PIFSC Report on the Logbook Program for the American Samoa Longline Fishery July-September 2008¹

Pacific Islands Fisheries Science Center

Summary statistics of American Samoa longline catch and effort for the third quarter of 2008, based on date of haul, are shown in Table 1. The table is derived from all logbook data submitted as of December 11, 2008. As of this date, the documented delinquency rate according to the Department of Marine and Wildlife Resources (DMWR) Daily Effort Census and Delinquency Reporting System for the third quarter of 2008 was 2.11%.

According to the longline logbook data, 24 vessels turned in longline logs for sets made during the third quarter of 2008 (Fig. 1). These 24 vessels made 1,160 sets (Fig. 2) and deployed 3,490,479 hooks (Fig. 3). The third quarter of 2008 showed declines in effort, with larger declines in catch for most species over the third quarter of last year. Compared to the third quarter of 2007, the number of vessels turning in logs this quarter decreased by 11%, from 27 vessels to 24, the number of sets decreased by 27%, and the number of hooks set also decreased by 27%. The average number of hooks used per set increased by less than 1%, from 2989 to 3008, reflecting a completed trend toward a fishing fleet of larger vessels deploying more hooks per set.

The total catch for all species combined was 80,884 fish (Fig. 4), which is a decrease of 45% compared to the near-record third quarter of last year. Albacore continued to dominate the catch, with 55,801 fish caught in the third quarter of 2008 (Fig. 5), a 51% decrease over the record 113,831 albacore caught in the third quarter of 2007. The catch of most species showed similar declines compared to the 3rd quarter of 2007. The bigeye tuna catch (Fig. 6) showed a decrease of 25%, yellowfin tuna catch (Fig. 8) showed a decrease of 61%, the catch of billfish (Fig. 11) was down 29%, the catch of sharks (Fig.12) was down 27%, and the wahoo catch (Fig. 10) dropped by 53%. The catch of skipjack tuna (Fig. 7) increased by 7.5% from its value in the third quarter of 2007 while the mahimahi catch (Fig. 9) showed an increase of 54% from its value a year ago.

Statistics on catch per 1000 hooks decreased less than the corresponding catch. The catch per 1000 hooks of albacore (Fig. 13) decreased by 33%, the catch per 1000 hooks of yellowfin tuna (Fig. 16) showed a decrease of 47%, the catch per 1000 hooks of wahoo (Fig. 18) dropped by 36%, and the catch per 1000 hooks of billfish (Fig. 19) was down 3% from its value a year ago. The catch per 1000 hooks of skipjack tuna (Fig. 15) increased by 46% from its value in the third quarter of 2007, the catch per 1000 hooks of mahimahi (Fig. 17) increased by 107%, the catch per 1000 hooks of bigeye tuna (Fig. 14) showed a slight increase of 2%, and the catch per 1000 hooks of sharks (Fig. 20) was unchanged.

¹ PIFSC Data Report DR-08-012 Issued 18 December 2008

Table 1. Summary of fish catch and nominal fishing effort by American Samoa Longline vesselsduring the third quarter of 2008 based on longline logbooks submitted before Dec. 11, 2008

TRIP INFORMATION

Number of Vessels:	24
Number of Trips:	88
Number of Sets:	1,160
1000's of Hooks Set:	3,490
Number of Light Sticks Used:	85

CATCH INFORMATION					
Species	Number Caught	Number Kept	Number Released	Number Caught per 1000 Hooks	
BILLFISH					
Black marlin	1	1	0	0.00	
Blue marlin	501	69	432	0.14	
Striped marlin	66	3	63	0.02	
Sailfish	147	3	144	0.04	
Spearfish	280	8	272	0.08	
Swordfish	32	13	19	0.01	
TOTAL BILLFISH	1,027	97	930	0.29	
SHARKS					
Blue shark	978	3	975	0.28	
Shortfin mako shark	85	1	84	0.02	
Thresher shark	64	0	64	0.02	
White tip oceanic shark	280	0	280	0.08	
Sharks	16	0	16	0.00	
TOTAL SHARKS	1,423	4	1,419	0.41	
TUNA					
Albacore	55,801	55,666	135	15.99	
Bigeye tuna	2,136	2,046	90	0.61	
Bluefin tuna	5	5	0	0.00	
Skipjack tuna	12,176	11,128	1,048	3.49	
Yellowfin tuna	3,128	3,038	90	0.90	
TOTAL TUNA	73,246	71,883	1,363	20.98	
OTHER PELAGICS					
Mahimahi	1,008	637	371	0.29	
Moonfish	146	16	130	0.04	
Oilfish	1,154	13	1,141	0.33	
Pomfret	337	25	312	0.10	
Wahoo	2,422	1,945	477	0.69	
TOTAL OTHER PELAGICS	5,067	2,636	2,431	1.45	
NON-PMUS					
Pelagic fish (misc)	121	0	121	0.03	
TOTAL NON-PMUS	121	0	121	0.03	
TOTAL ALL SPECIES	80,884	74,620	6,264	23.17	

