2 of 3)

A. SEASON DESCRIPTION (Continued)

South of Cape Falcon

Cape Falcon to Humbug Mt

• Except as provided below during the selective fishery, the season will be: Apr. 1 thru Oct. 31. All salmon except coho. 2 fish per day. No more than 6 fish in 7 consecutive days. Legal gear limited to artificial lures and plugs of any size, or bait no less than 6 inches long (excluding hooks and swivels). All gear must have no more than 2 single point, single shank barbless hooks. Divers are prohibited and flashers may be used only with downriggers. See Oregon State regulations for a description of a closure at the mouth of Tillamook Bay.

Selective fishery for marked hatchery coho (healed adipose fin clip) :

• Sun., Tue., Wed., Thur., and Sat. of each week, July 1 thru earlier of July 31 or a landed catch of 20,000 coho. All salmon. 2 fish per day, all retained coho must have a healed adipose fin clip. No more than 6 fish in 7 consecutive days. No special gear restrictions except all gear must have no more than 2 single point, single shank barbless hooks. Open days may be adjusted to utilize the available quota. **Note:** On closed days during the selective fishery, no angling for any species of salmon is allowed. The all-salmon-except-coho season reopens the earlier of Aug. 1 or attainment of the coho quota.

Humbug Mt. to Horse Mt.

• May 27 thru July 6, one fish per day; and July 29 thru Sept. 10, two fish per day. All salmon except coho. No more than 4 fish in 7 consecutive days. Klamath Control Zone (B.6.) closed. Gear restrictions B.4. and B.5.a. apply (one rod per angler and no more than 2 hooks).

Horse Mt. to Pt. Arena

• Feb. 12 thru July 6 and July 22 thru Nov. 12. All salmon except coho. 2 fish per day. Minimum size limit 24 inches thru May 31 and 20 inches thereafter. Gear restrictions B.4., B.5.a., and B.5.b. apply (one rod per angler; no more than 2 hooks; circle hooks required when fishing by any means other than trolling).

In 2001, season opens Feb. 17 (nearest Sat. to Feb. 15) for all salmon except coho. 2 fish per day, 24 inch minimum size limit and the same gear restrictions as in 2000.

Pt. Arena to Pigeon Pt.

• Apr. 15 thru Nov. 5. All salmon except coho. 2 fish per day. Minimum size limit 24 inches thru May 31 and 20 inches thereafter. Gear restrictions B.4., B.5.a., and B.5.b. apply (one rod per angler; no more than 2 hooks; circle hooks required when fishing by any means other than trolling).

In 2001, the season will open Apr. 14 for all salmon except coho. 2 fish per day, 24 inch minimum size limit and the same gear restrictions as in 2000.

Pigeon Pt. to U.S.-Mexico Border

• Apr. 1 thru Oct. 1. All salmon except coho. 2 fish per day. Minimum size limit 24 inches thru May 31 and 20 inches thereafter. North of Pt. Conception, gear restrictions B.4., B.5.a., and B.5.b. apply (one rod per angler; no more than 2 hooks; circle hooks required when fishing by any means other than trolling).

In 2001, season opens March 31 for all salmon except coho, 2 fish per day, 24 inch minimum size limit and the same gear restrictions as in 2000.

B. GENERAL REQUIREMENTS, DEFINITIONS, RESTRICTIONS OR EXCEPTIONS

1. Compliance with Minimum Size or Other Special Restrictions - All salmon on board a vessel must meet the minimum size or other special requirements for the area being fished . Salmon may be landed in an area that is closed only if they meet the minimum size or other special requirements for the area in which they were caught.

2. Minimum size limits (total length in inches) when areas are open:

Area (when open)	Chinook	Coho	Pink
North of Cape Falcon	24.0	16.0	None
Cape Falcon to Horse Mt.	20.0	16.0	None, except 20.0 off CA
South of Horse Mt.*	20.0*	-	20.0

* **Except** 24.0 inches from opening day thru May 31.

3. Hooks: Single point, single shank barbless hooks are required for all fishing gear north of Pt. Conception, California. ODFW regulations in the state-water fishery off Tillamook Bay may allow the use of barbed hooks to be consistent with inside regulations.

TABLE 2. Council-adopted **recreational** management measures for ocean salmon fisheries, 2000. (Page 3 of 3)

B. GENERAL REQUIREMENTS, DEFINITIONS, RESTRICTIONS OR EXCEPTIONS (Continued)

4. Restriction on Number of Fishing Rods North of Pt. Conception, California: All persons fishing for salmon, and all persons fishing from a boat with salmon on board, may use no more than one rod per angler.

5. Special Gear Restrictions off California:

   a. California North of Pt. Conception: All persons fishing for salmon, and all persons fishing from a boat with salmon on board, must use no more than 2 single point, single shank barbless hooks.
   (New for 2000)

   b. Between Horse Mt. and Pt. Conception, California: Single point, single shank, barbless **circle** hooks must be used if angling by any means other than trolling and no more than 2 such hooks shall be used. When angling with 2 hooks, the distance between the hooks must not exceed 5 inches when measured from the top of the eye of the top hook to the inner base of the curve of the lower hook, and both hooks must be permanently tied in place (hard tied). Circle hooks are not required when artificial lures are used without bait.

   Circle hook defined: A hook with a generally circular shape and a point which turns inward, pointing directly to the shank at a 90° angle.
   Trolling defined: Angling from a boat or floating device that is making way by means of a source of power, other than drifting by means of the prevailing water current or weather conditions, except when landing a fish.

6. Control Zone Definitions:

   Columbia Recreational Control Zone (modified in 1999) - An area at the Columbia River mouth bounded on the west by a line running northeast/southwest between the red lighted Buoy #4 (46°13'35" N/124°06'50" W) and the green lighted Buoy #7 (46°15'09' N/124°06'16" W); on the east by the Buoy #10 line which bears north/south at 357° true from the south jetty at 46°14'00" N/124°03'07" W to its intersection with the north jetty; on the north by a line running northeast/southwest between the green lighted Buoy #7 to the tip of the north jetty (46°14'48" N/124°05'20" W) and then along the north jetty to the point of intersection with the Buoy #10 line; and on the south by a line running northeast/southwest between the red lighted Buoy #4 and the tip of the south jetty (46°14'03" N/124°04'05" W) and then along the south jetty to the point of intersection with the Buoy #10 line.

   Klamath Control Zone - The ocean area at the Klamath River mouth bounded on the north by 41°38'48" N (approximately 6 nautical miles north of the Klamath River mouth), on the west by 124°23'00" W (approximately 12 nautical miles off shore), and on the south by 41°26'48" N (approximately 6 nautical miles south of the Klamath River mouth).

7. Inseason Management: Regulatory modifications may become necessary inseason to meet preseason management objectives such as quotas, harvest guidelines and season duration. Actions could include modifications to bag limits or days open to fishing, and extensions or reductions in areas open to fishing. NMFS may transfer coho inseason among recreational subareas North of Cape Falcon to help meet the recreational season duration objectives (for each subarea) after conferring with representatives of the affected ports and the Salmon Advisory Subpanel recreational representatives north of Cape Falcon.

   At the March 2001 meeting, the Council will consider an inseason recommendation to open seasons for all salmon except coho prior to May 1 in areas off Oregon.

8. Additional Seasons in State Territorial Waters: Consistent with Council management objectives, the states of Washington and Oregon may establish limited seasons in state waters. Oregon state-water fisheries are limited to chinook salmon. Check state regulations for details.

TABLE 3. Council-adopted **treaty Indian** ocean troll salmon fishery management measures, 2000. (Page 1 of 1)

Tribe and Area Boundaries[a/]	Open Seasons	Salmon Species	Minimum Size Limit (inches)[b/] Chinook	Coho	Special Restrictions by Area
S'KLALLAM - Washington State Statistical Area 4B (All)	May 1 thru earlier of June 30 or chinook quota.[c/]	All except coho	24	-	Barbless hooks. No more than 8 fixed lines per boat; 72 hook maximum per boat.
	Aug. 1 thru earliest of Sept. 15 or chinook or coho quota.[c/]	All	24	16	
MAKAH - Washington State Statistical Area 4B and that portion of the FMA north of 48°02'15" N (Norwegian Memorial) and east of 125°44'00" W.	May 1 thru earlier of June 30 or chinook quota.[c/]	All except coho	24	-	Barbless hooks. No more than 8 fixed lines per boat or no more than 4 hand-held lines per person.
	Aug. 1 thru earliest of Sept. 15 or chinook or coho quota[c/]	All	24	16	
QUILEUTE - That portion of the FMA between 48°07'36" N (Sand Pt.) and 47°31'42" N (Queets River)	May 1 thru earlier of June 30 or chinook quota.[c/]	All except coho	24	-	Barbless hooks. No more than 8 fixed lines per boat.[d/]
	Aug. 1 thru earliest of Sept. 15 or chinook or coho quota.[c/]	All	24	16	
HOH - That portion of the FMA between 47°54'18" N (Quillayute River) and 47°21'00" N (Quinault River)	May 1 thru earlier of June 30 or chinook quota.[c/]	All except coho	24	-	Barbless hooks. No more than 8 fixed lines per boat.[d/]
	Aug. 1 thru earliest of Sept. 15 or chinook or coho quota[c/]	All	24	16	
QUINAULT - That portion of the FMA between 47°40'06" N (Destruction Island) and 46°53'18" N (Point Chehalis)	May 1 thru earlier of June 30 or chinook quota.[c/]	All except coho	24	-	Barbless hooks. No more than 8 fixed lines per boat.[d/]
	Aug. 1 thru earliest of Sept. 15 or chinook or coho quota[c/]	All	24	16	

a/ All boundaries may be changed to include such other areas as may hereafter be authorized by a federal court for that tribe's treaty fishery.

b/ Applicable lengths, in inches, for dressed, head-off salmon, are 18 inches for chinook and 12 inches for coho. Minimum size and retention limits for ceremonial and subsistence harvest are as follows:
Makah Tribe - None
Quileute, Hoh and Quinault tribes - Not more than 2 chinook longer than 24 inches in total length may be retained per day. Chinook less than 24 inches total length may be retained.

c/ The overall treaty troll ocean quotas are 25,500 chinook and 20,000 coho. The overall chinook quota is divided into 20,000 chinook for the May-June chinook-directed fishery and 5,500 chinook for the Aug.-Sept. all-salmon season. If the chinook quota for the May-June fishery is not fully utilized, the excess fish must not be transferred into the later all-salmon season. The quotas include troll catches by the S'Klallam and Makah tribes in Washington State Statistical Area 4B from May 1 thru Sept. 30.

d/ The area within a 6-mile radius of the mouths of the Queets River (47°31'42" N) and the Hoh River (47°45'12" N) will be closed to commercial fishing. A closure within 2 miles of the mouth of the Quinault River (47°21'00" N) may be enacted by the Quinault Nation and/or the State of Washington and will not adversely affect the Secretary of Commerce's management regime.

TABLE 4. Chinook and coho **harvest quotas and guidelines (*)** for ocean salmon fisheries, 2000 (thousands of fish).
(Page 1 of 1)

Fishery or Quota Designation	Chinook	Coho
NORTH OF CAPE FALCON		
TREATY INDIAN COMMERCIAL TROLL[a/]		
May/June (all except coho)	20.0	-
Aug./Sept. (all salmon)	5.5	20.0
Total	25.5	20.0
NON-INDIAN COMMERCIAL TROLL		
Canada to Cape Falcon (May/June)	11.0*	-
Queets River to Cape Falcon (July-Sept.)[b/]	1.5*	25.0
Subtotal Non-Indian Commercial Troll	12.5	25.0
RECREATIONAL (selective coho fishery)[b/]		
U.S.-Canada Border to Cape Alava[c/]	0.5*	6.6
Cape Alava to Queets River[c/]	0.3*	1.7
Queets River to Leadbetter Pt.[c/]	7.4*	29.2
Leadbetter Pt. to Cape Falcon[c/]	4.3*	37.5
Subtotal Recreational	12.5	75.0
TOTAL NORTH OF CAPE FALCON	50.5	120.0
SOUTH OF CAPE FALCON		
COMMERCIAL TROLL (all except coho)		
Sisters Rock to Mack Arch (Aug.)	1.3	
House Rock to Humboldt S. Jetty (Sept.)	7.0	
Fort Ross to Pt. Reyes (July test fishery)	4.5	
Subtotal Troll	12.8	
RECREATIONAL (selective coho fishery)		
Cape Falcon to Humbug Mt.[b/]	-	20.0
TOTAL SOUTH OF CAPE FALCON	12.8	20.0

a/ For the Makah encounter rate study, legal sized fish retained in open periods will be included in the tribal quota. Chinook not taken during the May/June fishery are not to be added to the quota for the Aug./Sept. fishery.

b/ Selective fisheries for marked hatchery coho (healed adipose fin clip).

c/ The subarea chinook harvest is a guideline. The fisheries are restrained by the overall chinook quota north of Cape Falcon. The coho quota is a landed catch of marked hatchery coho (healed adipose fin clip).

TABLE 5. Projected key stock escapements (thousands of fish) or management criteria for fishery measures, 2000.[a/] (Page 1 of 1)

Key Stock/Criteria	Ocean Escapement or Other Criteria[b/]	Objective or Comparative Criteria	
CHINOOK			
Upper Columbia River Brights	207.9	57.3	Ocean escapement[c/]
Mid-Columbia Brights	62..2	-	Information only
Lower Columbia River Hatchery Tules	26.4	22.8	Ocean escapement[d/]
Lewis River Wild (threatened)	2.7	5.7	MSY spawner goal[e/]
Spring Creek Hatchery Tules	26.9	11.1	Ocean escapement[f/]
Snake River Fall (threatened) SRFI	0.58	≤0.70	Exploitation rate for all ocean fisheries[a/ g/]
Klamath River Fall	35.0	35.0	Floor level natural spawner objective
Adult spawner escapement rate	47.0%	33-34%	Minimum rate
Tribal/nontribal allocation	50/50	50/50	Required allocation
Age 4 ocean harvest rate	13.8%	≤17.0%	Requirement for threatened California coastal chinook[g/]
KMZ sport fishery	17.0%	17.0%	KFMC allocation agreement
CA/OR Split	57/43	-	Council agreement for 2000
River recreational fishery	15.0%	15.0%	California Fish and Game Commission
Sacramento River Winter (endangered)	31.0%	≥31.0%	Increase in age 3 replacement rate[g/]
Sacramento River Fall	270.0	122-180	Natural and hatchery spawners
COHO			
PUGET SOUND NATURAL:			
Skagit	24.7	30.0	MSP level of adult spawners (not annual target)[h/]
Stillaguamish	15.0	17.0	"
Snohomish	44.9	70.0	"
Hood Canal	50.4	21.5	"
Strait of Juan de Fuca	11.2	12.8	"
COASTAL NATURAL:			
Quillayute Fall	8.2	6.3-15.8	MSY adult spawner range (not annual target)[h/]
Hoh	3.3	2.0-5.0	"
Queets: Wild	2.5	5.8-14.5	"
Supplemental	0.7	-	
Grays Harbor	44.2	35.4	MSP level of adult spawners (not annual target)[h/]
Oregon Coastal Natural (threatened)	8.2%	≤15%	Marine and freshwater exploitation rate[g/]
Northern California (threatened)	6.0%	≤13%	Surrogate R/K hatchery coho marine exploitation rate[g/]
HATCHERY:			
Columbia River Early	219.1	38.7	Ocean escapement[i/]
Columbia River Late	172.9	19.4	Ocean escapement[i/]

a/ Projections in the table assume a WCVI mortality of 1,200 coho; Southeast Alaska harvest of 150,850 chinook per PST agreement; 1999 Canadian catches as described by Canada in March meeting with PFMC managers; WCVI troll catch of 72,000 chinook includes 56,000 chinook in the fall of 1999.

b/ Ocean escapement is the number of salmon escaping ocean fisheries and entering freshwater with the following clarifications. Ocean escapement for Puget Sound stocks is the estimated number of salmon entering Area 4B that are available to U.S. net fisheries in Puget Sound and spawner escapement after impacts from the Canadian, U.S. ocean, and Puget Sound troll and recreational fisheries have been deducted. For Columbia River early and late coho stocks, ocean escapement represents the number of coho after the Buoy 10 fishery. The escapement numbers provided for OCN coho are spawners in SRS accounting.

c/ Minimum to attain 43,500 adults over McNary Dam, with normal distribution and no mainstem harvest.

d/ Minimum to attain 13,900 adults for hatchery egg-take, with normal distribution and no lower river mainstem or tributary harvest.

e/ ESA guidance met by a total adult equivalent ocean fishery exploitation rate of no more than 0.65 on Coweeman tules.

f/ Minimum to achieve 7,000 adults for Spring Creek Hatchery egg-take, assuming normal distribution and no mainstem harvest.

g/ ESA guidance or jeopardy standard. Based on guidance from NMFS and the Oregon Fish and Game Commission, the Council's goal for 2000 was to limit impacts on OCN coho to no more than 8.7%.

h/ Criteria are maximum sustainable production (MSP) and maximum sustainable yield (MSY) objectives. The annual management objectives may be different and are subject to agreement between WDFW and the treaty tribes.

i/ Minimum to attain hatchery egg-take goals of 19,600 early and 15,200 late adult coho, with average distribution patterns and no mainstem or tributary fisheries.

