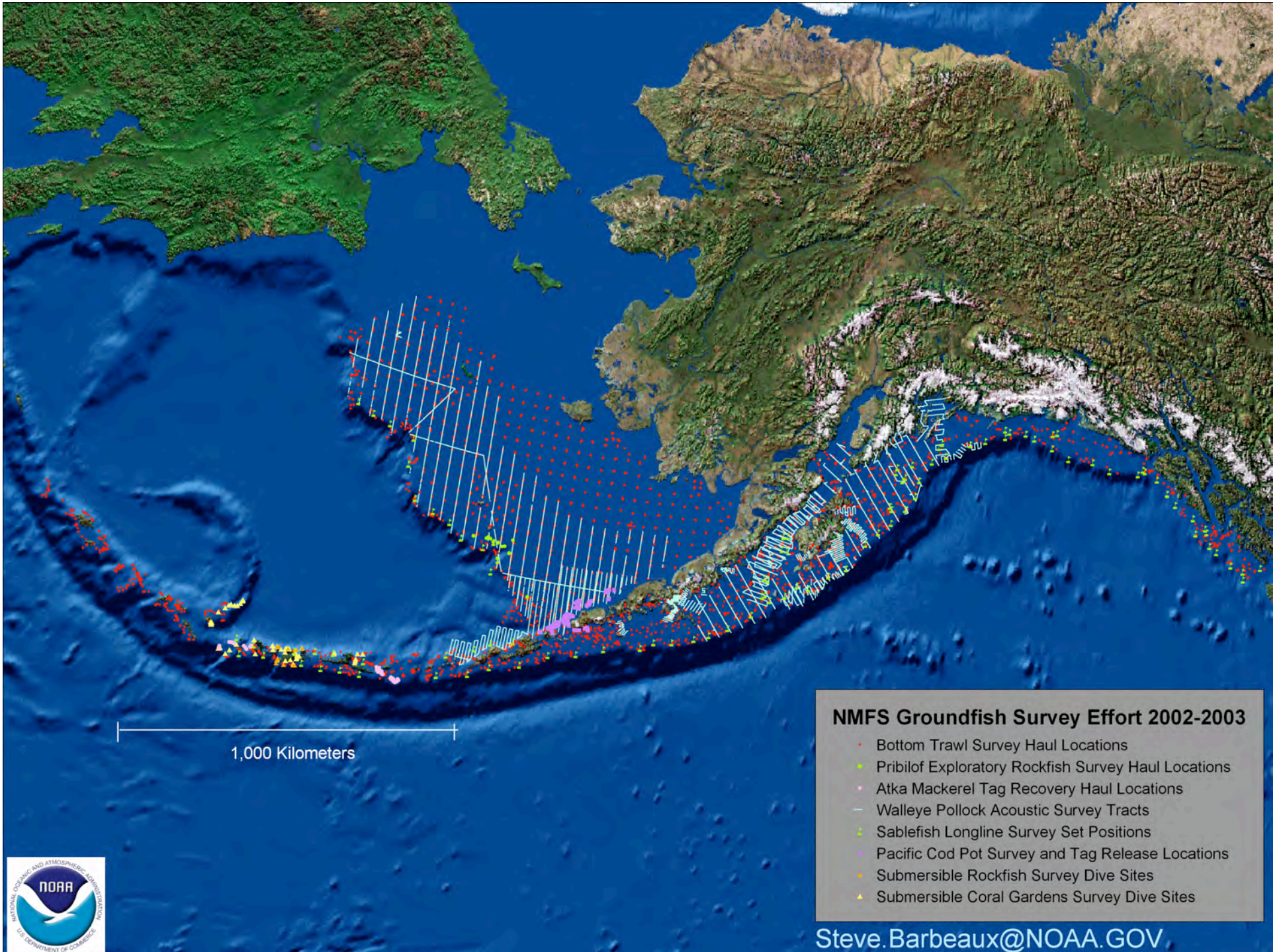
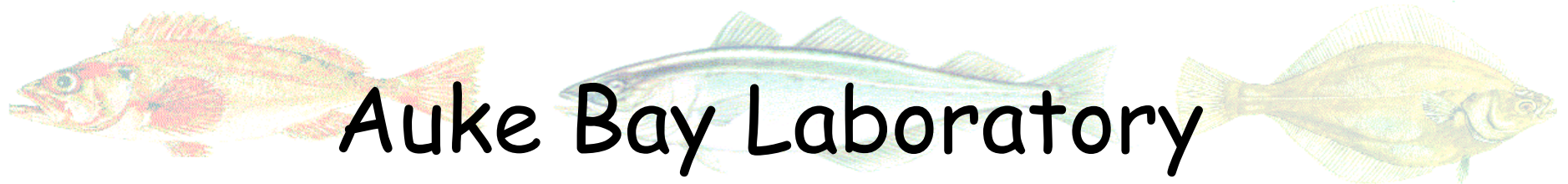


Overview of NMFS AFSC Field Activities

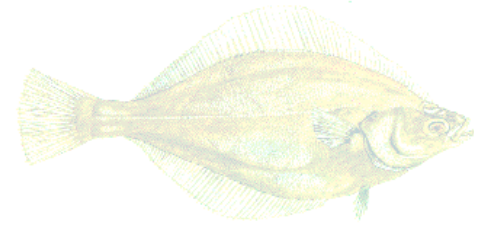
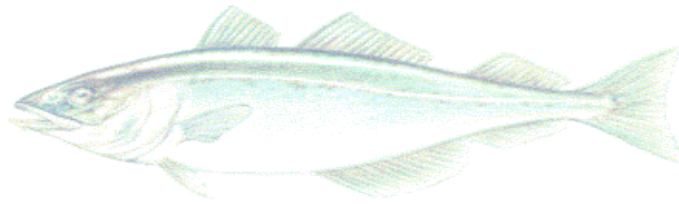
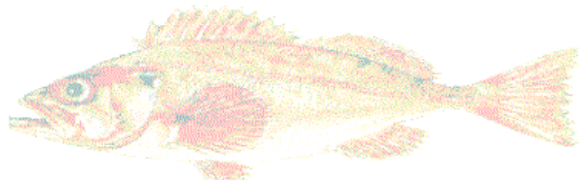
**Alaska Fisheries Science Center
7600 Sand Point Way NE
Seattle, WA**





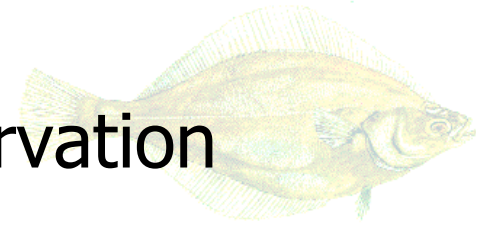
Auke Bay Laboratory

- **Longline survey**
- **GOA stock assessments for rockfish, shark, Sablefish.**
- **Ocean Carrying Capacity Program (OCC)**
- **Bering – Aleutian Salmon International Survey (BASIS)**



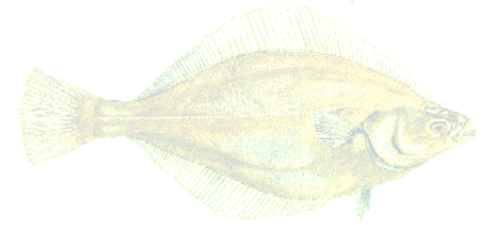
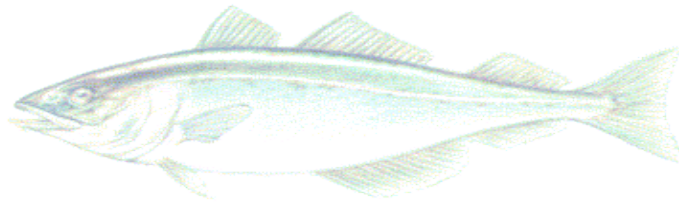
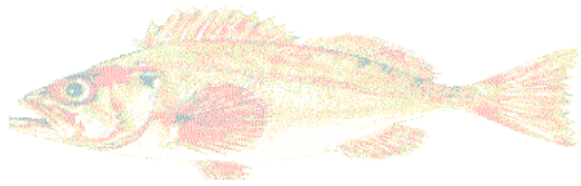
Planned longline survey for 2005 - 2006

YEAR	MONTHS	SURVEY AREA	SURVEY TYPE
2005	2 Jun-30 Aug	Gulf of Alaska	longline
	2 Jun-30 Aug	Bering Sea	longline
2006	2 Jun-30 Aug	Gulf of Alaska	longline
	2 Jun -30 Aug	Aleutian Islands	longline



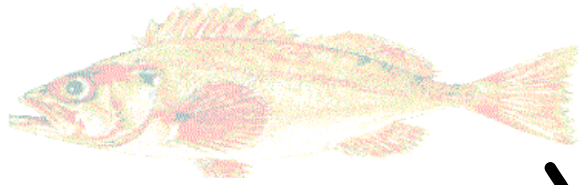
Resource Assessment and Conservation Engineering (RACE) Groundfish Assessment Program

- **Bottom trawl surveys to assess abundance of groundfish in the Gulf of Alaska, Aleutian Islands and eastern Bering Sea**
- **Research on survey methodology**
- **Research on the design and configuration of commercial and research fishing gears**
- **Research on factors influencing the life history (maturity) and distribution of groundfish**
- **Research on habitat associations of groundfish and responses of fish to habitat disturbance**

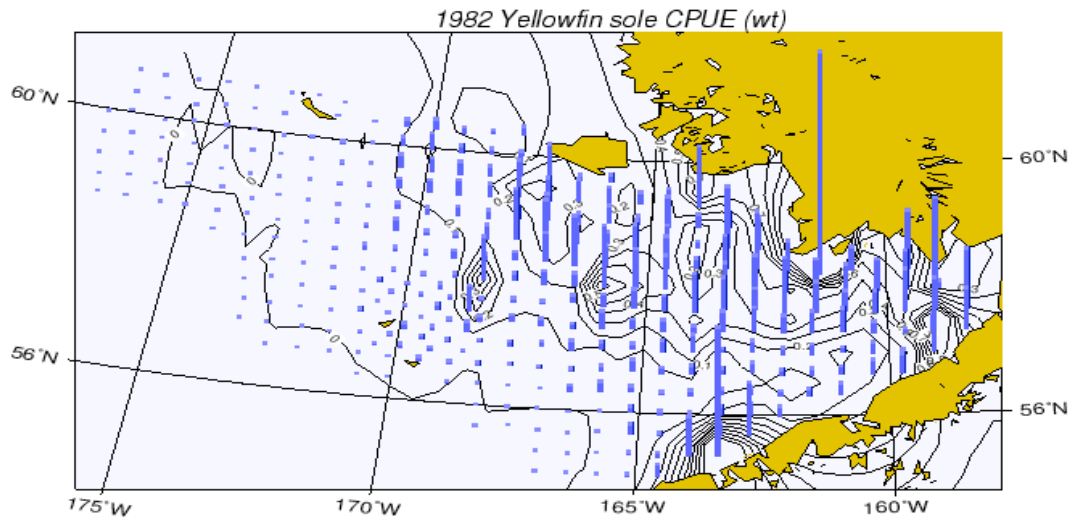


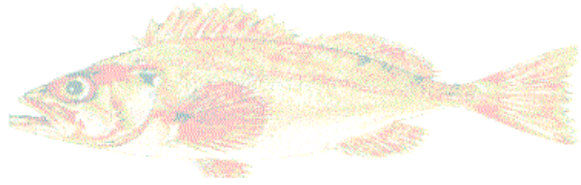
Planned GAP Research Cruises for 2005 - 2006