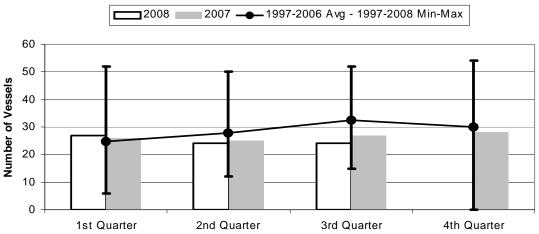
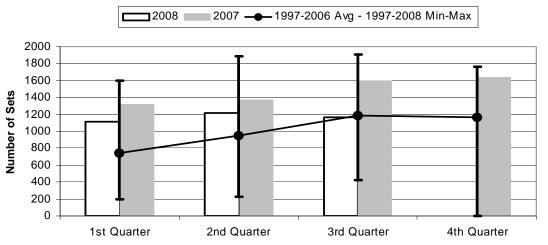


Figure 1. American Samoa Longline Vessels Submitting Logs by Quarter for

	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	27	24	24	0
2007	26	25	27	28
1997-2008 Max	52	50	52	54
1997-2006 Avg	25	28	32	30
1997-2008 Min	6	12	15	0





	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	1,109	1,215	1,160	0
2007	1,316	1,366	1,595	1,642
1997-2008 Max	1,602	1,886	1,903	1,758
1997-2006 Avg	741	953	1,183	1,162
1997-2008 Min	192	223	424	0

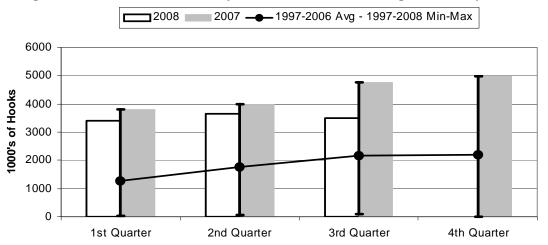
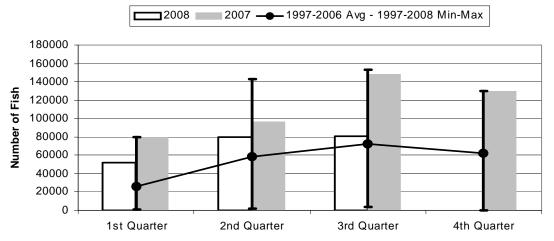


Figure 3. Number of Hooks Set by the American Samoa Longline Fleet by Quarter for

	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	3,402	3,660	3,490	0
2007	3,805	3,993	4,769	4,985
1997-2008 Max	3,805	3,993	4,769	4,985
1997-2006 Avg	1,262	1,760	2,152	2,189
1997-2008 Min	41	51	101	0

Figure 4. American Samoa Longline Total Catch (All Species) by Quarter for



	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	52,273	80,171	80,884	0
2007	79,567	96,950	148,564	130,238
1997-2008 Max	79,567	142,603	153,301	130,238
1997-2006 Avg	26,127	58,470	72,002	62,265
1997-2008 Min	1,315	1,416	4,127	0

