

Agenda Item #23  
Dec. 1977

Initial Assessments of the  
Distribution, Abundance, and Quality  
of Subtidal Clams in the S.E. Bering Sea

by

Steven E. Hughes<sup>1/</sup>  
Richard W. Nelson<sup>1/</sup>  
Robert Nelson<sup>2/</sup>

A Cooperative Industry-Federal-State of Alaska Study

sponsored by

New England Fish Company  
Snow Food Products, Borden, Inc.  
Campbell Soup Company  
Gorton Division, General Mills  
National Marine Fisheries Service  
Alaska Department of Fish and Game  
Alaska Department of Commerce  
University of Alaska  
Alaska Sea Grant  
Food and Drug Administration

November 1977

<sup>1/</sup> National Marine Fisheries Service, Seattle, Washington  
<sup>2/</sup> Alaska Department of Fish and Game, Dutch Harbor, Alaska

## Summary

A six-week joint Industry-Federal-State of Alaska venture organized to conduct initial assessments of the distribution, abundance and quality of subtidal clam resources in the S.E. Bering Sea was concluded in August 1977. Direct funding for the venture was composed primarily of \$133,000 from four industry companies and \$40,000 of State of Alaska money. NMFS was responsible for the scientific planning and execution of the venture and ADF&G acted as fiduciary.

The survey was conducted over a 6700-square mile area in offshore waters of the S.E. Bering Sea and along inshore waters of the Alaska Peninsula.

Concentrations of surf clams were located along 1600 square miles of the Alaska Peninsula region from port Moller to Ugashik Bay, primarily at depths of 13-18 fms. Results of the survey indicate the surf clam biomass in the area to be 248,000-324,000 metric tons of whole clams with an annual potential yield of 19-25 million pounds of meats (preliminary yield estimate). The harvestable surf clam resource in this region ranges in size from 90-135 mm and averaged 110 mm in length. At this size, the round weight is about 3 animals per pound. Food quality studies indicate excellent texture, flavor and general product acceptance. Results of all PDP (paralytic shellfish poison) tests on surf clams were completely negative, however tests of other species in this area did contain low toxic levels in the visceral portion indicating that causative organisms were in the area at some point in time.



**U.S. DEPARTMENT OF COMMERCE**  
**National Oceanic and Atmospheric Administration**  
NATIONAL MARINE FISHERIES SERVICE  
Northwest and Alaska Fisheries Center  
Division of Resource Assessment and  
Conservation Engineering  
2725 Montlake Boulevard East  
Seattle, WA 98112

November 22, 1977

Mr. Jim Branson  
Executive Director  
North Pacific Fishery  
Management Council  
P.O. Box 3136DT  
Anchorage, AK 99501

Dear Jim:

Please find the enclosed report and separate summary of the 1977 joint Industry-Federal-State of Alaska Bering Sea clam survey. Copies of the report are also being mailed out today to members of the SSC from Dr. Alverson's office.

Under Dr. Fukuhara's advice and scheduling, I have made arrangements to be in Anchorage November 30-December 1 or 2.

Looking forward to seeing you then.

Sincerely,

Steve Hughes  
Leader, Latent Resources Task

cc: Fukuhara  
Hayes  
Alverson

Enclosures