YEAR	MONTHS	SURVEY AREA	SURVEY TYPE	No. Stations
2005	May - 28 July	southeast Bering Sea shelf	Trawl	405
	May-Aug	GOA shelf / slope	Trawl	777
	Aug-Sep	Mesopelagic survey	midwater trawl	8
2006	May-July	southeast Bering Sea shelf	Trawl	405
	May-July	AI shelf	Trawl	430
	May-July	southeast Bering Sea slope	Trawl	230



Yellowfin sole





RACE

Midwater Assessment & Conservation Engineering

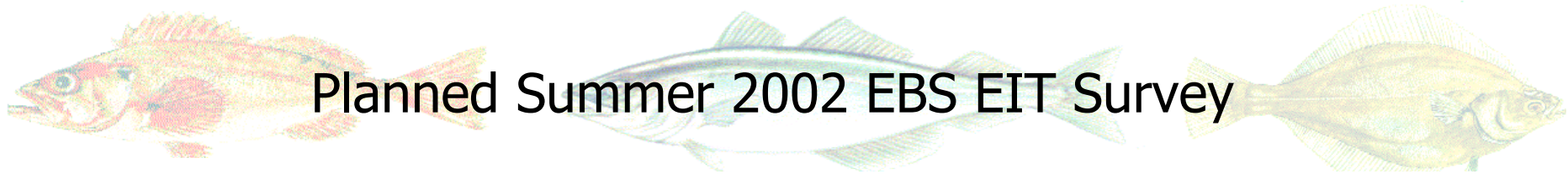
- **Echo Integration/Trawl Surveys to assess abundance of pelagic pollock in the Gulf of Alaska and eastern Bering Sea**
- **Research on fisheries acoustics and survey methodology**
- **Research involving innovative applications of acoustics in fisheries science**
- **Research on the design and configuration of commercial and research fishing gears**
- **Research on bycatch reduction devices**
- **Research on impacts of fishing on habitat**



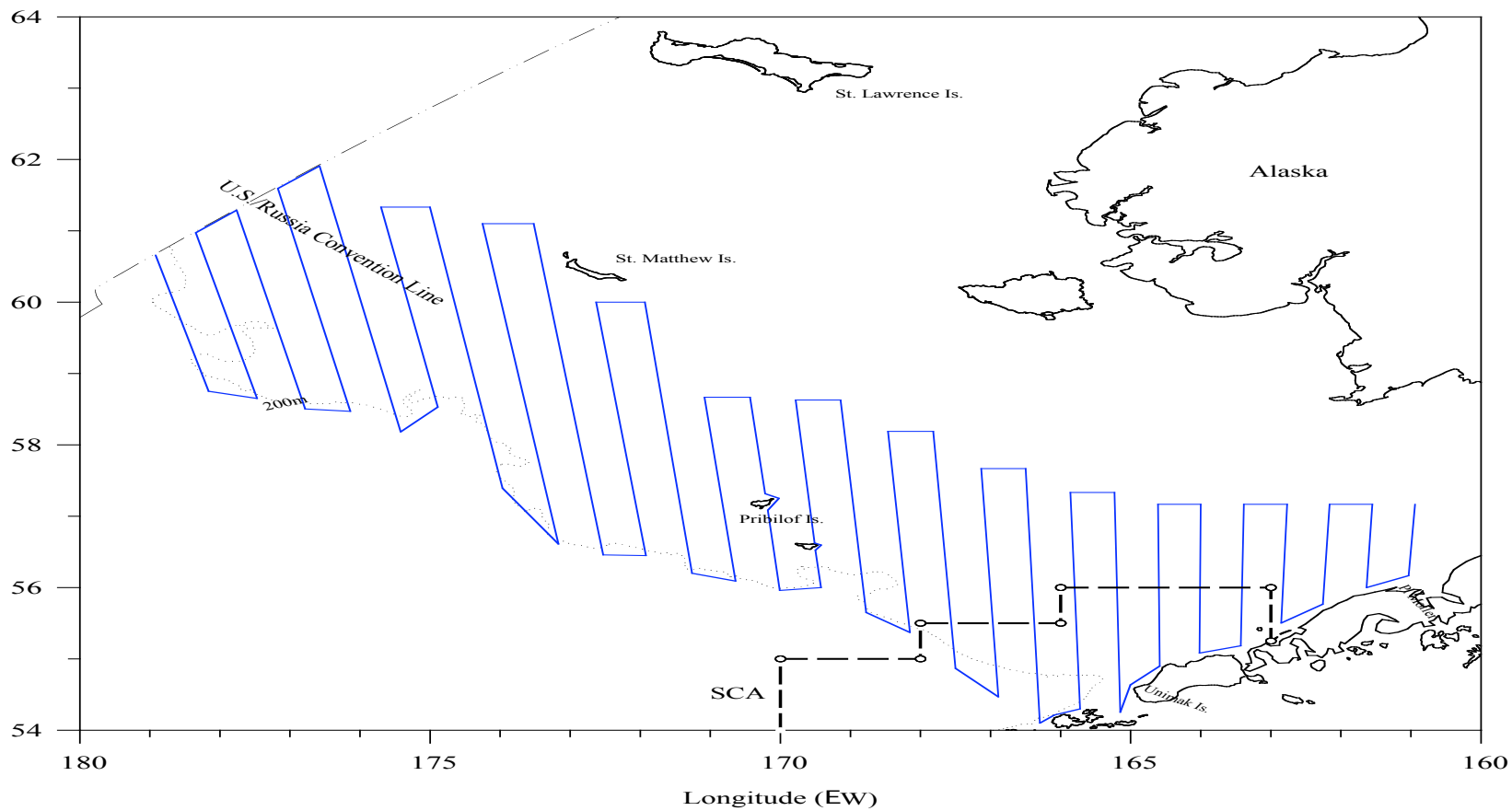


Planned MACE and FOCI Gulf of Alaska Research Cruises for 2005 - 2006

<u>YEAR</u>	<u>MONTHS</u>	<u>SURVEY AREA</u>	<u>SURVEY TYPE</u>	<u>VESSEL</u>
2005	Feb	Shumagin Islands	acoustic-trawl	<i>Miller Freeman</i>
	24 Mar - Apr 3	Shelikof Strait	acoustic-trawl	<i>Miller Freeman</i>
	May	central Gulf of Alaska	ichthyoplankton	<i>Miller Freeman, Ewing</i>
	5 Jun - 3 Aug	western central GOA	acoustic-trawl	<i>Oscar Dyson</i>
	Sep	western central GOA	ichthyoplankton	<i>Oscar Dyson</i>
2006	Feb	Shumagin Islands	acoustic-trawl	<i>Oscar Dyson</i>
	Mar	Shelikof Strait	acoustic-trawl	<i>Oscar Dyson</i>
	May	central Gulf of Alaska	ichthyoplankton	<i>Oscar Dyson</i>
	Jun-Jul	eastern Bering Sea shelf	acoustic-trawl	<i>Oscar Dyson</i>
	Aug	Kodiak Island	acoustic-trawl	<i>Miller Freeman</i>
	Sep	TBD	ichthyoplankton	<i>Miller Freeman</i>



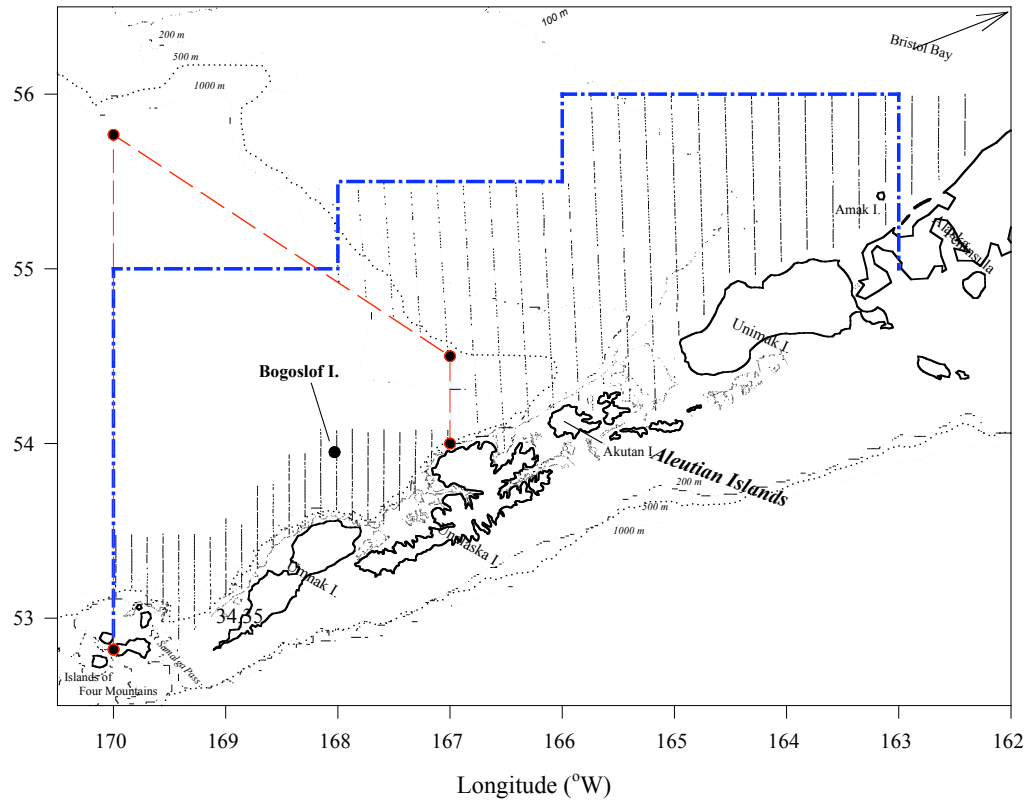
Planned Summer 2002 EBS EIT Survey



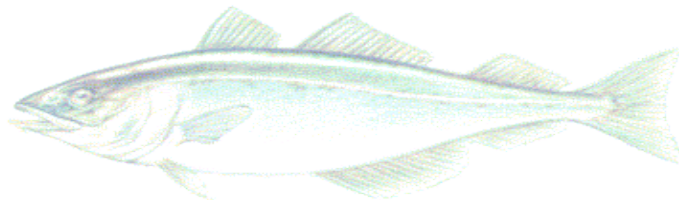
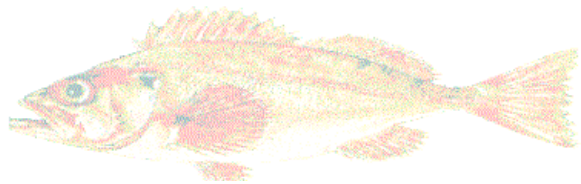
Proposed June - July 2002 acoustic-trawl survey of the eastern Bering Sea shelf and slope.



