

Southeast Alaska Dive Fisheries

**GEODUCK CLAMS, SEA CUCUMBERS, RED SEA
URCHINS, and ABALONE**



By

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Southeast Alaska Dive Fisheries

- Dive Fisheries Overview
 - CFEC
 - SARDFA
- Historical Overview and Proposals
 - Geoducks
 - Sea Cucumbers
 - Red Sea Urchins
 - Abalone



Dive Fishery Limited Entry Timeline

Prior to 1996 – Open access

July 1, 1996- June 30, 2000—Dive Fishery Moratorium, House Bill 547
Purpose: to allow review and analysis of dive fisheries.

CFEC Limited Entry Permits

- Geoducks and Sea Cucumbers—May, 2001.
- Red Sea Urchins - November, 2000.

Limited Entry Permits (2010-11 season)

- **Geoducks**—69 permits fished out of 89
- **Sea Cucumbers**—180 permits fished out of 284
- **Red Sea Urchins**—3 permits fished out of 67

Abalone

- Open access, low stocks, no commercial fishery planned





- **Mission** - Develop, expand, and enhance new and existing fisheries in Southeast Alaska
- Formed by Alaska Legislature in 1998 to help to develop dive fisheries
- Structure
 - Executive director
 - Board of Directors includes divers, processors, and municipalities
 - Permit holders are members
 - Geoduck and sea cucumber committees deal with fishery-specific issues



- SARDFA annual operating plan developed with ADF&G to determine how tax is spent
- SARDFA taxes:
 - Geoduck & Red Urchin = 7%
 - Sea Cucumber = 5%
- Tax Revenue 2011 fiscal year = \$601,396





Dive fishery taxes fund:

- Paralytic Shellfish Poisoning (PSP) and water quality testing
- Industry reconnaissance surveys to identify new fisheries
- Commercial fishery sampling
- Some department surveys
- Geoduck research project

Geoduck Clams



Geoduck
meat



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GEODUCK PROPOSALS (11)

- Establish equal share (183 and 184)—NEUTRAL
- Year round season, weekly harvest goals, registration requirements (185, 187, 188, 189)—NEUTRAL
- Change season start date (186) —NEUTRAL
- Change rotational schedule of fishery areas (190) —OPPOSED
- Hose length limit(191)—NEUTRAL
- Establish a minimum distance of 200 yds. between vessels (192)—NEUTRAL
- Registration requirements (194) —SUPPORTS



Geoduck Fishery Timeline

- **1985-1998**
 - 4 areas with 10 fisheries
 - Managed by registration permits
- **2000—Management Plan Adopted**
 - Stock assessment surveys are required in fishery areas within a maximum of 12 years
 - 2% of biomass harvested
 - No size limit
 - Openings coordinated by ADF&G, DEC and SARDFFA.
- **1998–2010** additional fisheries open
 - 37 defined commercial areas
- **200–07 BOF—** logbooks required



Geoduck Fishery

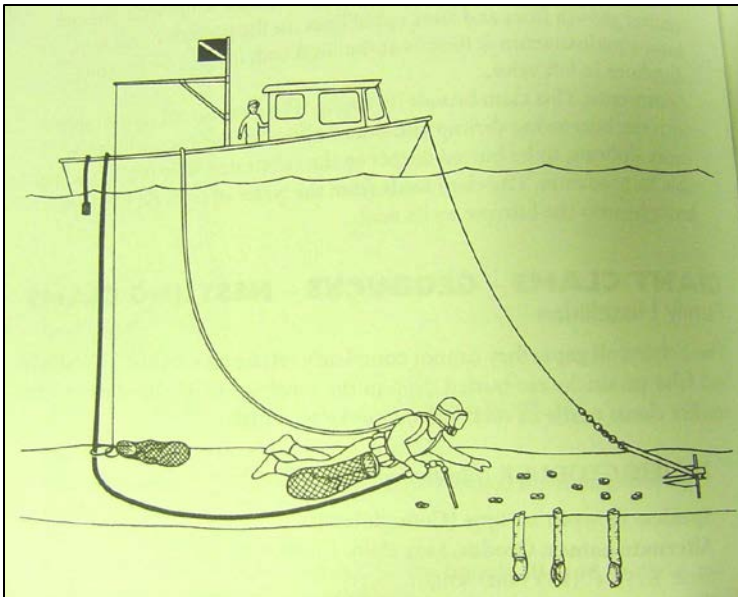
Paralytic Shellfish Poisoning

- Paralytic Shellfish Poisoning – geoducks bioaccumulate in viscera
- 2003 BOF—ADF&G manage based on PSP testing
- 2003-06 season
 - PSP testing protocol changed to fishery testing
- Live sale requires PSP testing/passing
- SARDEFA, ADF&G, DEC work together to open certain geoduck fishery areas that have passed tests
- Price per pound
 - Live market—\$5-\$15 / lb
 - Processed —\$1.75 / lb



