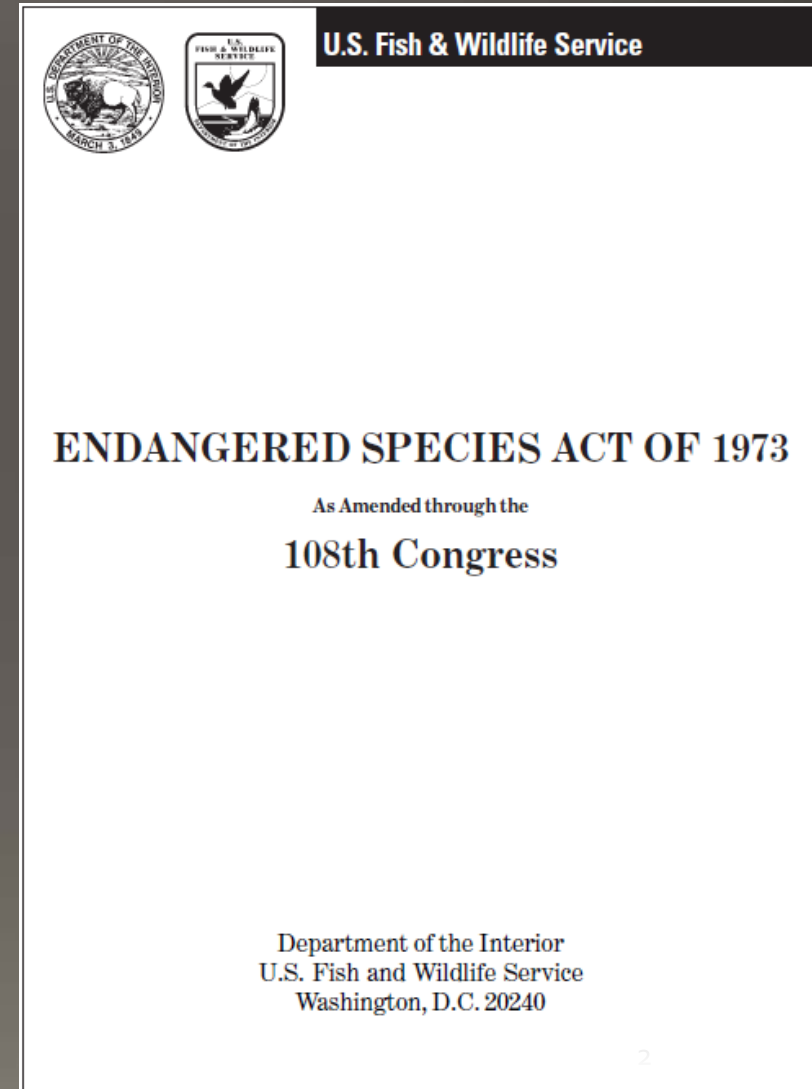


December 2017 Anchorage

Halibut PSC in the Western GOA Pacific cod Trawl A Season

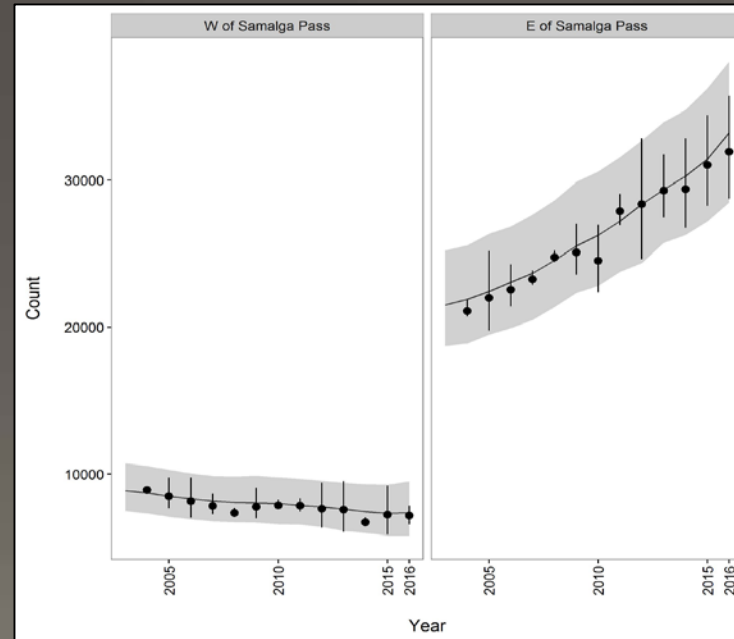
ESA Section 7 Considerations

- NMFS is mandated to ensure any action is in compliance with ESA
- Only initiate consultation on final action
- Informal
- Formal
- BiOp determines jeopardy / no jeopardy
- Jeopardy – RPAs
- No jeopardy – Advisory conservation recommendations



Western DPS of Steller sea lions

- Boundary 144 W. Long. (Cape Suckling)
- EDPS de-listed (recovered), **WDPS endangered**
- 20% of historic levels
- Recovery plan criteria for down-listing, de-listing
- 7 Sub-regions
- E/W of Samalga Pass



Discussion Paper Structure

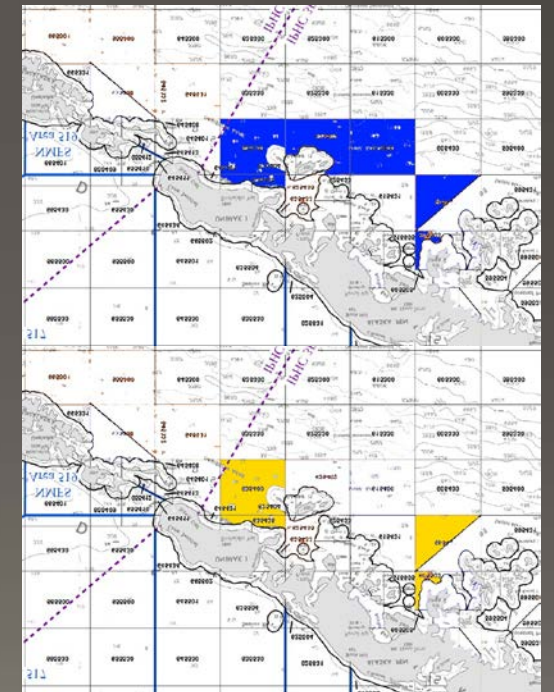
- Background
- Halibut PSC
- Analysis
- Discussion/Options