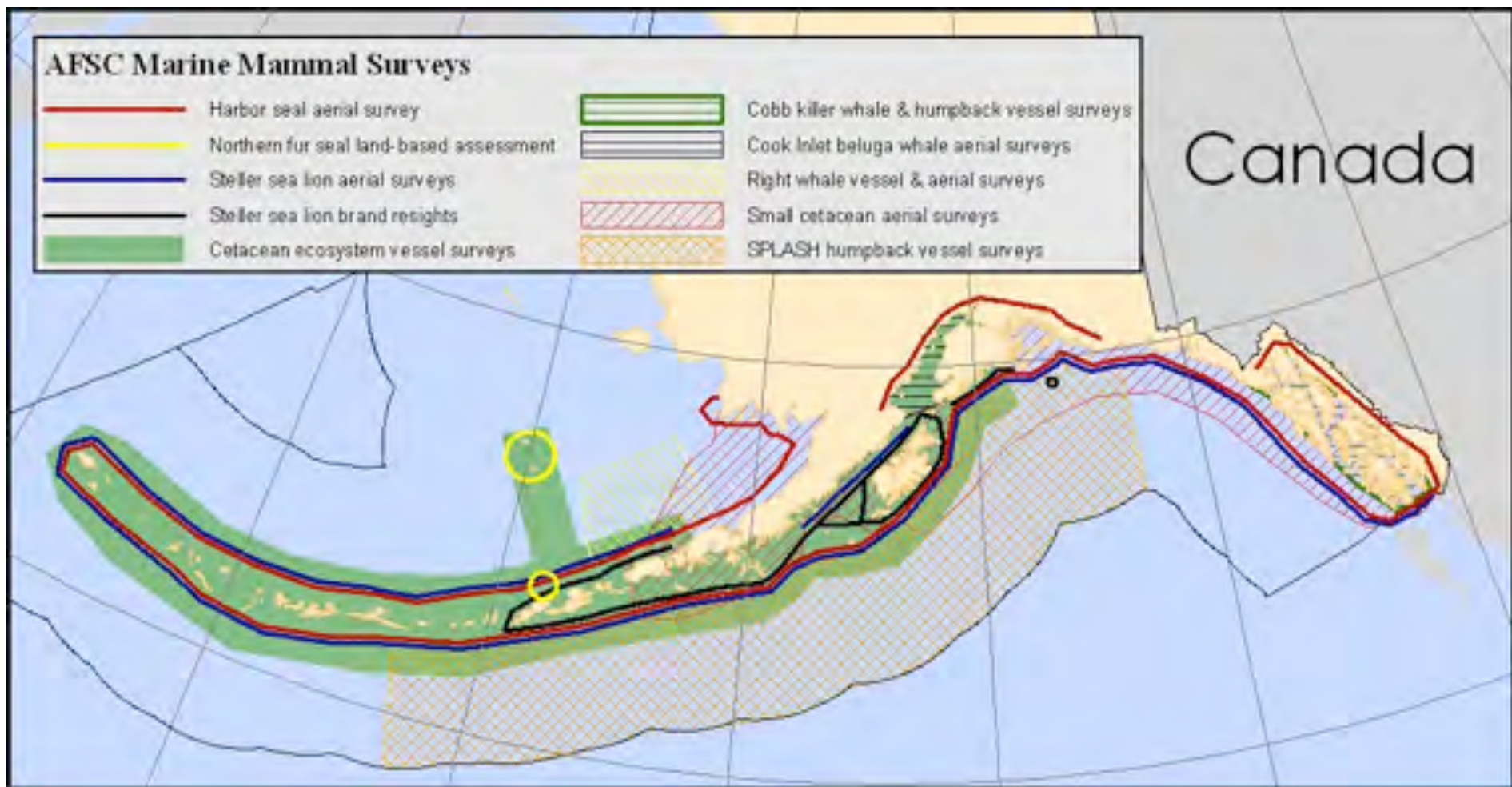
Winter 2002 EIT Survey of EBS Shelf and Bogoslof Region

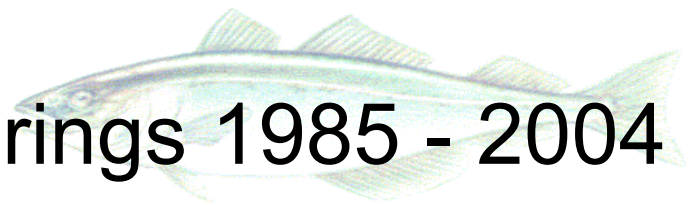


February - March 2002 acoustic-trawl survey of the southeastern Bering Sea shelf and southeastern Aleutian Basin near Bogoslof Island.

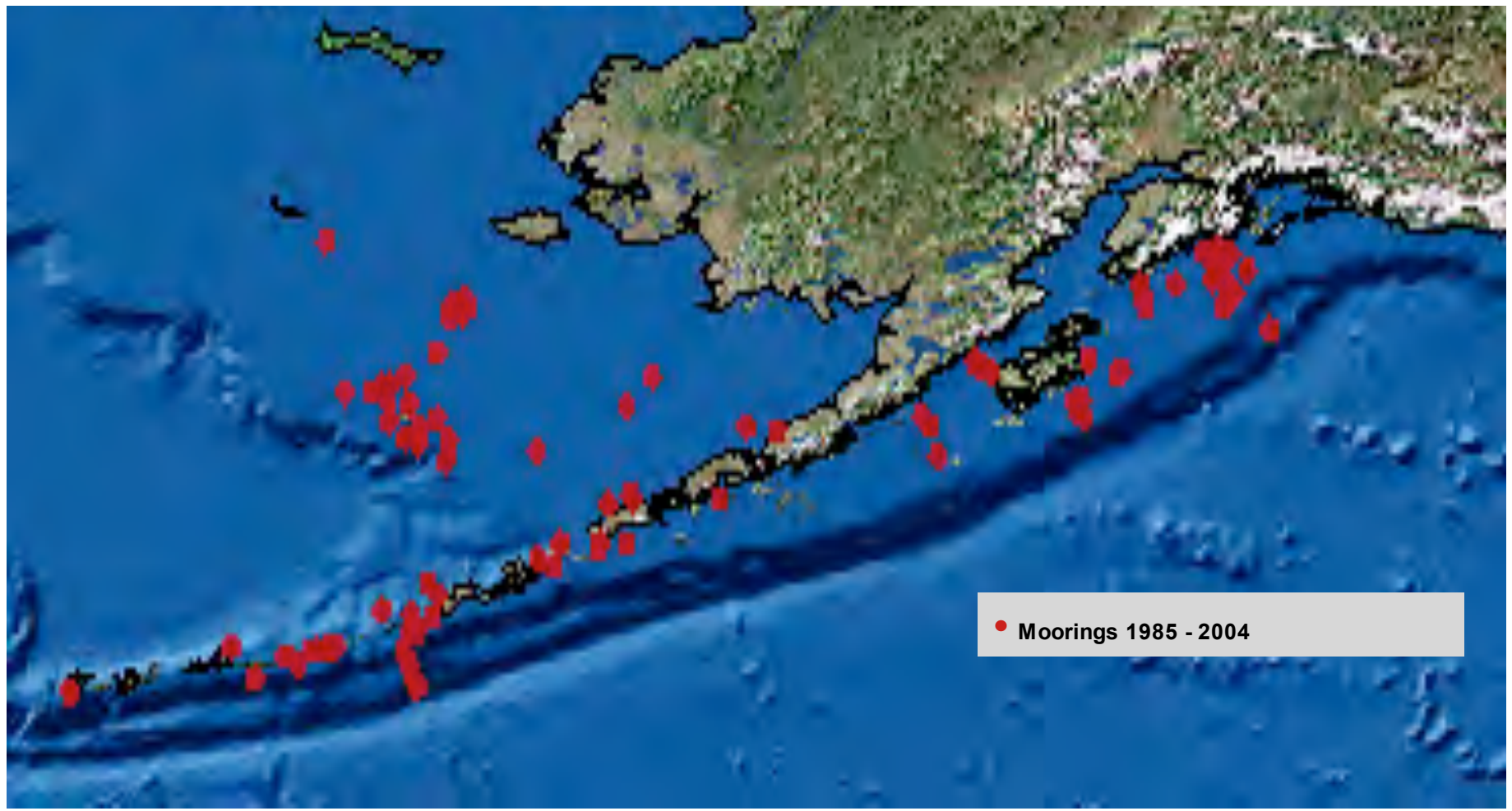


National Marine Mammal Laboratory

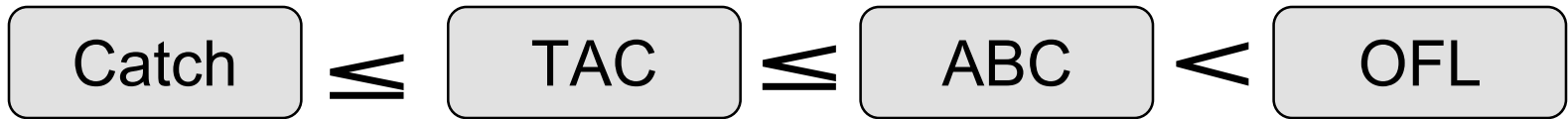




PMEL Moorings 1985 - 2004



Status of Stocks and Multispecies Assessment Program

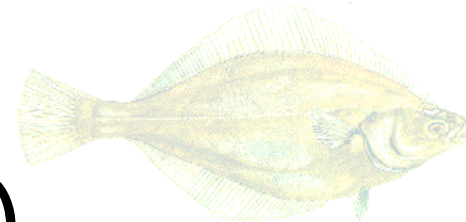
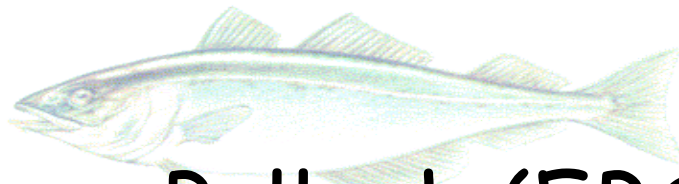
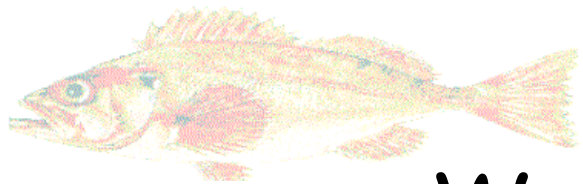