Harvest Method

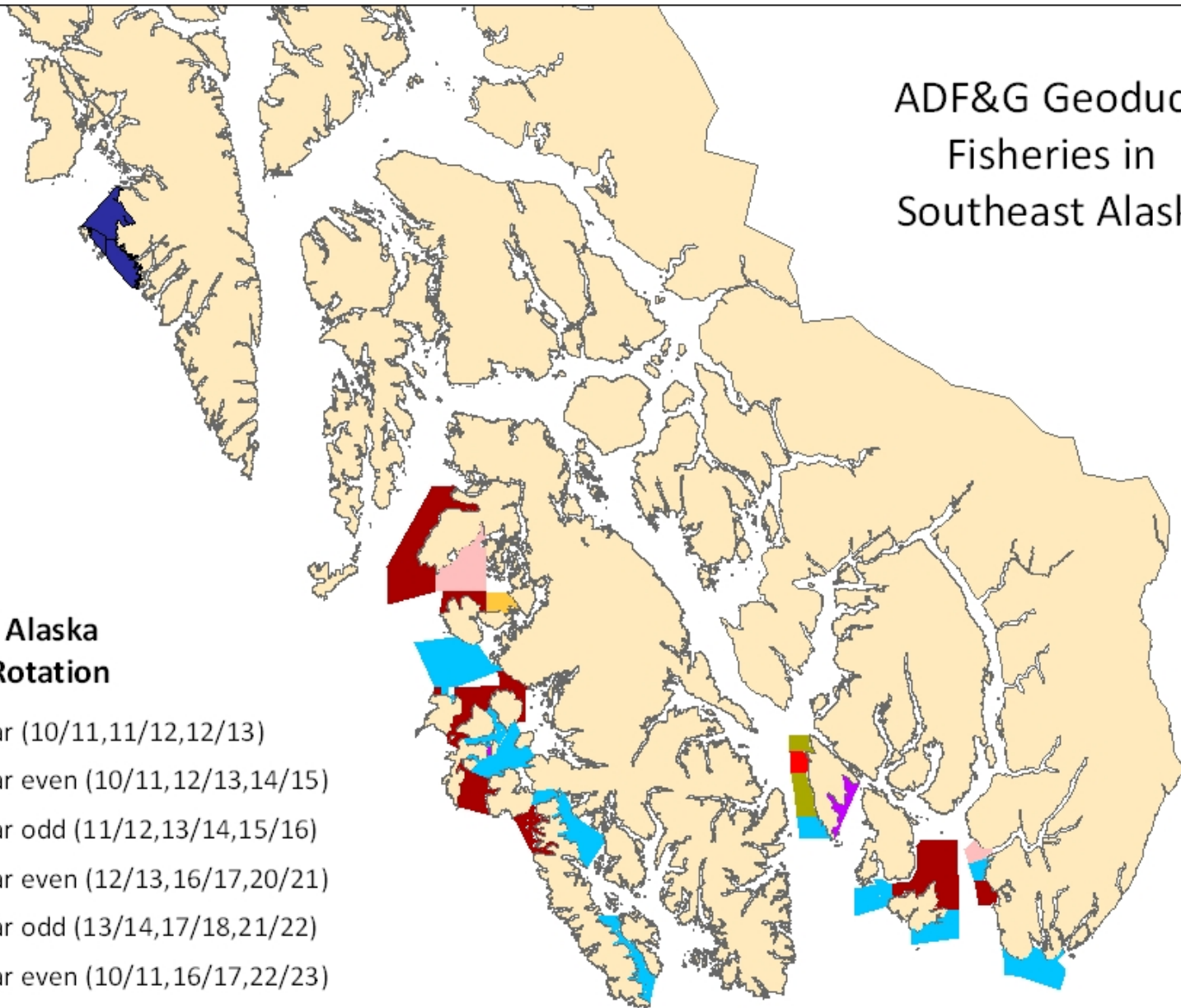
- Dive gear only
- Hand held, manually operated water jet
- Surface supplied water pump