WGOA Sector	MetricTons		
	Aseason	Bseason	Total
Jig	0.594	0.396	0.03
H&LCV	0.491	0.491	0.01
H&LCP	0.551	0.449	0.19
TrawlCV	0.721	0.279	0.37
TrawlCP	0.372	0.628	0.02
PotCV/CP	0.521	0.479	0.37
Total	0.600	0.400	1.00

TABLE 14—FINAL 2017 AND 2018 PACIFIC HALIBUT PSC LIMITS, ALLOWANCES, AND APPORTIONMENTS
[Values are in metric tons]

Trawl gear			Hook-and-line gear ¹				
Season	Percent	Amount	Other than DSR		DSR		
			Season	Percent	Amount	Season	Amount
January 20–April 1	27.5	469	January 1–June 10	86	221	January 1–December 31	9
April 1–July 1	20	341	June 10–September 1	2	5		
July 1–September 1	30	512	September 1–December 31	12	31		
September 1–October 1	7.5	128					
October 1–December 31	15	256					
Total		1,706			267		9

¹The Pacific halibut prohibited species catch (PSC) limit for hook-and-line gear is allocated to the demersal shelf rockfish (DSR) fishery and fisheries other than DSR. The hook-and-line sablefish IFQ fishery is exempt from halibut PSC limits, as are pot and jig gear for all groundfish fisheries. Note: Seasonal or sector apportionments may not total precisely due to rounding.



Background

The annual Pacific cod TAC is apportioned 60% to the A season and 40% to the B season in the Western and Central Regulatory Areas of the GOA.

WGOA		Pct	
Sector	Aseason	Bseason	Total
Jig	59.4%	39.6%	2.5%
H&LCV	49.1%	49.1%	1.4%
H&LCP	55.1%	44.9%	19.3%
TrawlCV	72.1%	27.9%	37.4%
TrawlCP	37.2%	62.8%	2.3%
PotCV/CP	52.1%	47.9%	37.1%
Total	60.0%	40.0%	100.0%

TABLE 5—FINAL 2017 SEASONAL APPORTIONMENTS AND ALLOCATION OF PACIFIC COD TOTAL ALLOWABLE CATCH AMOUNTS IN THE GOA; ALLOCATIONS FOR THE WESTERN GOA AND CENTRAL GOA SECTORS AND THE EASTERN GOA INSHORE AND OFFSHORE PROCESSING COMPONENTS

[Values are rounded to the nearest metric ton and percentages to the nearest 0.01. Seasonal allowances may not total precisely to annual allocation amount]

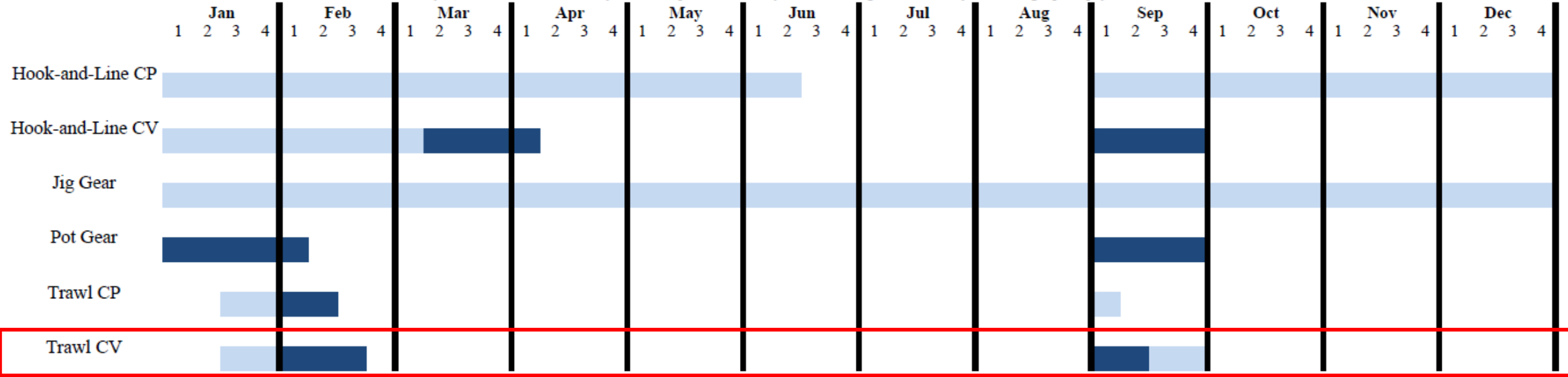
Regulatory area and sector	Annual allocation (mt)	A season		B season	
		Sector percentage of annual non-jig TAC	Seasonal allowances (mt)	Sector percentage of annual non-jig TAC	Seasonal allowances (mt)
Western GOA:					
Jig (2.5% of TAC)	635	N/A	381	N/A	254
Hook-and-line CV	347	0.70	173	0.70	173
Hook-and-line C/P	4,904	10.90	2,700	8.90	2,204
Trawl CV	9,511	27.70	6,861	10.70	2,650
Trawl C/P	594	0.90	223	1.50	372
All Pot CV and Pot C/P	9,412	19.80	4,904	18.20	4,508
Total	25,404	60.00	15,242	40.00	10,161
Central GOA:					
Jig (1.0% of TAC)	331	N/A	199	N/A	133
Hook-and-line <50 CV	4,790	9.32	3,056	5.29	1,734
Hook-and-line ≥50 CV	2,200	5.61	1,840	1.10	360
Hook-and-line C/P	1,674	4.11	1,347	1.00	327
Trawl CV ¹	13,641	21.14	6,933	20.45	6,708
Trawl C/P	1,377	2.00	657	2.19	720
All Pot CV and Pot C/P	9,121	17.83	5,849	9.97	3,272
Total	33,135	60.00	19,881	40.00	13,254
Eastern GOA		Inshore (90% of Annual TAC)		Offshore (10% of Annual TAC)	
	5,903	5,313	590		

¹ Trawl vessels participating in Rockfish Program cooperatives receive 3.81 percent, or 1,262 mt, of the annual Central GOA TAC (see Table 28c to 50 CFR part 679), which is deducted from the Trawl CV B season allowance (see Table 12).

