

## Analysis of the Management Situation

made a decision to postpone any timber management activities in the Big Islands Management Area for the remainder of the plan implementation period due to the oil spill. The decision resulted in postponement of the 36 MMBF South Montague Island timber sale for the remainder of the plan implementation period, cancellation of precommercial thinning contracts for previously harvested areas on Montague Island, permitted Chugach Alaska Corporation to construct a road across National Forest lands between McLeod Harbor and Patton Bay to access their lands as required by ANILCA, and effectively precluded the agency from implementing the other 20 MMBF timber sale in the amended Forest Plan (St. Matthew's/Olson Bay Sale) for the same reason.

In this revision, the Forest Service will need to determine whether or not to resume timber management activities on lands suitable for timber production in Prince William Sound and Copper River. These decisions will be made in light of adjacent Native Corporation timber harvest, EVOS restoration efforts, and the purchase of Native lands by the EVOS Trustee Council to prevent additional timber harvest on Native lands.

The Forest needs to assess how it is going to meet the growing demand for personal and Alaska free use forest products around communities on the Forest.

The Forest needs to reassess its commitment to protect and manage the timber resource for long-term sustainability and production.

### *Revision Decision Space*

The amount of timberland found suitable for timber production is dependent upon how the Forest's land base is allocated, economic efficiency, and the priority given to vegetation/timber management. The final ASQ is dependent upon the number of suitable acres, methods of timber harvest allowed, and the resulting yields. Possible designation of wilderness, wild and scenic, Research Natural Areas or other special areas could have specific impacts on the Forest's ability to meet the needs for forest products production.

Alternatives will span the range from no commercial timber harvest to offering the maximum sustainable amount consistent with sound ecosystem management and legislated constraints. Even though one or more alternatives could have no ASQ, vegetation management for forest stewardship and resultant forest product outputs could still occur if designed to meet other resource objectives.

## 2. Fisheries Production

### *Current Management Situation*

Commercial fish harvest in the waters of Southcentral Alaska is an important component of local economies. Wild salmon harvest in Prince William Sound averaged approximately seven million fish per year for the past 30 years. Harvest of coho salmon and sockeye salmon attributable to Forest streams from the Copper River/Bering River is estimated to average around 500,000 per year since 1971. Streams within the Forest on the Kenai Peninsula are estimated to produce an annual harvest of 400,000 kings, sockeyes and cohos to the commercial fishery. Sport harvest within these same waters has also risen dramatically, increasing more than 100% in the waters within and adjacent to the Forest within the last 10 years. On the Chugach National Forest, a total of 170,000 anglers days were expended to capture approximately 210,000 fish. The American Sportfishing Association estimated the 1996 economic impact of recreational fishing in Alaska to be over one billion dollars. In combination with the 1996 ADF&G Sport Fisheries report the economic output of sport fishing created by fish produced on the Chugach is approximately 200 million dollars.



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Between 1985 and 1997, 60 anadromous fish and 27 inland fish enhancement projects coordinated by the Forest Service have provided an estimated annual production of one million pounds of fish. The Forest Plan projected enhancement activities called for 89 projects to be completed during the 1985-97 period, with an average annual production of an additional 3.6 million pound of fish.

Since the Forest Plan was written, enhanced or hatchery production of salmon has greatly increased. All five species of salmon are raised by the two private aquaculture associations running seven hatcheries adjacent to the Forest. These hatcheries do not directly impact the Forest aquatic ecosystem, as most salmon releases have been at the private hatchery sites. But the greatly enhanced fishery production, up to a 10 fold increase in pinks and chums in Prince William Sound, has created a greatly congested fishery. If current management continues, movement towards mixed stocks of fish and mixing of hatchery and wild stocks of salmon in Forest streams may be expected. To alleviate this problem, the hatcheries have relied on the release of salmon juveniles at a distant or remote release location from the hatchery. Many additional sites are and will be proposed. These sites will be recommended primarily for fisheries management purposes.

### *Benchmarks*

Benchmarks identify the minimum and maximum potential numbers of fish that could be derived from the streams on the Forest. Benchmarks are presented for both commercial and sport fisheries. The

*Figure IV-35: Minimum Benchmark - Commercial fish harvest (Thousands of adult fish per year)*

Species	Kenai Pen.	PWS	Copper & Bering Rivers	Forest
Coho	32	76	297	405
Chum	64	815	6	885
King	2	0	0	2
Pink	78	5200	6	5284
Sockeye	481	305	73	859
Forest Total	657	6396	382	7435

*Figure IV-36: Minimum Benchmark - Sport fish catch (Thousands of adult fish harvested per year)*

