
Appendix III

1999 GENERAL CATEGORY EFFORT CONTROL SPECIFICATIONS FOR ATLANTIC BLUEFIN TUNA

General Category Effort Controls

General category effort controls consist of dividing the General category season into time period subquotas, and the use of restricted-fishing days (RFDs). Effort controls are intended to affect where and when bluefin tuna are caught for a variety of objectives. General category catch per unit effort (CPUE) information is used in stock assessments, so lengthening the season is important for scientific data collection purposes (See Section 2.2.3 for further explanation of the importance of scientific data collection in the bluefin tuna fishery). Objectives also include lengthening the season for market reasons, consistent with the goal of achieving optimum yield, and addressing allocation issues (e.g., through set-asides and split seasons). For example, the temporal and spatial effort control options for the General category seek to lengthen the fishing season in a category with high participation and landing rates. This document addresses several alternatives for General category effort controls.

At its second meeting on January 11 and 12, 1998, the HMS AP considered the scoping comments, and long-term allocation and effort control issues for bluefin tuna, including: Quota reallocation, General category effort controls, reducing landings rates of small fish, limited access, additional set-asides for the General category for Connecticut/Rhode Island/New York and for North Carolina, realignment of Angling category areas, the use of spotter aircraft, North Carolina fishery quotas, and readjusting boundaries for geographic subquotas. There was no clear consensus on quota allocation and effort controls during the scoping process and AP meeting, or at subsequent AP meetings.

In October 1998, NMFS published the draft HMS FMP, incorporating the best available scientific information available at that time. Some of the very latest information, however, such as the results of the September 1998 ICCAT stock assessment for bluefin tuna, were not available at the time of publication. The results of the 1998 stock assessment, as well as the November 1998 ICCAT meeting, were incorporated into the Bluefin Tuna Addendum to the draft HMS FMP, which was published along with the proposed General category effort control specifications.

A. General Category Season Alternatives

The market quality of bluefin tuna is generally higher later in the season, particularly in the month of October. This quality differential is primarily related to the higher fat content of fish later in the season, and can be reflected in ex-vessel prices, although supplies to the Japanese market (from all sources), the exchange rate, and other quality factors of each bluefin tuna are also critical determinants of Japanese (and thus domestic) prices.

In 1995, NMFS implemented monthly quotas for the bluefin tuna General category to address concerns regarding allocation of fishing opportunities, to allow for a late season fishery, and to improve marketing conditions. Due to the delay in implementing the 1995 rule, and the unexpected increase in recreational landings at the end of the season, these monthly quotas were not fully implemented. In order to fully evaluate the potential of an effort control system using time period subquotas, the program was reinitiated for the entire 1996 General category season. Results were mixed in 1996; quota remained available for the General category to be open later in the season, but only for a few days, and under “derby” fishing conditions (high effort and landings concentrated in a short time period).

In 1997 and 1998, the General category quota was divided into three time period subquotas based on historical landing patterns (see Table 1). Results in 1998 were slightly different from those in 1997 and 1996. Similar to 1997 and 1996, quota remained available for later in the season, but for a limited amount of time. Ex-vessel prices in the General category, however, were highest in June in 1998 as opposed to October in 1997 and 1996 (See Table 2). This may have been due to market conditions in Japan and the dollar/yen exchange rate. Table 3 shows average ex-vessel prices in all commercial bluefin tuna categories for 1994 to 1998.

Final Action: **Status quo: Implement separate quotas for June to August, September, and October to December (Preferred Alternative)**

This final action divides the annual General category quota into three time period subquotas as done in 1998. Based upon historical landing patterns, the General category quota will be distributed as follows: 60 percent in June to August, 30 percent in September, and ten percent in October to December. These percentages will apply to the General category quota after the ten-metric ton ww is taken out for the New York Bight fishery. As in 1997 and 1998, the New York Bight set-aside area is defined as the area comprising the waters south and west of a straight line originating at a point on the southern shore of Long Island at 72°27' W. (Shinnecock Inlet) and running SSE 150° true, and north of 38°47' N.