Bering Sea Aleutians

- *Pollock BS
- *Pollock AI
- *Pacific cod
- *Yellowfin
- *Greenland turbot
- *Arrowtooth flounder
- *Rock sole
- *Alaska Plaice
- *Flathead sole
- *Sablefish
- *Atka mackerel
- *Pacific ocean perch
- *Northern rockfish
- Shortraker/roughey
- Other rockfish

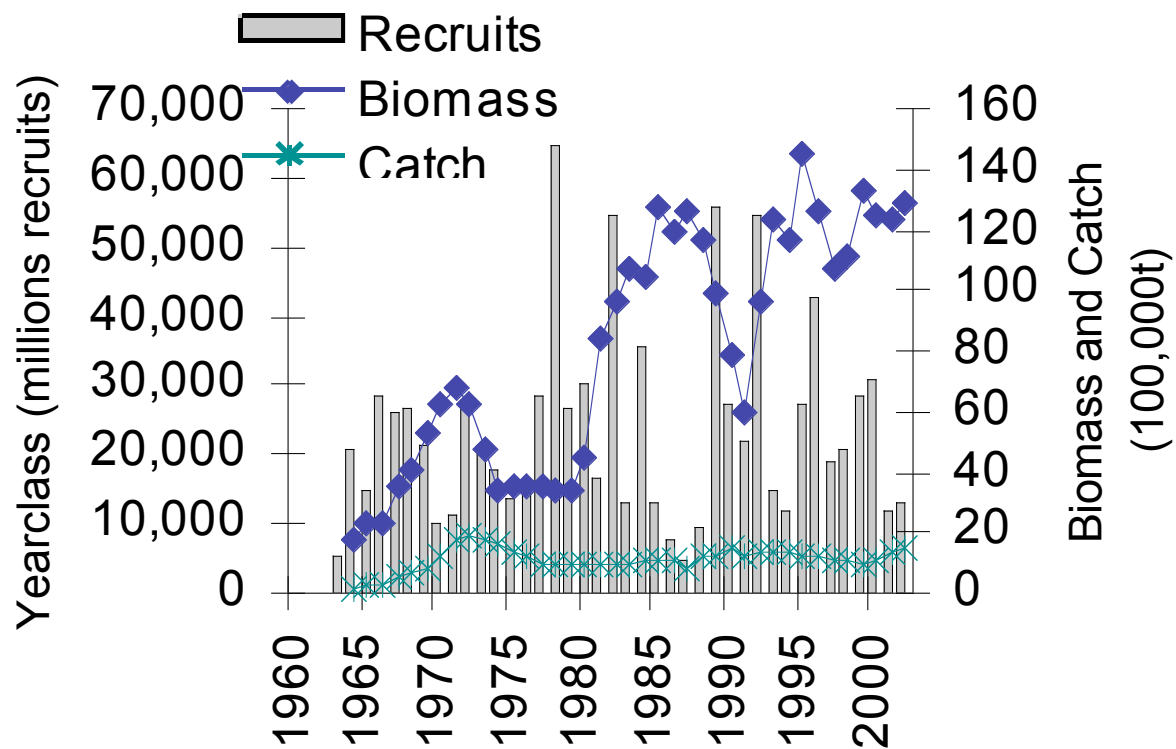
Gulf of Alaska

- *Pollock
- *Pacific cod
- Deep flats
- *Rex sole
- Shallow flats
- *Flathead sole
- *Arrowtooth flounder
- *Sablefish
- *Pacific ocean perch
- Shortraker/roughey
- *Shortspine thornyheads
- *Northern rockfish
- *Dover sole

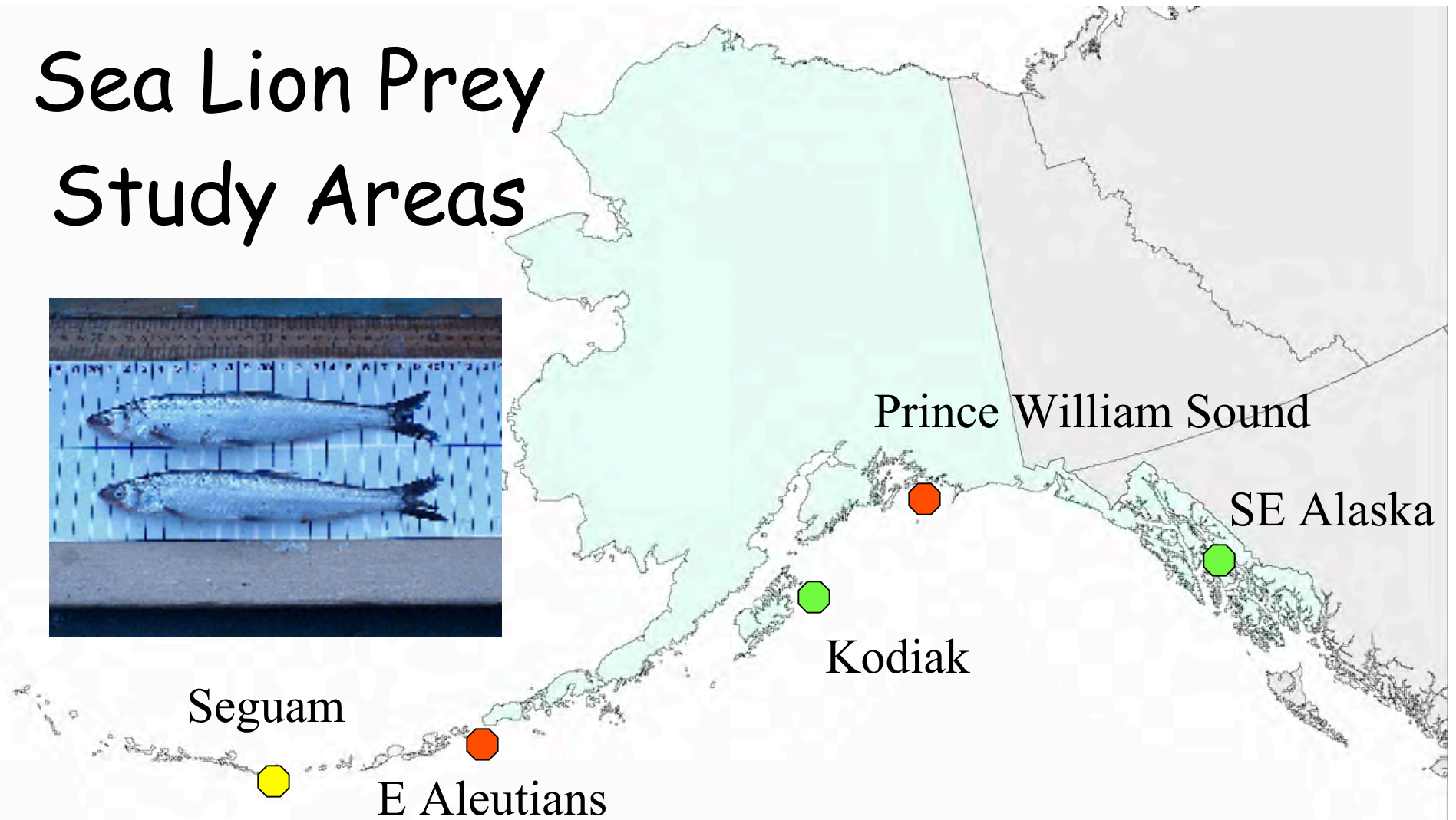





Walleye Pollock (EBS)

EBS Pollock



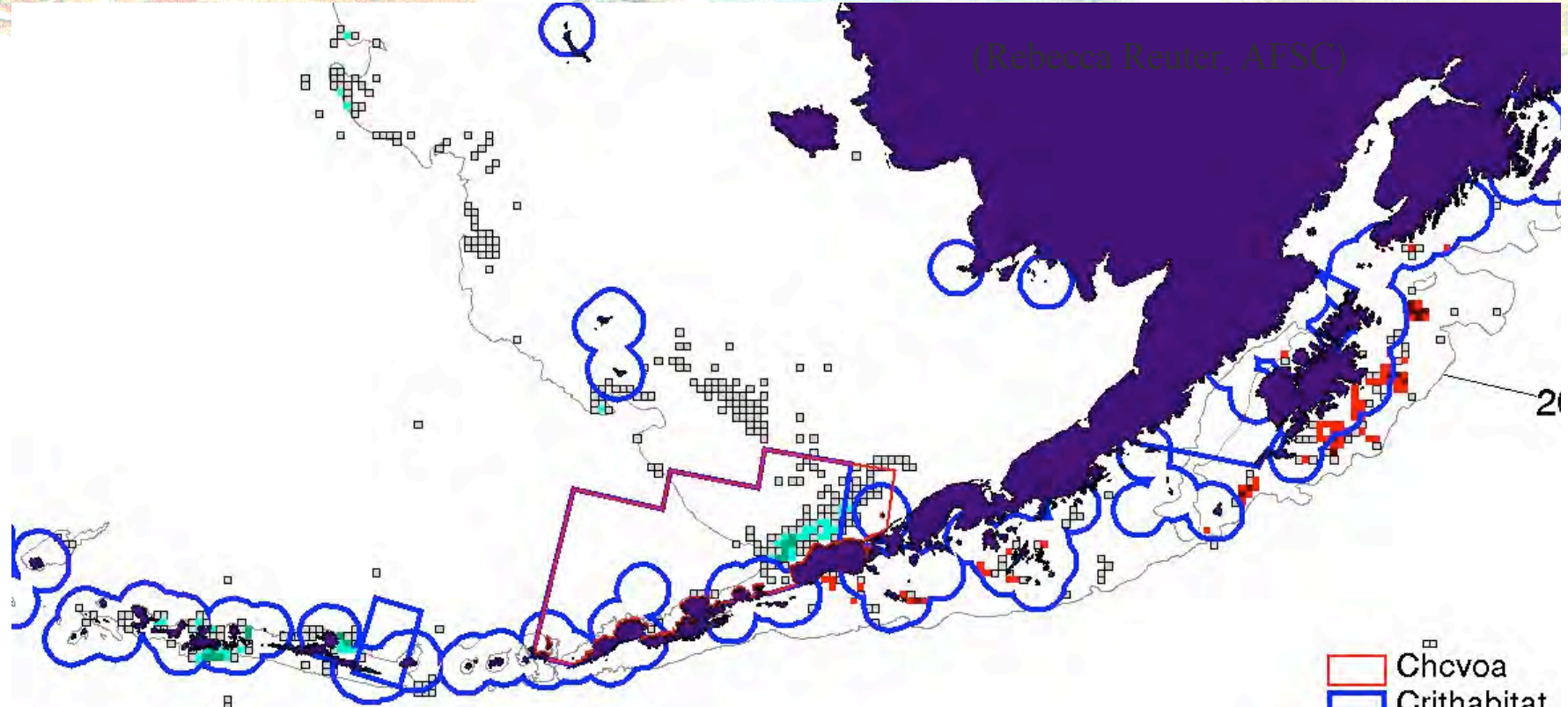
Sea Lion Prey Study Areas



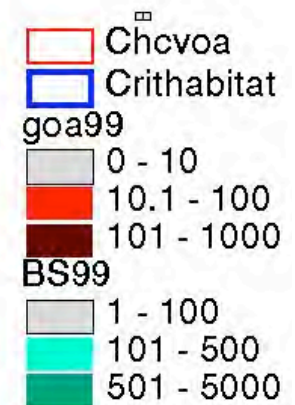
-  Existing
-  Proposed
-  Existing summer

