## PROPOSAL 127

## 5 AAC 04.362. Guideline harvest range for Port Clarence District.

Repeal the Guideline Harvest Range for the Port Clarence District and replace with the *Port Clarence District and Pilgrim River Salmon Management Plan*, as follows:

## 5 AAC 04.362. Port Clarence District Salmon and the Pilgrim River Sockeye Salmon Management Plan.

- (a) The purpose of this management plan is to provide the department with management guidelines for the sustained yield of sockeye salmon stocks in Port Clarence District and in the Pilgrim River from July 1 through August 15.
  - (1) In the subsistence fishery,
    - (A) If the average sockeye salmon escapement from the previous two years is below the lower bound of the Pilgrim River sockeye salmon escapement goal range, the subsistence harvest limit for sockeye salmon will be no greater than 25 sockeye salmon per household;
    - (B) If the average sockeye salmon escapement from the previous two years is between the lower bound and midpoint of the Pilgrim River sockeye salmon escapement goal range, the subsistence harvest limit for sockeye salmon will be no greater than 50 sockeye salmon per household;
    - (C) If the average sockeye salmon escapement from the previous two years is between the midpoint and upper bound of the Pilgrim River sockeye salmon escapement goal range, the subsistence harvest limit for sockeye salmon will be no greater than 100 sockeye salmon per household;
  - (2) If the Pilgrim River sockeye salmon escapement goal is projected to be achieved, a commercial fishery may be opened by emergency order in the Port Clarence District consisting of not more than
    - (A) two 24-hour periods per week if the average sockeye salmon escapement from the previous two years is above the midpoint of the Pilgrim River sockeye salmon escapement goal range,
    - (B) two 48-hour periods per week if the average sockeye salmon escapement from the previous two years is above the upper bound of the Pilgrim River sockeye escapement goal range.
- (a) Notwithstanding the provisions of (a), emergency orders may allow additional inseason adjustments to fishing time, area, and gear, including waiving subsistence limits and implementation of fishery closures, to achieve escapement goals and ensure optimal utilization of salmon harvestable surpluses.

What is the issue you would like the board to address and why? 5 AAC 04.362 was promulgated in 2007 when there were only four years of weir counts and an incomplete limited

understanding of the adverse impacts of large sockeye salmon escapements on the health of Salmon Lake. Beginning in 2009, the stock underwent a collapse due to successive large escapements ranging from 35,000–85,000 sockeye salmon from 2003–2007 that most likely exceeded the carrying capacity of the lake. Beginning in 2014, runs to Salmon Lake began to increase dramatically again resulting in record-setting subsistence harvest levels in the Pilgrim River and Port Clarence District. Recent limnological, smolt outmigration, and adult age, sex and size composition data indicate that another dramatic decline in runs is likely in the coming years.

At the time 5 AAC 04.362 was adopted, an arbitrary threshold level of inriver abundance was put forward as a trigger point to allow commercial fishing. This was largely due to incomplete knowledge regarding the level of subsistence need on the Pilgrim River, as well as an absence of a ground-based escapement goal for sockeye salmon. Since this regulation was adopted, several more years of high quality escapement, age, and subsistence harvest data have been collected.

These data have led directly to the department proposing a weir-based goal of 6,800–30,000 sockeye salmon, and more reliable estimates of subsistence harvests needs in high abundance years (10,000–15,000 fish). If the new proposed escapement goal range is adopted, subsistence and commercial fishery management should be predicated on escapements evaluated in the context of the goal, cumulative impacts of recent year escapements on the capacity of Salmon Lake to support rearing sockeye salmon, and anticipated subsistence harvest needs. Specifically, we recommend amending 5 AAC 04.362 to an escapement-based management plan and harvest policy that takes into account impacts to Salmon Lake of recent year escapements, current year escapement observations and projections and subsistence harvest needs.