The HMS FMP sets the General category quota at 47.1 percent of the overall U.S. landing quota. The U.S. quota for 1999, as elucidated in the 1998 ICCAT recommendation, and as set in this FMP, is 1,387 mt ww. This results in a General category quota of 653 mt ww. After subtracting the ten-mt ww for the New York Bight set-aside, and adding the one-metric ton ww which was not taken in 1998, the coastwide quota for the General category is 644 mt ww for the 1999 fishing season.

Of the 644 mt ww coastwide total, 387 mt ww will be available in the period beginning June 1 and ending August 31, 193 mt ww will be available in the period beginning September 1 and ending September 30, and 64 mt ww will be available in the period beginning October 1 and ending December 31. When the coastwide General category fishery has been closed in any quota period, NMFS may publish a notification in the *Federal Register* to make available up to ten mt ww of the quota set aside for the New York Bight. The daily retention limit for the set-aside area will be one large medium or giant bluefin tuna per vessel. Upon the

effective date of the set-aside fishery, fishing for, retaining, or landing large medium or giant bluefin tuna is authorized only within the set-aside area. Any portion of the set-aside amount not landed prior to the reopening of the coastwide General category fishery in the subsequent quota period may be carried over for the purpose of renewing the set-aside fishery at a later date.

Attainment of subquota in any fishing period will result in a closure until the following fishing period, whereupon any underharvest or overharvest will be carried over to the following period, with the subquota for the following period adjusted accordingly. Inseason closures will be filed at the Office of the Federal Register, stating the effective date of closure, and announced through the HMS Fax Network, the Atlantic Tunas Information Line, NOAA weather radio (when possible), the Coast Guard Notice to Mariners, and via the Internet at www.usatuna.com.

Ecological Impacts

Implementation of this final action should not result in any adverse or positive ecological effects, as the proposed changes in the regulations will not alter the amount of bluefin tuna caught or landed by the General category. This alternative, along with the other effort control alternatives, should have effects that are economic and/or administrative in nature.

Social and Economic Impacts

As mentioned earlier, in 1997, prices were strongest in October, and while they were not as strong in October 1998, they were higher than the previous three months, and the split season allowed for both early and late season fishing opportunities. Without a split season in 1998, the General category fish which were landed in September and October would have been landed in August when prices were lower. This action is consistent with the goal of achieving optimum yield in the General category fishery.

Conclusion

This is the final action. The split season should help extend the fishing season into the fall in order to collect the broadest range of data for stock monitoring purposes, and should result in a wider geographical and temporal distribution of the quota and possibly higher prices, thus helping to achieve optimum yield in the General category fishery. In addition, there was no clear consensus on effort controls during the scoping process and HMS AP meeting in January 1998, and no new information is available to NMFS which would promote changing the General category subdivisions implemented in 1997 and 1998. Public comment received on the subject was mixed, with some preferring the current subdivisions and other requesting modifications. Finally, implementation of quota subdivisions similar to the past two years may assist with enforcement and administration of the General category fishery as industry would not be subject to drastic management changes.

Rejected Options for General Category Quota Subdivisions

Rejected Option: No split season (time period subquotas)

This alternative would eliminate any time period quota subdivisions for the General category. This would be a return to how the General category was managed before 1995, and was discussed extensively during public comment for rulemaking over the last two years.

Ecological Impacts

See the final action.

Social and Economic Impacts

With recent landing rates, this scenario, unless accompanied by a great number of restricted-fishing days, would most likely result in a season which closes by late August/early September. With prices generally higher in September and October as compared with August, this alternative would result in less ex-vessel revenues. Because the landing rates early in the season are lower, however, the season could actually include more fishing days. For fishermen with high success rates, more fishing days could mean more fish caught, even though the fish are not as easily caught during the early season. Bluefin tuna caught early in the General category season are usually of lower quality compared to those caught later in the year. The supply of bluefin tuna on the market, as well as fish quality, is also important in determining prices, however.