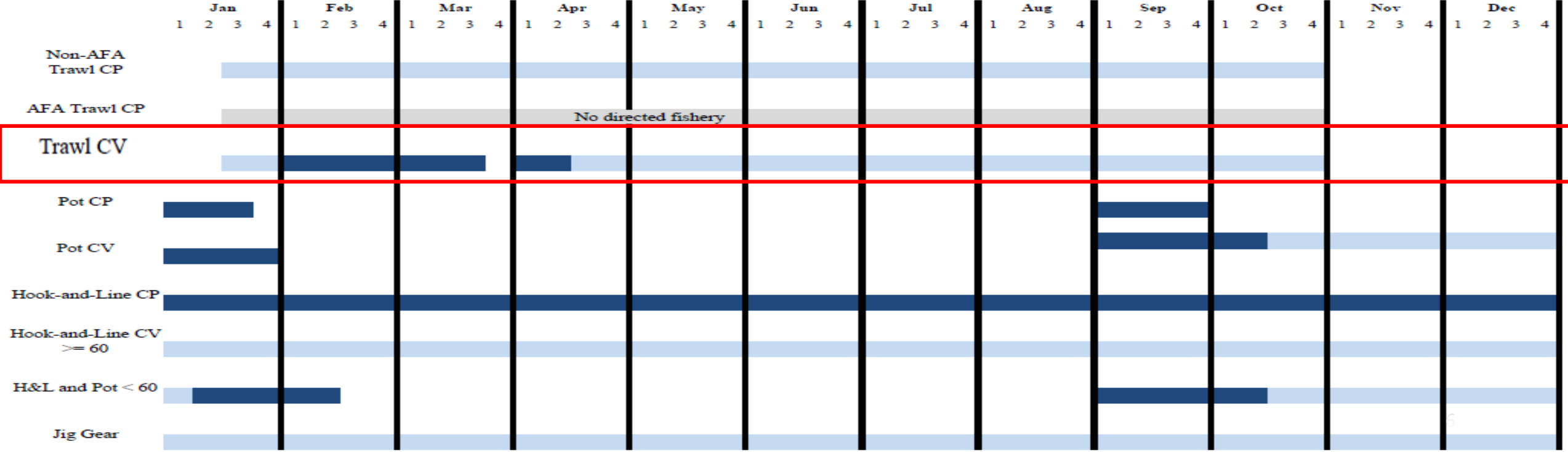
If a sector will be unable to harvest its allocation, regs allow for reallocation in order for the TAC to be harvested.

Western GOA Pacific Cod

More detailed GOA Pacific cod season dates can be found at <http://www.alaskafisheries.noaa.gov/sustainablefisheries/wgoapcod.pdf>



BSAI Pacific Cod



Halibut PSC

Seasonal Apportionment

Season	Shallow-water	Deep-water ¹	Total
January 20 - April 1	384	85	469
April 1 - July 1	85	256	341
July 1 - September 1	171	341	512
September 1 - October 1	128	Any remainder	128
Subtotal, January 20 - October 1	768	682	1,450
October 1 - December 31 ²			256
Total			1,706

Season	Shallow-water	Deep-water ¹	Total
January 20 - April 1	384	135	519
April 1 - July 1	85	256	341
July 1 - August 1	121	341	462
August 1 - October 1	53	75	128
Subtotal January 20 - October 1	643	807	1,450
October 1 - December 31 ²			256
Total			1,706

Halibut PSC

Seasonal Apportionment

Season	Shallow-water	Deep-water ¹	Total
January 20 - April 1	384	85	469
April 1 - July 1	85	256	341
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Halibut PSC