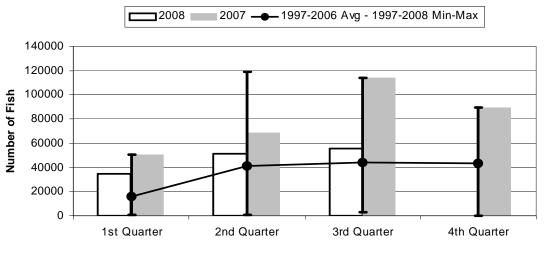
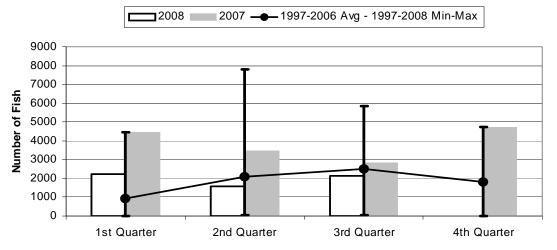


Figure 5. American Samoa Longline Albacore Catch by Quarter for

	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	34,945	51,558	55,801	0
2007	50,382	68,288	113,831	89,389
1997-2008 Max	50,382	118,994	113,831	89,389
1997-2006 Avg	15,986	40,820	44,057	43,213
1997-2008 Min	940	851	3,182	0

Figure 6. American Samoa Longline Bigeye Tuna Catch by Quarter for



	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	2,225	1,565	2,136	0
2007	4,466	3,485	2,850	4,728
1997-2008 Max	4,466	7,785	5,824	4,728
1997-2006 Avg	947	2,082	2,504	1,790
1997-2008 Min	6	26	55	0

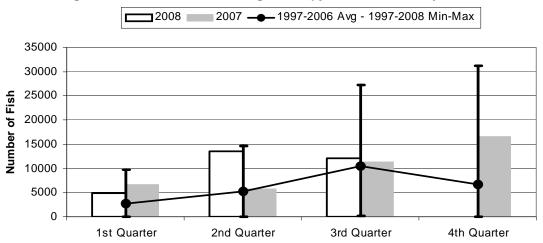
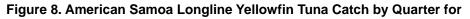
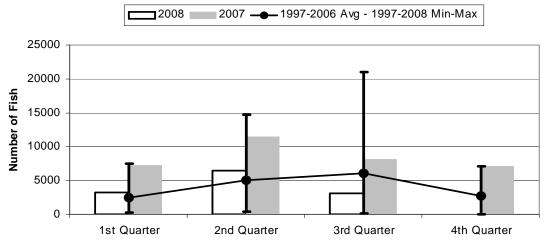


Figure 7. American Samoa Longline Skipjack Tuna Catch by Quarter for

	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	4,943	13,617	12,176	0
2007	6,735	5,708	11,327	16,635
1997-2008 Max	9,809	14,606	27,234	31,191
1997-2006 Avg	2,636	5,216	10,437	6,730
1997-2008 Min	0	6	244	0





	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	3,197	6,427	3,128	0
2007	7,174	11,488	8,135	7,104
1997-2008 Max	7,428	14,681	20,993	7,104
1997-2006 A vg	2,508	5,024	6,013	2,744
1997-2008 Min	213	356	84	0

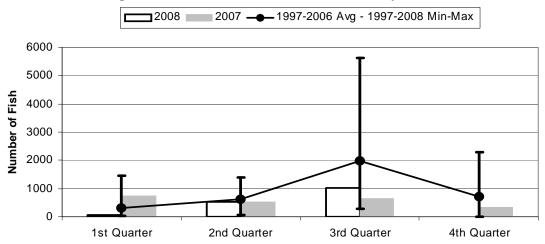
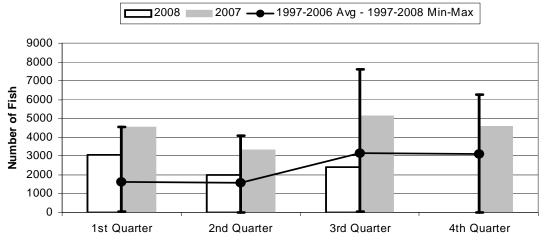


Figure 9. American Samoa Mahimahi Catch by Quarter for

	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	55	516	1,008	0
2007	729	535	655	330
1997-2008 Max	1,455	1,391	5,642	2,297
1997-2006 Avg	315	604	1,984	709
1997-2008 Min	30	59	280	0

Figure 10. American Samoa Wahoo Catch by Quarter for



	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	3,078	1,981	2,422	0
2007	4,524	3,336	5,135	4,573
1997-2008 Max	4,524	4,076	7,629	6,281
1997-2006 Avg	1,614	1,555	3,149	3,115
1997-2008 Min	27	20	68	0