Conclusion

This alternative is rejected. This alternative would increase the likelihood of a premature closure in the second half of the season (e.g., August to September), with negative consequences for the geographic and temporal distribution of the quota, scientific data collection, and prices.

B. Restricted-Fishing Day Alternatives

Prior to 1995 rulemaking, industry groups proposed daily closures as a means of lengthening the fishing season. Restricted-fishing days (RFDs), or “No-fishing” days, were implemented in the 1995 final rule, prohibiting persons aboard General category vessels from possessing, retaining, or landing any large medium or giant bluefin tuna on designated days. However, due to the delay in the implementation of the final rule, they were implemented only once the season was fully underway. Consecutive RFDs were implemented in 1996, but it was unclear as to whether their use lengthened the fishing season significantly.

The Atlantic tunas regulations were amended effective June 16, 1997, to prohibit persons aboard General category vessels from fishing for, including tag and release fishing for, all sizes of bluefin tuna on designated RFDs. During the 1997 General category effort control rulemaking process, NMFS received proposals from three associations representing General category fishermen and dealers. The 1997 effort control schedule implemented 12

RFDs that reflected mutually agreed-upon dates in July and August. Although there was no industry agreement regarding September RFDs, NMFS received numerous comments that September RFDs should be specified. Therefore, NMFS selected Sundays, Wednesdays (corresponds to Japanese market closure on Sundays), days corresponding to additional Japanese market closures, and Labor Day as RFDs for September 1997. In order to take advantage of a market closure day in Japan, the U.S. fishery should be closed four days prior to the Japanese market closure to account for processing and shipping time as well as the time difference. A similar pattern of RFDs was implemented for the 1998 season.

RFDs may cause landings on fishing days to be concentrated. This is illustrated in Table 4, which shows how there are “spikes” of landings on the days immediately following days in which there was no fishing. A designated RFD may be waived, or the daily retention limit may be adjusted, if it is determined that such effort control is impeding attainment of the time period subquota or needed to avert premature closure. NMFS will file such notices with the Office of the Federal Register a minimum of three calendar days in advance of the effective date.

Final Action: Designate Sundays, Mondays, and Wednesdays, plus selected Japanese market holidays as RFDs

This is the final action. This action adds one day per week (Mondays) to the proposed schedule of RFDs, and is similar to the RFD schedule implemented in 1995. NMFS received many comments that adding an additional RFD per week would help extend the season further into August. Persons aboard vessels permitted in the General category will be prohibited from fishing (including tag and release fishing) for bluefin tuna of all sizes on the following days: July 7, 11, 12, 14, 18, 19, 21, 25, 26, and 28; August 1, 2, 4, 8, 9, 10 11, 12, 15, 16, 18, 22, 23, 25, 29, and 30; September 1, 5, 6, 8, 12, 13, 15, 19, 20, 22, 26, 27 and 29; and October 1 (See Table 5).

Ecological Impacts

Similar to the General category season alternatives, implementation of any of the RFD alternatives should not result in any adverse or positive ecological effects, as they would not alter the amount of bluefin tuna caught or landed by the General category. This RFD schedule should have effects that are economic and/or administrative in nature.

Social and Economic Impacts

RFDs were first implemented by NMFS in response to proposals from fishery participants as a way to slow down the pace of landings in order to extend the fishing season. Because RFDs prohibit fishing for, and retention of, bluefin tuna on designated days, this RFD schedule could improve distribution of fishing opportunities by extending fishing over a broader temporal and geographic range. Because many of the RFDs correspond to days when the Japanese market would be closed, this alternative may also help improve prices received by fishermen. This action is consistent with the goal of achieving the optimum yield

in the General category fishery.

Conclusion

This is the final action. There was no clear consensus on RFDs during the scoping process and the January 1998 HMS AP meeting in which these issues were discussed, but NMFS did receive many comments that scheduling an additional RFD per week would help meet the objective of extending the fishing season. This action adds one RFD per week to the RFD pattern which was agreed to by three industry groups in 1997. NMFS maintains that this action will help to achieve optimum yield in the General category fishery.