ADF&G Geoduck Fisheries in Southeast Alaska

Southeast Alaska Fisheries Rotation

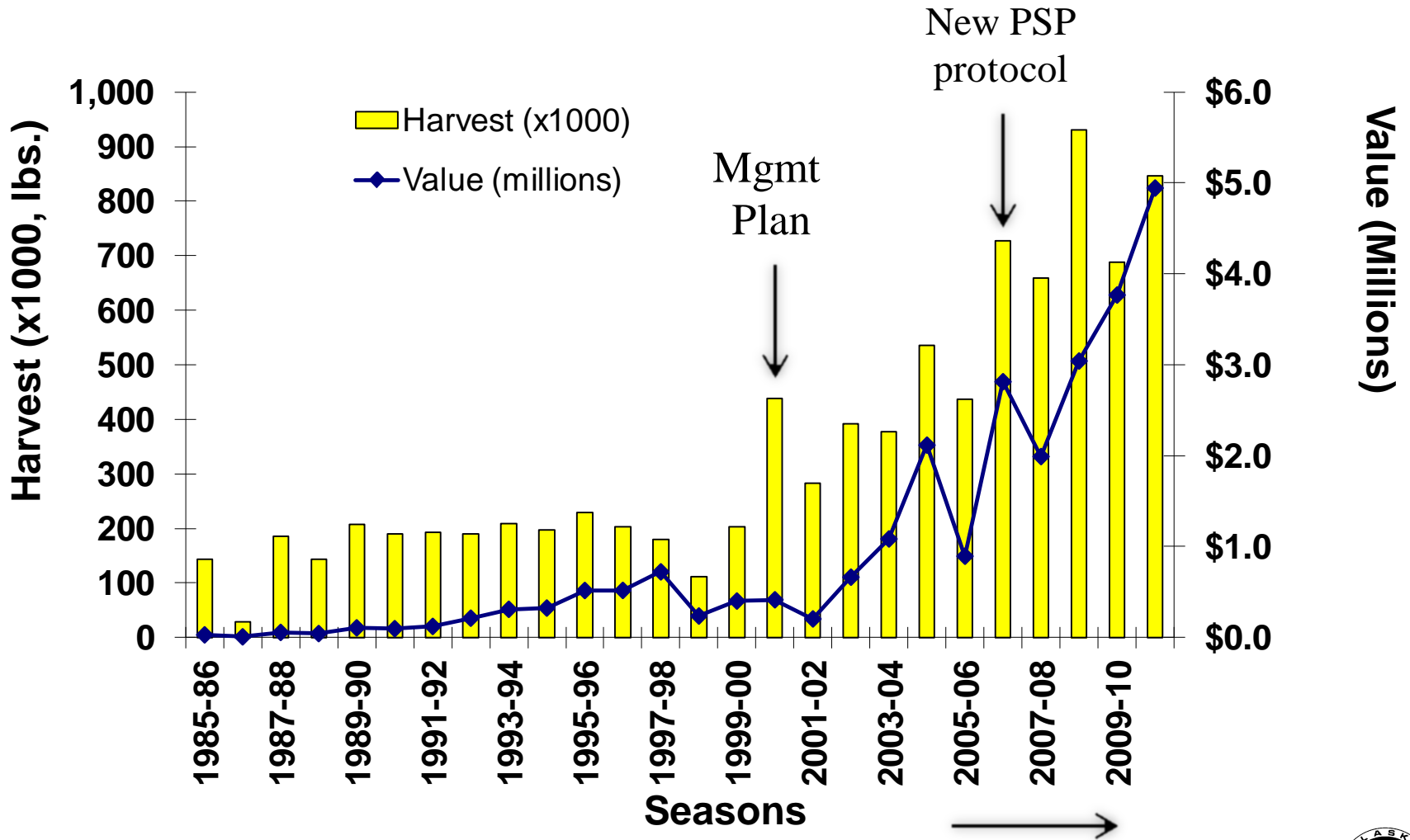
- 1-year (10/11,11/12,12/13)
- 2-year even (10/11,12/13,14/15)
- 2-year odd (11/12,13/14,15/16)
- 4-year even (12/13,16/17,20/21)
- 4-year odd (13/14,17/18,21/22)
- 6-year even (10/11,16/17,22/23)
- Control
- RECOVERY



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Geoduck Clams in Southeast Alaska Harvest and Value



2011-12 GHF = 557,300 pounds

New areas surveyed and opened
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Sea Cucumbers



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SEA CUCUMBER PROPOSALS (5)

- Establish variable harvest rate strategy (178)—SUPPORTS
- Revise management plan to account for sea otter predation (179)—
OPPOSES
- Amend fishing period during Thanksgiving week (180)—SUPPORTS
- Amend daily dive time in areas north of Sumner Strait (181) —
NEUTRAL
- Prohibit CFEC unlicensed divers from prospecting (182)—SUPPORTS



Sea Cucumber Management Plan

- Season: October through March
- Weekly Fishing Periods:
 - Monday 8:00 a.m. to 3:00 p.m.
 - Tuesday 8:00 a.m. to 12:00 noon,
 - Open periods may be extended if appropriate.
- Fishery areas surveyed and opened every 3 years