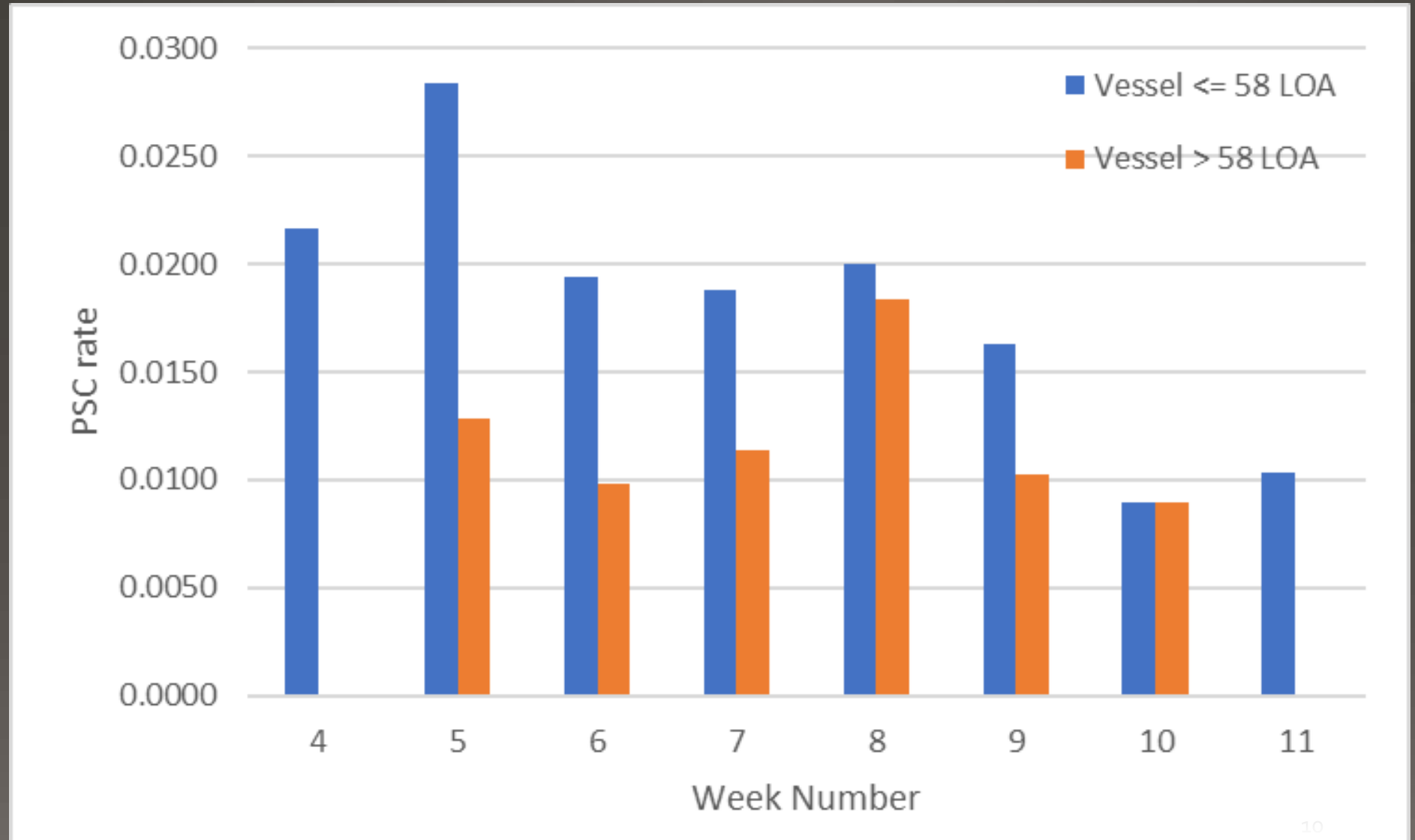
- CAS - Monitors
- PSC "rate"
- Groundfish Basis Weight
- PSC Estimate
- Halibut mortality

} Database

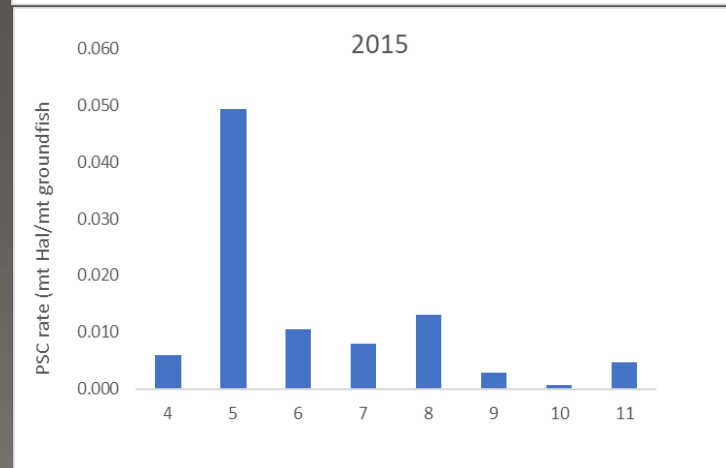