Rejected Options for 1999 General Category Restricted-Fishing Days

Rejected Option: Status quo: Designate RFDs following the schedule implemented in 1997 and 1998

The alternative would implement the schedule of restricted-fishing days established for 1998, making the necessary calendar adjustments for 1999 to coordinate with Japanese market closures. This was the preferred alternative when RFDs were initially proposed for 1999 (64 FR 9298, February 25, 1999)

Ecological Impacts

See the final action

Social and Economic Impacts

Because RFDs prohibit fishing for, and retention of, bluefin tuna on designated days, this schedule of RFDs could improve distribution of fishing opportunities by extending fishing over a broader temporal and geographic range. Because many of the RFDs correspond to days when the Japanese market would be closed, this alternative may also help improve prices received by fishermen. This alternative does not include as many RFDs as the final action, and would most likely not be as effective in extending the fishing season.

Conclusion

This alternative is rejected. As mentioned above, NMFS received many comments that the proposed RFDs were insufficient to meet the objective of extending the fishing season. This RFD schedule is similar to that of the last two years, and may assist with enforcement and administration of the General category fishery as industry would not be subject to drastic management changes.

Rejected Option: Designate Sundays, Mondays, and Tuesdays as RFDs

This alternative would implement an RFD schedule similar to that implemented for

1996, when RFDs were Sundays, Mondays, and Tuesdays.

Ecological Impacts

See the final action.

Social and Economic Impacts

This alternative would implement a similar amount of RFDs as the final action. As with the final action, this alternative could improve distribution of fishing opportunities by extending fishing over a broader temporal and geographic range. Consecutive RFDs may be easier to enforce and monitor, but this schedule does not conform with the Japanese market closures as well as the final action does. In addition, consecutive RFDs may actually cause further concentration of landings on fishing days. In 1996, with consecutive RFDs, average daily landings were very high on days immediately following a string of days in which there was no fishing (See Table 4). This may have caused prices received by U.S. fishermen to be lower than they might have been without the consecutive RFDs (due to market gluts).

Conclusion

This alternative is rejected. While it would provide an amount of RFDs similar to that for the final action, the RFDs would not correspond as well with Japanese market closures, and consecutive RFDs may further contribute to derby fishing conditions. In addition, this schedule does not correspond to the schedule agreed upon by three commercial bluefin tuna fishing associations in 1997 as closely as the final action.

Rejected Option: Implement alternating RFDs

This alternative would implement RFDs which would alternate with open fishing days throughout the season, beginning in mid-July. This alternative was discussed during public comment over the last two years.

Ecological Impacts

See the final action.

Social and Economic Impacts

This alternative would result in the most RFDs of any of the alternatives, and could help distribute fishing opportunities over a broader temporal and geographic range. In addition, this alternative may not contribute to derby conditions as much as others which contain consecutive RFDs. This alternative could be difficult to enforce, however, and could increase costs to fishermen who often stay at sea overnight if they do not catch a fish on a particular day. Under this alternative, they could be forced into returning to port as there

would be no fishing the following day.

Conclusion

This alternative is rejected. As mentioned above, while there may be market advantages to a system in which every other day is an RFD, this alternative could result in enforcement problems, as well as difficulties for fishermen who would be forced to return to port at the end of each day. In addition, this schedule would not correspond to the schedule agreed upon by the three commercial bluefin tuna fishing associations in 1997 as closely as the final action.

Rejected Option: No RFDs

This alternative would not implement any RFDs, similar to how the General category was managed before 1995.

Ecological Impacts

See the final action.

Social and Economic Impacts

A schedule without RFDs could reduce fishing opportunities in the General category. When combined with the preferred General category season alternative, this alternative would likely result in extremely short fishing periods followed by long closures during the fishing season. Without any General category season split, and given the potential for an increased pace of landings in July and August, this alternative could possibly result in little or no fishing after September 1. As shown in Table 2, bluefin tuna caught in late September and October usually receive higher prices as compared to those caught earlier in the year.

