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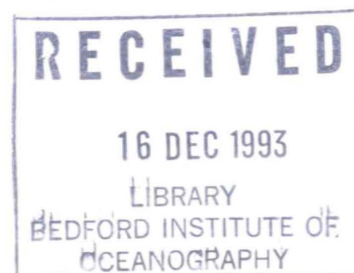
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Recreational Mail Surveys, 1987 - Tidal Sportfishing Diary Program and Visitors Sportfishing Survey

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DUPLICATE



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Canadian Manuscript Report of
Fisheries and Aquatic Sciences 2013

February 1989

Recreational Mail Surveys, 1987 -
Tidal Sportfishing Diary Program
and Visitors Sportfishing Survey

by

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RECREATIONAL MAIL SURVEYS, 1987 -
TIDAL SPORTFISHING DIARY PROGRAM
AND VISITORS SPORTFISHING SURVEY

PREFACE

The Tidal Sportfishing Diary Program was initiated in 1979 to obtain estimates of the sport catch by B.C. residents fishing in B.C. tidal waters. The Visitors Sportfishing Survey was first conducted in 1982 to obtain estimates of sport catch and expenditures by visitors fishing in B.C. tidal waters. Previous reports cover survey development and annual results. This report serves as a continuation of this series and deals with the 1987/88 results.

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RECREATIONAL MAIL SURVEYS, 1987 -
TIDAL SPORTFISHING DIARY PROGRAM
AND VISITORS SPORTFISHING SURVEY

ABSTRACT

Bijsterveld, L. 1989. Recreational mail surveys, 1987 - Tidal Sportfishing Diary Program and Visitors Sportfishing Survey. Can. MS. Rep. Fish. Aquat. Sci. 2013: vi + 35 p.

Mail surveys collected 1987/88 licence year catch and effort data on recreational fishing in B.C. tidal waters. During 1,950,000 angler days, adult anglers caught and kept 1,934,000 salmon including 395,000 chinook and 1,157,000 coho. Developments in the Diary program and problems related to mail surveys are reviewed.

Keywords: sportfishing, tidal waters, logbook, mail survey, catch statistics

RESUME

Bijsterveld, L. 1989. Recreational mail surveys, 1987 - Tidal Sportfishing Diary Program and Visitors Sportfishing Survey. Can. MS. Rep. Fish. Aquat. Sci. 2013: vi + 35 p.

Lors d'enquêtes par correspondance, on a recueilli des données sur les efforts et les prises pour la saison de pêche récréative 1987-1988 dans les eaux de marée en C.-B. Pendant 1,950,000 jours-pêcheurs, les pêcheurs adultes à la ligne ont capturé et gardé 1,934,000 saumons dont 393,000 saumons chinook et 1,157,000 saumons coho. Les développements du programme et les problèmes reliés aux enquêtes par correspondance sont l'étude.

Mots clés: pêche sportive, eaux de marée, journal de bord, enquête par correspondance, statistiques sur les prises.

RECREATIONAL MAIL SURVEYS, 1987 -
TIDAL SPORTFISHING DIARY PROGRAM
AND VISITORS SPORTFISHING SURVEY

INTRODUCTION

The Tidal Sportfishing Diary Program is a mail survey of resident B.C. tidal water anglers. The Diary Program was introduced in 1979 as a method of estimating recreational catch and effort. It was necessary to survey large numbers of B.C. adults in order to contact anglers in the absence of a licencing program. The B.C. Tidal Waters Sport Fishing Licence, introduced during 1981, identified anglers and provided a sample base for the program beginning in 1982. The licences also provide a sample base for anglers visiting B.C. The Visitors Sportfishing Survey was first conducted in 1982 to obtain estimates of sport catch and expenditures by anglers visiting B.C. during the previous year. The 1981 and 1982 licence years corresponded to calendar years (January 1 to December 31). The 1983 licence year was a transition from a calendar year to a fiscal year (April 1 to March 31) and extended from January 1, 1983 to March 31, 1984. The 1983 Diary program and Visitors Survey covered the entire 15 month period although only the 1983 calendar year statistics were published. The 1987/88 population and catch and effort statistics correspond to the 1987/88 licence year (April 1, 1987 - March 31, 1988).

METHODOLOGY

A systematic sample of 35,000 1986/87 B.C. Tidal Waters Sport Fishing Licences was drawn. The licence information was keyed directly from the licence stubs into a computer to produce an address list. The B.C. addresses were used for the Tidal Diary program while the remainder were used for the Visitors Sportfishing Survey.