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Sea Cucumber Management Plan

- 2,000 lb. max per diver per opening
- Maximum of two permit holders may fish from a single vessel per opening
- Enhanced air nitrox is allowed
- Harvest by hand picking using scuba, tethered surface supplied air, or snorkel



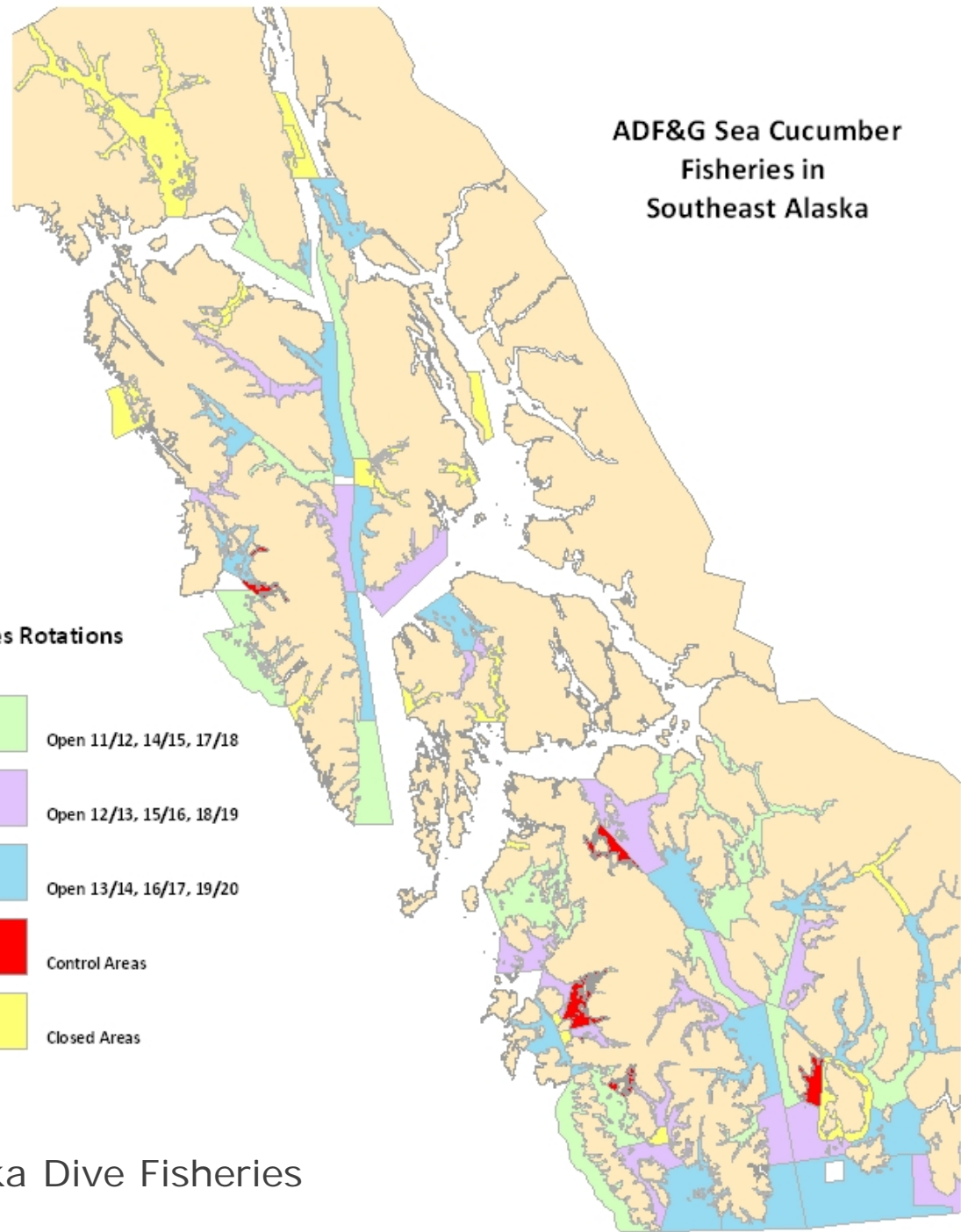
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ADF&G Sea Cucumber Fisheries in Southeast Alaska

Fisheries Rotations

-  Open 11/12, 14/15, 17/18
-  Open 12/13, 15/16, 18/19
-  Open 13/14, 16/17, 19/20
-  Control Areas
-  Closed Areas