Conclusion

This alternative is rejected. This alternative would increase the likelihood of premature closure(s), with possible negative consequences for the geographic and temporal distribution of the quota, scientific data collection, and prices. In addition, a schedule with no RFDs is inconsistent with the RFD schedule agreed to by the three commercial bluefin tuna fishing associations in 1997.

Table 1 General category landings of Atlantic bluefin tuna before and after September 1, 1983 to 1998. (NERO Bluefin Dealer Report Database)

	Before September 1		September 1 and After	
Year	Metric Tons ww	Percentage of Total	Metric Tons ww	Percentage of Total
1983	375.3	50.6	367.0	49.4
1984	396.9	61.8	245.1	38.2
1985	495.3	71.8	194.9	28.2
1986	208.8	52.8	186.4	47.2
1987	191.6	47.7	209.7	52.3
1988	192.7	48.1	208.0	51.9
1989	400.5	63.9	226.5	36.1
1990	325.6	50.2	322.5	49.8
1991	323.9	51.2	308.3	48.8
1992	383.6	70.6	159.5	29.4
1993	319.1	52.4	289.8	47.6
1994	509.4	79.3	133.1	20.7
1995	429.4	77.0	128.5	23.0
1996	309.6	53.9	265.1	46.1
1997	360.0	53.1	318.5	46.9
1998	380.8	54.1	323.4	45.9
Total Average		58.7		41.3

Table 2 Average monthly prices (per pound, dressed weight) for Atlantic bluefin tuna in the General category, 1994 to 1998*. (NERO Bluefin Dealer Report Database)

	June	July	August	September	October	November
1998*	8.80	6.01	5.74	5.92	7.35	--
1997	8.88	8.33	9.68	8.79	10.06	--
1996	9.77	9.85	10.68	10.41	12.46	19.03
1995	18.13	14.21	15.20	12.74	12.80	--
1994	10.34	10.86	11.00	10.48	13.43	-

*1998 data are preliminary

Table 3 Ex-vessel average prices (per pound, dressed weight) for Atlantic bluefin tuna by Commercial Fishing category, 1994 to 1998*. (NERO Bluefin Dealer Report Database)

Category	1994	1995	1996	1997	1998
General	10.86	14.45	10.89	8.91	6.26
Harpoon	14.88	16.41	9.62	10.09	7.13
Incidental	8.48	9.87	5.99	6.67	6.04
Purse Seine	10.23	11.07	11.05	10.34	7.23

*1998 figures are preliminary

Table 4 Average daily landings of Atlantic bluefin tuna, in numbers of fish on days when fishery was open, in the General category by month, 1993 to 1998*. (NERO Bluefin Dealer Report Database)

Year/Month	June	July	August	September	October	November
1998	3	54 (80)	84 (107)	167 (219)	120 (112)	Closed
1997	4	56 (131)	88 (107)	144 (152)	160 (170)	Closed
1996	2	36 (88)	101 (126)	145 (194)	90** (220)	5
1995	3	31	74 (79)	75 (95)	Closed	Closed
1994	1	49	113	242 (374)	Closed	Closed
1993	1	18	36	72	Closed	Closed

Numbers in parentheses indicate average daily landings on days immediately following days in which no fishing took place (due to closures or restricted-fishing days).

*For when General category was open in all areas.

**Landing rate was 200 fish per day in early October 1996, after which the fishery was closed. When fishery reopened in mid-October, catch rates were significantly lower.

Table 5 General category restricted-fishing days for 1999.

July

				1	2	3
4	5	6	7	8	9	10
11	12	13	14	15	16	17
18	19	20	21	22	23	24
25	26	27	28	29	30	31

August

1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30	31				

September

			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
		28		30		

October

					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30
31						

 = Restricted-fishing days