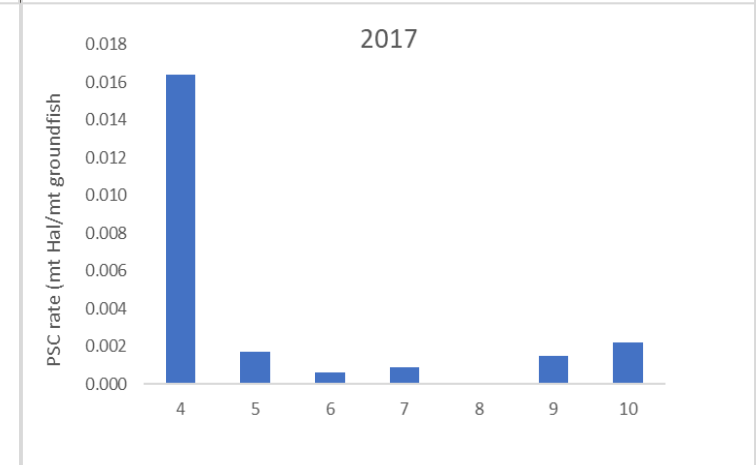
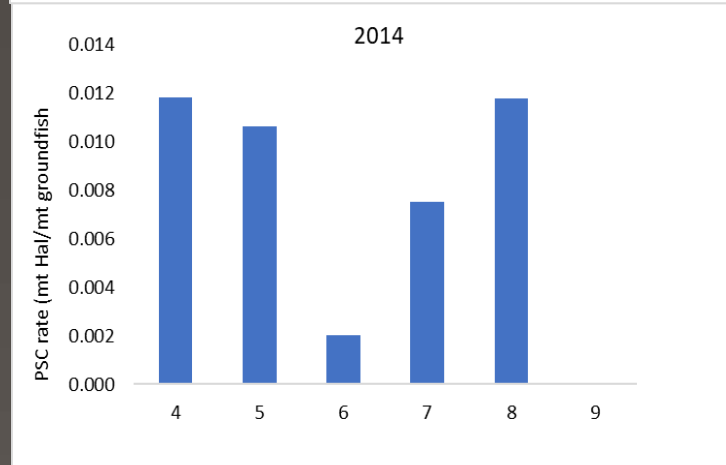
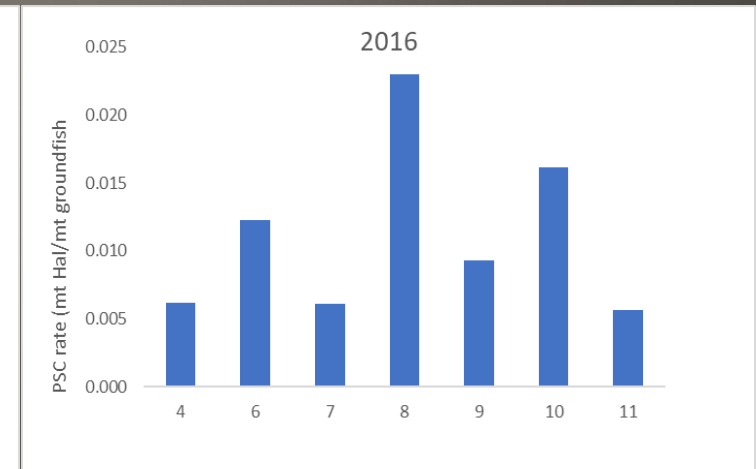
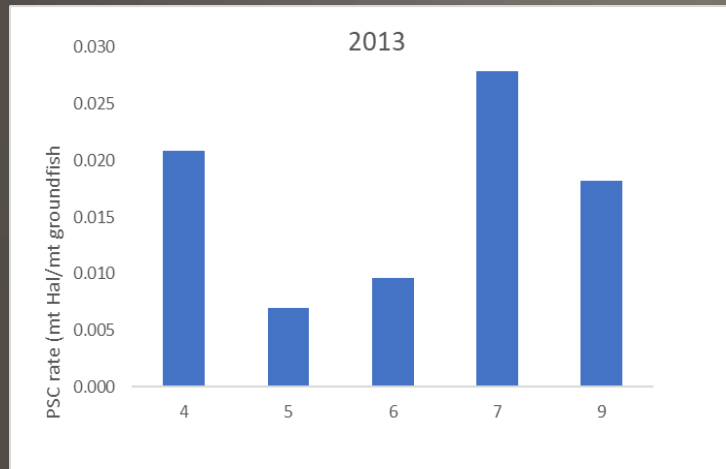
- $\leq 58'$ LOA
- $>58'$ LOA