Species	Kenai Pen.	PWS	Copper River & Bering Rivers	Forest
Coho	8.7	6.5	15.2	30.4
Chum	.5	1.2	1.2	2.9
King	.2	0	.0	0.2
Pink	14.5	5.4	19.1	39
Sockeye	125.4	13.1	31.8	165
Dolly Varden	13.1	.7	6.3	26.5
Rainbow/Cutthroat	36.4	.3	1.9	71.5
Forest Total	198.8	27.2	75.5	335.5

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Figure IV-37: Maximum Benchmark - Commercial Fish Harvest (Thousands of adult fish commercially harvested per year)

Species	Kenai Pen.	PWS	Copper & Bering Rivers	Forest
Coho	120	175	301.5	596.5
Chum	94	1,265	6	1,365
King	2	0	0	2
Pink	220	6,900	6	7,126
Sockeye	620	586	88.4	1294.4
Total	1056	8,926	401.9	10,383.9

minimum benchmark assumes that all fisheries enhancement structures would cease to have maintenance, and benefits accrued from the “enhanced” habitat would cease. Also, all ongoing programs such as lake fertilization would be discontinued. Natural fish production is assumed to continue on Forest streams.

#### Minimum Benchmark - Commercial Fish

Figure IV-35 displays the amount of fish that would be harvested from the Forest if no management were to occur on the Forest (thousands of adult fish commercially harvested per year).

#### Maximum Benchmark - Commercial Fish

The maximum benchmark assumes that all available potential fish habitat would be opened up to anadromous fish spawning and rearing. The production level from current fish habitat improvements would continue into the future.

#### *Need to Establish or Change Management Direction*

Some of the specific direction for fish habitat management has been evolving, particularly the strong emphasis on habitat improvement projects for enhancement of commercial fish production. The Revision will need to emphasize Forest Service’s role in maintaining or restoring fish habitat at the 100% level of capability. Enhancement or rehabilitation of habitat will be in context of enhancing specific populations, particularly wild salmon populations.

Figure IV-38: Maximum Benchmark - Sport Fish Catch (Thousands of adult fish per year)

Species	Kenai Pen.	PWS	Copper River	Forest
Coho	32.6	15.0	15.5	63.1
Chum	.7	1.2	1.2	3.1
King	2	0	0	2
Pink	41	5.4	19.1	65.5
Sockeye	161	25.2	31.8	218
Dolly Varden	20.5	.7	6.3	27.5
Rainbow/Cutthroat	51.9	.3	1.9	54.1
Total	309.7	47.8	75.8	433.3

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The Forest Plan needs to look at possible allocations that address mariculture and aquaculture opportunities and effects on adjacent uses.

### *Revision Decision Space*

The Forest Plan needs to look at designating special areas within the Forest emphasizing wild fish production.

The Forest may set allocations that emphasize fisheries enhancement projects in watershed associations that are projected to receive high demand for additional fish for sport, personal or subsistence purposes.

Possible designation of wilderness, wild and scenic, or other special areas could have specific impact on the Forest's ability to meet the needs for enhancement or restoration of aquatic resources.

### 3. Minerals

#### *Introduction and Background*

Geologic, geophysical, and geochemical investigations along with surveys of known mines, prospects, and mineral occurrences have been conducted to evaluate the mineral resource potential of the Chugach National Forest, Alaska. The U. S. Geological Survey and the U. S. Bureau of Mines conducted these studies. Information from these studies was used to describe the mineral potential. Identified and potential resources include gold, copper, zinc, silver, lead, coal, oil, and possibly manganese, molybdenum, nickel, chromium, barium, cobalt, tungsten, and antimony. Significant amounts of gold and copper were produced on the Forest, in the past. Oil has been produced from the Katalla/Controller Bay area of the Forest.

The Forest Service considers mineral exploration and development to be important parts of its management program. It cooperates with the Department of the Interior (USDI) in administering lawful exploration and development. While the Forest Service is mainly involved with surface resource management and protection, it recognizes that mineral exploration and development are ordinarily in the public interest and can be compatible in the long term, if not immediately, with the purposes for which National Forests were established.

National Forest System lands are generally available for mineral exploration and mining unless specifi-

Figure IV-39: Status of the Mineral Estate

Mineral Estate Status	Acres
National Forest System, surface and subsurface	4,545,400*
Acquired Lands	500
ANILCA Copper River Addition	801,600
Katalla Oil Exchange Area	56,400
National Forest Surface, Native Corporation Subsurface (reserved minerals)	48,100
Private/State Surface and Subsurface	864,700
<b>Total</b>	<b>6,316,700</b>

\*Includes 84,400 acres of fresh water lakes