Pacific Cod Trawl Catch 1999

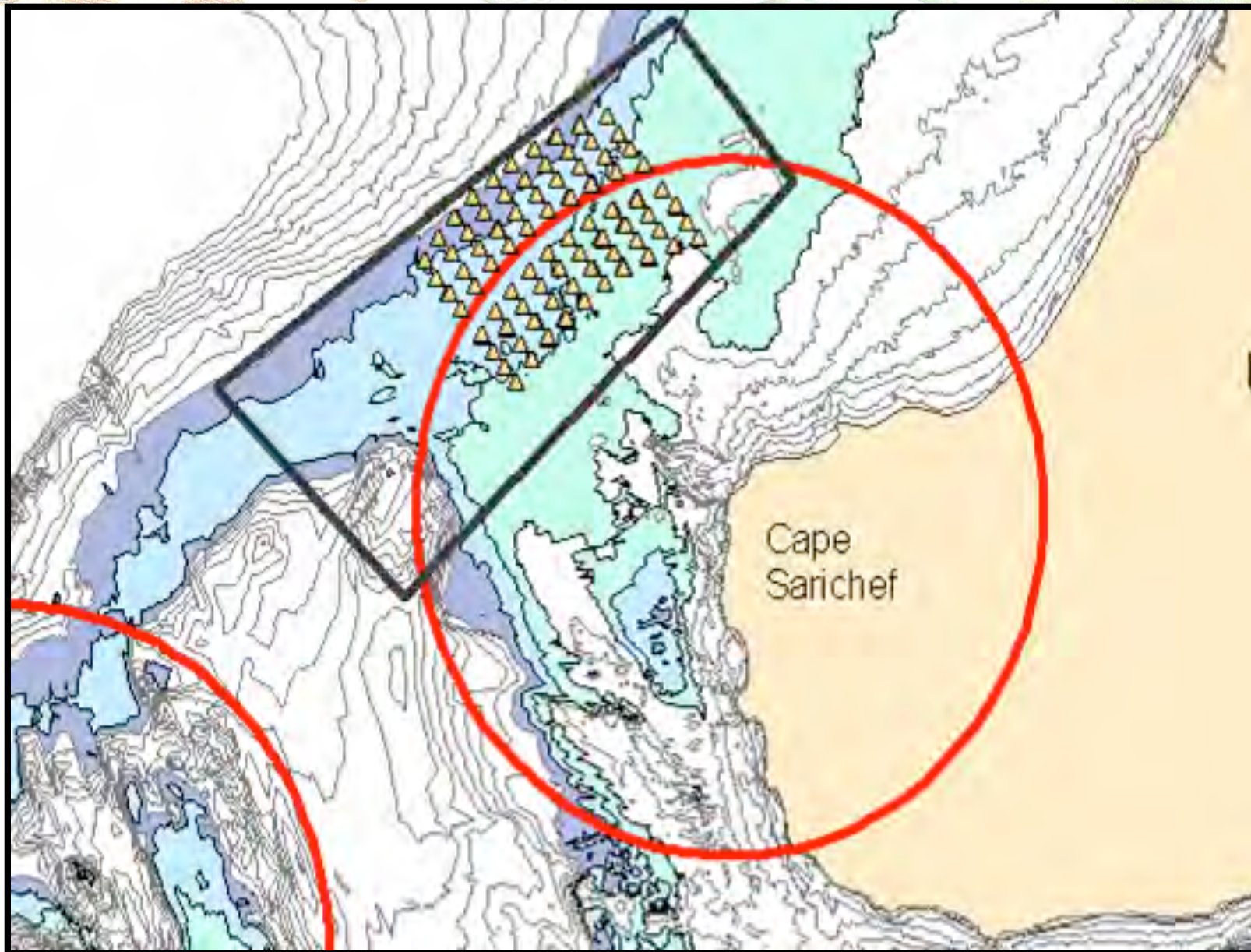
(Rebecca Reuter, AFSC)

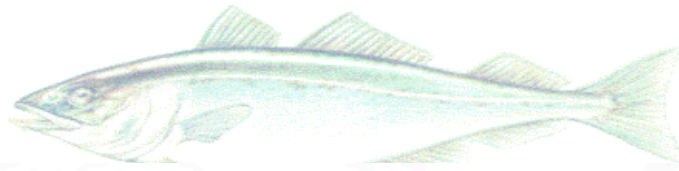
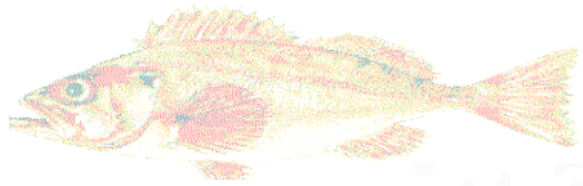


- SSL diet data - Pacific Cod is important item in winter
- Late winter nutrition critical for females & weaned juveniles ?
- Cod spawning aggregations - important seasonal food supply ?
- Intense, localized fishery (trawl, pots, & longline)
- Look for localized depletion or disturbance



The Bread Line (SW end)