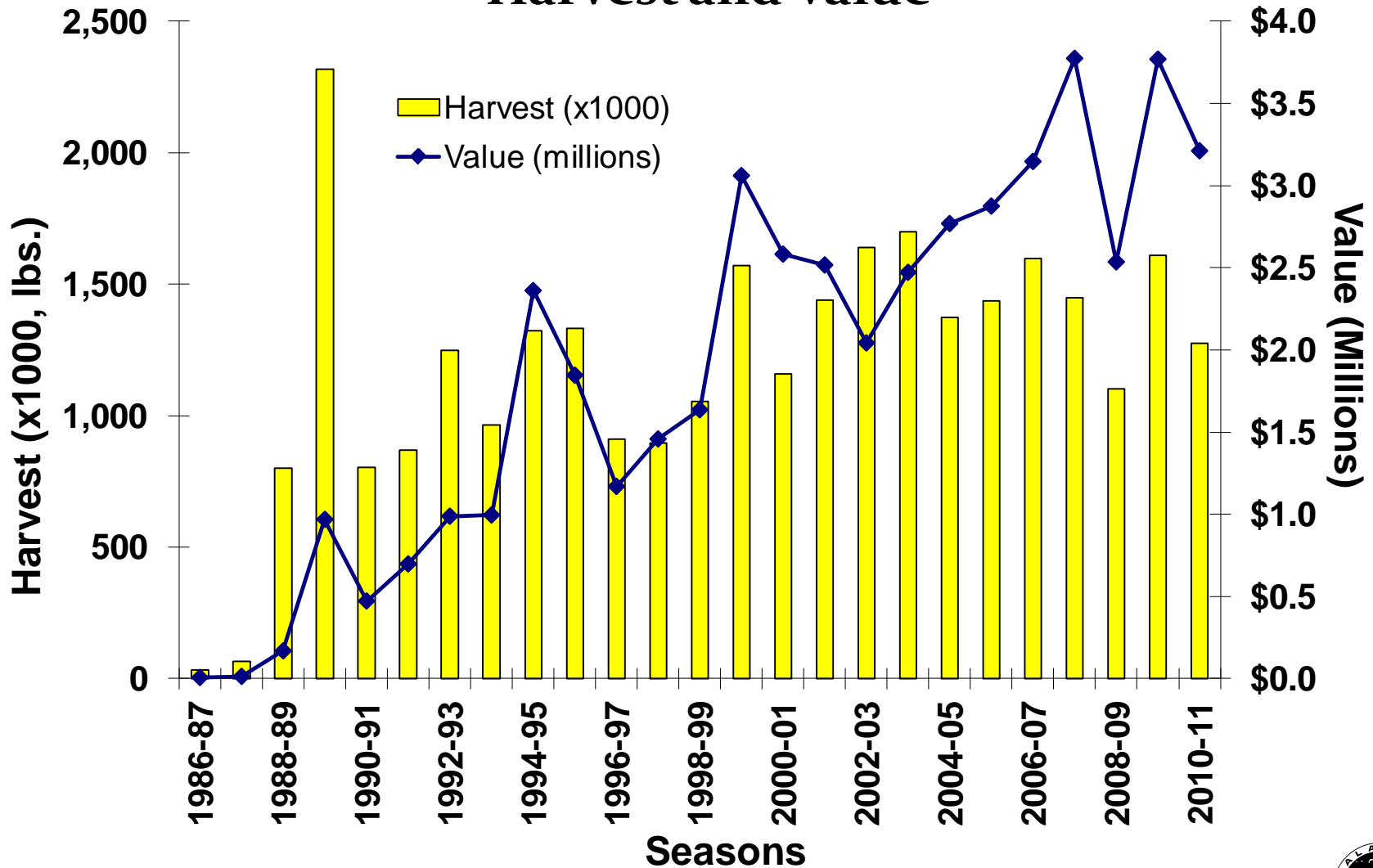


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Sea Cucumbers in Southeast Alaska