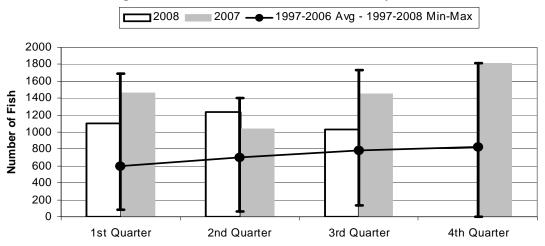
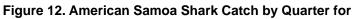
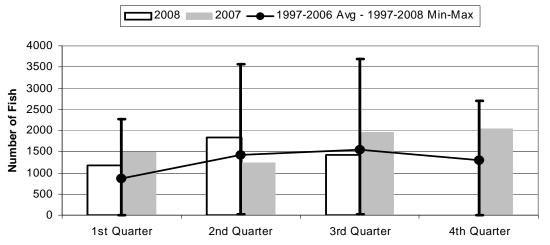


Figure 11. American Samoa Billfish Catch by Quarter for

	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	1,100	1,242	1,027	0
2007	1,468	1,045	1,450	1,819
1997-2008 Max	1,692	1,404	1,729	1,819
1997-2006 Avg	594	697	785	821
1997-2008 Min	83	58	132	0





	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	1,174	1,826	1,423	0
2007	1,480	1,242	1,952	2,044
1997-2008 Max	2,262	3,562	3,686	2,695
1997-2006 Avg	864	1,432	1,553	1,303
1997-2008 Min	5	16	26	0

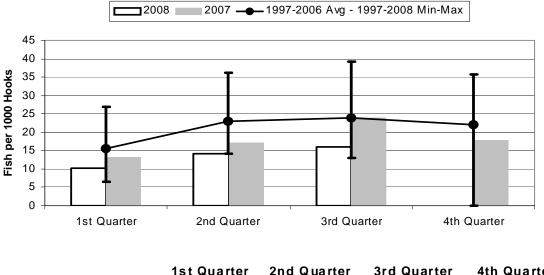
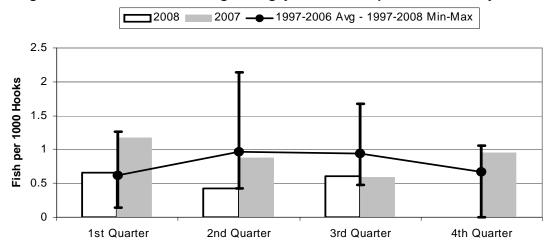


Figure 13. American Samoa Longline Albacore Catch per 1000 Hooks by Quarter for

	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	10.27	14.09	15.99	0.00
2007	13.24	17.10	23.87	17.93
1997-2008 Max	27.01	36.18	39.13	35.75
1997-2006 Avg	15.64	23.07	23.92	22.13
1997-2008 Min	6.58	14.09	12.96	0.00

Figure 14. American Samoa Longline Bigeye Tuna Catch per 1000 Hooks by Quarter for



	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	0.65	0.43	0.61	0.00
2007	1.17	0.87	0.60	0.95
1997-2008 Max	1.27	2.15	1.68	1.05
1997-2006 Avg	0.61	0.97	0.94	0.66
1997-2008 Min	0.15	0.43	0.48	0.00

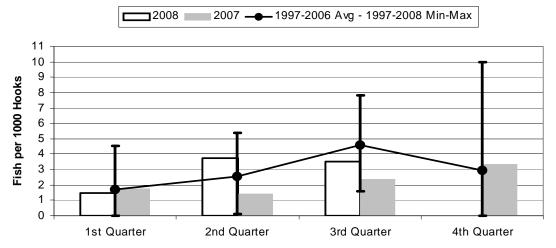
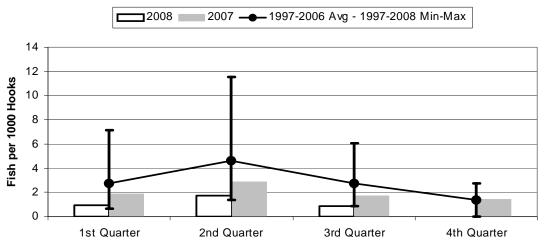


