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2021 Observer Program Annual Report

June 2022

Overview

- **378** individual observers were trained, briefed, and equipped for deployment to vessels and processing facilities operating in the Bering Sea and Gulf of Alaska groundfish fisheries.
- Observers collected data onboard **296** fixed gear and trawl vessels and at **12** processing facilities for a total of **35,769** observer days.
- FMA maintained remote and hybrid observer training and briefing to keep observers, fishermen, and fishing communities safe:
 - New trainees trained virtually and in-person with hands-on training focused on cold water survival and species identification and dissection
 - Trainings incorporated COVID safety protocols
 - Briefings were conducted entirely virtually



COVID Waivers and Flexibilities

In March 2020, NMFS published a temporary emergency action (85 FR 17285, 27 March 2020) to provide NMFS with the authority to **waive observer coverage and other observer program requirements.**

This rule was extended (85 FR 16307, 29 March 2021) through March 26, 2022.

Allowed FMA to exercise flexibilities with observer deployments to meet monitoring needs when needed; for example:

- Waive Level 2 endorsement
- Waive deployment time limitations (90 days per deployment; time limits per vessel in 12 months)



Observer Cost - Full Coverage

- The total invoiced amount for full coverage observer days in 2021 was \$12,305,020 for 32,565 days
 - Invoiced days differ from deployment days – the latter includes days for which the observer provider did not charge
- Average cost per invoiced sea day \$378
- Average invoiced cost includes daily rate per observer day, transportation, and all other billed expenses



Electronic Monitoring - Full Coverage

- EM is used to supplement observer coverage in the following full coverage fisheries:
 - Bering Sea and Aleutian Islands non-pollock trawl catcher/processors
 - Additional EM required on these vessels if they are participating in deck sorting of Pacific halibut
 - Bering Sea pollock catcher/processors and motherships
 - Central Gulf of Alaska rockfish trawl catcher/processors
 - BSAI Pacific cod longline catcher/processors
- Vessels act as their own EM providers or arrange this service with a private company
- NMFS does not collect any cost information associated with these EM programs



Observer Cost – Partial Coverage

- Total expenditures for partial coverage observer deployments was \$4,448,612 for 3,193 observer days
 - Average cost of \$1,393 per observer day
 - Cost is inclusive of non-deployed day costs (training, debriefing, travel, quarantine time, and running the ODDS Help Desk for both observer and EM deployment)
- Some partial coverage observers were deployed to shoreside processing plants in order to maintain COVID safety protocols
 - These deployment days were paid for using federal funds



Fixed Gear Electronic Monitoring— Partial Coverage

- Total expenditures for fixed gear EM deployments was \$1,317,860 for 695 **reviewed** EM days
 - Preliminary average cost of \$1,896 per reviewed EM day
 - Only trips reviewed and data submitted to NMFS prior to February 28, 2022 are included in the reviewed EM day amount (denominator)
 - Average trip cost will come down once all 2021 trips are reviewed
 - Bulk of EM cost is equipment services; field technical services; and fixed costs associated with EM review (e.g., software licensing) which are already included in total expenditures
 - EM reviewer time spent on reviewing 2021 trips will be added to total expenditures
- The average cost per electronic monitoring day uses an “amortized” approach which spreads equipment costs over the assumed useful life of that equipment (5 years)
- EM operational costs include project coordination by EM vendors and image reviewer; data review, processing and analysis; equipment services; and field technical services.



Chapter 3:

Deployment Performance Review



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Partial Coverage in 2021: Two Deployment Plans

- **January 1 – August 31:** Deployment only from 14 ports where travel and lodging conditions allowed for COVID safety protocols and fishing effort was expected to make observer placement cost effective
 - Target Deployment Rates:
 - Hook and Line – 15.13%
 - Pot – 15.04%
 - Non-EM Trawl – 16.12%
- **September 1 – December 31:** All ports re-opened to observer deployments
 - Target Deployment Rates:
 - Hook and Line – 17.90%
 - Pot – 17.60%
 - Non-EM Trawl – 21.00%



Table 3-1. -- Number of total vessels (V), sampled vessels (v), total trips (N), and sampled trips (n) for each stratum in 2021. The coverage and 95% confidence interval columns are expressed as percentages of the total number of trips taken within each stratum.