Tidal Sportfishing Diary Program

In 1987/88, the Diary Program was conducted as follows: semi-monthly, a new sample or panel of 1200 licence holders was mailed a diary form covering a full "month". Half of the panels were responsible for recording fishing activity for a calendar month, the other half for an interval from the middle of one month to the middle of the next. Data for the first half of the "month" was filled in from memory; data for the second half was filled in as they fished. Reminders were sent to all panel members at the end of the "month". Diarists were provided with addressed postage paid envelopes for returning the survey forms. Drawings of the 5 salmon species and lingcod, rockfish and halibut were included to aid identification.

Visitors Sportfishing Survey

Three thousand questionnaires were sent to visiting North American anglers (excluding B.C.) at the end of the licence year. Reminders were sent to questionnaire nonrespondents four weeks after the initial sendout. Questionnaire recipients were asked about their fishing activity in B.C. during the 1987/88 licence year.

RESULTS

Returns

The number of diary returns for each panel of the 1987/88 Diary Program is provided in Table 1. The proportion of respondents fishing during each diary period varies throughout the year, as shown in Table 1. Three thousand questionnaires were sent out for the 1987/88 Visitors Survey. The return rate for the Visitors Survey was 73%.

Resident Sportfishing Population

The estimated number of B.C. resident adult anglers in 1987/88 is provided in Table 2. The population is estimated using the proportion of B.C. anglers in the licence sample and the total licence sales. The population consists of adult B.C. resident tidal water anglers (aged 16 and over). Characteristics of the population of licence holders can be estimated from the sample of licence holders selected to receive questionnaires. Males account for 80% of the population of licence holders while females account for only 20% (Figure 1). The population of B.C. adults, by comparison, is composed of almost equal numbers of males and females (Statistics Canada 1987).

The age composition of the B.C. adult population is presented in Figure 2. The proportion of individuals between 26 and 54 years of age is higher among licenced anglers than among B.C. adults in general. More young adults and people 55 years of age and over are present in the total population of adults (Statistics Canada 1987).

TABLE 1
DIARY RETURNS - 1987/88

<u>Panel Period</u>	<u>Undelivierable</u>	<u>Total Possible Response</u>	<u>Number of Respondents</u>	<u>Adjusted Response (%)</u>	<u>% That Fished</u>
<u>1987</u>					
Apr 01-Apr 30 ¹	152	1,101	601	55	8
Apr 16-May 15 ¹	158	1,087	618	57	14
May 01-May 31 ¹	144	1,101	611	55	20
May 16-Jun 15	136	1,064	575	54	19
Jun 01-Jun 30	149	1,051	561	53	21
Jun 16-Jul 15	143	1,057	588	56	26
Jul 01-Jul 31	176	1,024	573	56	24
Jul 16-Aug 15	143	1,057	576	54	28
Aug 01-Aug 31	166	1,034	607	59	33
Aug 16-Sep 15	176	1,024	577	56	33
Sep 01-Sep 30	189	1,011	544	54	26
Sep 15-Oct 16	198	1,002	547	55	17
Oct 01-Oct 31	192	1,008	593	59	15
Oct 15-Nov 16	193	1,007	590	59	9
Nov 01-Nov 30	211	989	620	63	6
Nov 15-Dec 16	200	1,000	595	60	3
Dec 01-Dec 31	195	1,005	593	59	4
Dec 15-Jan 16/88	201	999	596	60	4
<u>1988</u>					
Jan 01-Jan 31	198	1,002	587	59	4
Jan 15-Feb 16	205	995	616	62	4
Feb 01-Feb 28	194	1,006	585	58	2
Feb 15-Mar 16	202	998	593	59	4
Mar 01-Mar 31	209	991	566	57	7
Mar 15-Apr 16	210	990	538	54	5
TOTAL	4,340	24,603	14,050	57	14

¹ These three panels had larger sample sizes (1253, 1245 and 1245 anglers) because of computerized sample selection problems.

TABLE 2

ESTIMATED POPULATION OF B.C. RESIDENT ANGLERS

<u>Year</u>	<u>Number of Anglers</u>
1981	203,000
1982	223,000
1983/84	224,000
1984/85	225,000
1985/86	239,000
1986/87	242,000
1987/88	240,000

The distribution of B.C. residents and licenced anglers by area of residence is presented in Figure 3. Over 75% of licenced anglers are from Vancouver Island and the Greater Vancouver area. These areas account for only 62% of the total population of B.C. (Statistics Canada 1987). The proportion of licenced anglers is higher than the proportion of the population in coastal areas, with the exception of Greater Vancouver.