Harvest and Value

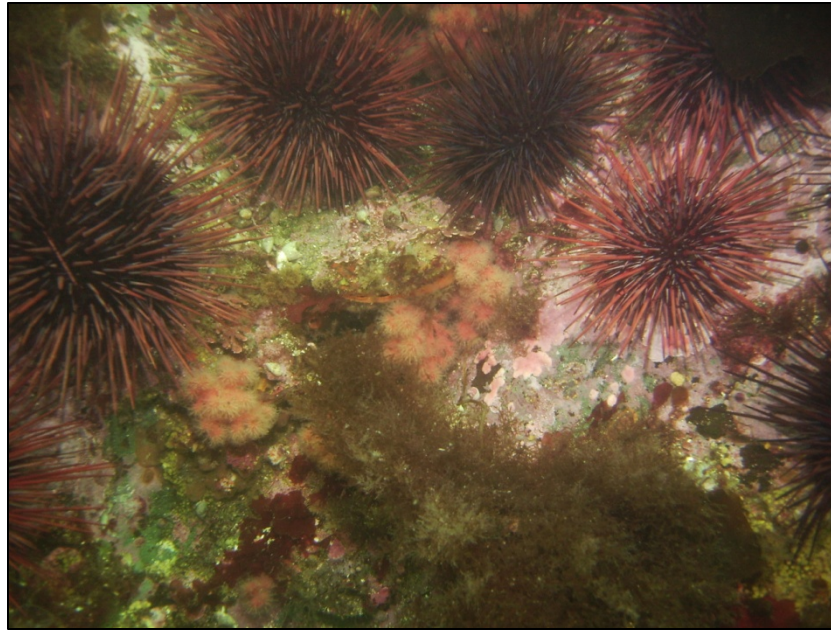


2011-12 GHF = 999,000 lbs.

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Red Sea Urchins



Red Sea Urchin Fishery Timeline

- **1981**—commercial harvest began
- **1991–1993**—small fishery in Sitka Sound, closed due to sea otter predation
- **1994–1995**—department surveys conducted in Districts 1 & 2
- **1995–1996**—test fishery in Districts 1 and 2 to pay for population assessment surveys
- **1996**—Red Urchin Management Plan developed



Red Sea Urchin Fishery

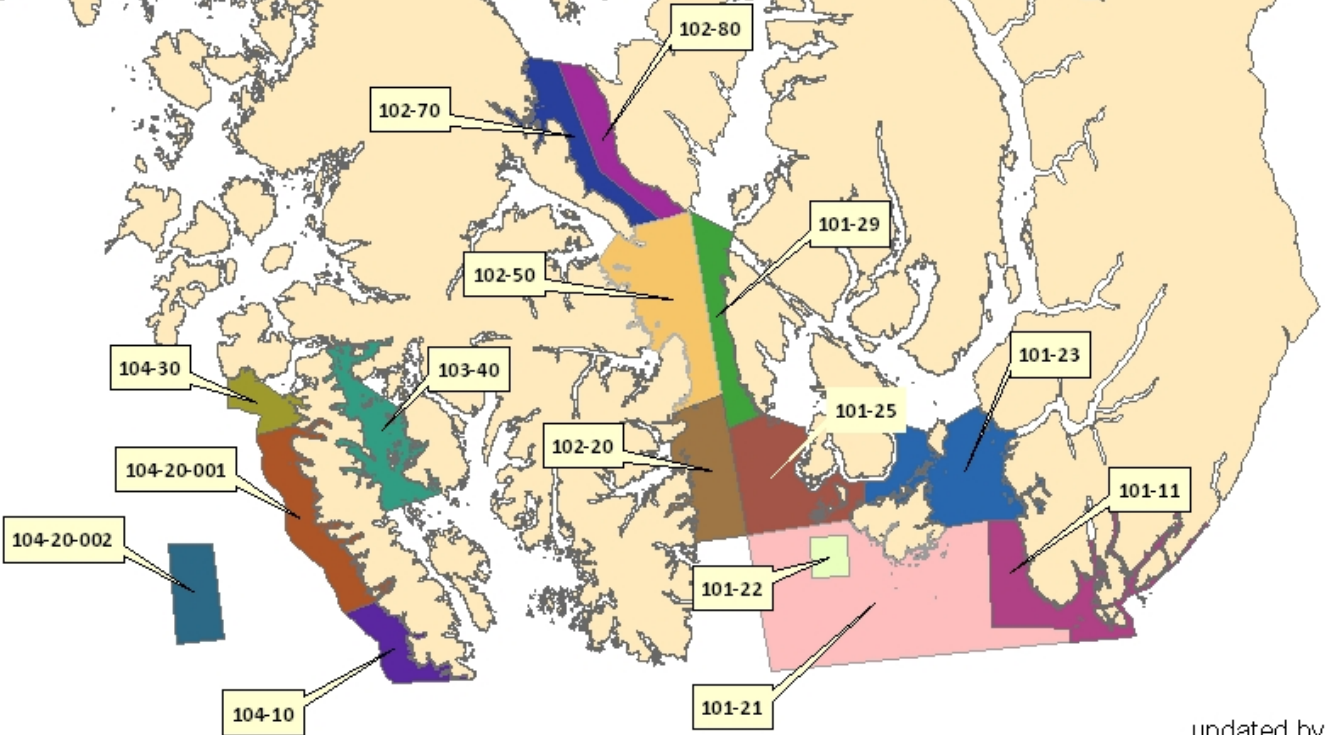
- 2001–02 to present decreasing harvest and effort
 - majority of GHL not harvested
 - decreasing markets and processing opportunities
- 2006 BOF—extended interval between assessment surveys if GHL is not entirely taken



