Fish Assemblages in Nearshore Waters of Chukchi and Beaufort Seas, Alaska

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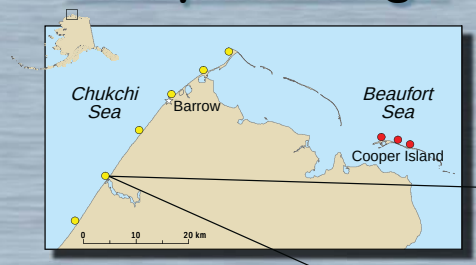
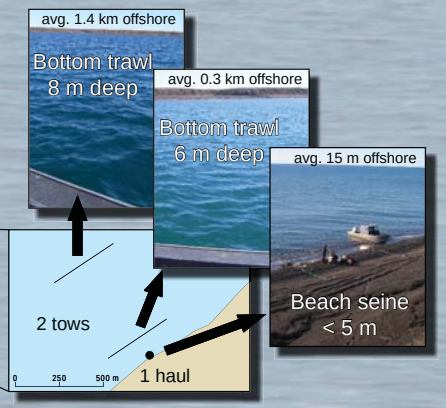
Arctic is vulnerable to climate change and increased demand for oil and gas exploration

Problem: Limited and outdated information on use of nearshore habitats by fish in the Chukchi and Beaufort Seas

Objective: Identify distribution and relative abundance of fish in nearshore waters

Sample design



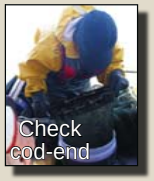


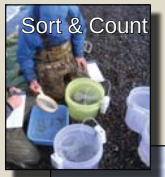
- 9 locations
- 9 beach seine hauls
- 18 bottom trawls

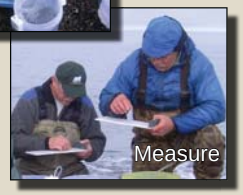
Methods

- Beach seine

- Bottom trawl

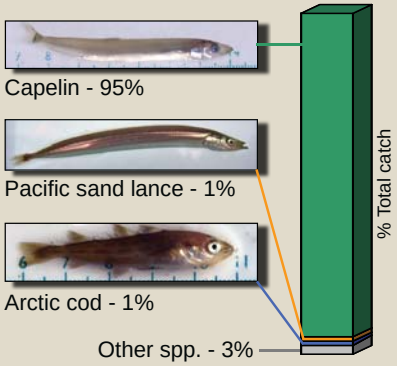






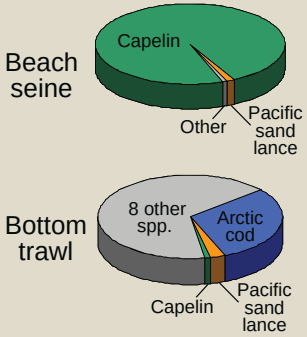
Results

Total catch



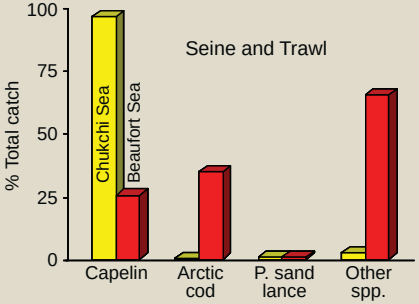
- 3 spp. accounted for 97% of catch
- Juveniles dominated catch

Catch by gear



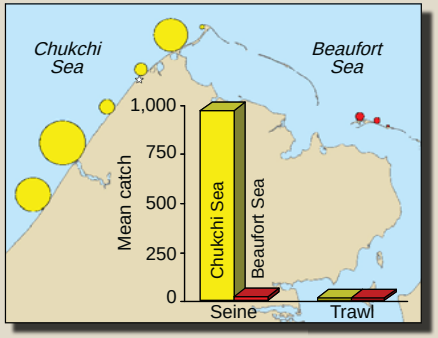
- Capelin most abundant in seine
- Arctic cod most abundant in trawl

Species distribution



- Capelin most abundant in Chukchi
- Arctic cod most abundant in Beaufort

Catch by area



- Catch greatest in Chukchi Sea
- Catch greatest with beach seine

Conclusions

★ Arctic nearshore waters used by forage fish, especially capelin
★ Catch & composition differed with gear type/water depth
★ Catch & composition differed between Chukchi and Beaufort Seas

Future plans

- Resample sites in 2008 and 2009 to establish a baseline for long-term monitoring of nearshore fish in the Arctic