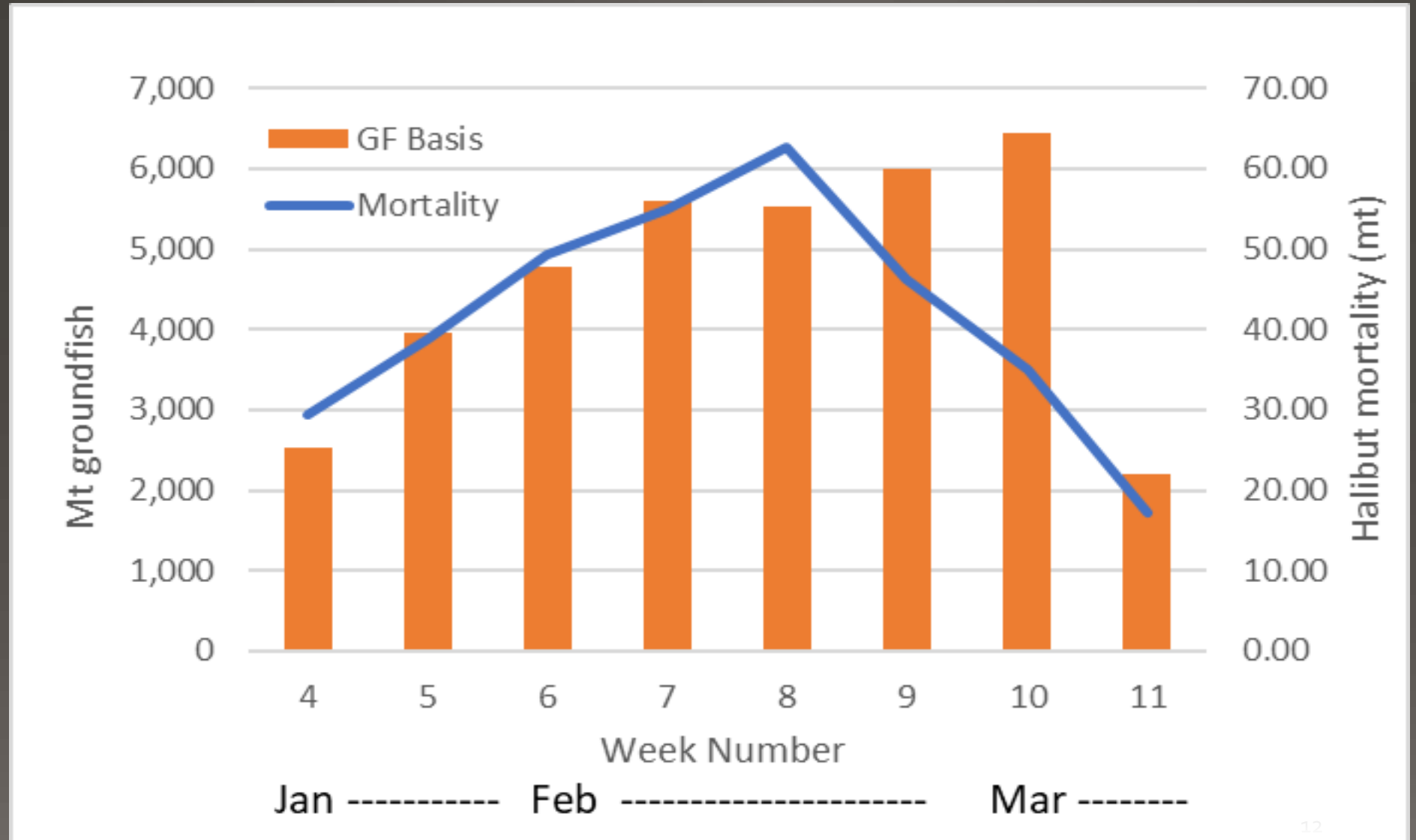
Analysis



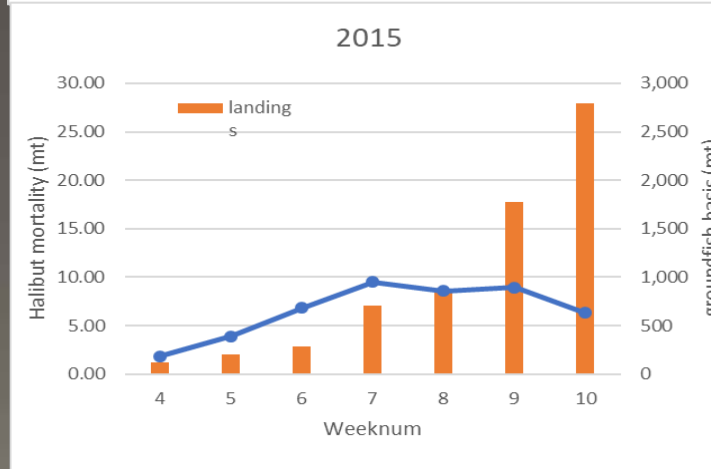
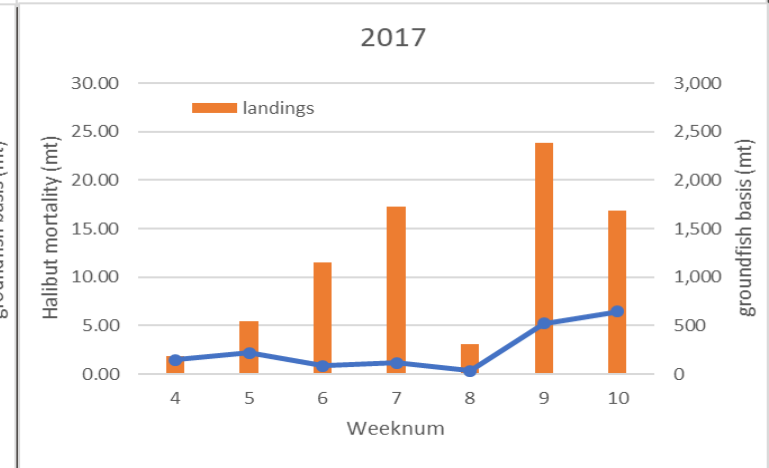
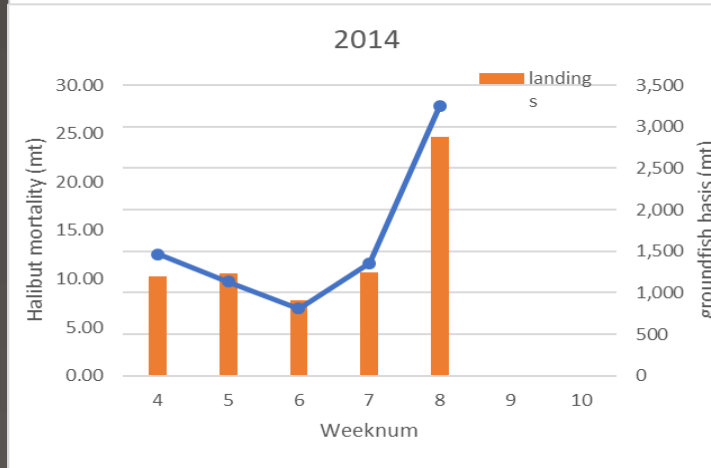
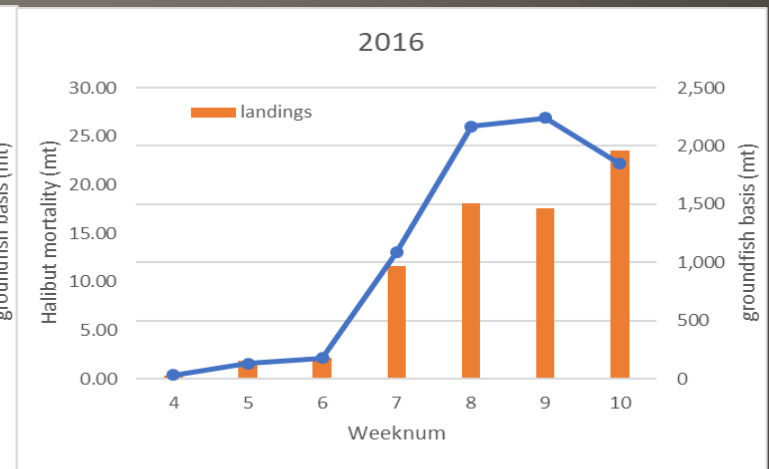
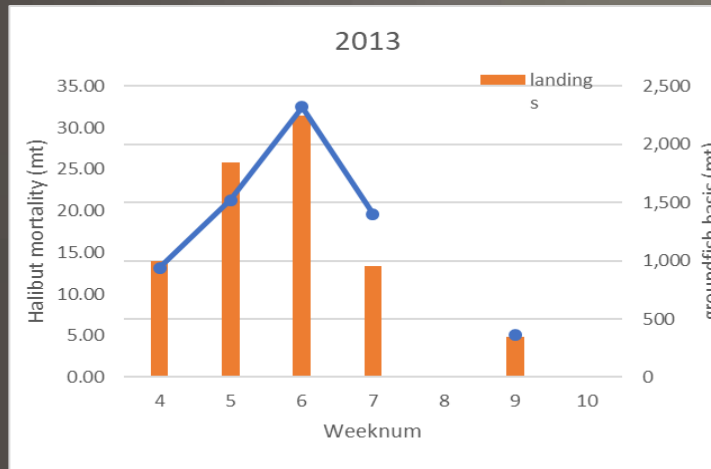
Analysis