TABLE 6. Projections of chinook and coho harvest impacts for ocean salmon fishery management measures, 2000. (NA = not available) (Page 1 of 1)

Area and Fishery	2000 Catch Projection	2000 Bycatch Mortality[a/] Projection	Observed in 1999 Catch	Observed in 1999 Bycatch Mortality
OCEAN FISHERIES:[b/]		**CHINOOK (thousands of fish)**		
NORTH OF CAPE FALCON				
Treaty Commercial Troll	25.5	7.0	27.4	NA
Non-Indian Commercial Troll	12.5	2.6	17.5	NA
Recreational	12.5	1.6	9.9	NA
CAPE FALCON TO HUMBUG MT.				
Commercial Troll	157.8	NA	61.0	NA
Recreational	4.2	NA	3.3	NA
HUMBUG MT. TO HORSE MT.				
Commercial Troll	11.4	NA	3.9	NA
Recreational	15.9	NA	9.6	NA
SOUTH OF HORSE MT.				
Commercial	351.4	NA	262.0	NA
Recreational	159.1	NA	81.4	NA
TOTAL OCEAN FISHERIES				
Commercial Troll	558.6	NA	371.8	
Recreational	191.7	NA	104.2	NA
INSIDE FISHERIES:				
Area 4B Add-On	0.0	<0.05	-	NA
Buoy 10	11.0	NA	9.9	NA
OCEAN FISHERIES:		**COHO (thousands of fish)**		
NORTH OF CAPE FALCON				
Treaty Commercial Troll	20.0	1.1	33.4	NA
Non-Indian Commercial Troll[c/]	25.0*	5.7	3.8	NA
Recreational[c/]	75.0*	8.9	47.7	6.9
SOUTH OF CAPE FALCON				
Commercial Troll	0.0	12.7	0.0	3.6
Recreational[c/]	20.0*	8.3	6.7	4.8
TOTAL OCEAN FISHERIES				
Commercial Troll	45.0	19.5	37.2	3.6
Recreational[c/]	95.0*	17.2	54.4	11.7
INSIDE FISHERIES:				
Area 4B Add-On[c/]	6.0*	1.8	0.0	NA
Buoy 10[c/]	54.9*	5.2	8.9	0.8

a/ The bycatch mortality reported in this table consists of hook-and-release and drop-off mortality of chinook and coho salmon in fisheries which have minimum size limits or special species retention restrictions (e.g., all-salmon-except-coho or all-salmon-except-chinook seasons, or selective fisheries for marked coho). In general, the bycatch mortality rate parameters used by the Council for both chinook and coho in fisheries using barbless hooks are:
Commercial - 26% of fish hooked-and-released plus 5% of total encounters (drop-off, predation, noncompliance, etc.).
Sport north of Pt. Arena - 14% of fish hooked-and-released plus 5% of total encounters (drop-off, etc.).
Sport south of Pt. Arena - 23.2% (weighted average of California style mooching and trolling) of fish hooked-and-released plus 5% of total encounters (drop-off, etc.).

b/ Includes Oregon territorial water, late season chinook fisheries.

c/ Selective fishery, marked by an asterisk (*), which allows only retention of hatchery coho with a healed adipose fin clip.

TABLE 7. Expected coastwide Oregon coastal natural (OCN) and Rogue/Klamath (RK) coho harvest mortality and exploitation rates by fishery for Council-adopted 2000 fisheries. (Page 1 of 1)[a/]

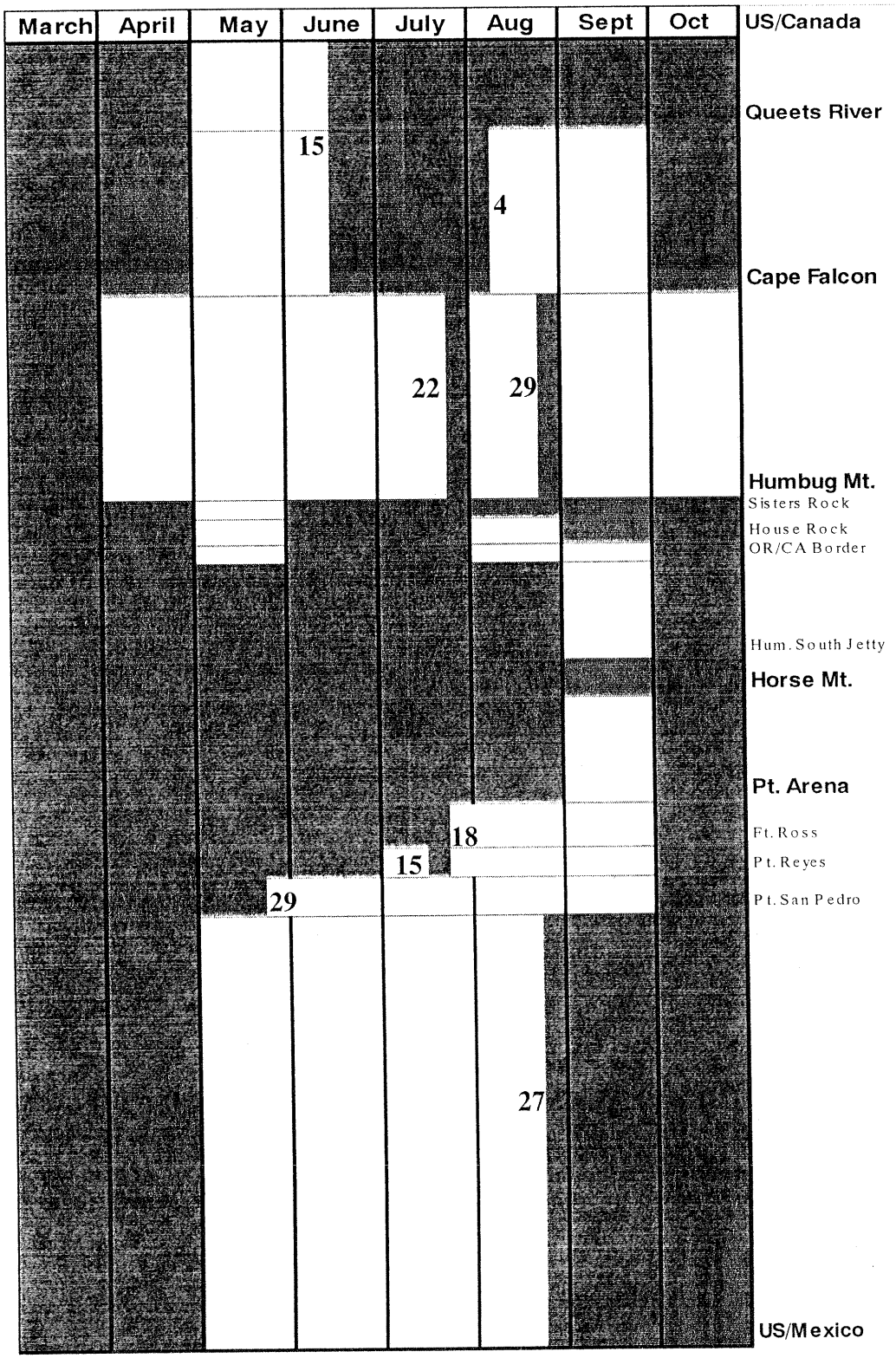
Fishery	Harvest Mortality and Exploitation Rate			
	OCN		RK	
	Number	Percent	Number	Percent
SOUTHEAST ALASKA	16	0.03	0	0.00
BRITISH COLUMBIA	2	0.00	0	0.00
PUGET SOUND/STRAITS	110	0.21	0	0.00
NORTH OF CAPE FALCON				
Treaty Indian Troll	106	0.20	0	0.00
Recreational	281	0.53	7	0.04
Non-Indian Troll	215	0.41	0	0.00
SOUTH OF CAPE FALCON				
Recreational:				
Cape Falcon to Humbug Mt.[b/]	472	0.89	13	0.07
Humbug Mt. to Horse Mt. (KMZ)	469	0.89	512	2.87
Fort Bragg	281	0.53	259	1.45
South of Pt. Arena	381	0.72	70	0.39
Troll:				
Cape Falcon to Humbug Mt.	942	1.79	17	0.09
Humbug Mt. to Horse Mt. (KMZ)	69	0.13	85	0.48
Fort Bragg	8	0.02	16	0.09
South of Pt. Arena	392	0.74	66	0.37
BUOY 10	102	0.19	20	0.11
ESTUARY/FRESHWATER	494	0.94	---	---
TOTAL	4,340	8.23	1,065	5.97
1999 Total	4,996	8.73	1,571	4.90

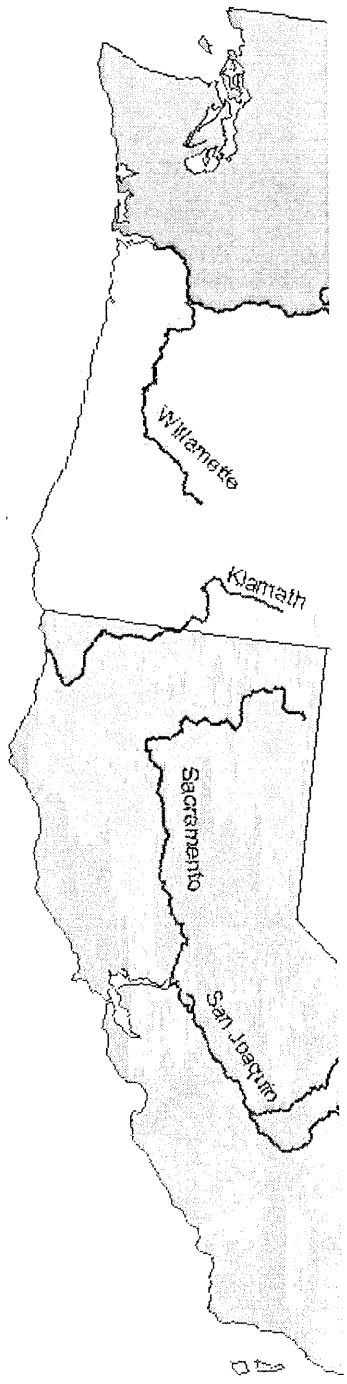
a/ OCN adult spawners (SRS accounting): 1999 observed = 46,764; 2000 projection = 48,764.
b/ Under a 15,000 marked coho quota for the July selective fishery off central Oregon (rather than 25,000), the total impacts are 8.07% and 5.95% for OCN and RK coho, respectively.

TABLE 8. Expected mark rates for Council-adopted selective coho fisheries, 2000. (Page 1 of 1)

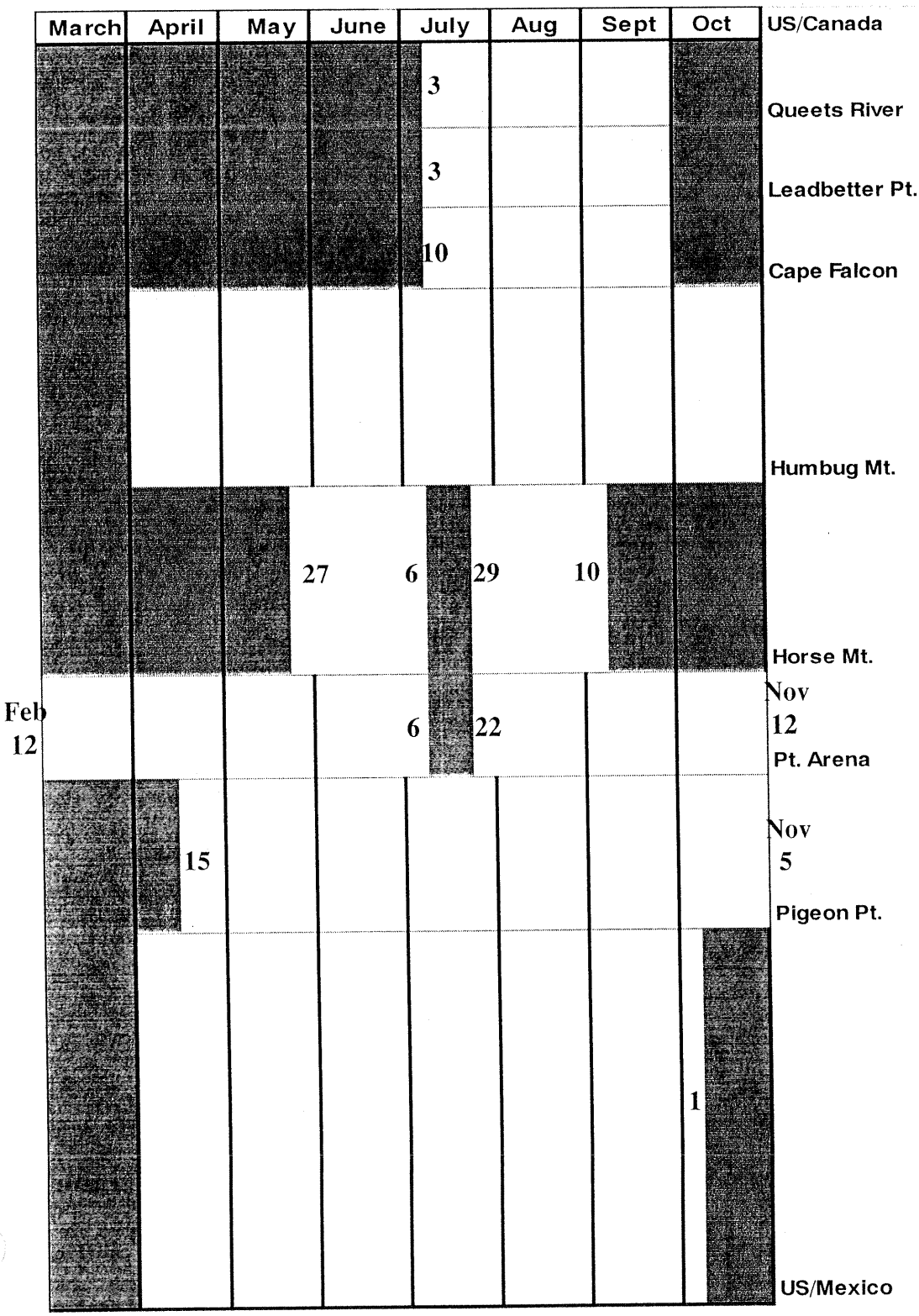
Area	Fishery	July	August	September	1999 Observed
North of Cape Falcon					
Neah Bay (Area 4)	Recreational	57.3%	48.2%	58.5%	26%
	Non-Indian Troll	54.7%	47.9%	-	-
La Push (Area 3)	Recreational	77.1%	62.4%	56.8%	40%
	Non-Indian Troll	59.1%	58.5%	-	-
Westport (Area 2)	Recreational	79.4%	77.5%	73.5%	60%
	Non-Indian Troll	67.9%	70.6%	-	-
Columbia River (Area 1)	Recreational	87.9%	87.0%	85.7%	78%
	Non-Indian Troll	81.9%	85.0%	-	-
Buoy 10	Recreational	-	88.2%	89.8%	79%
South of Cape Falcon					
Cape Falcon to Humbug Mt.	Recreational	80.6%	72.6%	-	62%
Tillamook	Recreational	83.7%	76.1%	-	-
Newport	Recreational	80.1%	73.2%	-	-
Coos Bay	Recreational	79.4%	66.5%	-	-