Pacific cod release and recovery location

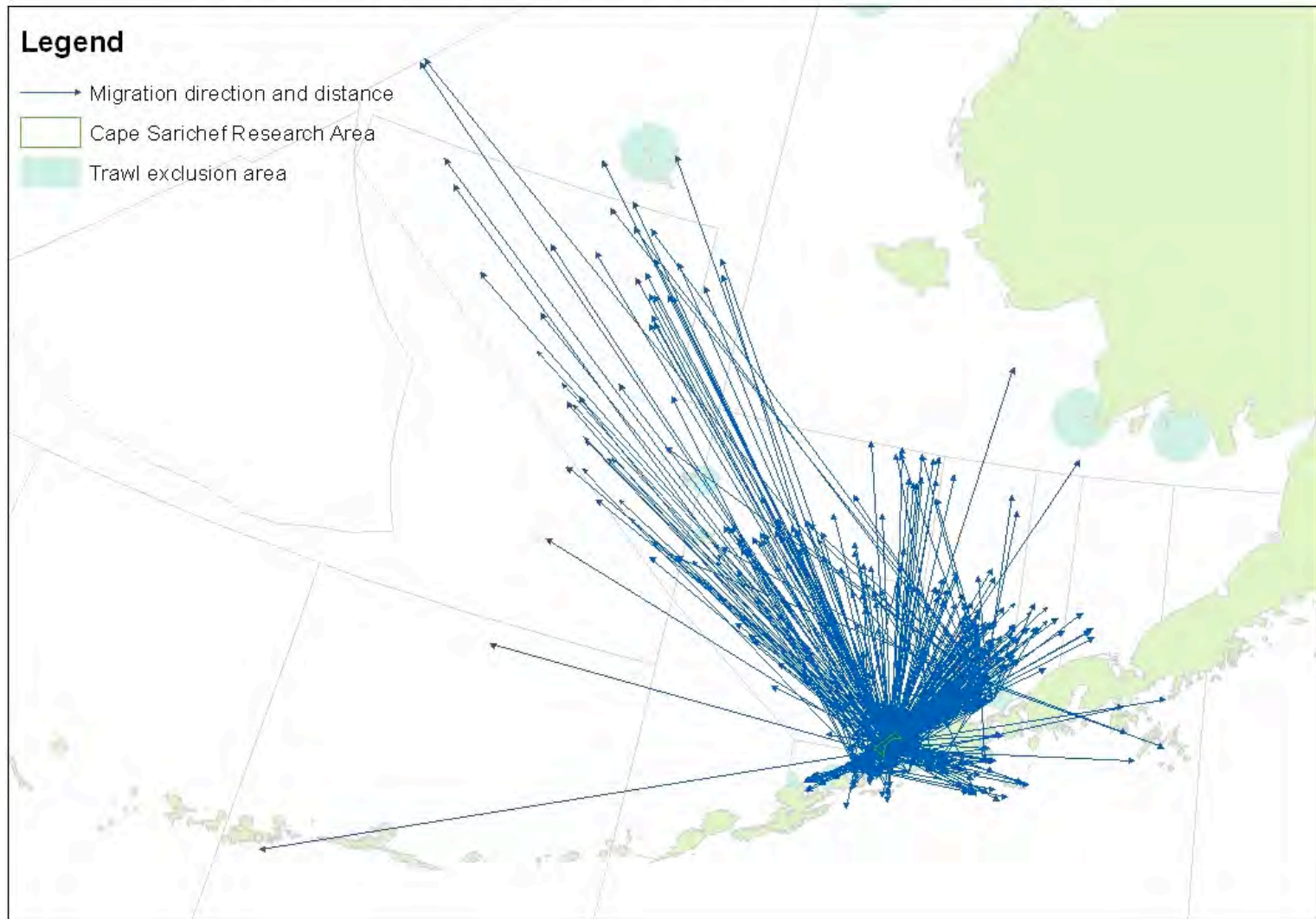


Fig 3B. Biological Shelter- Gulf of Alaska

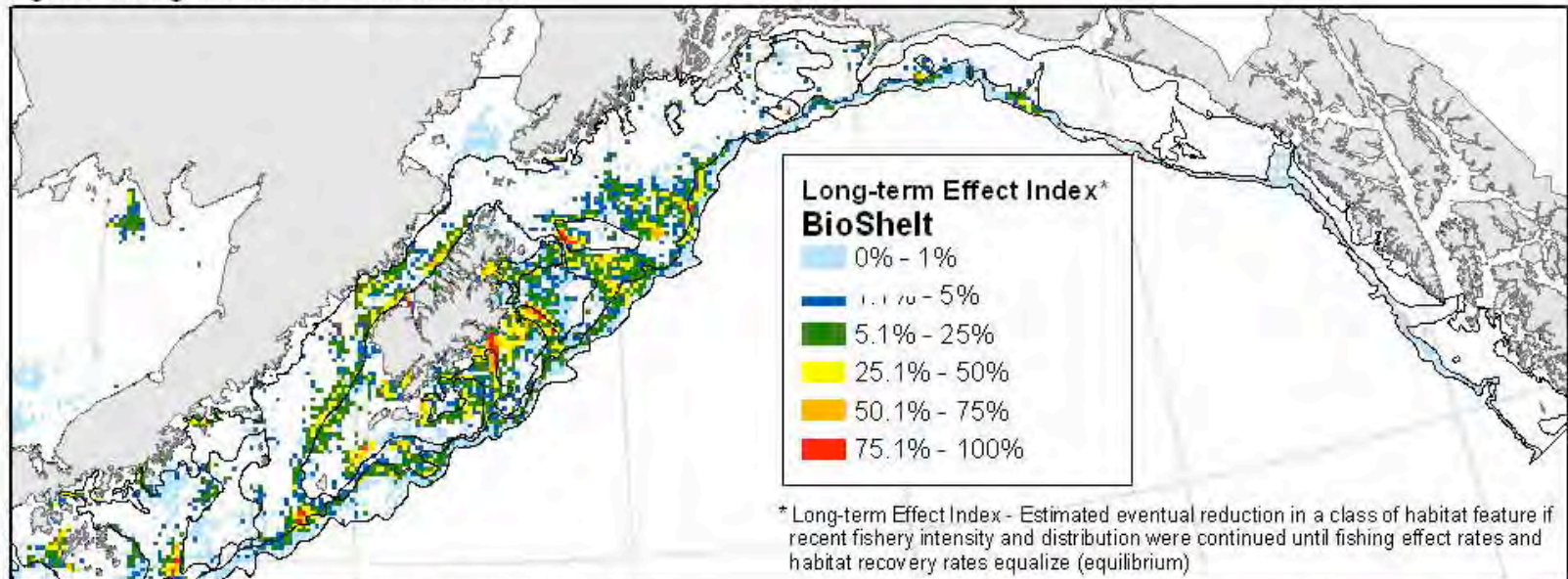
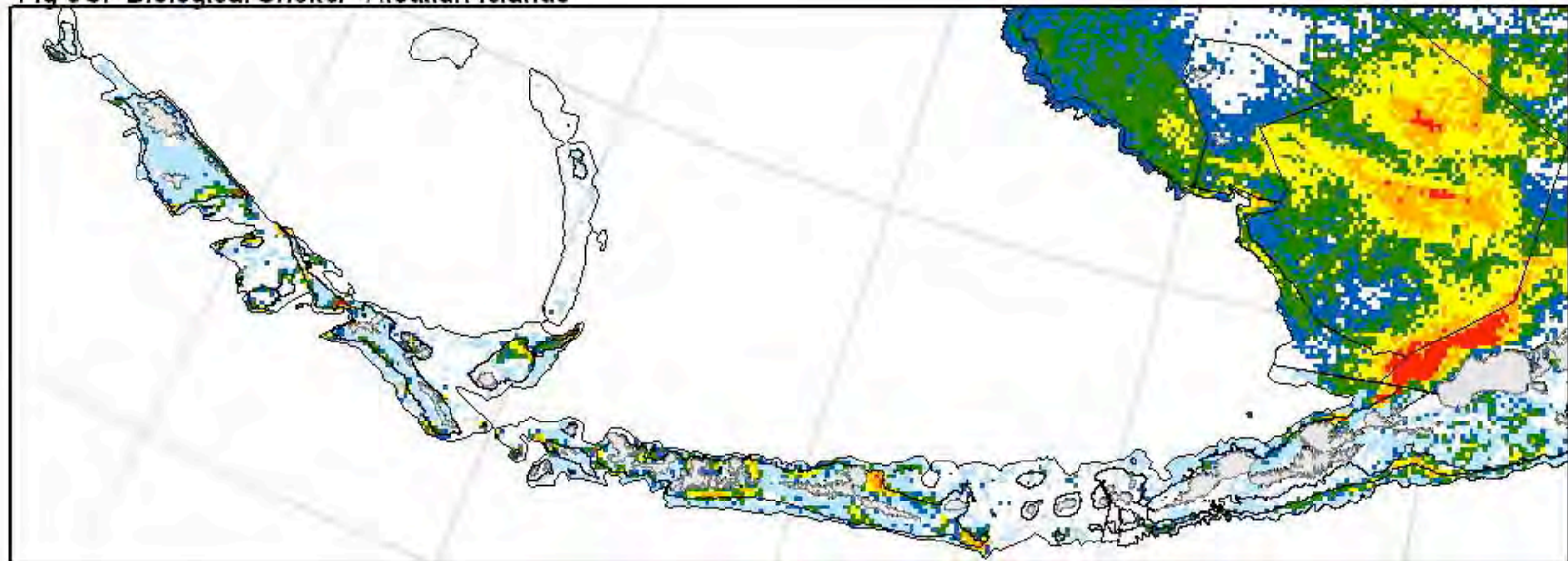
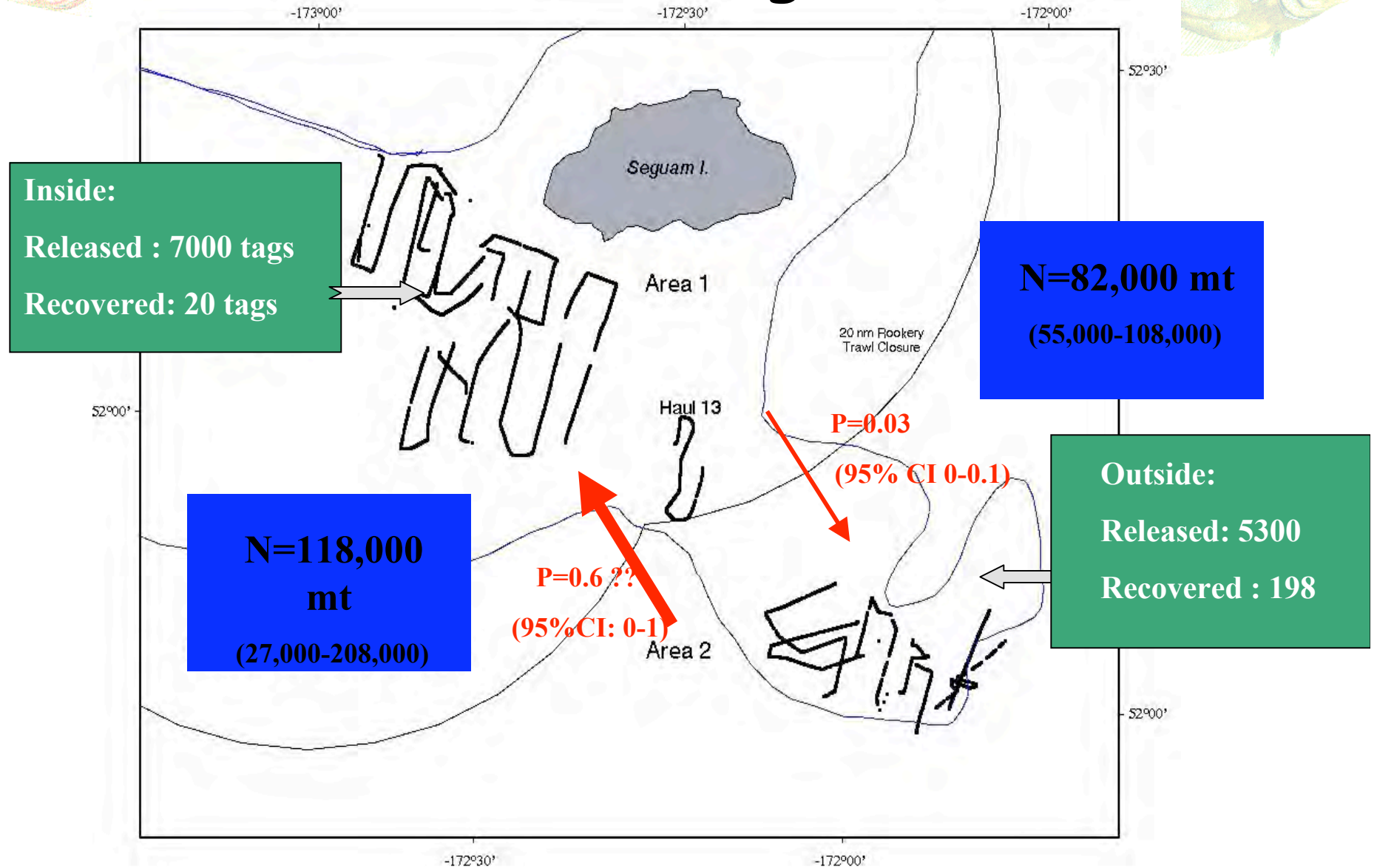