Figure 15. American Samoa Longline Skipjack Tuna Catch per 1000 Hooks by Quarter for

	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	1.45	3.72	3.49	0.00
2007	1.77	1.43	2.38	3.34
1997-2008 Max	4.56	5.39	7.84	9.98
1997-2006 Avg	1.71	2.56	4.61	2.93
1997-2008 Min	0.00	0.12	1.56	0.00

Figure 16. American Samoa Yellowfin Tuna Catch per 1000 Hooks by Quarter for



	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	0.94	1.76	0.90	0.00
2007	1.89	2.88	1.71	1.43
1997-2008 Max	7.12	11.51	6.04	2.76
1997-2006 Avg	2.71	4.65	2.71	1.34
1997-2008 Min	0.66	1.34	0.83	0.00

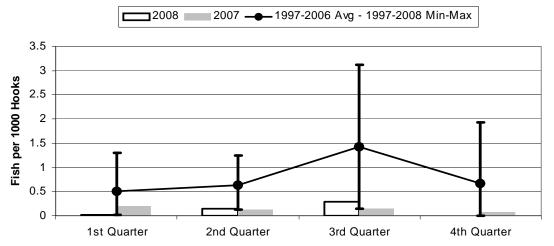
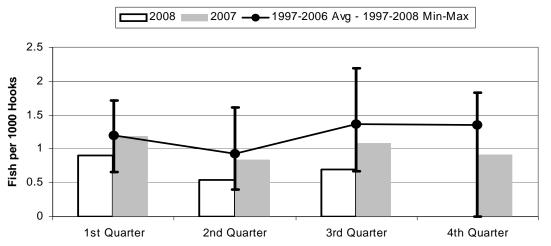


Figure 17. American Samoa Longline Mahimahi Catch per 1000 Hooks by Quarter for

	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	0.02	0.14	0.29	0.00
2007	0.19	0.13	0.14	0.07
1997-2008 Max	1.30	1.25	3.13	1.93
1997-2006 Avg	0.50	0.62	1.42	0.67
1997-2008 Min	0.02	0.12	0.14	0.00

Figure 18. American Samoa Wahoo Catch per 1000 Hooks by Quarter for



	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	0.90	0.54	0.69	0.00
2007	1.19	0.84	1.08	0.92
1997-2008 Max	1.71	1.62	2.20	1.83
1997-2006 A vg	1.20	0.92	1.36	1.35
1997-2008 Min	0.66	0.39	0.67	0.00

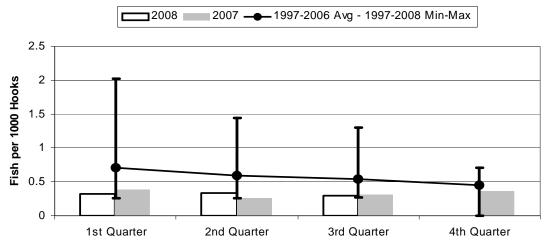
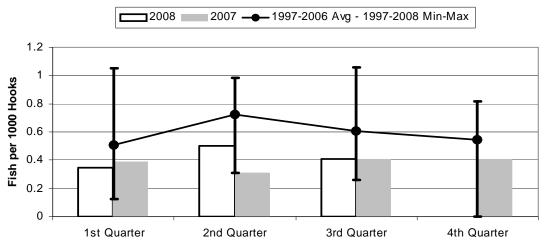


Figure 19. American Samoa Billfish Catch per 1000 Hooks by Quarter for

	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	0.32	0.34	0.29	0.00
2007	0.39	0.26	0.30	0.36
1997-2008 Max	2.02	1.44	1.31	0.71
1997-2006 Avg	0.71	0.59	0.54	0.45
1997-2008 Min	0.25	0.26	0.27	0.00

Figure 20. American Samoa Shark Catch per 1000 Hooks by Quarter for



	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
2008	0.35	0.50	0.41	0.00
2007	0.39	0.31	0.41	0.41
1997-2008 Max	1.05	0.99	1.06	0.82
1997-2006 Avg	0.51	0.72	0.60	0.54
1997-2008 Min	0.12	0.31	0.26	0.00