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ADF&G Urchin Fisheries in Southeast Alaska

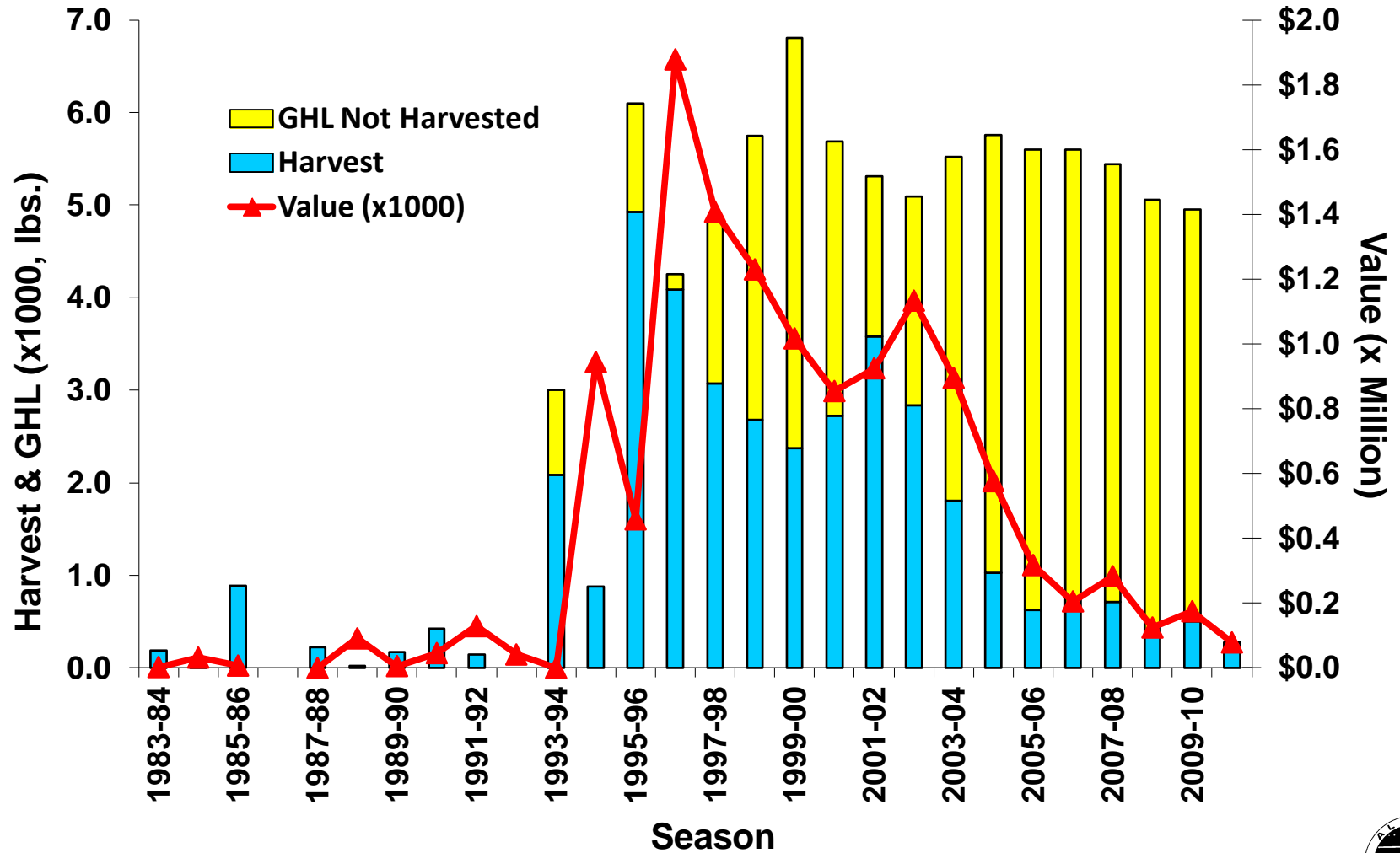


updated by jmr 09/10



Red Urchins in Southeast Alaska

Harvest and Value



2011-12 GHL = 3,274,500 lbs.