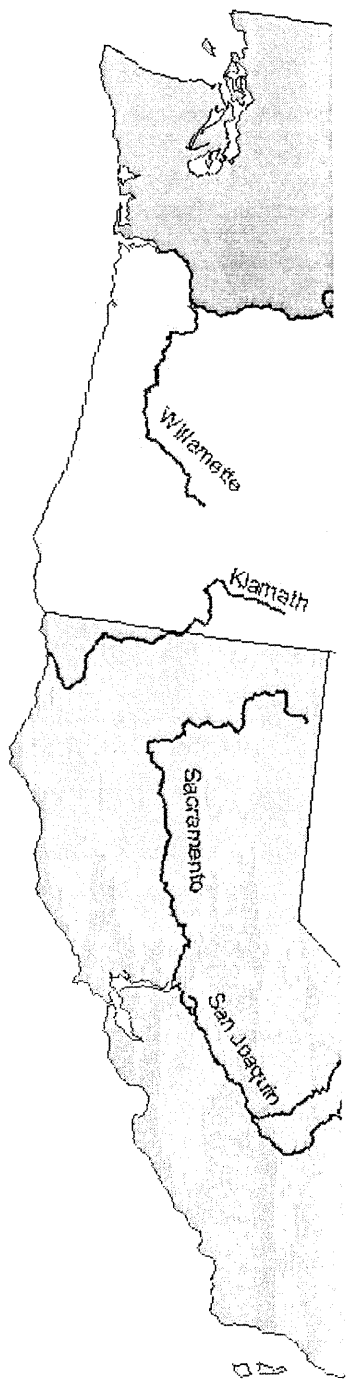
2000 Commercial Seasons

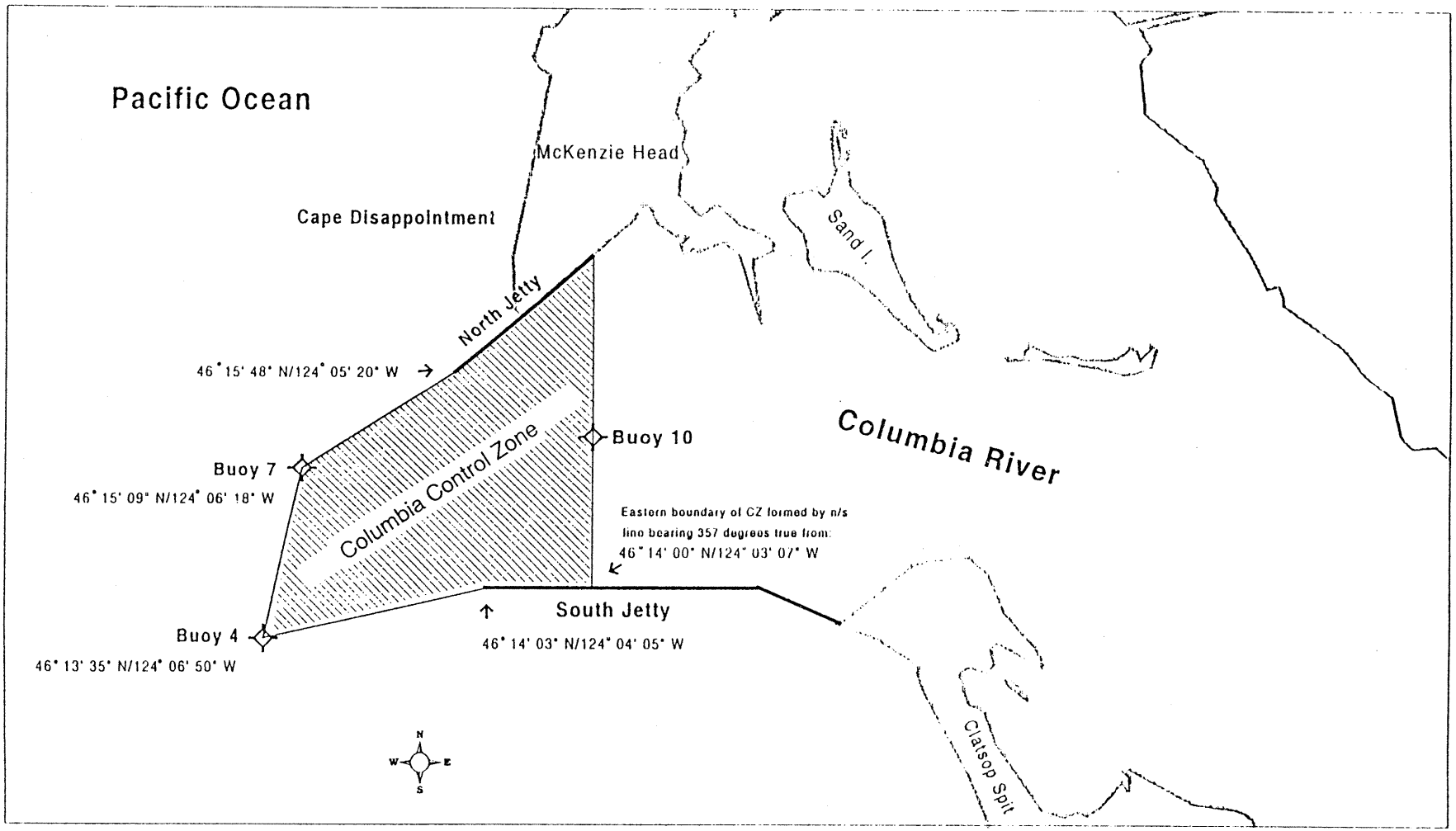




2000 Recreational Seasons







COLUMBIA CONTROL ZONE

FINAL ACTION ON 2000 MANAGEMENT MEASURES

Situation: The Salmon Technical Team (STT) will briefly review its analysis of the tentative management measures and answer Council questions. Final adoption of management measures, including fishing gear definitions (Attachment C.4.a. from EXHIBIT C.4., or as modified) and incidental troll-caught halibut harvest restrictions, will follow the comments of the advisors, tribes, agencies, and public.

This action is for submission to the U.S. Secretary of Commerce and the final motions must be visible in writing. To avoid unnecessary delay and confusion in proposing final regulations, minor edits may be made to the STT analysis and other documents provided by the staff. If major deviations from existing documents are anticipated, Council members should be prepared to provide a written motion that can be projected on a screen or quickly photocopied. Please prepare your motion documents or advise Council staff of the need for, or existence of, additional working documents as early as possible before the final vote.

Council Action:

1. **Adopt final treaty Indian commercial troll and non-Indian commercial troll and recreational ocean salmon fishery management measures, including definitions for recreational and non-Indian commercial troll fishing gear, and restrictions for incidental troll-caught halibut, for submission to the U.S. Secretary of Commerce. *(Motions must be visible in writing prior to vote.)***
2. **Authorize Council staff, National Marine Fisheries Service, and STT to draft and revise the necessary documents to allow implementation of the recommendations in accordance with Council intent.**

Reference Materials:

1. STT Analysis of Tentative 2000 Ocean Salmon Fishery Management Measures (Supplemental STT Report C.6.).
2. Definitions of Fishing Gear (Attachment C.4.a. from EXHIBIT C.4.).

PFMC
03/21/00

SALMON TECHNICAL TEAM

ANALYSIS OF TENTATIVE SALMON MANAGEMENT MEASURES FOR 2000 OCEAN FISHERIES

April 6, 2000


Cape Flattery
Cape Alava
Carroll Island
Destruction Island
Queets River
Copalis Head
WASHINGTON
Leadbetter Point
Westport
Willapa Bay
Columbia River
Tillamook Head
Astoria
Cape Falcon
Garibaldi
Cascade Head
Newport
Heceta Head
Heceta Banks
Florence
Coos Bay
Cape Arago
OREGON
Cape Blanco
Humbug Mountain
Port Orford
Sisters Rocks
Gold Beach
Mack Arch
House Rock
Brookings
KMZ AREA
Crescent City
Klamath River
Humboldt South Jetty
Eureka
Horse Mountain
Bruhel Pt.
Fort Bragg
Navarro Head
Point Arena
Fort Ross
Bodega Head
Bodega Bay
Point Reyes
San Francisco
Point San Pedro
Pillar Pt.
Pigeon Pt.
Santa Cruz
Monterey
Point Sur
CALIFORNIA
Point Lopez
Pt. Piedras Blancas
Morro Bay
Point Conception
Santa Barbara
Pitas Pt.
Point Mugu
Los Angeles
San Diego

TABLE 1. **Tentative, non-Indian commercial troll** management measures analyzed by the STT for ocean salmon fisheries, 2000. (Page 1 of 3)

A. SEASON DESCRIPTION

North of Cape Falcon

Projections and Assumptions:

1. ESA listed species: Snake River fall chinook SRFI of 58% for all ocean fisheries relative to 1988-1993 average (≤70% required).
2. WCVI mortality of 1,200 coho; Southeast Alaska harvest of 150,850 chinook per PST agreement; 1999 Canadian catches as described by Canada in March meeting with PFMC managers; WCVI troll catch of 72,000 chinook includes 56,000 chinook in the fall of 1999.
3. Treaty Indian commercial ocean troll quotas of: 25,500 chinook (20,000 for May/June; maximum of 5,500 for all-salmon season Aug.-Sept. 15); 20,000 coho.
4. Overall non-Indian TAC: 25,000 chinook; 100,000 coho. (No trade)
5. Non-Indian Troll TAC: 12,500 chinook and selective fishery impacts of a landed catch of 25,000 marked hatchery coho.

U.S.-Canada Border to Cape Falcon

• May 1 thru earlier of June 15 or 11,000 chinook guideline (see B.8.a.). All salmon except coho. Columbia Control Zone is closed (see B.5. for description of newly defined area for 2000 which is the same as the recreational control zone instituted in 1999). Inseason actions may modify harvest guidelines in later fisheries to achieve or prevent exceeding the overall allowable troll harvest impacts.

Queets River to Cape Falcon

• Aug. 4 thru earliest of Sept. 30 or the overall chinook quota (preseason 1,500 chinook guideline; see B.8.a.) or 25,000 marked coho quota. All salmon (all retained coho must have a healed adipose fin clip). Cycle of 4 days open/3 days closed. Each vessel may possess, land, and deliver no more than 50 chinook per open period. However, no possession or landing restrictions will apply if the initial chinook harvest guideline is at least 2,500 chinook as a result of the transfer of uncaught harvest from the May/June fishery. Trip limits, gear restrictions, and harvest guidelines may be instituted or adjusted inseason. Vessels must land and deliver their fish within 24 hours of any closure of this fishery within the area or adjacent closed area. Columbia River Control Zone is closed (see B.5. for description of newly defined area for 2000 which is the same as the recreational control zone instituted in 1999).

South of Cape Falcon

Projections and Assumptions:

1. ESA listed species:
   OCN coho total incidental marine and freshwater harvest impact of 8.4% (limit of ≤15%);
   Rogue/Klamath hatchery coho total incidental marine harvest impact of 6.0% (limit of ≤13%);
   Sacramento winter chinook age-3 adult spawner increase of 31.0% in mean brood replacement rate (goal ≥31%).
2. Klamath River fall chinook:
   50% of harvestable surplus (28,200 fish) for tribes with federally recognized fishing rights (Hoopa Valley; Yurok);
   13.8% age-4 ocean harvest rate;
   35,000 natural spawners (floor = 35,000);
   15% of non-Indian impacts to Klamath River sport fishery;
   57/43 CA/OR sharing of age-4 ocean harvest outside the KMZ sport fishery for 2000;
   17% of ocean impacts to KMZ ocean sport fishery.

Cape Falcon to Humbug Mt.

• Apr. 1 thru July 22; Aug. 1 thru Aug. 29; and Sept. 1 thru Oct. 31. All salmon except coho. See Oregon State regulations for a description of the closed area at the mouth of Tillamook Bay. [**Note:** Incidental retention of halibut is not allowed during April.]

Humbug Mt. to OR-CA Border

• May 1 thru May 31. All salmon except coho.

Sisters Rocks to Oregon-California Border

• Aug. 1 thru earlier of Aug. 31 or 1,300 chinook quota. All salmon except coho. Possession and landing limit of 30 fish per day. All salmon must be landed and delivered to Gold Beach, Port Orford or Brookings within 24 hours of closure.

House Rock, OR to Humboldt South Jetty

• Sept. 1 thru earlier of Sept. 30 or 7,000 chinook quota. All salmon except coho. Possession and landing limit of 30 fish per day. All fish caught in this area must be landed within the area. Klamath Control Zone closed (see B.5.). Within the 7,000 chinook quota is a harvest guideline limiting landings at the port of Brookings to no more than 1,000 chinook. If this guideline is reached prior to the overall quota, the fishery will close north of the Oregon-California border. When the fishery is closed north of the Oregon-California border and open to the south, Oregon State regulations provide for the following action: Vessels with fish on board caught in the open area off California may seek temporary mooring in Brookings, Oregon prior to landing in California only if such vessels first notify the Chetco River Coast Guard Station via VHF channel 22A between the hours of 0500 and 2200 and provide the vessel name, number of fish on board, and estimated time of arrival.

TABLE 1. **Tentative, non-Indian commercial troll** management measures analyzed by the STT for ocean salmon fisheries, 2000. (Page 2 of 3)

A. SEASON DESCRIPTION (Continued)

Horse Mt. to Pt. Arena (Fort Bragg)
• Sept. 1 thru Sept. 30. All salmon except coho.

Pt. Arena to Pt. Reyes (Bodega Bay)
• July 18 thru Sept. 30. All salmon except coho. Minimum size limit 27 inches.

Fort Ross to Pt. Reyes (test fishery inside 6 nm)
• July 1 thru earlier of July 15 or 4,500 chinook quota. All salmon except coho. Fishery closed July 4. Minimum size limit 26 inches (to be consistent with 1998 and 1999 test fisheries). Open only inside 6 nautical miles. Possession and landing limit of 30 fish per day. All fish caught in this area must be landed in Bodega Bay. Fish taken outside this area may not be landed at Bodega Bay while this fishery is open.

Pt. Reyes to Pt. San Pedro
• May 29 thru Sept. 30. All-salmon-except-coho. Minimum size limit 26 inches thru June 30 and 27 inches thereafter.

Pt. San Pedro to U.S.-Mexico Border
• May 1 thru Aug. 27. All salmon except coho. Minimum size limit 26 inches thru June 30 and 27 inches thereafter.

B. GENERAL REQUIREMENTS, DEFINITIONS, RESTRICTIONS OR EXCEPTIONS

1. Compliance with Minimum Size or Other Special Restrictions - All salmon on board a vessel must meet the minimum size or other special requirements for the area being fished and the area in which they are landed if that area is open. Salmon may be landed in an area that is closed only if they meet the minimum size or other special requirements for the area in which they were caught.

2. Minimum size limits in inches (when seasons are open):

	Chinook		Coho		
Area (when open)	Total Length	Head-off	Total Length	Head-off	Pink
North of Cape Falcon	28.0	21.5	16.0	12.0	None
Cape Falcon to Pt. Arena	26.0[a/]	19.5[a/]	-	-	None
South of Pt. Arena prior to July 1	26.0[a/]	19.5[a/]	-	-	None
South of Pt. Arena after June 30	27.0[a/b/]	20.25[a/b/]	-	-	None

a/ Chinook not less than 26 inches (19.5 inches head-off) taken in open seasons south of Cape Falcon may be landed north of Cape Falcon only when the season is closed north of Cape Falcon.
b/ Except minimum size limit of 26 inches total length in the Bodega Bay test fishery.