Strata	V	v	N	n	Coverage		95% Confidence		Meets expected?
					Expected	Realized	Lower	Upper	
Full coverage: Jan. 1 - Dec. 31									
Full	118	118	1,849	1,849	100.0	100.0			
EM TRW EFP	46	46	999	999	100.0	100.0			
Full Coverage Total	149	149	2,848	2,848		100.0			



Table 3-1. -- Number of total vessels (V), sampled vessels (v), total trips (N), and sampled trips (n) for each stratum in 2021. The coverage and 95% confidence interval columns are expressed as percentages of the total number of trips taken within each stratum.

					Coverage		95% Confidence		
Strata	V	v	N	n	Expected	Realized	Lower	Upper	Meets expected?
Partial coverage EM: Jan. 1 - Dec. 31									
EM HAL	119	81	656	180	30.0	27.4	24.1	31.0	Yes
EM POT	44	33	267	76	30.0	28.5	23.1	34.3	Yes
EM TRW EFP	34	29	432	142	33.3	32.9	28.5	37.5	Yes
Partial coverage observed: Jan. 1 – Aug. 31									
HAL	242	71	853	106	15.1	12.4	10.3	14.8	No - lower than expected
POT	119	43	558	92	15.0	16.5	13.5	19.8	Yes
TRW	64	33	418	83	16.1	19.9	16.1	24.0	Yes
Partial coverage observed: Sep. 1 - Dec. 31									
HAL	173	63	506	88	17.9	17.4	14.2	21.0	Yes
POT	86	44	341	70	17.6	20.5	16.4	25.2	Yes
TRW	25	22	220	62	21.0	28.2	22.3	34.6	No - higher than expected
Gear-based Total	533	307	4,251	899		21.1			

Table 3-4. -- Monitored catch¹ (metric tons), total catch, and percent monitored (%) of groundfish and halibut retained and discarded in the groundfish and halibut fisheries in 2021 in the Gulf of Alaska. Empty cells indicate that no catch occurred.

Gear	Catch	Catcher/Processor			Catcher vessel			Catcher vessel: Rockfish program			Gear total		
		Monitored	Total	%	Monitored	Total	%	Monitored	Total	%	Monitored	Total	%
Hook and Line	Retained	1,732	1,861	93%	2,425	15,581	16%				4,157	17,442	24%
	Discard	712	736	97%	1,478	9,553	15%				2,189	10,289	21%
Jig	Retained				0	29	0%				0	29	0%
	Discard												
Non-Pelagic Trawl	Retained	28,654	28,654	100%	1,228	5,767	21%	5,062	5,062	100%	34,944	39,483	89%
	Discard	4,747	4,747	100%	98	667	15%	694	694	100%	5,539	6,108	91%
Pot	Retained	476	476	100%	2,414	12,482	19%				2,889	12,958	22%
	Discard	24	24	100%	100	602	17%				124	626	20%
Pelagic Trawl	Retained	1,327	1,327	100%	26,253	96,726	27%	12,518	12,518	100%	40,098	110,571	36%
	Discard	90	90	100%	191	557	34%	60	60	100%	340	706	48%

¹Monitored reflect either trips with an observer, EM fixed gear trips for which some video was reviewed, or EM trawl trips where observers sampled shoreside.

Table 3-5. -- Monitored catch¹ (metric tons), total catch, and percent monitored (%) of groundfish and halibut retained and discarded in the groundfish and halibut fisheries in 2021 in the Bering Sea/Aleutian Islands. Empty cells indicate that no catch occurred.