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Abalone Fishery Timeline

- Late 1970's early 80's – harvest and effort high
- Price per pound
 - \$1 —1970s
 - \$10—1990s
- 1984/85—beginning concern, upper limit of guideline harvest range not reached
- 1984–1995—second downward trend
- 1995—season closed
 - decreased harvest rates
 - information from commercial divers and subsistence harvesters confirmed low population levels
- Department surveys targeting other species show no evidence of abalone recovery
- West Coast of United States – abalone populations are at low levels and protected in most areas



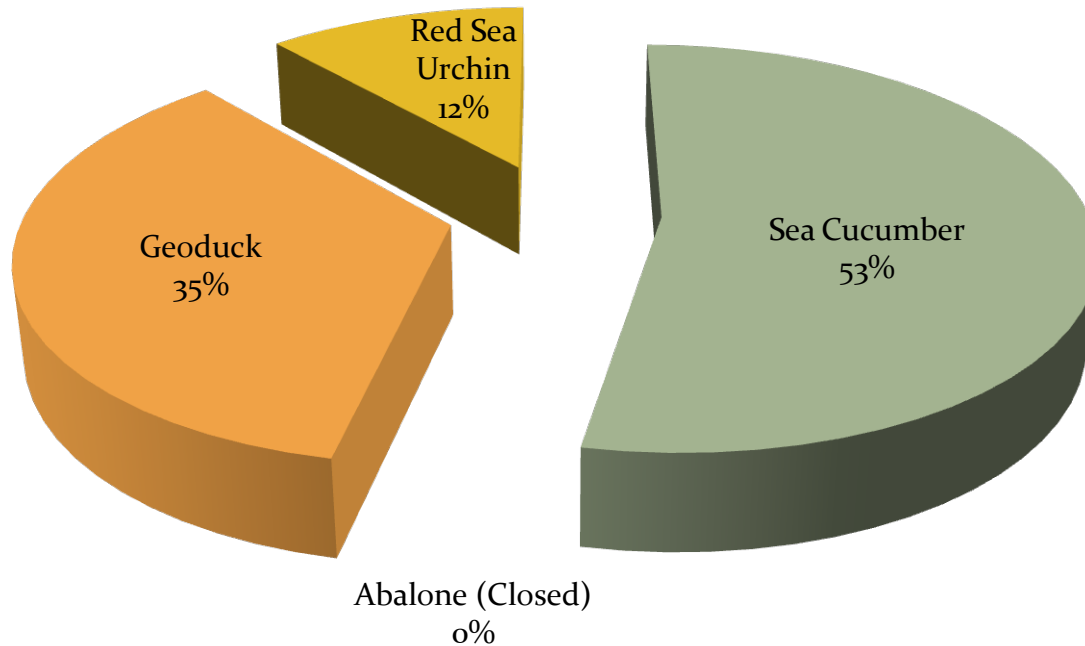
PROPOSALS

4 Miscellaneous Shellfish proposals

- Abalone: Reduce bag limit for subsistence and personal use and increase size limit (195 and 196). —SUPPORTS
- Razor Clams: Close personal use and subsistence fishing in Sitka Sound Special Use Area (197 and 198). —SUPPORTS



2010–11 Dive Fisheries Harvested by Species

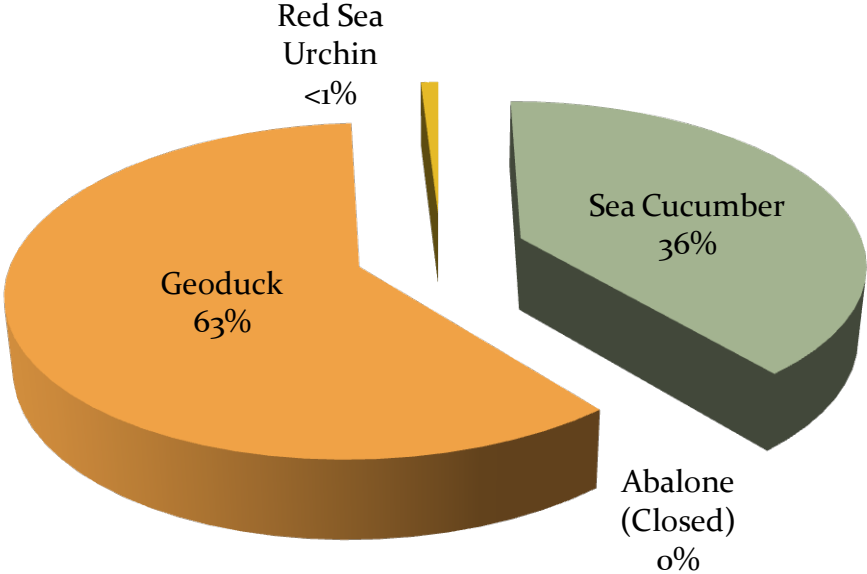


Total Harvest = 2,396,868 lbs.

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2010–11 Dive Fisheries Exvessel Value by Species



Total Value = \$8,895,053

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Sea Otter – Dive Fishery Interactions

Percent of fishery areas negatively affected by sea otters

- Geoduck fishery—73%
- Sea cucumber fishery—28%
- Red sea urchin fishery—57%



Other proposals (1)

- Limit prospecting before participating in a commercial dive fishery (193)—SUPPORTS