3. Transit Through Closed Areas with Salmon on Board - It is unlawful for a vessel to have troll gear in the water while transiting any area closed to salmon fishing while possessing salmon.

4. Line, Spread, and Gear Restrictions:

a. Single point, single shank barbless hooks are required.
b. Off **Oregon south of Cape Falcon**, no more than 4 spreads are allowed per line.
Spread defined: A single leader connected to an individual lure or bait.
c. Off **California**, no more than 6 lines are allowed per vessel and barbless **circle** hooks are required when fishing by any means other than trolling.
Circle hook defined: A hook with a generally circular shape and a point which turns inward, pointing directly to the shank at a 90° angle.
Trolling defined: Fishing from a boat or floating device that is making way by means of a source of power, other than drifting by means of the prevailing water current or weather conditions, except when landing fish.

5. Control Zone Definitions **(modified description of Columbia Control Zone for 2000)**:

Columbia Control Zone (same as recreational zone as modified in 1999) - An area at the Columbia River mouth bounded on the west by a line running northeast/southwest between the red lighted Buoy #4 (46°13'35" N/124°06'50" W) and the green lighted Buoy #7 (46°15'09' N/124°06'16" W); on the east by the Buoy #10 line which bears north/south at 357° true from the south jetty at 46°14'00" N/124°03'07" W to its intersection with the north jetty; on the north by a line running northeast/southwest between the green lighted Buoy #7 to the tip of the north jetty (46°14'48" N/124°05'20" W) and then along the north jetty to the point of intersection with the Buoy #10 line; and on the south by a line running northeast/southwest between the red lighted Buoy #4 and tip of the south jetty (46°14'03" N/124°04'05" W) and then along the south jetty to the point of intersection with the Buoy #10 line.

Klamath Control Zone - The ocean area at the Klamath River mouth bounded on the north by 41°38'48" N. (approximately 6 nautical miles north of the Klamath River mouth), on the west by 124°23'00" W. (approximately 12 nautical miles off shore), and on the south by 41°26'48" N (approximately 6 nautical miles south of the Klamath River mouth).

TABLE 1. **Tentative, non-Indian commercial troll** management measures analyzed by the STT for ocean salmon fisheries, 2000. (Page 3 of 3)

B. GENERAL REQUIREMENTS, DEFINITIONS, RESTRICTIONS OR EXCEPTIONS (continued)

6. Notification When Unsafe Conditions Prevent Compliance with Regulations: If prevented by unsafe weather conditions or mechanical problems from meeting special management area landing restrictions, vessels must notify the U.S. Coast Guard and receive acknowledgment of such notification prior to leaving the area. This notification shall include the name of the vessel, port where delivery will be made, approximate amount of salmon (by species) on board and the estimated time of arrival. This stipulation will be implemented by state regulations for California, Oregon and Washington, as required.

7. Incidental Halibut Harvest - The operator of a vessel that has been issued an incidental halibut harvest license may retain Pacific halibut caught incidentally in Area 2A, during authorized periods, while trolling for salmon. License applications for incidental harvest must be obtained from the International Pacific Halibut Commission (phone 206/634-1838). Applicants must apply prior to April 1 of each year. Incidental harvest is authorized only during **May and June** troll seasons and after July 31 if quota remains and if announced on the NMFS hotline (phone 800-662-9825). ODFW and WDFW will monitor landings and if they are projected to exceed the 23,490 pound preseason allocation or the Area 2A non-Indian commercial halibut TAC, NMFS will take inseason action to close the incidental halibut fishery.

   License holders may land no more than 1 halibut per each 5 chinook, except 1 halibut may be landed without meeting the ratio requirement, and no more than 35 halibut may be landed per trip. Halibut retained must meet the minimum size limit of 32 inches.

8. Inseason Management - In addition to standard inseason actions or modifications already noted under the season description, the following inseason guidance is provided to NMFS:

   a. In the overall non-Indian commercial chinook quota north of Cape Falcon, 1,000 chinook in the May/June harvest guideline are the result of impacts assessed at the July/August harvest impact rate. Inseason, these 1,000 chinook (or portion thereof) may be transferred to the July/ August harvest guideline at a one-to-one rate if not caught in the May/June fishery. Any chinook remaining in the May/June harvest guideline in excess of 1,000 may be transferred to the July/August harvest guideline on an impact equivalent basis.

   b. At the March 2001 meeting, the Council will consider inseason recommendations to: (1) open commercial seasons for all salmon except coho prior to May 1 in areas off Oregon, and (2) identify the areas, season, quota, and special regulations for any experimental April fisheries (proposals must meet Council protocol and be received in November 2000).

9. Consistent with Council management objectives, the State of Oregon may establish additional late-season, chinook-only fisheries in state waters. Check state regulations for details.

10. For the purposes of CDFG Code, Section 8232.5, the definition of the KMZ for the ocean salmon season shall be that area from Humbug Mt., Oregon to Horse Mt., California.

TABLE 2. **Tentative recreational** management measures analyzed by the STT for ocean salmon fisheries, 2000. (Page 1 of 3)

A. SEASON DESCRIPTION

North of Cape Falcon

Projections and Assumptions:

1. ESA listed species: Snake River fall chinook SRFI of 58% for all ocean fisheries relative to 1988-1993 average (≤70% required).
2. WCVI mortality of 1,200 coho; Southeast Alaska harvest of 150,850 chinook per PST agreement; 1999 Canadian catches as described by Canada in March meeting with PFMC managers; WCVI troll catch of 72,000 chinook includes 56,000 chinook in the fall of 1999.
3. Neah Bay/La Push agreed coho allocation of 80%/20% adjusted for Area 4B add-on.
4. Area 4B add-on fishery of 8,000 coho (chinook nonretention) opens later of ocean closure or Aug. 28.
5. Buoy 10 fishery opens Aug. 1 with an expected landed catch of 32,400 coho in Aug. and 22,500 coho in Sept. All retained coho must have an adipose fin clip.
6. Overall non-Indian TAC: 25,000 chinook; 100,000 coho. (No trade)
7. Recreational TAC: 12,500 chinook and fishery impacts of a landed catch of 75,000 hatchery coho with healed adipose fin clips.

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U.S.-Canada Border to Cape Alava (Neah Bay)

• July 3 thru earlier of Sept. 30 (7 days per week) or 6,600 coho subarea quota. All salmon, see note below concerning Area 4B. 2 fish per day, but only 1 chinook and all retained coho must have a healed adipose fin clip. Inseason management may be used to maintain season length and keep harvest within a guideline of 500 chinook.

Note: While ocean fishery is open in Area 4, no retention of chinook is allowed in Area 4B.

Cape Alava to Queets River (La Push)

• July 3 thru earlier of Sept. 30 (7 days per week) or 1,700 coho subarea quota. All salmon. 2 fish per day, but only 1 chinook. All retained coho must have a healed adipose fin clip. Inseason management may be used to maintain season length and keep harvest within a guideline of 300 chinook.

Queets River to Leadbetter Pt. (Westport)

• Sun. thru Thurs. July 3 thru earlier of Sept. 30 or 29,200 coho subarea quota. All salmon. 2 fish per day, but only 1 chinook. All retained coho must have a healed adipose fin clip. Closed thru Thurs., Aug. 10 inside the area defined by a line drawn from the lighthouse to Buoy 2 to Buoy 3 to the Grays Harbor north jetty. Inseason management may be used to maintain season length and limit harvest within a guideline of 7,400 chinook.

Leadbetter Pt. to Cape Falcon (Columbia River)

• Sun. thru Thurs. July 10 thru earlier of Sept. 30 or 37,500 coho subarea quota. All salmon. 2 fish per day, but only 1 chinook. All retained coho must have a healed adipose fin clip. **Coho retention is prohibited** between Tillamook Head and Cape Falcon beginning Aug. 1 (i.e., all salmon except coho and a daily bag limit of 1 chinook). Closed in Recreational Columbia Control Zone (newly defined in 1999, see B.6.). Inseason management may be used to maintain season length and limit harvest within a guideline of 4,300 chinook.

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South of Cape Falcon

Projections and Assumptions:

1. ESA listed species:
   OCN coho total incidental marine and freshwater harvest impact of 8.4% (limit of ≤15%);
   Rogue/Klamath coho total incidental marine harvest impact of 6.0% (limit of ≤13%);
   Sacramento winter chinook age-3 adult spawner increase of 31.0 % in mean brood replacement rate (goal ≥31%).
2. Klamath River fall chinook:
   50% of harvestable surplus (28,200 fish) for tribes with federally recognized fishing rights (Hoopa Valley; Yurok);
   13.8% age-4 ocean harvest rate;
   35,000 natural spawners (floor = 35,000);
   15% of non-Indian impacts to Klamath River sport fishery;
   17% of ocean impacts to KMZ ocean sport fishery.

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TABLE 2. **Tentative recreational** management measures analyzed by the STT for ocean salmon fisheries, 2000. (Page 2 of 3)

A. SEASON DESCRIPTION (Continued)

South of Cape Falcon

Cape Falcon to Humbug Mt

• Except as provided below during the selective fishery, the season will be: Apr. 1 thru Oct. 31. All salmon except coho. 2 fish per day. No more than 6 fish in 7 consecutive days. Legal gear limited to artificial lures and plugs of any size, or bait no less than 6 inches long (excluding hooks and swivels). All gear must have no more than 2 single point, single shank barbless hooks. Divers are prohibited and flashers may be used only with downriggers. See Oregon State regulations for a description of a closure at the mouth of Tillamook Bay.

Selective fishery for marked hatchery coho (healed adipose fin clip) :

• Sun., Tue., Wed., Thur., and Sat. of each week, July 1 thru earlier of July 31 or a landed catch of 25,000 coho. All salmon. 2 fish per day, all retained coho must have a healed adipose fin clip. No more than 6 fish in 7 consecutive days. No special gear restrictions except all gear must have no more than 2 single point, single shank barbless hooks. Open days may be adjusted to utilize the available quota. **Note:** On closed days during the selective fishery, no angling for any species of salmon is allowed. The all-salmon-except-coho season reopens the earlier of Aug. 1 or attainment of the coho quota.

Humbug Mt. to Horse Mt.

• May 27 thru July 6, one fish per day; and July 29 thru Sept. 10, two fish per day. All salmon except coho. No more than 4 fish in 7 consecutive days. Klamath Control Zone (B.6.) closed. Gear restrictions B.4. and B.5.a. apply (one rod per angler and no more than 2 hooks).

Horse Mt. to Pt. Arena

• Feb. 12 thru July 6 and July 22 thru Nov. 12. All salmon except coho. 2 fish per day. Minimum size limit 24 inches thru May 31 and 20 inches thereafter. Gear restrictions B.4., B.5.a., and B.5.b. apply (one rod per angler; no more than 2 hooks; circle hooks required when fishing by any means other than trolling).

In 2001, season opens Feb. 17 (nearest Sat. to Feb. 15) for all salmon except coho. 2 fish per day, 24 inch minimum size limit and the same gear restrictions as in 2000.

Pt. Arena to Pigeon Pt.

• Apr. 15 thru Nov. 5. All salmon except coho. 2 fish per day. Minimum size limit 24 inches thru May 31 and 20 inches thereafter. Gear restrictions B.4., B.5.a., and B.5.b. apply (one rod per angler; no more than 2 hooks; circle hooks required when fishing by any means other than trolling).

In 2001, the season will open Apr. 14 for all salmon except coho. 2 fish per day, 24 inch minimum size limit and the same gear restrictions as in 2000.

Pigeon Pt. to U.S.-Mexico Border

• Apr. 1 thru Oct. 1. All salmon except coho. 2 fish per day. Minimum size limit 24 inches thru May 31 and 20 inches thereafter. North of Pt. Conception, gear restrictions B.4., B.5.a., and B.5.b. apply (one rod per angler; no more than 2 hooks; circle hooks required when fishing by any means other than trolling).

In 2001, season opens March 31 for all salmon except coho, 2 fish per day, 24 inch minimum size limit and the same gear restrictions as in 2000.

B. GENERAL REQUIREMENTS, DEFINITIONS, RESTRICTIONS OR EXCEPTIONS

1. Compliance with Minimum Size or Other Special Restrictions - All salmon on board a vessel must meet the minimum size or other special requirements for the area being fished . Salmon may be landed in an area that is closed only if they meet the minimum size or other special requirements for the area in which they were caught.

2. Minimum size limits (total length in inches) when areas are open:

Area (when open)	Chinook	Coho	Pink
North of Cape Falcon	24.0	16.0	None
Cape Falcon to Horse Mt.	20.0	16.0	None, except 20.0 off CA
South of Horse Mt.*	20.0*	-	20.0

* **Except** 24.0 inches from opening day thru May 31.

3. Hooks: Single point, single shank barbless hooks are required for all fishing gear north of Pt. Conception, California. ODFW regulations in the state-water fishery off Tillamook Bay may allow the use of barbed hooks to be consistent with inside regulations.

TABLE 2. **Tentative recreational** management measures analyzed by the STT for ocean salmon fisheries, 2000. (Page 3 of 3)

B. GENERAL REQUIREMENTS, DEFINITIONS, RESTRICTIONS OR EXCEPTIONS (Continued)

4. Restriction on Number of Fishing Rods North of Pt. Conception, California: All persons fishing for salmon, and all persons fishing from a boat with salmon on board, may use no more than one rod per angler.

5. Special Gear Restrictions off California:

   a. California North of Pt. Conception: All persons fishing for salmon, and all persons fishing from a boat with salmon on board, must use no more than 2 single point, single shank barbless hooks.
   (**New for 2000**)

   b. Between Horse Mt. and Pt. Conception, California: Single point, single shank, barbless **circle** hooks must be used if angling by any means other than trolling and no more than 2 such hooks shall be used. When angling with 2 hooks, the distance between the hooks must not exceed 5 inches when measured from the top of the eye of the top hook to the inner base of the curve of the lower hook, and both hooks must be permanently tied in place (hard tied). Circle hooks are not required when artificial lures are used without bait.

   Circle hook defined: A hook with a generally circular shape and a point which turns inward, pointing directly to the shank at a 90° angle.
   Trolling defined: Angling from a boat or floating device that is making way by means of a source of power, other than drifting by means of the prevailing water current or weather conditions, except when landing a fish.

6. Control Zone Definitions:

   Columbia Recreational Control Zone (modified in 1999) - An area at the Columbia River mouth bounded on the west by a line running northeast/southwest between the red lighted Buoy #4 (46°13'35" N/124°06'50" W) and the green lighted Buoy #7 (46°15'09' N/124°06'16" W); on the east by the Buoy #10 line which bears north/south at 357° true from the south jetty at 46°14'00" N/124°03'07" W to its intersection with the north jetty; on the north by a line running northeast/southwest between the green lighted Buoy #7 to the tip of the north jetty (46°14'48" N/124°05'20" W) and then along the north jetty to the point of intersection with the Buoy #10 line; and on the south by a line running northeast/southwest between the red lighted Buoy #4 and the tip of the south jetty (46°14'03" N/124°04'05" W) and then along the south jetty to the point of intersection with the Buoy #10 line.

   Klamath Control Zone - The ocean area at the Klamath River mouth bounded on the north by 41°38'48" N (approximately 6 nautical miles north of the Klamath River mouth), on the west by 124°23'00" W (approximately 12 nautical miles off shore), and on the south by 41°26'48" N (approximately 6 nautical miles south of the Klamath River mouth).

7. Inseason Management: Regulatory modifications may become necessary inseason to meet preseason management objectives such as quotas, harvest guidelines and season duration. Actions could include modifications to bag limits or days open to fishing, and extensions or reductions in areas open to fishing. NMFS may transfer coho inseason among recreational subareas North of Cape Falcon to help meet the recreational season duration objectives (for each subarea) after conferring with representatives of the affected ports and the Salmon Advisory Subpanel recreational representatives north of Cape Falcon.

   At the March 2001 meeting, the Council will consider an inseason recommendation to open seasons for all salmon except coho prior to May 1 in areas off Oregon.