Population of Visiting Anglers

An estimated 109,000 visiting anglers fished in B.C. tidal waters in 1987/88. The population consisted of 33,400 Canadians, 71,000 U.S. visitors and 4,200 visitors from other countries (Table 3). The sex composition of the population of visiting anglers is similar to the composition of B.C. resident anglers. Males account for 78% of the visiting population and females account for 22%.

The age composition of the population of visiting anglers is presented in Figure 2. The proportion of individuals over the age of age 45 is higher among visiting anglers than among B.C. resident anglers.

Americans accounted for 65% of the visiting anglers while Canadians accounted for 31%. The remaining 4% of the visiting anglers originated from outside North America. The proportions of visiting anglers by country of origin are presented in Figures 4 and 5.

TABLE 3

ESTIMATED POPULATION OF VISITING ANGLERS

<u>Year</u>	<u>Country of Origin</u>			<u>Total</u>
	<u>Canada</u>	<u>U.S.A.</u>	<u>Other</u>	
1981	32,300	43,100	3,600	79,000
1982	28,700	40,900	1,500	71,100
1983/84	30,300	42,600	2,000	74,900
1984/85	25,700	51,600	300	74,900
1985/86	27,200	63,600	2,600	77,600
1986/87	44,800	61,300	3,900	110,000
1987/88	33,200	71,100	4,200	108,500