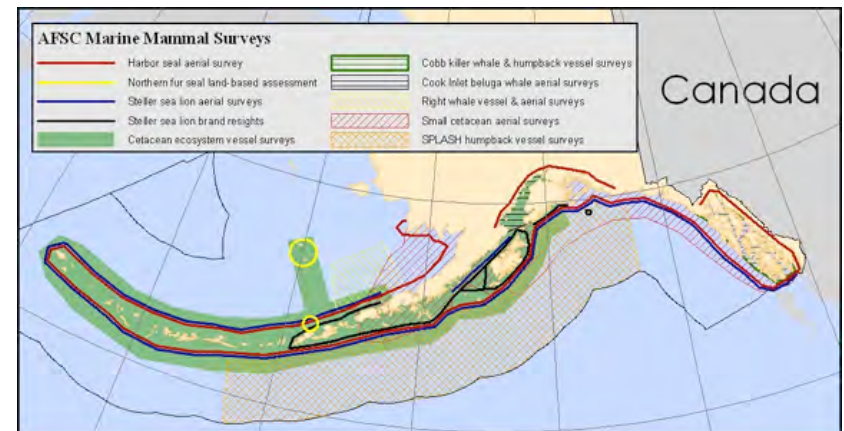
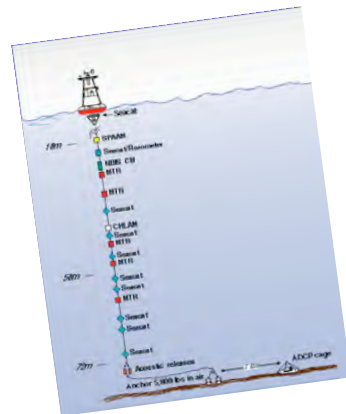
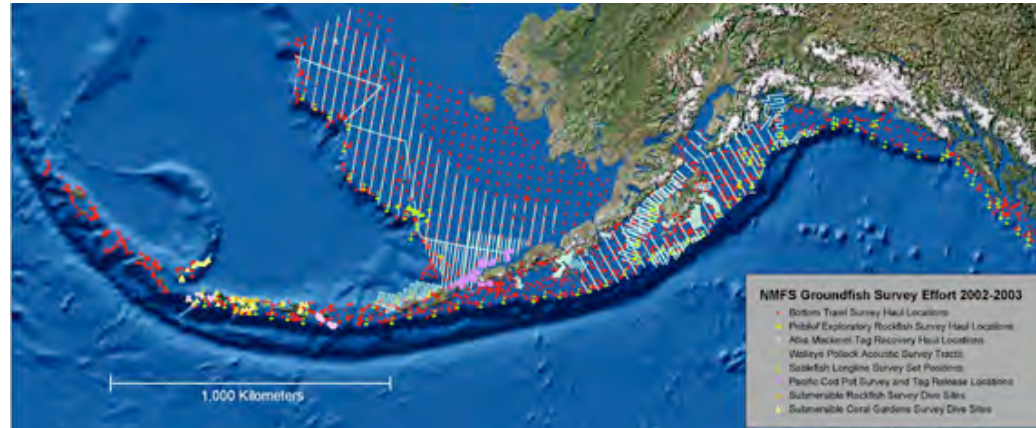
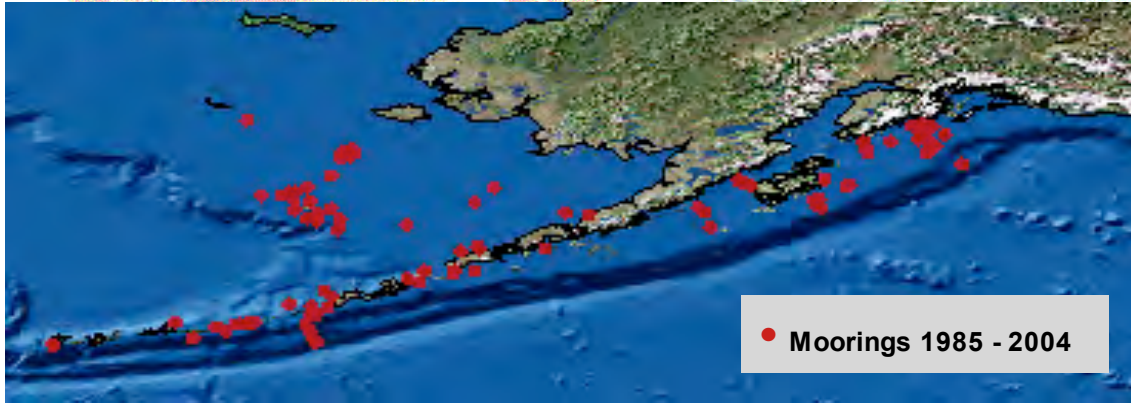
Fig 3C. Biological Shelter- Aleutian Islands

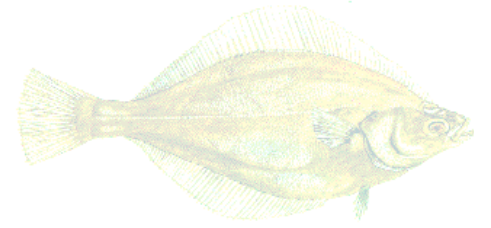
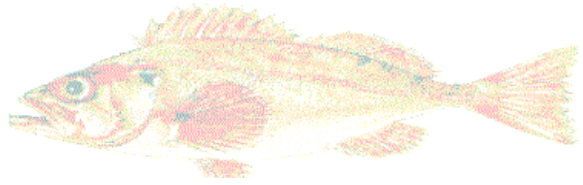


Results 2000 Seguam Pass



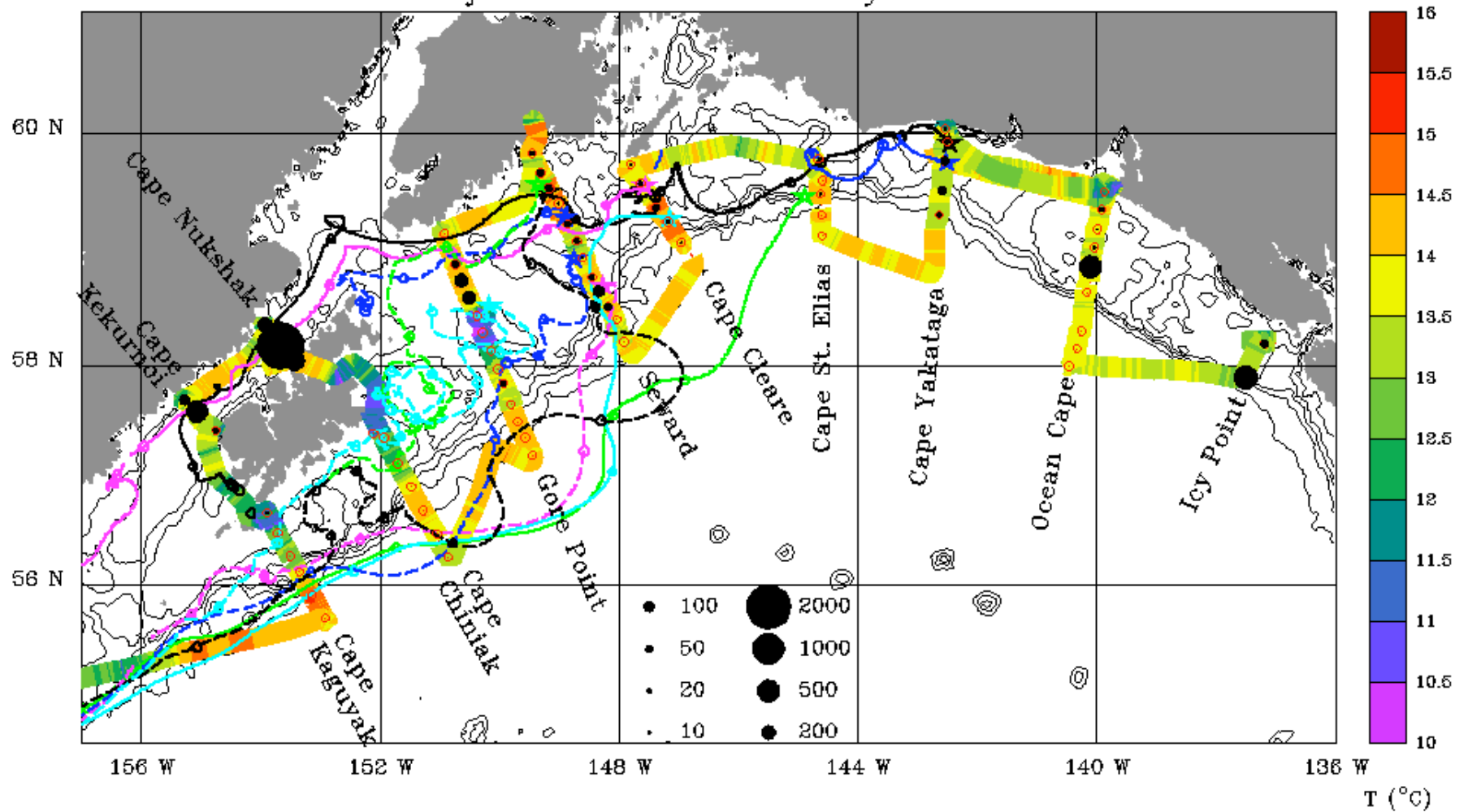
FOCI: Basis for Understanding

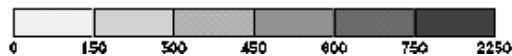
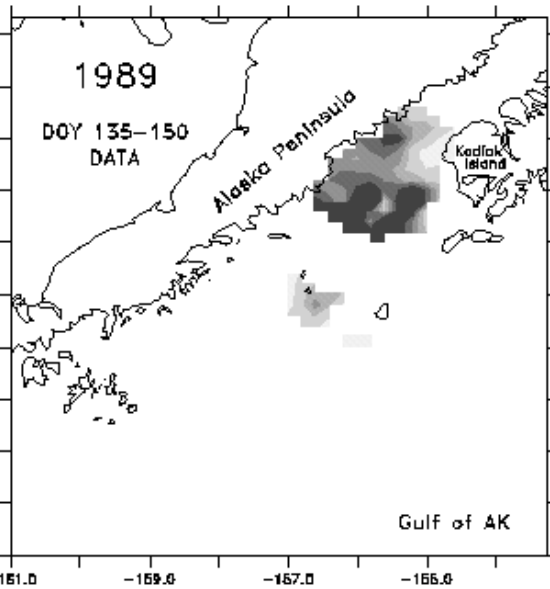
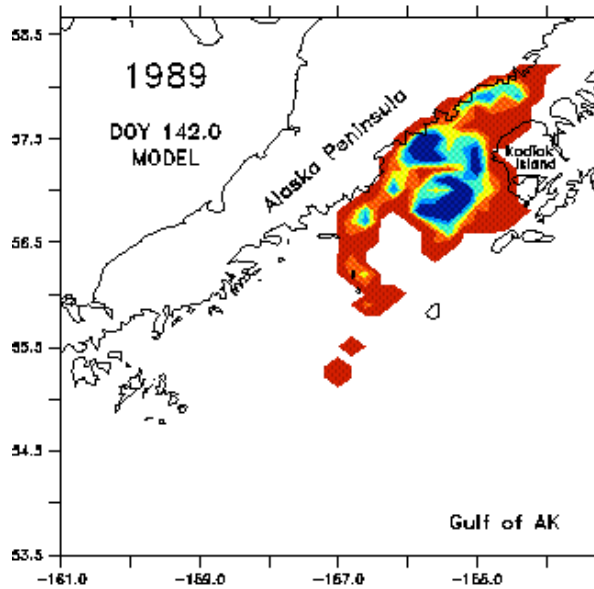
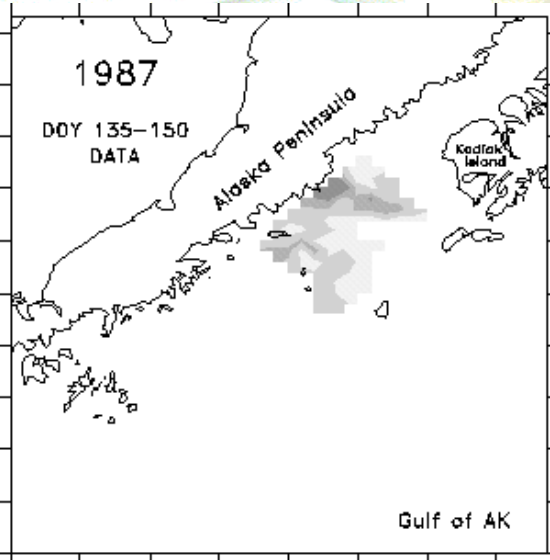
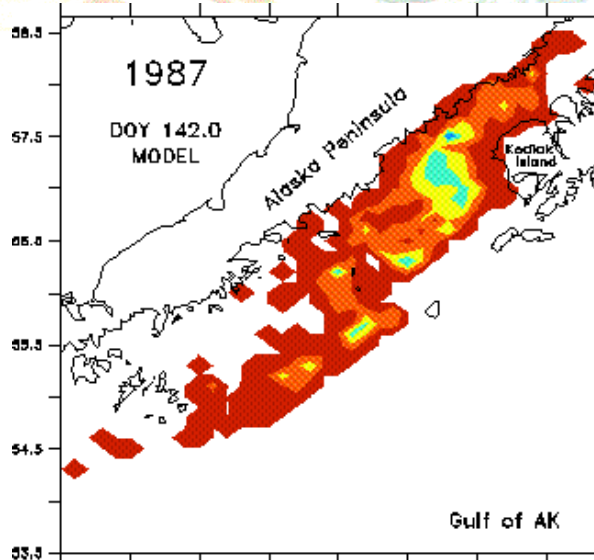
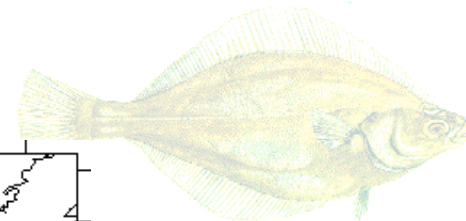
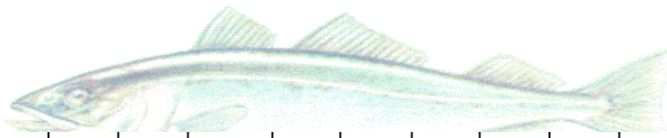
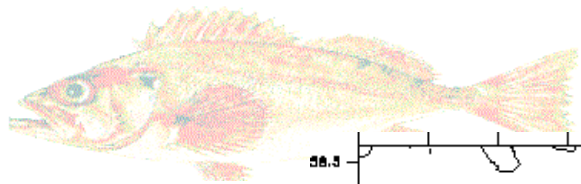