8. Additional Seasons in State Territorial Waters: Consistent with Council management objectives, the states of Washington and Oregon may establish limited seasons in state waters. Oregon state-water fisheries are limited to chinook salmon. Check state regulations for details.

TABLE 3. Tentative **treaty Indian** ocean troll salmon fishery management measures, 2000. (Page 1 of 1)

Tribe and Area Boundaries[a/]	Open Seasons	Salmon Species	Minimum Size Limit (inches)[b/] Chinook	Coho	Special Restrictions by Area
S'KLALLAM - Washington State Statistical Area 4B (All)	May 1 thru earlier of June 30 or chinook quota.[c/]	All except coho	24	-	Barbless hooks. No more than 8 fixed lines per boat; 72 hook maximum per boat.
	Aug. 1 thru earliest of Sept. 15 or chinook or coho quota.[c/]	All	24	16	
MAKAH - Washington State Statistical Area 4B and that portion of the FMA north of 48°02'15" N (Norwegian Memorial) and east of 125°44'00" W.	May 1 thru earlier of June 30 or chinook quota.[c/]	All except coho	24	-	Barbless hooks. No more than 8 fixed lines per boat or no more than 4 hand-held lines per person.
	Aug. 1 thru earliest of Sept. 15 or chinook or coho quota[c/]	All	24	16	
QUILEUTE - That portion of the FMA between 48°07'36" N (Sand Pt.) and 47°31'42" N (Queets River)	May 1 thru earlier of June 30 or chinook quota.[c/]	All except coho	24	-	Barbless hooks. No more than 8 fixed lines per boat.[d/]
	Aug. 1 thru earliest of Sept. 15 or chinook or coho quota.[c/]	All	24	16	
HOH - That portion of the FMA between 47°54'18" N (Quillayute River) and 47°21'00" N (Quinault River)	May 1 thru earlier of June 30 or chinook quota.[c/]	All except coho	24	-	Barbless hooks. No more than 8 fixed lines per boat.[d/]
	Aug. 1 thru earliest of Sept. 15 or chinook or coho quota[c/]	All	24	16	
QUINAULT - That portion of the FMA between 47°40'06" N (Destruction Island) and 46°53'18" N (Point Chehalis)	May 1 thru earlier of June 30 or chinook quota.[c/]	All except coho	24	-	Barbless hooks. No more than 8 fixed lines per boat.[d/]
	Aug. 1 thru earliest of Sept. 15 or chinook or coho quota[c/]	All	24	16	

a/ All boundaries may be changed to include such other areas as may hereafter be authorized by a federal court for that tribe's treaty fishery.

b/ Applicable lengths, in inches, for dressed, head-off salmon, are 18 inches for chinook and 12 inches for coho. Minimum size and retention limits for ceremonial and subsistence harvest are as follows:
Makah Tribe - None
Quileute, Hoh and Quinault tribes - Not more than 2 chinook longer than 24 inches in total length may be retained per day. Chinook less than 24 inches total length may be retained.

c/ The overall treaty troll ocean quotas are 25,500 chinook and 20,000 coho. The overall chinook quota is divided into 20,000 chinook for the May-June chinook-directed fishery and 5,500 chinook for the Aug.-Sept. all-salmon season. If the chinook quota for the May-June fishery is not fully utilized, the excess fishy may not be transferred into the later all-salmon season. The quotas include troll catches by the S'Klallam and Makah tribes in Washington State Statistical Area 4B from May 1 thru Sept. 30.

d/ The area within a 6-mile radius of the mouths of the Queets River (47°31'42" N) and the Hoh River (47°45'12" N) will be closed to commercial fishing. A closure within 2 miles of the mouth of the Quinault River (47°21'00" N) may be enacted by the Quinault Nation and/or the State of Washington and will not adversely affect the Secretary of Commerce's management regime.

TABLE 4. Chinook and coho **harvest quotas and guidelines (*)** for tentative ocean salmon fisheries, 2000 (thousands of fish). (Page 1 of 1)

Fishery or Quota Designation	Chinook	Coho
NORTH OF CAPE FALCON		
TREATY INDIAN COMMERCIAL TROLL[a/]		
May/June (all except coho)	20.0	-
Aug./Sept. (all salmon)	5.5	20.0
Total	25.5	20.0
NON-INDIAN COMMERCIAL TROLL		
Canada to Cape Falcon (May/June)	11.0*	-
Queets River to Cape Falcon (July-Sept.)[b/]	1.5*	25.0
Subtotal Non-Indian Commercial Troll	12.5	25.0
RECREATIONAL (selective coho fishery)[b/]		
U.S.-Canada Border to Cape Alava[c/]	0.5*	6.6
Cape Alava to Queets River[c/]	0.3*	1.7
Queets River to Leadbetter Pt.[c/]	7.4*	29.2
Leadbetter Pt. to Cape Falcon[c/]	4.3*	37.5
Subtotal Recreational	12.5	75.0
TOTAL NORTH OF CAPE FALCON	50.5	120.0
SOUTH OF CAPE FALCON		
COMMERCIAL TROLL (all except coho)		
Sisters Rock to Mack Arch (Aug.)	1.3	
House Rock to Humboldt S. Jetty (Sept.)	7.0	
Fort Ross to Pt. Reyes (July test fishery)	4.5	
Subtotal Troll	12.8	
RECREATIONAL (selective coho fishery)		
Cape Falcon to Humbug Mt.[b/]	-	25.0
TOTAL SOUTH OF CAPE FALCON	12.8	25.0

a/ For the Makah encounter rate study, legal sized fish retained in open periods will be included in the tribal quota. Chinook not taken during the May/June fishery are not to be added to the quota for the Aug./Sept. fishery.

b/ Selective fisheries for marked hatchery coho (healed adipose fin clip).

c/ The subarea chinook harvest is a guideline. The fisheries are restrained by the overall chinook quota north of Cape Falcon. The coho quota is a landed catch of marked hatchery coho (healed adipose fin clip).

TABLE 5. Projected key stock escapements (thousands of fish) or management criteria for tentative measures, 2000.[a/] (Page 1 of 1)

Key Stock/Criteria	Ocean Escapement or Other Criteria[b/]		Objective or Comparative Criteria
CHINOOK			
Upper Columbia River Brights	207.9	57.3	Ocean escapement[c/]
Mid-Columbia Brights	62..2	-	Information only
Lower Columbia River Hatchery Tules	26.4	22.8	Ocean escapement[d/]
Lewis River Wild (threatened)	2.7	5.7	MSY spawner goal[e/]
Spring Creek Hatchery Tules	26.9	11.1	Ocean escapement[f/]
Snake River Fall (threatened) SRFI	0.58	≤0.70	Exploitation rate for all ocean fisheries[a/ g/]
Klamath River Fall	35.0	35.0	Floor level natural spawner objective
Adult spawner escapement rate	47.0%	33-34%	Minimum rate
Tribal/nontribal allocation	50/50	50/50	Required allocation
Age 4 ocean harvest rate	13.8%	≤17.0%	Requirement for threatened California coastal chinook[g/]
KMZ sport fishery	17.0%	17.0%	KFMC allocation agreement
CA/OR Split	57/43	-	Council agreement for 2000
River recreational fishery	15.0%	15.0%	California Fish and Game Commission
Sacramento River Winter (endangered)	31.0%	≥31.0%	Increase in age 3 replacement rate[g/]
Sacramento River Fall	270.0	122-180	Natural and hatchery spawners
COHO			
PUGET SOUND NATURAL:			
Skagit	25.5	30.0	MSP level of adult spawners (not annual target)[h/]
Stillaguamish	15.5	17.0	"
Snohomish	46.4	70.0	"
Hood Canal	52.0	21.5	"
Strait of Juan de Fuca	11.2	12.8	"
COASTAL NATURAL:			
Quillayute Fall	8.2	6.3-15.8	MSY adult spawner range (not annual target)[h/]
Hoh	3.3	2.0-5.0	"
Queets: Wild	2.5	5.8-14.5	"
Supplemental	0.7	-	
Grays Harbor	44.1	35.4	MSP level of adult spawners (not annual target)[h/]
Oregon Coastal Natural (threatened)	8.4%	≤15%	Marine and freshwater exploitation rate[g/]
Northern California (threatened)	6.0%	≤13%	Surrogate R/K hatchery coho marine exploitation rate[g/]
HATCHERY:			
Columbia River Early	216.2	38.7	Ocean escapement[i/]
Columbia River Late	170.7	19.4	Ocean escapement[i/]

a/ Projections in the table assume a WCVI mortality of 1,200 coho; Southeast Alaska harvest of 150,850 chinook per PST agreement; 1999 Canadian catches as described by Canada in March meeting with PFMC managers; WCVI troll catch of 72,000 chinook includes 56,000 chinook in the fall of 1999.

b/ Ocean escapement is the number of salmon escaping ocean fisheries and entering freshwater with the following clarifications. Ocean escapement for Puget Sound stocks is the estimated number of salmon entering Area 4B that are available to U.S. net fisheries in Puget Sound and spawner escapement after impacts from the Canadian, U.S. ocean, and Puget Sound troll and recreational fisheries have been deducted. For Columbia River early and late coho stocks, ocean escapement represents the number of coho after the Buoy 10 fishery. The escapement numbers provided for OCN coho are spawners in SRS accounting.

c/ Minimum to attain 43,500 adults over McNary Dam, with normal distribution and no mainstem harvest.

d/ Minimum to attain 13,900 adults for hatchery egg-take, with normal distribution and no lower river mainstem or tributary harvest.

e/ ESA guidance met by a total adult equivalent ocean fishery exploitation rate of no more than 0.65 on Coweeman tules.

f/ Minimum to achieve 7,000 adults for Spring Creek Hatchery egg-take, assuming normal distribution and no mainstem harvest.

g/ ESA guidance or jeopardy standard.

h/ Criteria are maximum sustainable production (MSP) and maximum sustainable yield (MSY) objectives. The annual management objectives may be different and are subject to agreement between WDFW and the treaty tribes.

i/ Minimum to attain hatchery egg-take goals of 19,600 early and 15,200 late adult coho, with average distribution patterns and no mainstem or tributary fisheries.

TABLE 6. Projections of chinook and coho harvest impacts for tentative ocean salmon fishery management measures, 2000. (NA = not available) (Page 1 of 1)

Area and Fishery	2000 Catch Projection	2000 Bycatch Mortality[a/] Projection	Observed in 1999 Catch	Observed in 1999 Bycatch Mortality
OCEAN FISHERIES:[b/]		**CHINOOK (thousands of fish)**		
NORTH OF CAPE FALCON				
Treaty Commercial Troll	25.5	7.0	27.4	NA
Non-Indian Commercial Troll	12.5	2.6	17.5	NA
Recreational	12.5	1.6	9.9	NA
CAPE FALCON TO HUMBUG MT.				
Commercial Troll	157.8	NA	61.0	NA
Recreational	4.2	NA	3.3	NA
HUMBUG MT. TO HORSE MT.				
Commercial Troll	11.4	NA	3.9	NA
Recreational	15.9	NA	9.6	NA
SOUTH OF HORSE MT.				
Commercial	351.4	NA	262.0	NA
Recreational	159.1	NA	81.4	NA
TOTAL OCEAN FISHERIES				
Commercial Troll	558.4	NA	371.8	
Recreational	191.7	NA	104.2	NA
INSIDE FISHERIES:				
Area 4B Add-On	0.0	<0.05	-	NA
Buoy 10	11.0	NA	9.9	NA
OCEAN FISHERIES:		**COHO (thousands of fish)**		
NORTH OF CAPE FALCON				
Treaty Commercial Troll	20.0	1.1	33.4	NA
Non-Indian Commercial Troll[c/]	25.0*	5.7	3.8	NA
Recreational[c/]	75.0*	8.9	47.7	6.9
SOUTH OF CAPE FALCON				
Commercial Troll	0.0	12.7	0.0	3.6
Recreational[c/]	25.0*	8.8	6.7	4.8
TOTAL OCEAN FISHERIES				
Commercial Troll	45.0	19.5	37.2	3.6
Recreational[c/]	100.0*	17.7	54.4	11.7
INSIDE FISHERIES:				
Area 4B Add-On[c/]	8.0*	2.4	0.0	NA
Buoy 10[c/]	54.9*	5.2	8.9	0.8

a/ The bycatch mortality reported in this table consists of hook-and-release and drop-off mortality of chinook and coho salmon in fisheries which have minimum size limits or special species retention restrictions (e.g., all-salmon-except-coho or all-salmon-except-chinook seasons, or selective fisheries for marked coho). In general, the bycatch mortality rate parameters used by the Council for both chinook and coho in fisheries using barbless hooks are:
Commercial - 26% of fish hooked-and-released plus 5% of total encounters (drop-off, predation, noncompliance, etc.).
Sport north of Pt. Arena - 14% of fish hooked-and-released plus 5% of total encounters (drop-off, etc.).
Sport south of Pt. Arena - 23.2% (weighted average of California style mooching and trolling) of fish hooked-and-released plus 5% of total encounters (drop-off, etc.).

b/ Includes Oregon territorial water, late season chinook fisheries.

c/ Selective fishery, marked by an asterisk (*), which allows only retention of hatchery coho with a healed adipose fin clip.

TABLE 7. Expected coastwide Oregon coastal natural (OCN) and Rogue/Klamath (RK) coho harvest mortality and exploitation rates by fishery for tentative management measures, 2000. (Page 1 of 1)[a/]

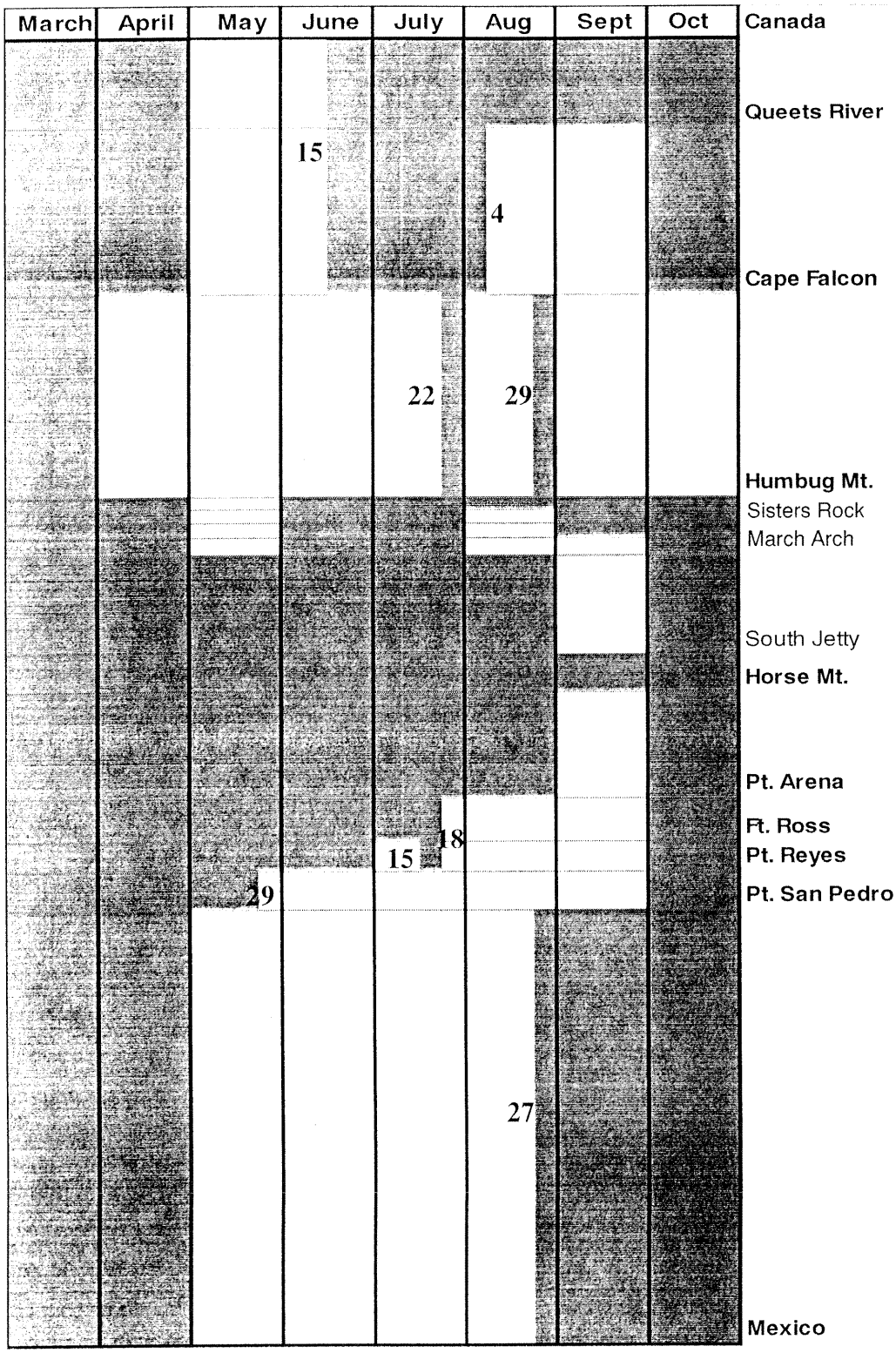
Fishery	Harvest Mortality and Exploitation Rate			
	OCN		RK	
	Number	Percent	Number	Percent
SOUTHEAST ALASKA	16	0.03	0	0.00
BRITISH COLUMBIA	2	0.00	0	0.00
PUGET SOUND/STRAITS	110	0.21	0	0.00
NORTH OF CAPE FALCON				
Treaty Indian Troll	106	0.20	0	0.00
Recreational	287	0.54	7	0.04
Non-Indian Troll	216	0.41	0	0.00
SOUTH OF CAPE FALCON				
Recreational:				
Cape Falcon to Humbug Mt.[b/]	555	1.05	15	0.08
Humbug Mt. to Horse Mt. (KMZ)	470	0.89	513	2.88
Fort Bragg	281	0.53	259	1.45
South of Pt. Arena	382	0.72	70	0.39
Troll:				
Cape Falcon to Humbug Mt.	945	1.79	17	0.09
Humbug Mt. to Horse Mt. (KMZ)	69	0.13	85	0.48
Fort Bragg	8	0.02	16	0.09
South of Pt. Arena	392	0.74	66	0.37
BUOY 10	103	0.20	20	0.11
ESTUARY/FRESHWATER	493	0.93	---	---
TOTAL	4,435	8.41	1,068	5.99
1999 Total	4,996	8.73	1,571	4.90