FIGURE 1

SEX COMPOSITION OF B.C. ADULTS, ANGLERS AND VISITING ANGLERS -
1987/88

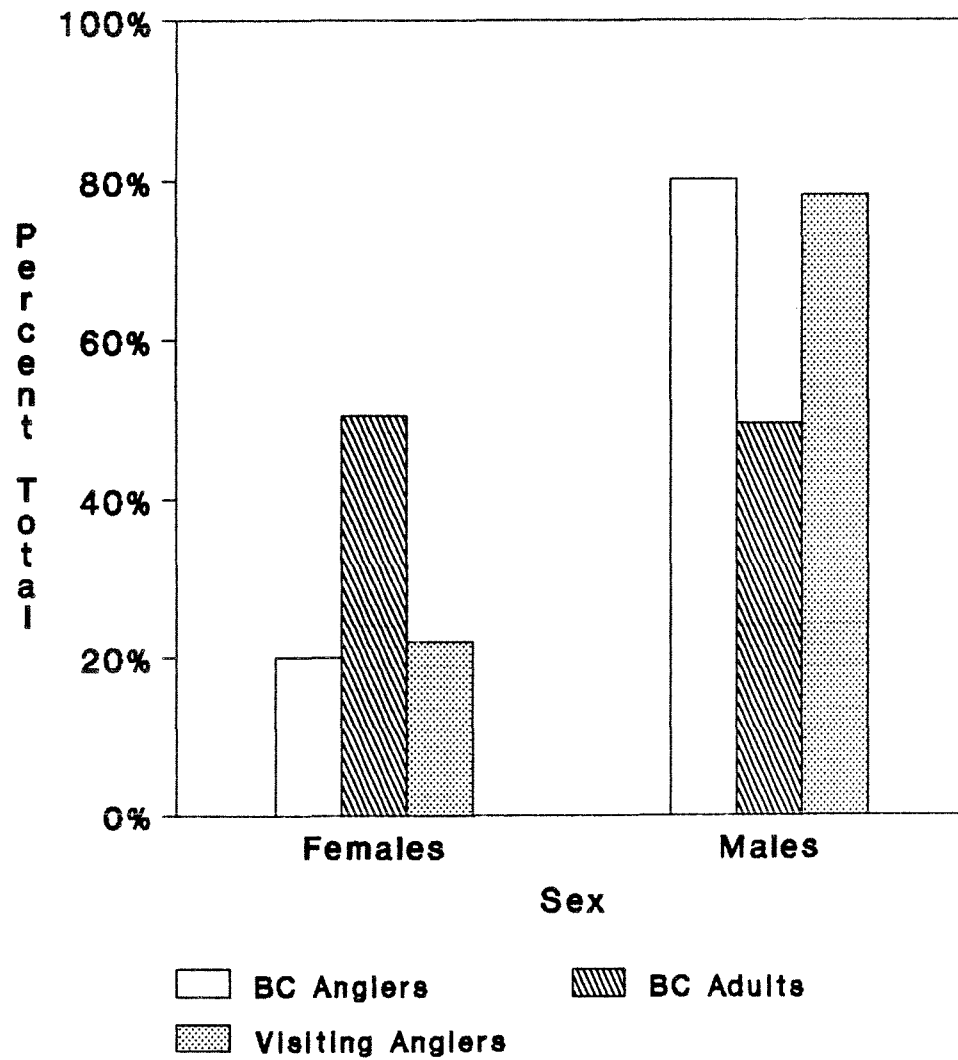


FIGURE 2

AGE COMPOSITION OF B.C. ADULTS, ANGLERS AND VISITING ANGLERS -
1987/88

Age Group

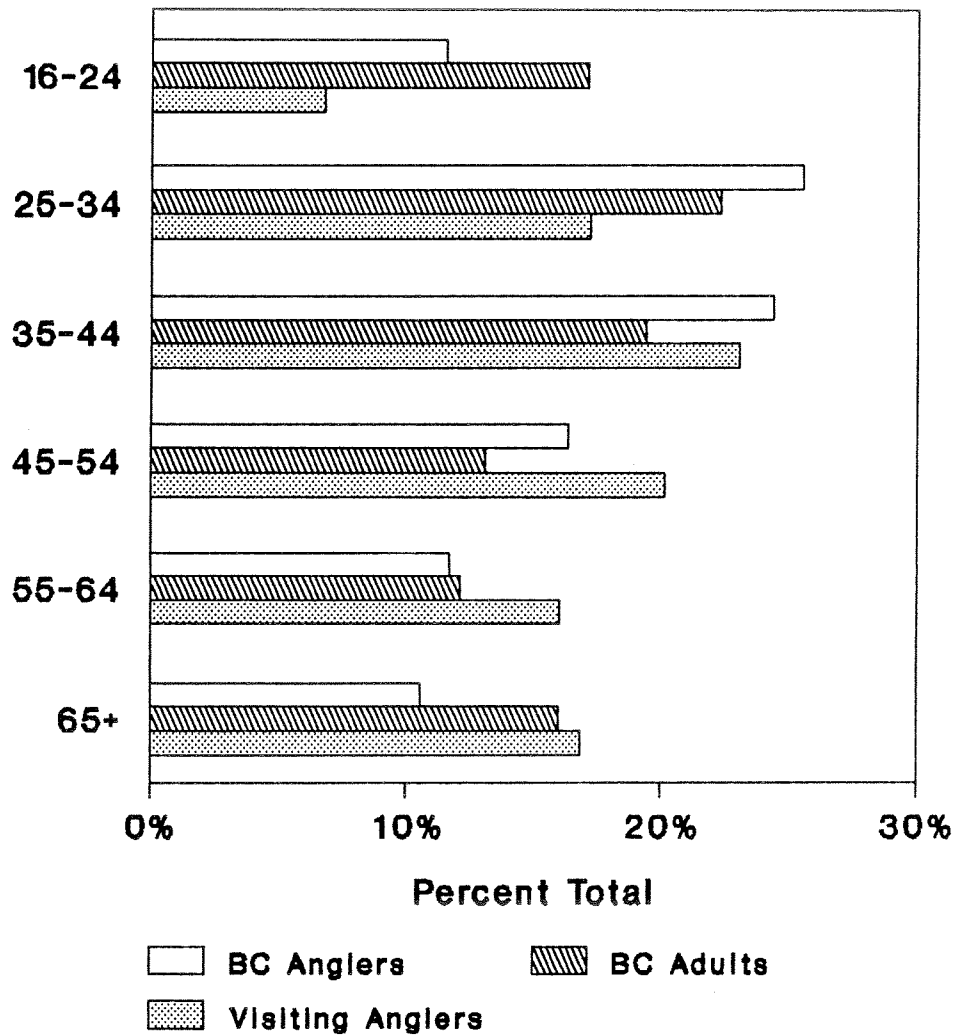


FIGURE 3

DISTRIBUTION OF B.C. RESIDENTS AND LICENCED ANGLERS BY RESIDENCE
AREA - 1987/88

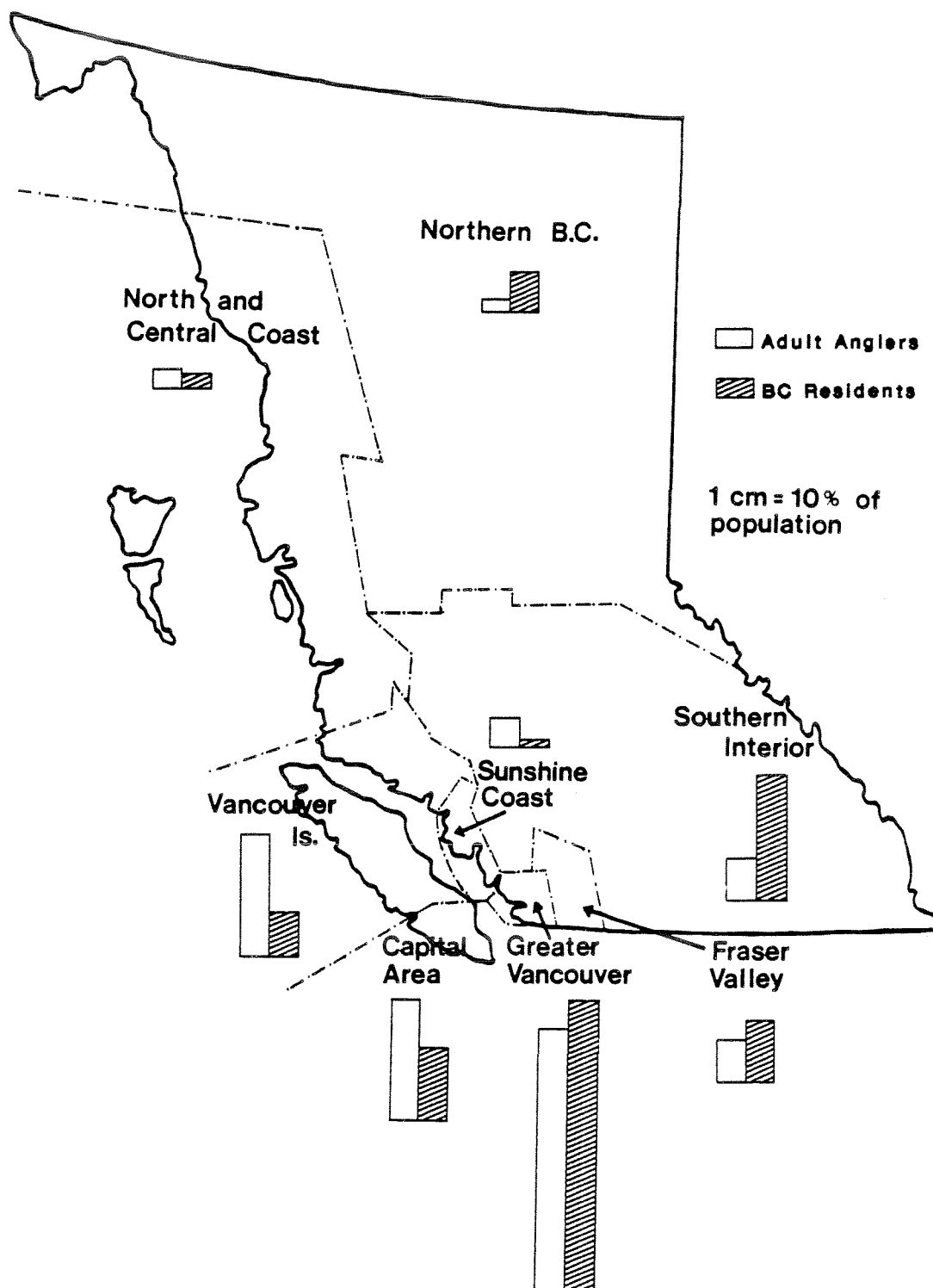


FIGURE 4

RESIDENCE OF ALL VISITING ANGLERS - 1987/88

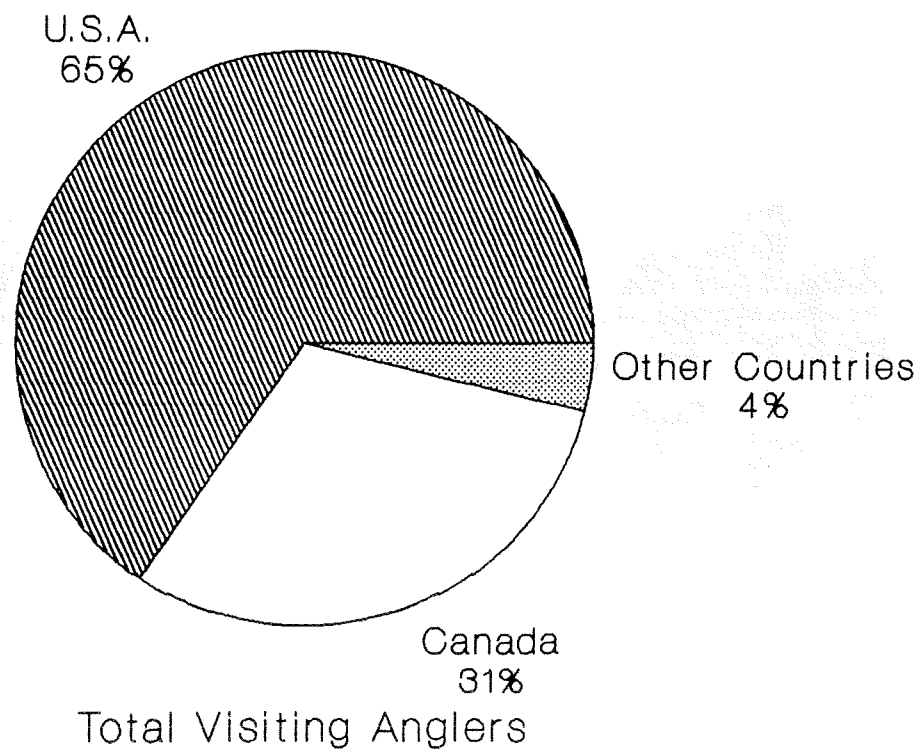
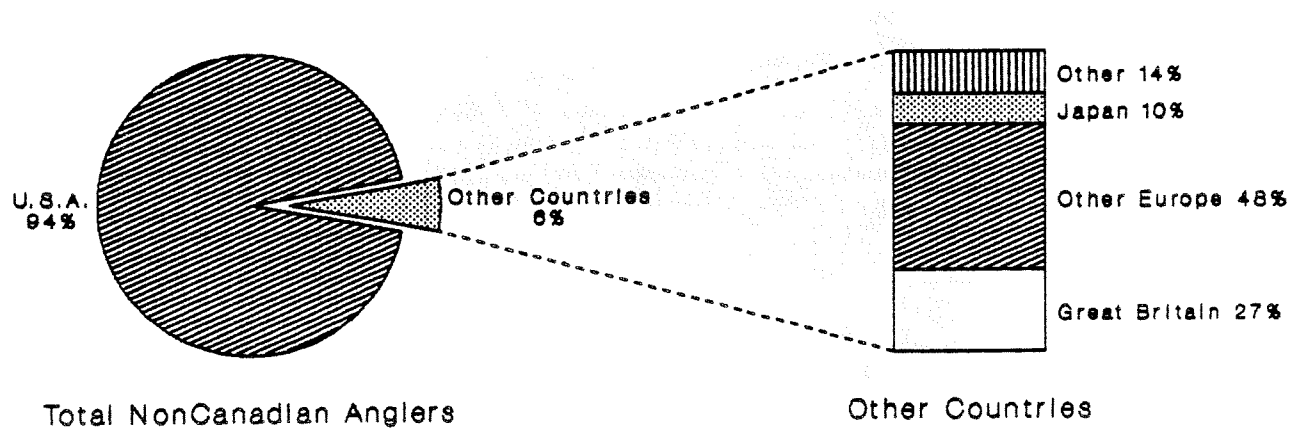


FIGURE 5

RESIDENCE OF NONCANADIAN ANGLERS - 1987/88



Catch

British Columbia resident adult anglers caught and retained 1,292,000 salmon during the 1987/88 licence year (Table 5). The catch consisted of 258,000 chinook, 778,000 