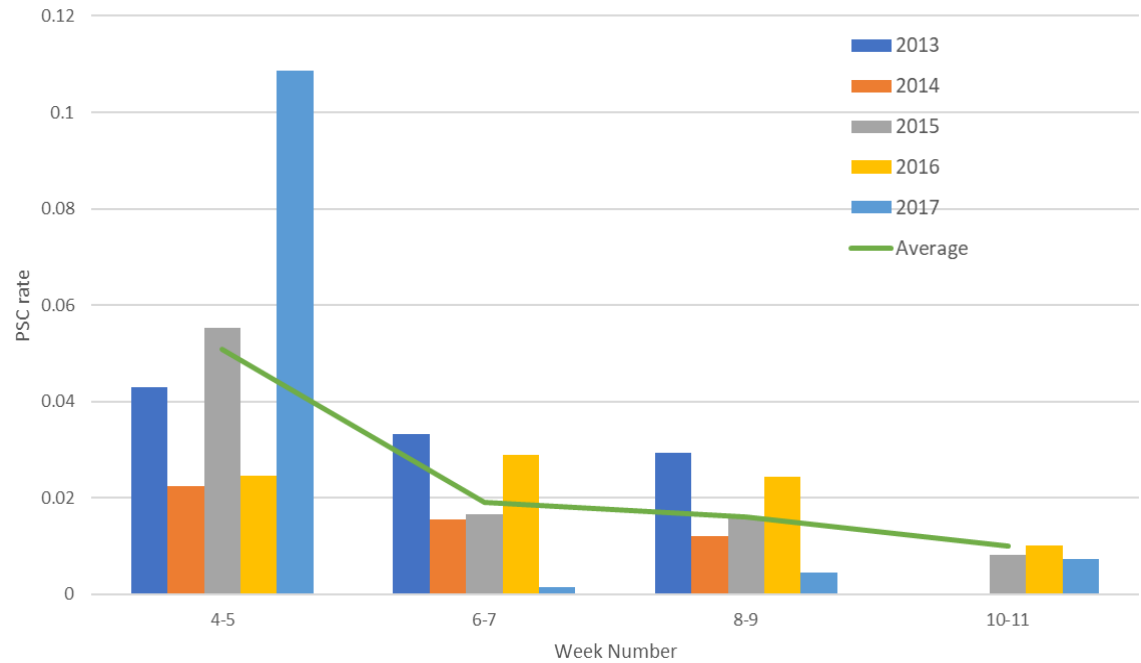
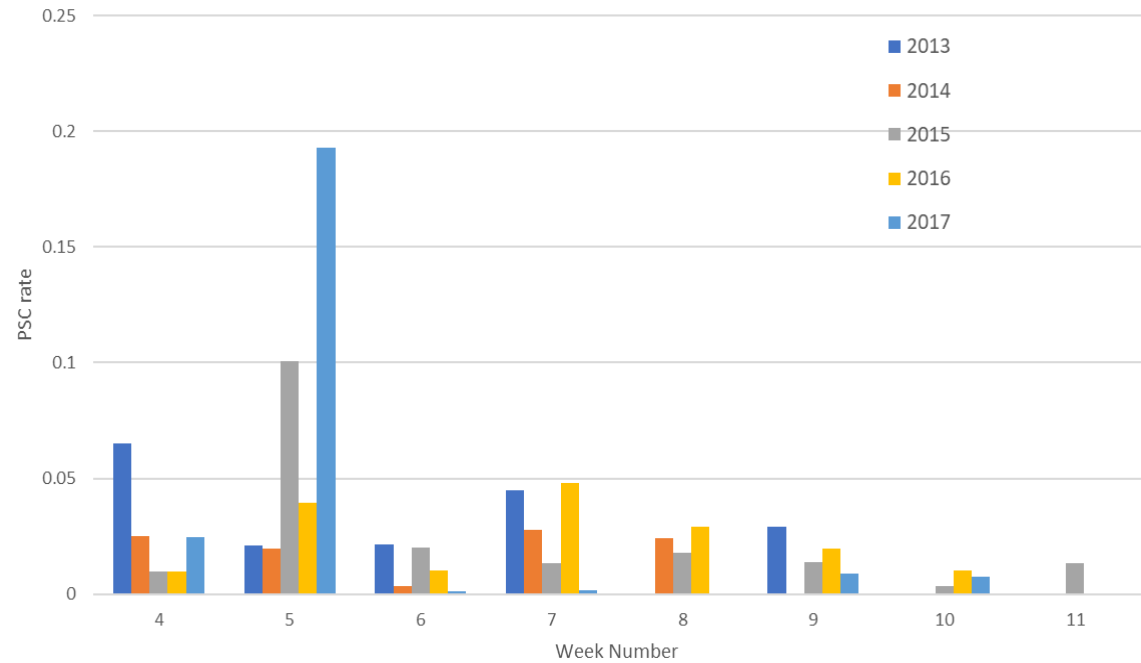
Analysis