		Catcher/Processor			Mothership			Catcher vessel			Gear total		
Gear	Catch	Monitored	Total	%	Monitored	Total	%	Monitored	Total	%	Monitored	Total	%
Hook and Line	Retained	68,416	68,416	100%				312	1,836	17%	68,728	70,252	98%
	Discard	10,350	10,350	100%				165	2,100	8%	10,514	12,450	84%
Jig	Retained												
	Discard												
Non-Pelagic Trawl	Retained	283,067	283,067	100%	21,953	21,953	100%	5,849	13,183	44%	310,869	318,203	98%
	Discard	26,840	26,840	100%	1,652	1,652	100%	164	476	34%	28,655	28,967	99%
Pot	Retained	2,816	2,816	100%				2,120	13,159	16%	4,937	15,976	31%
	Discard	44	44	100%				49	405	12%	93	449	21%
Pelagic Trawl	Retained	626,356	626,356	100%	120,683	120,683	100%	601,652	601,692	100%	1,348,691	1,348,732	100%
	Discard	3,066	3,066	100%	1,074	1,074	100%	936	936	100%	5,077	5,077	100%

¹Monitored reflect either trips with an observer, EM fixed gear trips for which some video was reviewed, or EM trawl trips where observers sampled shoreside.



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Chapter 4 – Enforcement and Compliance

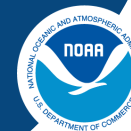
Data Analysis Methods

- Each statement submitted by an observer may contain multiple occurrences of potential violations.
- The frequency of potential violations is based on a rate of occurrences per 1,000 deployed days.
- OLE Priority: Inter-personal is calculated occurrences per assignment.
- Refer to page 56 of the Annual Report for more specifics on data preparation.



Trends in Reporting

- OLE Priority: Inter-personal
 - Assault – zero reports in 2021.
 - Sexual harassment
 - CP/MS PTR BSAI AFA: .28 per assignment.
 - CP/MS PTR BSAI CDQ: .19 per assignment.
 - PLANT BSAI AFA: .09 per assignment.
 - Intimidation, coercion, hostile work environment:
 - PLANT BSAI AFA: .23 occurrences per assignment.
 - CP/MS PTR BSAI AFA: .15 occurrences per assignment.
 - Disruptive/Bothersome Behavior – Conflict Resolved:
 - CP/MS POT BSAI CDQ: 2.5 occurrences per assignment.



Trends in reporting

- OLE Priority – Safety & Duties

- Interference/sample biasing

- CP/MS POT BSAI OA: 27.8 occurrences per 1,000 deployed days.
 - CV NPT BSAI OA: 19.2 occurrences per 1,000 deployed days.

- Safety

- CP/MS POT BSAI CDQ: 83.6 occurrences per 1,000 deployed days.
 - CV POT GOA IFQ: 40.8 occurrences per 1,000 deployed days.
 - CV NPT BSAI OA: 19.2 occurrences per 1,000 deployed days.

- Coast Guard

- Marine casualty

- CV POT GOA OA: 24.7 occurrences per 1,000 deployed days.

- MARPOL/Oil

- CV POT GOA OA: 37 occurrences per 1,000 deployed days.



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Trends in Reporting

- Limited Access Programs

- Amendment 80

- CP/MS PTR GOA RPP: 75.4 occurrences per 1,000 deployed days.

- Protected Resources and Prohibited Species

- Seabird Avoidance

- CV HAL GOA OA: 454.5 per 1,000 deployed days.

- Gulf of Alaska Salmon

- PLANT GOA OA: 98.4 occurrences per 1,000 deployed days.

- Halibut Deck Sorting

- CP/MS NPT BSAI CDQ: 13.8 per 1,000 deployed days.

- Other Statement types

- PLANT GOA OA: Failure to notify – 218 per 1,000 deployed days.

- CV POT GOA OA: Failure to provide reasonable assistance – 703.7 occurrences per deployed days & R/R - 469.1 per 1,000 deployed days.