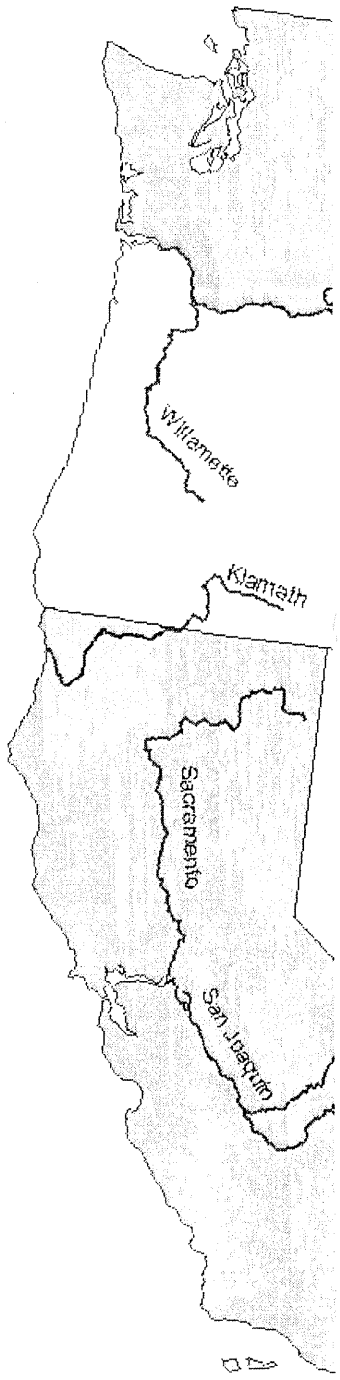
a/ OCN adult spawners (SRS accounting): 1999 observed = 46,764; 2000 projection = 48,764.
b/ Under a 15,000 marked coho quota for the July selective fishery off central Oregon (rather than 25,000), the total impacts are 8.07% and 5.95% for OCN and RK coho, respectively.

TABLE 8. Expected mark rate for areas with proposed selective coho fisheries, 2000. (Page 1 of 1)

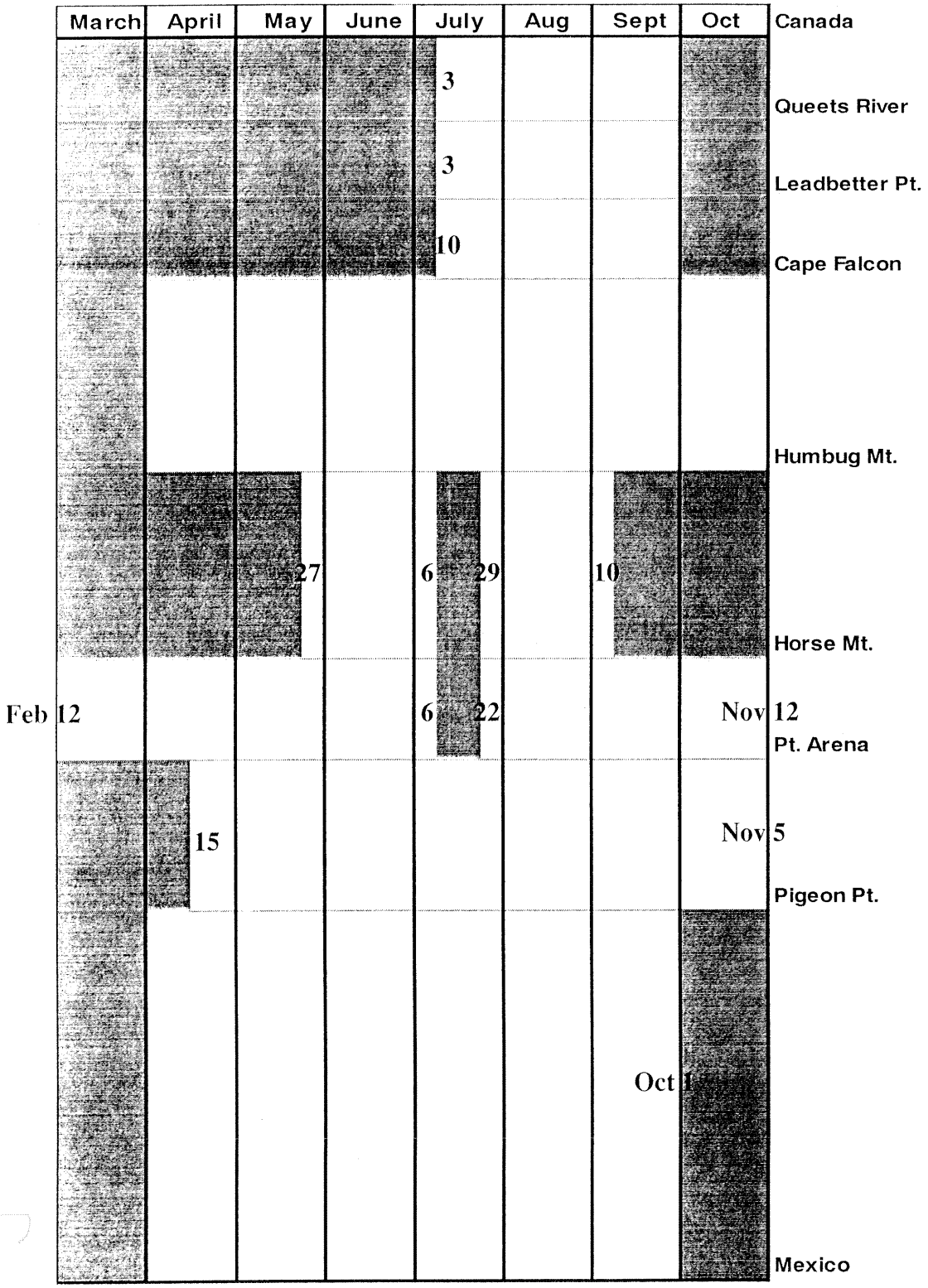
Area	Fishery	July	August	September	1999 Observed
	North of Cape Falcon				
Neah Bay (Area 4)	Recreational	57.3%	48.2%	58.5%	26%
	Non-Indian Troll	54.7%	47.9%	-	-
La Push (Area 3)	Recreational	77.1%	62.4%	56.8%	40%
	Non-Indian Troll	59.1%	58.5%	-	-
Westport (Area 2)	Recreational	79.4%	77.5%	73.5%	60%
	Non-Indian Troll	67.9%	70.6%	-	-
Columbia River (Area 1)	Recreational	87.9%	87.0%	85.7%	78%
	Non-Indian Troll	81.9%	85.0%	-	-
Buoy 10	Recreational	-	88.2%	89.8%	79%
	South of Cape Falcon				
Cape Falcon to Humbug Mt.	Recreational	80.6%	72.6%	-	62%
Tillamook	Recreational	83.7%	76.1%	-	-
Newport	Recreational	80.1%	73.2%	-	-
Coos Bay	Recreational	79.4%	66.5%	-	-

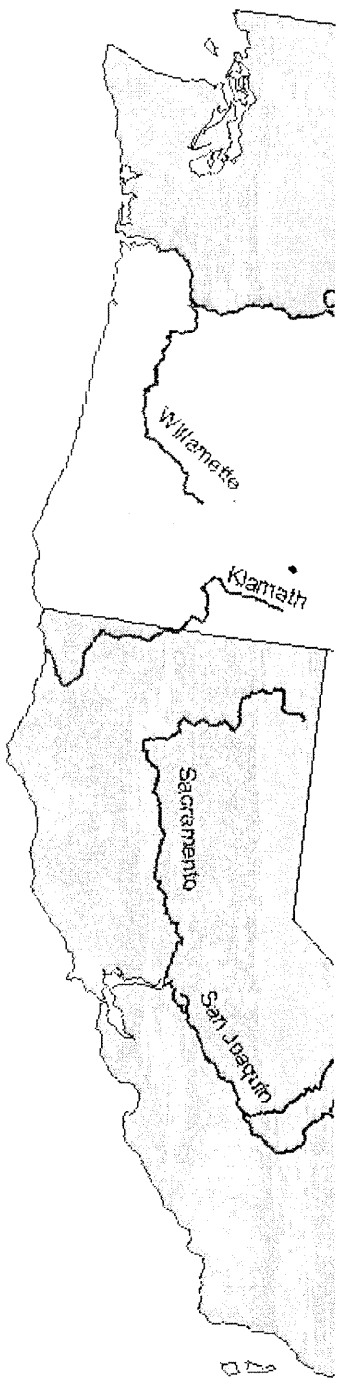
2000 Commercial Tentative Seasons

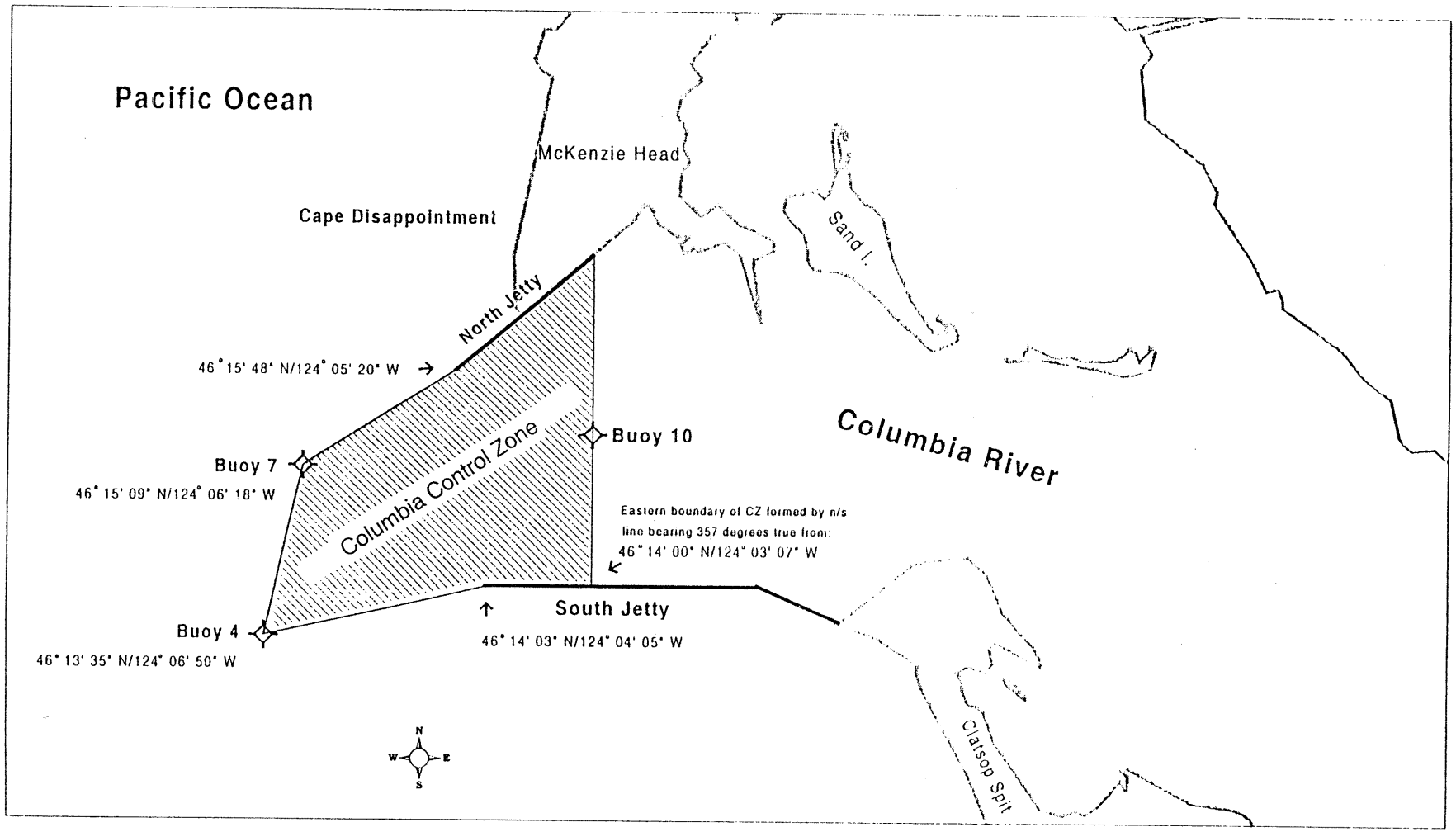




2000 Recreational Tentative Seasons







COLUMBIA CONTROL ZONE

TESTIMONY OF THE
COLUMBIA RIVER TREATY TRIBES
BEFORE THE PACIFIC FISHERY MANAGEMENT COUNCIL
APRIL 6, 2000
PORTLAND, OR

Good Afternoon Mr. Chairman and members of the Council. My name is Terry Courtney. I am a member of the Warm Springs Fish and Wildlife Committee. I am here today to present comments on behalf of the four Columbia River treaty tribes: the Nez Perce, Yakama, Warm Springs and Umatilla tribes.

~~All of~~ the PFMC chinook options meet the Snake River wild fall chinook criteria. The Columbia River tribes would have preferred a lower ~~still support~~ chinook option to maximize chinook escapement back to the river. The Columbia River tribes face a difficult fall season because the current analysis shows that the tribes can not achieve 50% of the total harvestable fall chinook due to ESA constraints.

Regarding coho fisheries, the total package of Columbia River fisheries is still being discussed. The tribes will be evaluating the combination of ocean fisheries and the states' planned in-river fisheries for consistency with the requirement to pass 50% of the upriver coho upstream of Bonneville Dam.