coho, and 256,000 salmon of other species. Visiting anglers caught an additional 653,000 salmon, consisting of 139,000 chinook, 379,000 coho and 138,000 salmon of other species (Table 6). The combined catch by B.C. resident and visiting anglers was 392,000 chinook, 1,157,000 coho and 395,000 salmon of other species, resulting in a total catch of 1,944,000 salmon in 1987/88 (Table 9).

Most of the salmon were caught between Vancouver Island and the mainland. This area accounted for 75% of the chinook, 89% of the coho and 85% of the total salmon caught and kept by B.C. resident anglers in 1987/88. This area contributed a smaller proportion (79%) of the total salmon caught by visiting anglers.

British Columbia residents also caught and retained 170,000 lingcod, 413,000 rockfish and 46,000 halibut during the 1987/88 licence year (Table 7). Visiting anglers caught an additional 79,000 lingcod, 87,000 rockfish and 7,000 halibut (Table 8). The combined catch by B.C. resident and visiting anglers was 249,000 lingcod, 501,000 rockfish and 53,000 halibut (Table 9).

Over 80% of the rockfish and lingcod caught by residents were taken from waters between Vancouver Island and the mainland. About 75% of the lingcod and 60% of the rockfish caught by visitors were taken from this area. Over 75% of the halibut caught by B.C. residents were taken from waters north of Vancouver Island (81%). Visitors took almost equal proportions of halibut from waters west of Vancouver Island (33%) and from the North Coast (36%).

