

almon fisheries are vitally important to the regional economy and an essential part of the long-standing social fabric of Southeast Alaska. Annual harvest levels of salmon in Southeast Alaska are subject to provisions of the Pacific Salmon Treaty (Treaty) between the U.S. and Canada. The Treaty addresses conservation and allocation of salmon stocks that migrate across the international boundary and are harvested in the fisheries of both nations. Thus, salmon are a shared resource.

A high degree of cooperation and coordination is required between the nations to prevent overfishing, provide optimum production, and ensure that each country receives benefits that are equivalent to the production of salmon in its waters.

Left: A Chinook salmon is released. Photo by Ken Marsh.

#### FEDERAL FUNDING

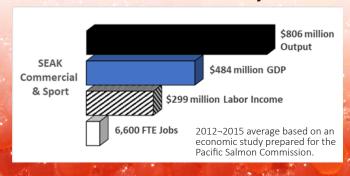
The newly negotiated 2019 revision to the Pacific Salmon Treaty (Treaty) requires the State of Alaska to manage fisheries and allocations for specific areas and salmon species, and to implement numerous stock assessment, catch monitoring, and catch sampling programs. Alaska is engaged in three chapters of the Treaty requiring participation in two bilateral Panels and eight bilateral technical committees.

U.S. obligations under the Pacific Salmon Treaty are fundamentally a federal commitment. Funding is requested annually for the State of Alaska to meet U.S. obligations. This funding is critical for providing the data, analyses, fishery management, and bilateral coordination essential to implement the Treaty. In federal FY20, Alaska requested \$8,990,650 and received a base grant of \$5,615,000.

The 2019 Treaty also calls for a 7.5% reduction in Chinook salmon harvest levels in Southeast Alaska to meet the provisions of the Endangered Species Act. Subsequently, U.S. negotiators agreed that \$22,400,00 in mitigation funding should also be provided to offset economic consequences of the harvest reduction.

The goals and objectives of the Southeast Alaska Chinook Salmon Mitigation program are to mitigate economic impacts of the 7.5% harvest reduction by increasing production of and access to hatchery-produced salmon in Southeast Alaska. Primary impacts of the Chinook salmon harvest reduction are on "hook and line fisheries," which include commercial troll, sport fish, and associated interests.

#### **Southeast Alaska Communities Rely on Salmon**



## TRANSBOUNDARY RIVERS

**CHAPTER 1: Transboundary Rivers** (Taku, Stikine, Alsek) requires abundance-based management of Chinook, sockeye, and coho salmon returning to transboundary rivers based upon specified stock assessments, required conservation measures, and harvest sharing agreements. A jointly implemented sockeye salmon enhancement program in the Taku and Stikine watersheds is required. The sockeye enhancement specifications provide strong incentives for bilateral agreement and provide a bridge between the U.S. and Canada concerning catch shares in both rivers.

# **NORTHERN BOUNDARY AREA**

**CHAPTER 2**: **Northern Boundary Area** (areas adjacent to Alaska's southern boundary with British Columbia) defines obligations that limit (1) the interceptions of Canadian Nass and Skeena-origin sockeye salmon in Southeast Alaska fisheries, and (2) the interceptions of Alaska-origin pink salmon in Canadian fisheries through an abundance-based management regime. Obligations include providing forecasts, fishery monitoring, catch sampling for age and origin, and extensive bilateral coordination.

## **CHINOOK SALMON**

**CHAPTER 3: Chinook Salmon** (covers Chinook salmon throughout the geographic range of the Treaty) is complex; it lists individual stocks or stock groups with specific management and monitoring measures and lists extensive duties and assignments to the Chinook Technical Committee. Chapter 3 obligations for all Treaty fisheries include annual estimation of catch, exploitation rates and escapement, as well as forecasting annual abundance indices. Thus, the management regime is data intensive, and is difficult and costly to fully implement.

### SOUTHEAST ALASKA CHINOOK SALMON FISHERY MITIGATION PROGRAM

he Southeast Alaska Chinook Salmon Fishery Mitigation Program was established in 2009 to alleviate economic impacts of the 15% reduction in Chinook salmon harvest levels under the 2009 revision of the Treaty. This program continues to be necessary due to an additional 7.5% reduction in Chinook harvests under the 2019 revision. Alaska's willingness to accept another loss to Chinook fisheries was predicated, in part, on a mitigation package designed to offset economic consequences.

The Alaska Department of Fish and Game (ADF&G) is the State entity that administers program funds and is advised by a Stakeholder Panel of representatives from sport, troll, gillnet, and seine fisheries, hatchery operators, and local communities. The Panel has identified actions that would provide economic benefits to offset the losses to Treaty harvest shares. Projects to increase salmon production ranked in highest priority.

The contributions of hatchery raised Chinook and coho salmon are important to the "hook and line" fisheries, including commercial troll and sport fisheries, most affected by the reduction in Treaty harvests. Alaska hatchery-produced Chinook provide significant benefits because they may be harvested in addition to the annual Chinook harvest quota set under the Treaty.

TOTAL COST	\$22.4 M
FY20 FUNDING RECEIVED	\$6.2 M
FY21 FUNDING REQUEST	\$16.2 M



Chinook salmon fry. Photo by Ryan Ragan.

#### FY20 Investments

- \$4.7 M in Department of Interior funding is supporting the construction of two automated tagging trailers, tagging supplies, and operations.
- \$1.5 M in Department of Commerce funding is being allocated to expand hatchery infrastructure at four facilities to accommodate increases in salmon production.

## Program components include the following:

- Hatchery fish marking, tagging, and evaluation \$4.7 M (included in FY20 funding). Alaska is held accountable for gaps in its information by what is known as the risk factor. In short, the risk factor considers potential errors in Alaska's data and reduces Chinook harvest levels accordingly. Alaska is interested in reducing the annual risk factor and improving access to hatchery-produced fish by expanding marking and tagging rates at Alaska hatcheries.
- <u>Hatchery enhancement projects</u> \$17.7 M (\$1.5 M included in FY20 funding). Alaska is interested in replacing as much of the 7.5% reduction taken in the 2019 agreement as possible with increased hatchery production. Hatchery production will be expanded across seven locations for an increase of up to 2.5 million yearling releases per year.
- <u>Hatchery Research</u>. Funds may also be used to develop brood stocks and to conduct critical hatchery-related research into marine survival, alternate life history traits, migration, and other information that can increase fishing opportunities.