Analysis



Analysis



Conclusions

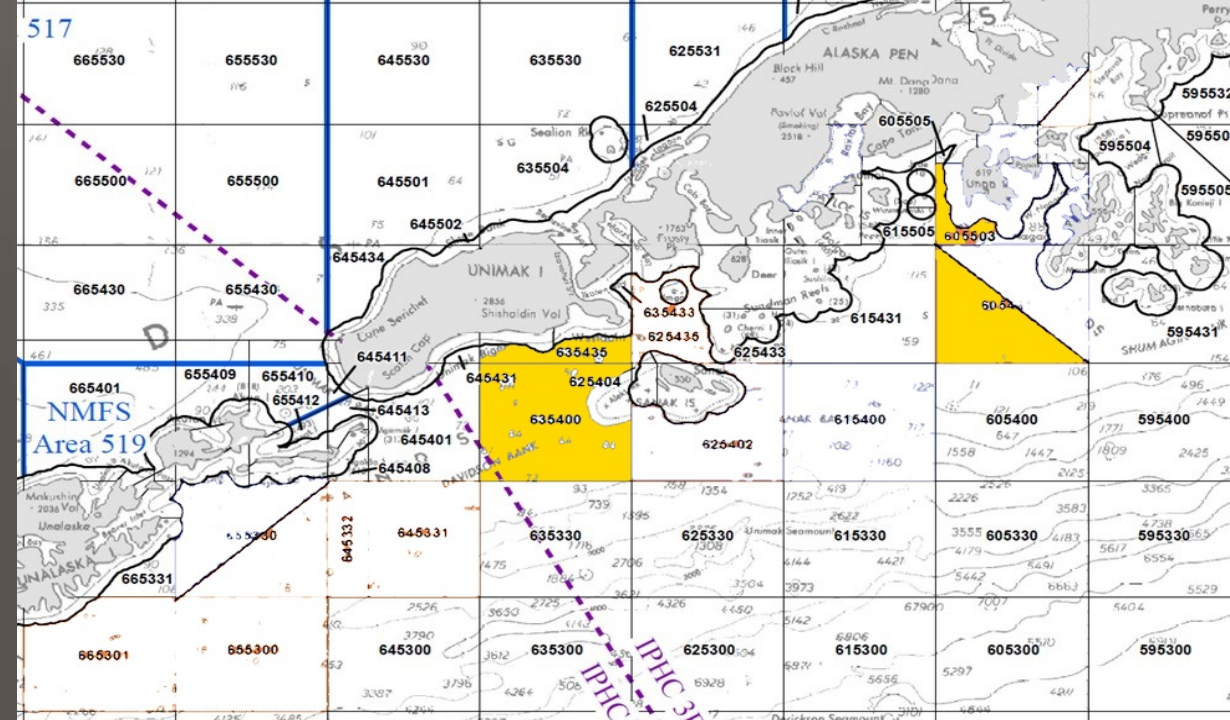
Explanation

Response

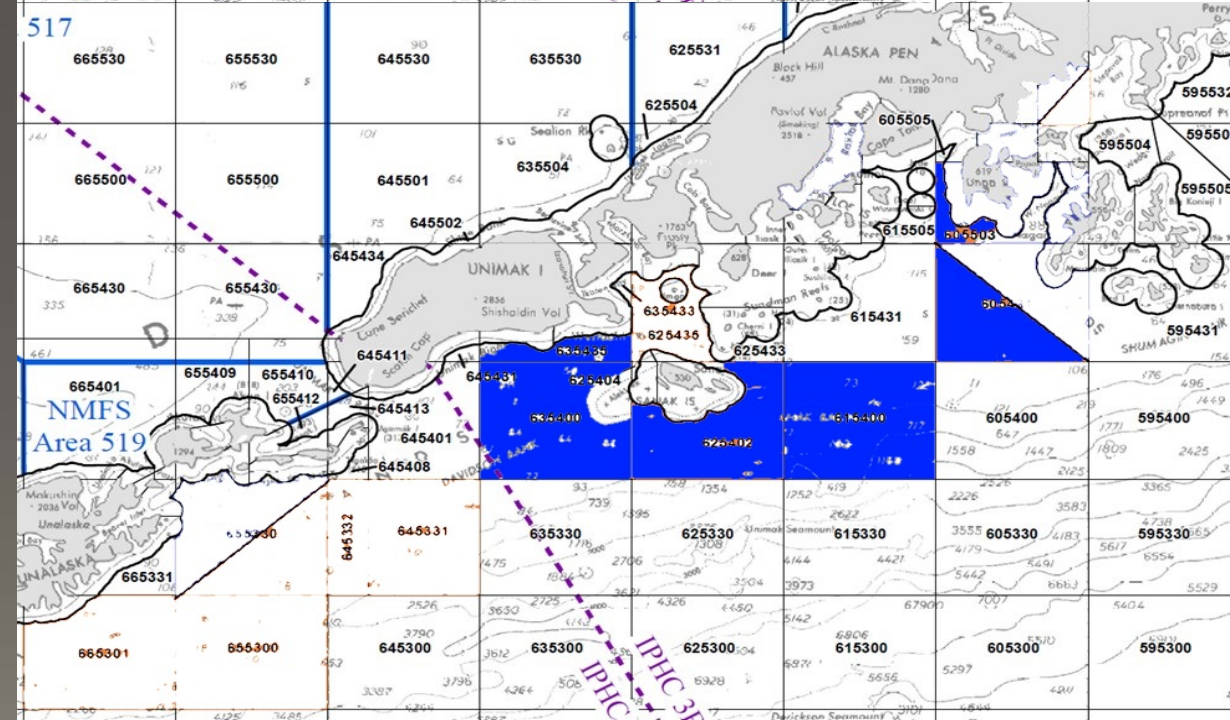
<p>1. The start of the season involves a learning process each year where the vessel operators find out where the halibut are by catching them and then avoiding those areas</p>	<p>A start date might not be effective since the learning curve would just be delayed</p>
<p>2. Halibut and Pacific cod are more closely associated with each other at the start of the season.</p>	<p>Consider shifting start date so season opens when the species are differently distributed.</p>
<p>3. Pacific cod are not aggregated enough to be caught efficiently (relatively low fishery CPUE). Because fishing is inefficient, tows are longer, and this increases halibut PSC.</p>	<p>Consider shifting start date so season opens when Pacific cod are typically more aggregated.</p>

Conclusions

$> 58'$ LOA



$\leq 58'$ LOA



Conclusions

- Western DPS of SSL
- Other Fed/State fisheries
- Shoreside processing
- Regulatory discards
- WGOA / CGOA / BSAI effort spillover
- Reductions in availability of halibut PSC

CG v WG PSC

Year	CG	WG
2013	1,088	140
2014	1,249	145
2015	1,332	77
2016	1,189	139
2017	976	32
Total	5,835	534