The catch estimates from 1985/86 through 1987/88 are presented in table 11.

TABLE 4

1987/88 SALMON CATCH¹ AND EFFORT BY REGION
FOR B.C. RESIDENT ANGLERS

<u>Region</u>	<u>Angler Days</u>	<u>Chinook</u>	<u>Coho</u>	<u>Other Salmon</u>	<u>Total Salmon</u>
North Coast (Areas 1- 6) ²	44.4	13.3	11.7	4.8	29.9
Central Coast (Areas 7-11) ²	16.2	3.3	8.9	5.0	17.3
E. Vancouver Is. (Areas 12-14) ²	342.3	55.4	337.4	47.0	439.9
Sunshine Coast (Areas 15-16) ²	163.9	18.7	96.6	1.2	116.6
S. Vancouver Is. (Areas 17-20) ²	451.7	99.9	206.7	117.7	424.3
W. Vancouver Is. (Areas 21-27) ²	120.1	48.6	66.1	35.3	150.0
Lower Mainland (Areas 28-29) ²	208.2	18.4	50.4	45.0	113.8
Total B.C. (Areas 1-29) ²	1346.7	257.6	778.0	256.1	1291.6

¹ Catch is reported as thousands of fish kept.

² Department of Fisheries statistical areas as indicated in the map in Appendix B.

TABLE 5

1987/88 SALMON CATCH¹ AND EFFORT BY REGION
FOR VISITING ANGLERS

<u>Region</u>	<u>Angler Days</u>	<u>Chinook</u>	<u>Coho</u>	<u>Other Salmon</u>	<u>Total Salmon</u>
North Coast (Areas 1-6) ²	33.3	7.5	12.8	3.8	24.1
Central Coast (Areas 7-11) ²	37.5	7.8	17.1	7.4	32.3
E. Vancouver Is. (Areas 12-14) ²	332.2	59.5	258.5	110.0	428.0
Sunshine Coast (Areas 15-16) ²	42.9	5.5	24.1	2.1	31.8
S. Vancouver Is. (Areas 17-20) ²	67.8	14.2	26.5	5.2	45.9
W. Vancouver Is. (Areas 21-27) ²	79.0	37.7	36.4	9.3	83.3
Lower Mainland (Areas 28-29) ²	10.8	2.5	3.6	1.1	7.2
Total B.C. (Areas 1-29) ²	603.4	134.8	378.9	138.8	652.5

¹ Catch is reported as thousands of fish kept.

² Department of Fisheries statistical areas as indicated on the map in Appendix B.

TABLE 6

1987/88 NONSALMON CATCH¹ BY REGION
FOR B.C. RESIDENT ANGLERS

<u>Region</u>	<u>Lingcod</u>	<u>Rockfish</u>	<u>Halibut</u>
North Coast (Areas 1-6) ²	7.2	22.7	36.2
Central Coast (Areas 7-11) ²	0.4	4.3	0.6
E. Vancouver Is. (Areas 12-14) ²	49.3	80.7	3.4
Sunshine Coast (Areas 15-16) ²	29.7	106.7	0.4
S. Vancouver Is. (Areas 17-20) ²	45.7	122.4	1.8
W. Vancouver Is. (Areas 21-27) ²	26.8	47.5	1.9
Lower Mainland (Areas 28-29) ²	11.1	29.1	1.2
Total B.C. (Areas 1-29) ²	170.2	413.3	45.5

¹ Catch is reported as thousands of fish kept.

² Department of Fisheries statistical areas as indicated on the map in Appendix B.

TABLE 7

1987/88 NONSALMON CATCH¹ BY REGION
FOR VISITING ANGLERS

<u>Region</u>	<u>Lingcod</u>	<u>Rockfish</u>	<u>Halibut</u>
North Coast (Areas 1-6) ²	2.5	7.0	2.6
Central Coast (Areas 7-11) ²	2.5	2.7	1.4
E. Vancouver Is. (Areas 12-14) ²	39.4	34.1	0.6
Sunshine Coast (Areas 15-16) ²	5.6	5.9	0.0
S. Vancouver Is. (Areas 17-20) ²	14.2	11.2	0.3
W. Vancouver Is. (Areas 21-27) ²	13.9	26.0	2.4
Lower Mainland (Areas 28-29) ²	0.5	0.5	0.0
Total B.C. (Areas 1-29) ²	78.5	87.4	7.3

¹ Catch is reported as thousands of fish kept.