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Comparing 2020 to 2021

- Intimidation, coercion, hostile work environment
 - 60% of all factor groups had a least one occurrence
 - 55% increase from 2020 to 2021
- Safety-NMFS
 - 60% of all factor groups had a least one occurrence
 - 10% decrease from 2020 to 2021
- Marine Casualty
 - 69% of all factor groups had at least one occurrence
 - 12% decrease from 2020 to 2021
- Record Keeping and Reporting
 - 83% of all factor groups had at least one occurrence
 - 3% decrease from 2020 to 2021



Outreach letters & Meetings with Industry

- Outreach letters
 - Observer Work Environment
 - Impacts to Observer Data
 - CP Operational Requirements
 - Amendment 80 Requirements
 - Halibut Deck Sorting Requirements
 - Catcher Vessel Requirements
- Voluntary Online Training – Ensuring a Safe Work Environment for Observers
- Meetings with vessel companies
 - 26 meetings in total – discussions focused on current issues detected in the fishing fleet in general and in specific sectors.



Compliance Assistance, Written Warnings, Summary Settlements, Cases Forwarded for Prosecution

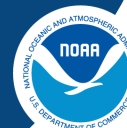
- Compliance Assistance
 - 53 cases
 - 202 individual statements
- Written Warnings
 - 11 cases
 - 41 individual statements
- Summary Settlements
 - 11 cases
 - 23 individual statements
- Forwarded for Prosecution
 - 3 cases
 - 5 individual statements



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NOAA General Counsel - Enforcement Decisions, Orders and Enforcement Actions

- AK1701779; **F/V Seafisher** – Crewman Iakopo Jake Vae was charged under the Magnuson-Stevens Act with forcibly assaulting and sexually harassing a fisheries observer onboard the vessel. A \$24,000 superseding NOVA was issued.
- AK1708652; **F/V Vaerdal** - Crew member Justin Williams was charged under the Magnuson-Stevens Act with sexually harassing a fisheries observer onboard the vessel. A \$24,000 NOVA was issued.
- AK2005521; **F/V Legacy** - Crew member Tausagi Tusi was charged under the Magnuson-Stevens Act with forcibly assaulting a fisheries observer onboard the vessel. A \$72,000 NOVA was issued.
- AK1802015; **F/V Alaskan Lady** - In an Initial Decision, Administrative Law Judge Susan Biro found crewman Eliman S. Bah liable, and imposed a civil penalty of \$20,000, for sexually harassing an observer in violation of the Magnuson-Stevens Fishery Conservation and Management Act. Specifically, Judge Biro found that Bah harassed the observer both by conduct that had sexual connotations, as well as by otherwise creating an intimidating, hostile, or offensive environment. The Judge's decision followed a two-day hearing that occurred on September 1-2, 2021.
- AK2100828; **Terry Fisher** – Crewman was charged under the Magnuson Stevens Act with one count of harassing a female fisheries observer on board a vessel. A \$24,000 NOVA was issued.



NMFS Recommendations for the 2023 Draft Annual Deployment Plan

Observer selection pools:

- Maintain 3 gear based strata (hook-and-line, pot, and trawl)
- Continue to allocate observer deployment using a 15% hurdle plus optimization.
 - Base optimization on discarded groundfish, Pacific halibut PSC, and Chinook salmon PSC.



NMFS Recommendations for the 2023 Draft Annual Deployment Plan

Fixed Gear EM:

- Maintain the size of the 2022 fixed gear pool (170 vessels)
 - If funding becomes available, expand by up to 30 vessels.
- If funding is insufficient to accommodate all vessels that request EM, follow past prioritization
 - Vessels already equipped with EM; vessels unlikely to introduce data gaps; vessels where carrying an observer is problematic due to bunk space or life-raft limitations
- Continue to notify operators of VMP non-compliance.
 - NMFS may remove vessels with repeated problems.



NMFS Recommendations for the 2023 Draft Annual Deployment Plan

Trawl EM EFP:

- Continue the pelagic trawl EM EFP
- Support increasing the number of participants and continuing efforts to improve processor participation and support.
- Collaborating with Industry on Future EM Projects:
 - Evaluate cost-effective and mobile EM systems
 - Explore alternative EM review protocols to minimize changes in catch handling
 - Test EM configurations for multiple VMPs to allow cross-over between the fixed gear EM program and the trawl EM EFP



Questions?



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