SCHOOL OF AQUATIC AND FISHERY SCIENCES
UNIVERSITY OF WASHINGTON

2026 Autumn Seminar Series

November 12, 4:00PM
Thursday (Th) (FSH 102)

Climate change, crab collapse, and cascading consequences in the Bering Seas

Cody Szuwalski, ***Research Fishery Biologist***
Alaska Fisheries Science Center, NOAA

The Bering Sea supports some of the world's most productive fisheries. Sea ice plays a central role in this ecosystem, but northern latitudes are warming rapidly, and the consequences are becoming increasingly apparent. The collapse of eastern Bering Sea snow crab provides a striking example of how climate change can alter marine populations. I will explore multi-pronged efforts to understand the collapse, including: modeling to evaluate competing hypotheses involving predation, disease, starvation, and fishing impacts; fieldwork to measure the energetic condition of snow crab in the ocean; and laboratory experiments to understand starvation dynamics. The consequences of collapse extend beyond population decline. Unprecedented fishery closures, hybridization between snow and Tanner crab, and changes in maturity schedules highlight the potential for cascading socioeconomic and ecological impacts. I will end by discussing the challenges these changes pose for fisheries management and consider how we can respond to an increasingly unpredictable Bering Sea.

Cody Szuwalski studies the population dynamics of commercially important crab species in Alaska. His research focuses on understanding how climate, ecology, and fishing interact to influence marine populations and how fisheries management can respond when those relationships change. Much of his recent work has focused on the collapse of snow crab in the eastern Bering Sea, including research into the mechanisms behind the collapse and its implications for fisheries and ecosystems. He has served on the North Pacific Fishery Management Council's Crab Plan Team and worked on stock assessment and management strategies for Bering Sea crab stocks. Cody holds a PhD from the University of Washington and has worked on fisheries and aquatic ecosystems in the United States and internationally.

Accommodation requests related to a disability or health condition should be made before the event by contacting Jon Wittouck, Assistant Director, Facilities for SAFS: 206-616-8552/ wittouck@uw.edu.

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