End

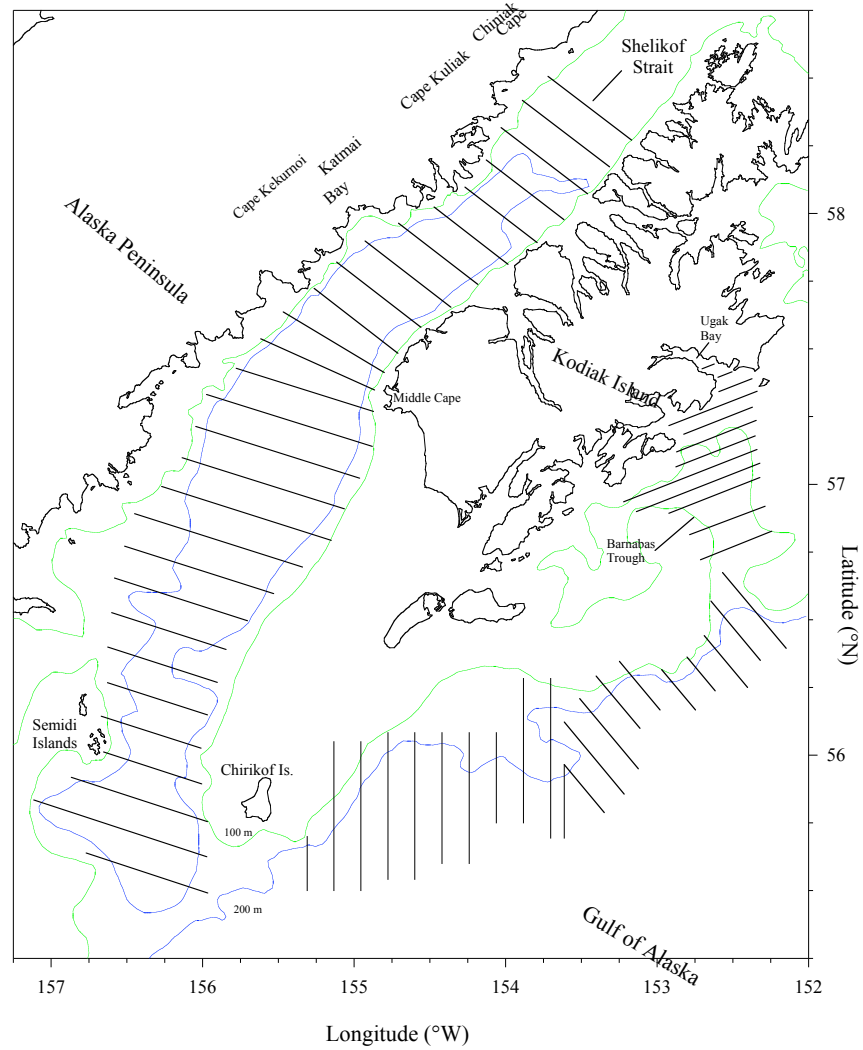
Temperature & Pink Salmon CPUE, F/V *Great Pacific* Cruise, 17 July–8 Aug 2001
 Drifter Trajectories Marked Every 10 d for 90 d



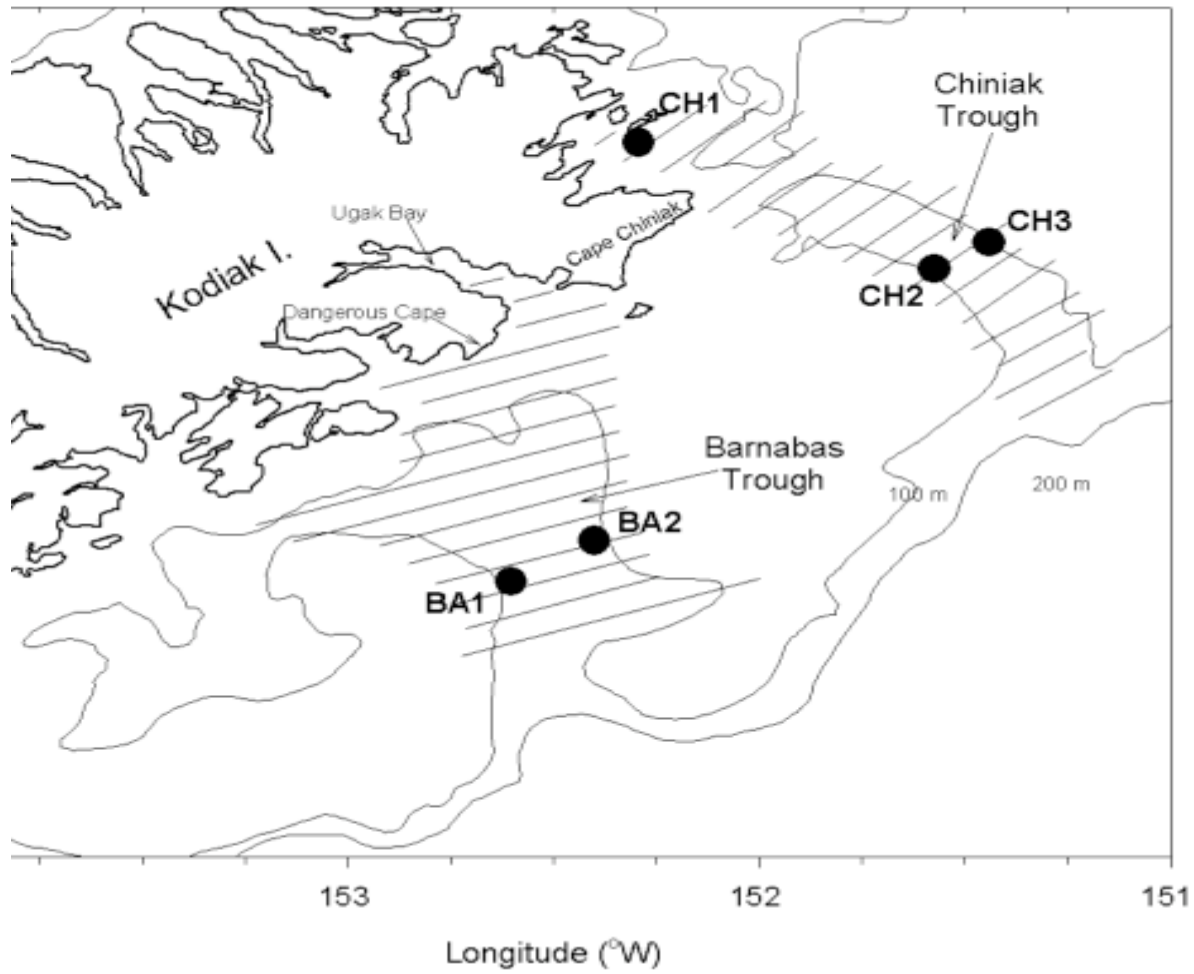
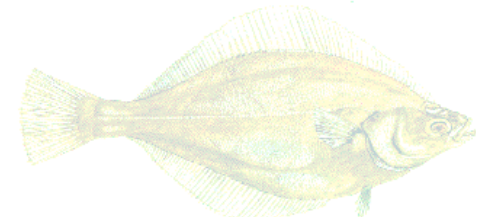
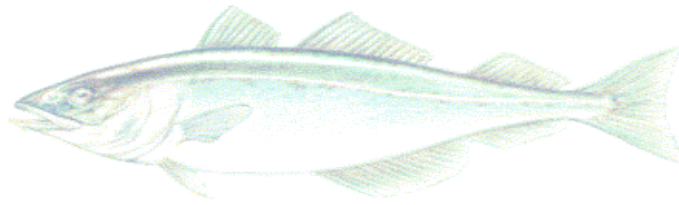
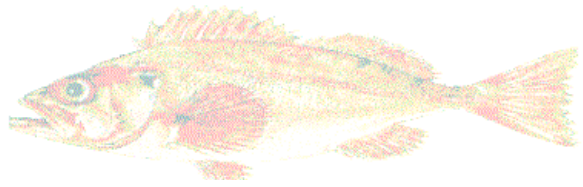


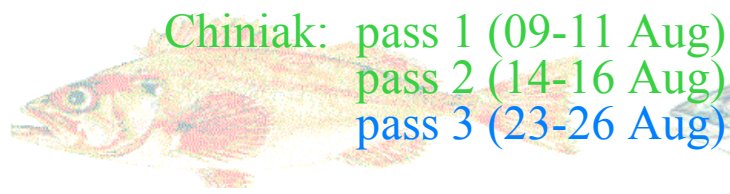


March 2002 Kodiak and Shelikof Strait EIT Survey



March 2002 acoustic-trawl survey of Shelikof Strait and the east side of Kodiak Island.





Chiniak: pass 1 (09-11 Aug)
pass 2 (14-16 Aug)
pass 3 (23-26 Aug)



Barnabas: pass 1 (11-14 Aug)
pass 2 (16-19 Aug)
pass 3 (26-29 Aug)
pass 4 (29-30 Aug)