The tribes continue to question the mass marking and selective fisheries programs that are funded by the federal agencies. Although these types of programs provide some fishing opportunity, our experience with Columbia River steelhead proves that they do not restore natural stocks. Unless basic wild fish survival problems are corrected, mass marking and selective fisheries programs will only be a temporary fix. Our experience indicates that mass marking and selective programs create allocation imbalances between gear types. In addition, the long-term effects on wild stocks are unknown, yet the pressure to expand selective fisheries programs increases.

As long as the fish are managed consistent with the five conservation principles of *U.S. v. Oregon*, the tribes do not oppose non-Indian fisheries. All fisheries are paying the price for years of mismanagement of the fish and their environment to provide short-term economic gain to other industries. So often, fishery reductions are targeted as the primary method to achieve restoration. However, substantial progress can be made in other areas, such as, the hydro-system, habitat and hatcheries. The current reliance on transporting smolts around dams has not been successful. The Columbia River tribes support breaching of the lower Snake River dams, drawdowns, and additional spill during the summer months as actions necessary to restore the runs of wild fish. The Columbia River tribes also advocate identifying habitat problems and working with land managers and owners to find appropriate solutions related to irrigation and timber harvest.

The Snake River fall chinook supplementation program is a recent example of success. This year's projected return of supplementation fish is substantial. The tribes'

supplementation efforts are designed for natural stock rebuilding and to benefit all fisheries. This program was implemented at the insistence of the tribes and with major opposition from state and federal parties. The National Marine Fisheries Service has proposed additional monitoring requirements that may inhibit the supplementation program. It appears to us that the federal government is concerned that the supplementation program may be "too successful." Tribal supplementation programs in the Clearwater, Umatilla, Yakima, and Hood rivers are also demonstrating success in returning fish to naturally spawning areas. In our view, there are no surplus fish. Each returning fish is valuable for spawning.

While improvements are needed throughout the entire life cycle of the salmon, it is too easy to just blame hydro-system or habitat management. State and federal fishery agencies do have control over hatcheries and can immediately begin reforming these hatchery programs to assist in natural stock rebuilding.

The tribal vision for the future is for a healthy sustainable environment that produces fish populations that can support viable fisheries for both tribal and non-Indian fishermen. Salmon are the lifeblood of tribal culture. We hope that others share our vision and will work to do what is necessary to make that vision come true.

This concludes my statement. Thank you.

STATEMENT BY JIM HARP TO THE PACIFIC FISHERY MANAGEMENT COUNCIL REGARDING THE 2000 OCEAN TREATY TROLL FISHERY
Thursday, April 6, 2000

Mr. Chairman,

As I indicated in my previous statements, the treaty tribes have been working on a package of fishery restrictions that meets this year's resource constraints and fairly distributes the burden of conservation.

- The fisheries that the tribes have proposed thus far I believe are consistent with this year's resource conditions, and take into account the need for each tribe to have some fishing opportunity in its area.

- At the appropriate time, I will offer a motion for treaty troll quotas of 20,000 coho and 25,500 chinook.

- This year the tribes have put forth a proposal for treaty troll quotas that, while not the preference of any tribe, provide some reasonable opportunity for all of the affected parties and meet the conservation needs for Queets coho. The treaty troll quotas represent a balance of the treaty rights of the Makah, Quinault, and other coastal tribes, as well as the four Columbia River Tribes and the Puget Sound tribes given the conservation constraints of the many salmon stocks in 2000.

- The proposed quotas for the ocean treaty Indian troll fishery along with the rest of the ocean fishery package meets the ESA considerations for Snake River chinook, OCN coho, and Puget Sound Chinook.

- The quota meets the commitment by the ocean tribes to the Columbia River Tribes in 1988 to not increase impacts on stocks of concern.

- The quota levels also meet the coho management objectives for 2000 for the Washington coastal stocks.

- The proposed quotas also meet the commitments made under the Pacific Salmon Treaty.

- The quota levels have been significantly reduced from Option 1. (Chinook is 15% less and coho is 48% less)

- The impacts from the proposed treaty troll quotas are for the 2000 fishery and should not become a "standard" for future years.

- This proposal for the treaty troll fishery is part of an evolving, comprehensive package that includes in-river and Puget Sound fisheries.

- The ocean treaty troll fishery presents a limited opportunity for us to exercise our treaty rights in the ocean this year. One must remember, the treaty tribes must exercise their treaty rights in their established U& A's, so the treaty troll tribes cannot simply move their fisheries to alternative locations in order to reduce impacts.

Thank you.

C.6.g.

Public Comment
(Thursday April 6th)

Pacific Fishery Management Council

Carl F. Ness
11640 SW Corby Dr. #3; Portland, OR 97225
(503) 644-5605 Fax (503)520-9787

April 5, 2000

Greetings Pacific Fishery Management Council and Guests,

As our history tells us we haven't allowed wise choices when the alarm has been sounded. I say this in regards to the words of our former President, Theodore Roosevelt who in 1908 voiced to congress for regulations on the Columbia River, "The Salmon fisheries of the Columbia River are now but a fraction of what they were 25 years ago."

I plead with each of you with that same voice of urgency to do the following A.S.A.P.:

1. Put a five-year moratorium on both sport and commercial fishing for salmon and steelhead up and down the coastline and to every tributary.
2. Cease all tribal fishing on the Columbia River and allow the treaty rights to be, as they were a few years back, on the Willamette River at the falls in Oregon City.
3. Stop the catch of any ocean sustenance of Salmon and Steelhead. I.E. anchovies and herring for five years.
4. Have an open harvesting of predators that are protected under Federal law. The decimation of Seals and Sea Lions is a must. The balance of nature is off-balance and we need to step in quickly.
5. Cease all ocean operations of open nets known as draggers. The incidental catch of Salmon and Steelhead is a horrendous and horrifying destruction of fish runs by these open nets that are legally in operation.

There is so much more that we need to do that I'm sure you have already discussed. Please find favor with the urgency of my plea and that of others.

Thank you for your time.

Appreciatively,

Carl F Ness

Carl F. Ness
Concerned Fisherman & Outdoor Enthusiast

Agenda Item C.6.h.
Adopt Final Measures

NORTH OF FALCON MOTION For The Ocean Treaty Troll Fishery
(Thursday, April 6, 2000)

Mr. Chairman,

For the 2000 salmon fishery in the area from the U.S./Canada border to Cape Falcon, Oregon, I move the following management structure be adopted by the Council for the Treaty Indian ocean troll fisheries:

The Treaty Indian ocean troll fishery would have a quota of 25,500 chinook and 20,000 coho. The overall chinook quota would be divided into a 20,000 chinook sub-quota for May 1 through June 30, and a 5,000 chinook sub-quota for the all species fishery in the time period of August 1 through September 15. If the chinook quota for the May-June fishery is not fully utilized, the remaining fish would not be rolled over into the all species fishery. The treaty troll fishery would close upon the projected attainment of either of the chinook or coho quota. Other applicable regulations are shown in Table 3 of STT Report C.6.

SALMON MANAGEMENT OPTION HEARING SUMMARY

Date:	March 27, 2000	Hearing Officer:	Mr. Jim Lone
Location:	Chateau Westport Westport, WA	Other Council Members:	Mr. Phil Anderson Mr. Jim Harp
		NMFS:	No Representative
Attendance:	24	Coast Guard:	LT Brian Corrigan
Testifying:	6	Salmon Team Member:	Mr. Doug Milward
		Council Staff:	Mr. Jim Seger

Organizations Represented:

Westport Chapter of the Washington Trollers Association (WTA)
Westport Charterboat Association
Westport/Grayland Chamber of Commerce

Synopsis of Testimony

Of the 6 people testifying:

- One commented primarily on the commercial troll fishery with 11 raising their hands in support.
- Five commented primarily on the recreational fishery (charterboat operators).

Commercial Troll Comments

Trollers supported Option 1 with an August 11 opening, a selective fishery only if absolutely necessary, and retaining some chinook for a summer fishery but maximizing chinook opportunity in the spring (Washington Trollers Association with 11 individuals supporting by show of hands). Everyone at a meeting of the Westport Chapter of the WTA was comfortable with 4 days on 3 days off. The Friday through Monday fishing schedule works out well for monitoring and marketing. They prefer to not have a landings restriction on coho, at least for the first opening, if necessary restrictions can be added for subsequent openings. With respect to encounter rate studies, it's difficult to have observers, but association members are willing to go along with logbooks. The halibut/chinook landing ratio should be reduced from 1:5 to 1:2, with a corresponding increase in the cap to 50 halibut.

Recreational Comments

Recreational fishers supported Option I including the July 3 opening (Westport Charterboat Association, Westport/Grayland Chamber of Commerce, and 3 individuals). Since another north of Cape Falcon meeting is upcoming, the Westport Charterboat Association reserved their views on the more specific aspects of ocean management for the public comment period during the Council meeting. Those more specific details could include area closures, modified bag limits, and similar proposals designed to optimize the economic and social value of the allowed harvest. Recreational fisheries inside the Columbia River should be subject to the same constraints as the fishery on the ocean: a one chinook per two-fish bag limit. Fairness in inside/outside sharing should be a top priority issue this year (Westport Charterboat Association and others in agreement with Westport Charterboat Association). In response to questions, one person testifying expressed a lack of concern about boats from the Columbia River fishing on Westport's quota, if Westport were to open later than the Columbia River; another person stated that he would rather open July

3 and take the risk of not getting to labor day (as opposed to ensuring the season reached labor day); and a third person stated that in his experience there appeared to be more hatchery fish in the catch in July than in September.

Written Statements (Attached)

1. Memo from Westport Chapter of the Washington Trollers Association (March 27, 2000).

PFMC
03/30/00

Memo 3-27-2000

To: Pacific Fisheries Management Council

Submitted at: March 27, 2000 Hearing
Chateau Westport
Westport, Washington

From: Westport Chapter of Washington Trollers Association

Subject: Preferred 2000 Troll Option

U.S. - Canadian Boarder to Cape Falcon
May 1 thru June 15 - 10,000 chinook

Queets River to Cape Falcon
Aug. 11 thru Sept. 30 - 25,000 coho

- 2,500 chinook
- Marked coho only if absolutely necessary for fishery
- Cycle 4 days open/3 days closed
- No landing restrictions on first opening
- Appropriate landing restrictions on following openings
- Willing to cooperate with Coho log book program

Halibut - prefer incidental landing allowance of one halibut plus one halibut per two chinook with a 50 halibut per landing limit.

The 2000 Option 1 is less than ½ chinook troll allocation from the 1999 season. We understand that there is sharing with the Treaty Troll fishery and inside Columbia River fisheries on Tule and Wild stocks. We expect the PFMC to provide 2000 season opportunities where all fishermen equally share in the reductions from 1999 in protecting the stocks for the future.

SALMON MANAGEMENT OPTION HEARING SUMMARY

Date:	March 28, 2000	Hearing Officer:	Mr. Burnie Bohn
Location:	Shilo Inn Tillamook, OR	Other Council Members:	None
		NMFS:	Mr. Chris Wright
Attendance:	13	Coast Guard:	LT Brian Corrigan
Testifying:	10	Salmon Team Member:	Mr. Curt Melcher
		Council Staff:	Mr. Jim Seger
Organizations Represented: Pacific City Dorymen's Association			

Synopsis of Testimony

Of the 10 people testifying:

- Five commented primarily on the commercial fishery.
- One commented primarily on the recreational fishery.
- Four commented on both recreational and commercial fisheries.

Commercial Troll Comments

The trollers and the Pacific City Dorymen's Association supported Troll Option I north and south of Cape Falcon and a chinook to halibut ratio of 2:1 with a maximum landing limit of 50. In general, trollers at this hearing were disconcerted with recent year north of Cape Falcon fisheries, because they had not extended far enough south to benefit small trollers along the northern Oregon coast. Valuable scientific data could be acquired with a fishery off northern Oregon. Trollers opposed trading troll coho for recreational chinook. They favored maintaining the coho to support a summer all species fishery. The July fishery was supported, because weather is better and fish come in closer to the beach. There was also support for restricting the fishery to the area between Cape Falcon and Point Leadbetter and for moving the management line to Tillamook Head. For the south of Cape Falcon fisheries, the Council intent should be maintained to share Klamath impacts 50/50 between Oregon and California fisheries. The California Department of Fish and Game has shown little flexibility to the California troll industry by refusing to reduce the California recreational fishery and put the impacts into the troll fishery. It is usually up to Oregon to give up time so the California troll fishery can fish. One troller offered to carry an observer. Another troller stressed the importance of bringing the stocks back to healthy conditions before taking too many fish.

The following are some specific suggestions made for adjusting the Troll season options: (1) forego the August Sisters Rock to Mack Arch fishery in favor of a Sisters Rock to Oregon/California border fishery with all landings to occur in Gold Beach, Port Orford, or Brookings; and (2) change the Humbug Mountain to Oregon/California border May opening to a quota fishery (with the appropriate quota) opening May 1 through May 29 with a two-day closure at the end of May to determine the amount of fish taken and carry over any left over quota to a June 1 opening with appropriate adjustments for differences in Klamath impact rates.

One processor testified that allowing trollers to take the halibut as bycatch provides a steady supply to go to the fresh market along with salmon. A marina owner testified that local fresh fish availability brings people into small towns.

Recreational Comments

Support for recreational Option I (1 recreational fisher, 2 trollers, a marina owner, and the Pacific City Dorymen's Association). The selective recreational fishery brought substantial benefits to Pacific City and while only a few fish were caught, many people came into Garibaldi. Most coho are still south by the time the selective fishery closes at the end of July. It would be good to keep the selective fishery open until Oregon Coastal Natural coho began showing up.

PFMC
03/30/00

SALMON MANAGEMENT OPTION HEARING SUMMARY

Date:	March 27, 2000	Hearing Officer:	Dr. Hans Radtke
Location:	Pony Village Motor Inn North Bend, OR	Other Council Members:	Mr. Burnie Bohn
		NMFS:	Mr. Chris Wright
Attendance:	36	Coast Guard:	None
Testifying:	17	Salmon Team Member:	Mr. Curt Melcher
		Council Staff:	Dr. John Coon

Organizations Represented:

Brookings Harbor Chamber of Commerce
Klamath Fishery Management Council
Klamath Management Zone Fisheries Coalition
Oregon South Coast Fishermen
Port of Brookings Harbor

Synopsis of Testimony

Of the 17 people testifying:

- Eleven represented or commented primarily on the recreational fishery.
- Five represented or commented primarily on the commercial fishery.
- One commented primarily on community issues.

Commercial Troll Comments

All trollers were generally in support of Option I. Additional comments included the following:

- The season structure in Option III that cuts off the area between the Oregon-California border and House Rock is not fair to Oregon trollers.
- Oregon Department of Fish and Wildlife and National Marine Fisheries Service should restrict planting of striped bass in areas which are inhabited by listed coho stocks.
- Trollers should be allowed to keep fin clipped hatchery coho.

Recreational Comments

All those who spoke about the recreational options supported a one fish bag limit in the Klamath management zone (KMZ) to get the maximum fishing opportunity (see attached written statement #1). Option I with the selective coho fishery in July was preferred for the area north of Humbug Mountain. Other comments expressed by the participants included the following:

- Utilize the full Klamath River fall chinook ocean harvest allocation and if any fish remain, allow them to go to escapement, not to the inriver sport fishery.
- Using the 20% buffer with the two fish bag limit in the KMZ is ludicrous as the Klamath Ocean Harvest Model (KOHM) consistently over estimates the recreational effort and catch by a significant amount and is based on a two fish bag and the higher effort occurring during 1986 through 1990. Completion of a new KOHM should receive high priority.
- More days should be added to Option II (primarily in July and August) to account for the overestimates of the KOHM, and consideration should be given to allowing six fish in seven days.

- The harvest of the Karuk Tribe should be included in the accounting of Klamath River fall chinook allocation.
- To protect coho, limit planting of stripe bass and take action to reduce pinniped and avian predation problems.
- Managers should ensure enforcement and harvest accounting in the Indian gillnet fishery.

Other Testimony

One person spoke regarding the need for consistent commercial and recreational fishing opportunities to support the coastal communities and reduce substance abuse and other social problems. He also noted the need for better data from which to make management decisions.

Written Statements (Attached)

1. Port of Brookings Harbor and Klamath Fishery Management Council Statement before the Pacific Fishery Management Council, North Bend, Oregon, March 27, 2000.

PFMC
03/31/00

PORT OF BROOKINGS HARBOR
AND
THE KLAMATH MANAGEMENT COUNCIL
STATEMENT BEFORE
THE PACIFIC FISHERY MANAGEMENT COUNCIL,
NORTH BEND, OREGON 97459

March 27, 2000

My name is Russ Crabtree. I am the Executive Director for the Port of Brookings Harbor and Vice Chairman of the Klamath Management Zone Fisheries Coalition. The KMZFC is a bi-state organization comprised of Northern California and Southern Oregon Coastal Communities dedicated to conservation of the resource and continuing the economic return to coastal fishing communities. The Klamath Management Zone Fisheries Coalition and the Port of Brookings Harbor, for numerous years, has approached the fishery issues with one single purpose or focus and that is to always advocate for equality and parity within the fisheries for all concerned.

My preparatory comment is: despite the downturns in economic contribution in recent years, the commercial and recreational fishing industry is still an important component to many coastal communities. The Coastal communities of Northern California and Southern Oregon always have maintained the position of parity and equality in the fisheries, but today some disturbing events are unfolding which have caused major concern for the fate of our valued way of life. Today, we see major groundfish reductions based upon flawed scientific data, and are told it is the best available information from which to make decisions.

This may be true, but the fact still remains that an industry's very lifeline is at stake and it is our opinion that this is unjustified given the current state of affairs. The Pacific Fishery Management Council should continue and join with industry to demand accountability of the scientific information used to justify harvest and allocation of a public owned fisheries resource. Never should one federal agency, such as National Marine Fisheries, be able to interpret reauthorization of the Magnuson Act in such a stringent manner without the coinciding interpretation and solution to the impact to communities and fishermen.

In the Klamath Management Zone Ocean Recreation, Option II is the only viable option that provides time and opportunity for the fishermen. This is the only option that is a community development proposal; the other two options are not based upon KMZ communities' consensus. In the past, fishing restrictions were based upon the KMZ Ocean Recreational season structure, due to the need to reduce Klamath Chinook and Oregon Natural Coho impacts.

Today, given the harvest level of this fishery, these fishing dampers should be lifted and Option II revised to adjust for more flexibility in this fishery. This

equated to a 17% harvest share for the KMZ Ocean Recreational fisheries. Since then, the allowable harvest for the fisheries has only reached a 50% harvest level, due to the season restrictions and structures that are currently in place. Also, this year we learned that the Klamath Harvest Model only models two fish and has never given this fishery credit for reducing to a one fish bag limit or the other fishing restrictions. It is our opinion, that Option II should be revised to reflect a more liberal season structure. One suggestion is an increased number of days. Today, the question of reallocation of the Klamath Chinook, a finite resource, is again being examined and we understand that the in-river recreational range is being established in a range of 15% to 19%. This year's 19% in-river recreational harvest reallocation by California Fish and Game Commission is a decision that did not take into consideration the consensus regulatory process or escapement goals of fisheries management.

In the PFMC deliberation process, we respectively request due consideration be provided to the severe consequences and ramifications of any Klamath in-river Fall Chinook, State of California, reallocation decision. The communities of Northern California and Southern Oregon coastal economies have already suffered economic hardships due to current salmon fishing restraints and to further restrict one group for the benefit of another is the height of injustice.

Our comments are as follows:

1. Each year specific allocations of Klamath River Fall Chinook are made to in-river sport fisheries, ocean sport and commercial fisheries. These allocations have been relatively stable since 1993 when the U. S. Department of Justice Solicitor's Opinion reserved a 50% allocation for in-river tribal fisheries.

2. This yearly change in allocation above 15% simply magnifies severe repercussion impacts to the marine fisheries in both states, Oregon and California.

3. Any, after the fact, increases to the in-river sport's allocation profoundly impacts the ocean season setting process as Klamath Fall Chinook are the limiting factor in mixed-stock ocean Chinook fisheries, again in California and Oregon.

4. The ocean areas with high Klamath River Chinook impacts have already been seriously curtailed which is accomplished, to the extent possible, by season structures and foregone fishing opportunities. To the contrary, an in-river impact is and should be counted directly as fish for fish impact and only results in a benefit for a portion of the Klamath Management Zone economy which, unlike the ocean mixed stock fisheries, benefits a larger geographical area.

5. When fish are reallocated, like the attempt last year and the movement this year, it quickly becomes a public reality of the forces at work and the futility of enduring the allocation process with the known outcome being the elimination of the ocean fisheries within the Klamath Management Zone.

Please understand that our most adamant position, simply stated, is that the fisheries must manage with parity in the allocation process and always approach, with utmost care, to achieve equality for all concerned, and not just for one specific group at the expense of another. Never should one group's action be allowed to impact another group for no other reason than to achieve an inappropriate redistribution of a finite public resource. Too many other stakeholders stand to lose substantially in order for this type of action to be allowed to take place.

Thank you for the opportunity to comment.

Respectfully submitted,

Russ Crabtree
Executive Director for Port of Brookings Harbor
Vice Chairman for Klamath Management Zone Fisheries Coalition

SALMON MANAGEMENT OPTION HEARING SUMMARY

Date:	March 28, 2000	Hearing Officer:	Mr. Jim Caito
Location:	Red Lion Inn, Eureka, CA	Other Council Members:	None
		NMFS:	Mr. Joe Blum
Attendance:	37	Coast Guard:	BMCM Lars Kent
Testifying:	14	Salmon Team Member:	Mr. Scott Barrow
		Council Staff:	Dr. John Coon

Organizations Represented:

Klamath Fishery Management Council
Klamath Management Zone Fisheries Coalition
Humboldt Bay Marketing Association
Pacific Coast Federation of Fishermen's Associations

Synopsis of Testimony

Of the 14 people testifying:

- Eleven spoke primarily about the recreational fishery.
- Three spoke primarily about the commercial fishery.

Commercial Troll Comments

Trollers spoke in favor of commercial Option II with one amendment if sufficient Klamath River fall chinook impacts are available. The amendment would be: open the commercial fishery between the Oregon-California border and Humboldt South Jetty from August 16 through 31 or a 2,000 fish quota; all salmon, except coho; possession and landing limit of 30 chinook per day; minimum size limit of 26 inches (see attached written statement #1).

One troller noted by limiting Oregon coastal natural coho impacts to less than 80% of what the jeopardy standard allowed, significant harvest of chinook could be lost. Another troller was extremely frustrated with the lack of improvement in salmon fisheries over the past 14 years. He noted our regulations had gotten thicker and thicker while the stocks showed no improvement. He asked what the Council's goal and time-line were for recovering the stocks.

Recreational Comments

Anglers commenting on the recreational options made the following points or recommendations for the Klamath Management Zone (KMZ):

- All commenters were in favor of a two-fish bag limit (Option I) and most believe it is necessary to attract anglers to the area and to make charter fishing competitive with the southern areas.
- Several commenters stated the recreational season in the KMZ is overly shortened, and anglers are unable to take the agreed upon allocation each year, because the Klamath Ocean Harvest Model consistently over estimates recreational fishing effort and harvest.
- Some commenters noted the special restrictions in the KMZ lead to safety issues as anglers feel more pressure to go out in marginal weather conditions so as not to miss the limited fishing opportunity.
- One commenter stated anglers should not be restricted to only two hooks.
- One commenter stated the KMZ needs to have the season with the maximum number of fishing days

to provide the most economic benefits.

- Several commenters asked that the openings include a few days past July 4 to allow vacationers more opportunity.
- One commenter asked that the openings include the first week in August.
- One commenter proposed a new option which would have a special ocean fishery punch card that would allow just 15 salmon per year coupled with a less restrictive season.
- Reduce coho mortality by allowing anglers to keep the salmon they catch (see attached written statement #2).
- Stop reducing hatchery funding and production.

Written Statements

1. Letter of March 28, 2000 to Mr. Jim Lone from Mr. Dave Bitts.
2. Letters of July 27, 1998 and April 26, 1999 to California State Governors from Mr. Tom Williams.

PFMC
03/31/00

HUMBOLDT FISHERMEN'S MARKETING ASSOCIATION, INC.

216 H Street
Eureka, California 95501

(707) 443-0537 FAX (707) 443-1724

March 28, 2000

Mr. Jim Lone, Chair
Pacific Fisheries Management Council

Dear Mr. Lone:

I would like to propose the following amendment to Option 2 of the March 2000 ocean salmon option package, to be considered if Klamath impacts available to ocean fisheries are otherwise unused, and subject to OCN coho and coastal fall chinook constraints:

CA/OR border to Humboldt south jetty:

open Aug.16-31 or attainment of 2000 fish quota, chinook only, 30 fish landing and possession limit, 26" minimum size.

I believe this is the same as an opening we had in 1996, and thus should be consistent with the constraints on coastal fall chinook; I believe there is a minor OCN coho impact which will have to be accounted for.

Sincerely,

Dave Bitts

July 27, 1998

Governor Pete Wilson
State Capitol
Sacramento, CA 95814

Dear Honorable Governor Wilson:

I am concerned about the salmon fishing rules in the Klamath Management Zone along Humboldt County coast. The rules are resulting in the needless killing of many Silver Salmon.

As you are aware, Silver Salmon cannot be taken, only King Salmon can be taken in the Klamath zone. The problem arises in identifying the fish. Since Silver and King Salmon look very similar, each salmon caught must be brought in the boat, hooks removed, fish examined for black gum lines on lower and upper jaw, spots on tail to determine if it is a King or a Silver. If these markings are not present the fish is probably a Silver and must be returned to the ocean. Unfortunately, by this time (about two minutes) the fish just floats "head-up-dead". There were four fishermen on my boat recently and each fisherman repeated this scenario. If you have fished for Salmon you know they fight very vigorously until "boated". There is no way they can be identified until "boated". By this time the fish are spent and their mouths are severely torn up. Barbless hooks do little in reducing damage to the fish's mouth. Even those fish that swim away when released will have difficulty surviving due to their damaged mouths.

I recommend that fishermen be allowed to keep the salmon they catch regardless of the species. If this is unacceptable I believe the entire Northern California Coast be closed to salmon fishing until stocks have recovered sufficiently to allow the "take" of either species.

Very truly yours,

Tom Williams
P.O. Box 353
Trinidad, CA 95570
(707) 488-6065

cc: Times Standard

tw:pjw

April 26,1999

Governor Gray Davis
State Capitol
Sacramento,Ca. 95814

Dear Honorable Governor Davis:

Attached is a copy of a letter that I wrote to Governor Wilson last year. I have had no response from my letter and have concluded that the Governor's staff have no interest in the problem that I addressed in my letter.

The purpose of this letter is to bring the problem to your attention. Salmon season for 1999 is rapidly approaching and I've no reason to believe that the problem of killing and wasting silver salmon will change. I'm left with the feeling that no one in government gives a damn.

I hope to receive a response soon from someone on your staff telling me what a poorly informed fisherman I am; and that the rules are being changed for 1999 to address the problem.

Thank you for your valuable time and consideration in this matter

Very truly yours,

Tom Williams
P.O. Box 353
Trinidad, CA. 95570
(707) 488-6065

SALMON MANAGEMENT OPTION HEARING SUMMARY

Date:	March 27, 2000	Hearing Officer:	Mr. Roger Thomas
Location:	Flamingo Resort Hotel and Conference Center, Santa Rosa, CA	Other Council Members:	Mr. LB Boydstun
		NMFS:	Mr. Dan Viele
Attendance:	4	Coast Guard:	LT Ken Szeto ENS Ken Baltze
Testifying:	3	Salmon Team Member:	Mr. Allen Grover
		Council Staff:	Dr. Don McIsaac
Organizations Represented: Fishermen's Marketing Association of Bodega Bay Golden Gate Fishermen's Association			

Synopsis of Testimony

Of the 3 people testifying:

- One spoke primarily about the recreational fishery.
- Two spoke primarily about the commercial fishery.

Commercial Troll Comments

Testimony supported Option II and objected to a 50:50 split on Klamath fall chinook impacts between California and Oregon fisheries outside the Klamath Management Zone as unfair to the California fleet, since the Oregon fleet has only about half as many boats as the California fleet.

Testimony also spoke to the need for a closure around the 4th of July for the Bodega Bay Test Fishery, but did not support the two-day closure proposed by the California Department of Fish and Game. The preference of the testimony was for only a one-day closure on the 4th of July.

Recreational Comments

Testimony supported Option II, and strongly opposed Options I and III. Testimony also commented on the poor information base upon which coho impact estimates are being made, particularly with regard to the opportunity foregone as a result of uncertain information.

Written Statements

1. March 28, 2000 letter from Mr. Dave Bitts to Mr. Jim Lone.
2. March 27, 2000 fax from Mr. Larry Miyamura to the Council via Mr. Chuck Wise.

PFMC
03/30/00

HUMBOLDT FISHERMEN'S MARKETING ASSOCIATION, INC.

216 H Street
Eureka, California 95501

(707) 443-0537

FAX (707) 443-1724

March 28, 2000

Mr. Jim Lone, Chair
Pacific Fisheries Management Council

Dear Mr. Lone:

I would like to propose the following amendment to Option 2 of the March 2000 ocean salmon option package, to be considered if Klamath impacts available to ocean fisheries are otherwise unused, and subject to OCN coho and coastal fall chinook constraints:

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I believe this is the same as an opening we had in 1996, and thus should be consistent with the constraints on coastal fall chinook; I believe there is a minor OCN coho impact which will have to be accounted for.

Sincerely,

Dave Bitts

Dave Bitts

Mr. Chairman, members of the Council, this is the testimony of Larry Miyamura in regards to the proposed troll options for Horse Mountain to the Mexican border. Option II should be your choice. Voting for the 'Oregon Friendly Option' – Option I, would legitimize Bernie's political ploy of holding RK Coho hostage in exchange for a more liberal OCN percentage. What he's saying is that if Oregon can't play with it's toys, they don't want California to be able to play either. Are you going to determine our troll season politically, or scientifically. Option II conserves more OCN and Klamath stocks and should be the choice over Option I.

Thank you.

SALMON MANAGEMENT OPTION HEARING SUMMARY

Date:	March 28, 2000	Hearing Officer:	Mr. LB Boydstun
Location:	Moss Landing Community Center, Moss Landing, CA	Other Council Members:	Mr. Roger Thomas
		NMFS:	Mr. Dan Viele
Attendance:	50	Coast Guard:	None
Testifying:	12	Salmon Team Member:	Mr. Allen Grover

Organizations Represented:

Moss Landing Chamber of Commerce
Pacific Coast Federation of Fishermen's Associations
Golden Gate Fishermen's Associations

Synopsis of Testimony

Of the 12 people testifying:

- Three represented or commented primarily on the recreational fishery.
- Nine represented or commented primarily on the commercial fishery.

Commercial Troll Comments

- All speakers were in favor of troll Option II.
- Two speakers recommended moving the September closure south of Pedro Point to August.
- One speaker asked that any extra Klamath impacts be applied to San Francisco in May.
- One speaker asked that any extra Klamath impacts be moved to Fort Bragg.
- One speaker recommended that any extra Klamath impacts be moved to the Klamath Management Zone during August.
- One speaker recommended the Bodega Bay test fishery closure be limited to July 4.
- One speaker suggested opening the San Francisco area May 1 rather than later in the month.
- The entire West Coast should be opened to commercial fishing, because the fleet is so small.
- Pinniped problems can be minimized by retaining the mid-August to mid-September closure.
- Landing of 26-inch fish should be allowed after June 30.

Recreational Comments

- All speakers were in favor of sport Option II.
- Two speakers favored an earlier opening date in the Monterey area.

Other Testimony

- One speaker commented that 50/50 sharing of Klamath chinook is not fair.
- There are good signs of recovery of winter and spring chinook.
- Tougher timber harvest rules are needed.
- Hatchery operations need to reviewed in the context of native salmon recovery.
- Demand for troll-caught chinook is increasing.

No Written Statements Were Submitted at the Hearing

PFMC
03/30/00