² Department of Fisheries statistical areas as indicated on the map in Appendix B.

TABLE 8

1987/88 B.C. TIDAL WATER SPORT CATCH¹ AND EFFORT (000'S)

	B.C. Resident <u>Anglers</u> ²	Visiting <u>Anglers</u> ³	<u>Total</u>
Angler Days	1,346.7	603.4	1,950.1
Chinook	257.6	134.8	392.4
Coho	778.0	378.9	1,156.9
Other Salmon	256.1	138.8	394.9
Total Salmon	1,291.6	652.6	1,944.1
Lingcod	170.2	78.5	248.8
Rockfish	413.3	87.4	500.7
Halibut	45.5	7.3	52.9

¹ Catch is reported as number of fish kept.

² Tidal Sportfishing Diary Program.

³ Visitors Sportfishing Diary Program.

Effort

British Columbia resident anglers fished an estimated 1.3 million days in 1987/88. Visiting anglers fished an estimated 603,000 days in B.C. tidal waters in the 1987/88 licence year, bringing the total tidal water estimate of effort to 1.95 million days during the 1987/88 licence year. More than 90% of the finfish effort by B.C. resident anglers occurred from boats. The percentage of effort from boats was much lower around the Fraser River (area 29) due to a closure to salmon sport fishing at the mouth of the Fraser River (Department of Fisheries and Oceans 1987). Fishing from the shore and fishing bars accounted for more than one third (36%) of the effort in this area in 1987/88. Most of the combined angler effort (83%) occurs inside Vancouver Island.

Catch Per Unit Effort (CPUE)

The average catch per angler day for B.C. resident anglers during 1987/88 was 0.19 chinook, 0.58 coho and 0.96 for all salmon combined (Table 10). The average catch per angler day for visiting anglers was 0.20 chinook, 0.63 coho and 1.08 for all salmon combined. The average CPUE of released salmon by B.C. resident anglers in 1987/88 was 0.27 chinook and 0.43 coho.

The catch per angler day estimates for 1985/86 through 1987/88 are presented in Table 11.

Catch and Effort by Juvenile Anglers

A Tidal Waters Sport Fishing Licence for juvenile anglers (age 15 and under) was introduced as part of the 1987/88 licence system. The population of juvenile anglers by residence can be estimated from juvenile licence sales and a sample of licences providing residence information. In 1987/88, there were 40,000 B.C. juvenile anglers and 9,000 visiting juvenile anglers, estimated using licence sales and sample information.

TABLE 9

1987/88 SALMON CATCH PER UNIT EFFORT

	<u>Chinook</u>	<u>Coho</u>	<u>Total Salmon</u>
B.C. Resident Anglers	0.19	0.58	0.96
Visiting Anglers	0.22	0.63	1.08
All Anglers	0.20	0.59	1.00

TABLE 10

B.C. TIDAL WATER SALMON SPORT CATCH¹ AND EFFORT (000'S)
1985 - 1987

	<u>1985/86</u>	<u>1986/87</u>	<u>1987/88</u>
<u>Effort</u>			
Angler Days	2,260.4	2,107.0	1,950.1
<u>Catch</u>			
Chinook	549.5	516.2	392.4
Coho	1,117.2	1,302.3	1,156.9
Other Salmon	296.3	112.3	394.9
Total Salmon	1,963.0	1,930.8	1,944.1
<u>Catch per Unit Effort</u>			
Chinook	0.24	0.24	0.20
Coho	0.49	0.62	0.59
Total Salmon	0.87	0.92	1.00

¹ Catch is reported as number of fish kept.

Prior to 1987/88, the population of juvenile anglers was estimated using data from previous Diary Programs and Visitors Surveys and adult angler population estimates. Based on questionnaire data from the 1982 through 1984 Diary programs, the average ratio of B.C. juveniles to adult anglers is 1:4. Based on the 1983 and 1984 Visitor Surveys, the average ratio of visiting juveniles to adult anglers is 1:3. Using these ratios, the number of B.C. juvenile anglers is estimated to be 60,000 while the number of visiting anglers is estimated to be 36,000. Licence sales yield a ratio of 1:6 B.C. juveniles to adult anglers and a ratio of 1:14 visiting juveniles to adult anglers. The 1987/88 licence sales and past surveys may provide different estimates of the numbers of juvenile anglers because of the following reasons:

1. The average ratio of visiting juvenile to adult anglers may have been inaccurately measured by the Visitor Surveys.
2. Anglers may not have been aware of the requirement for licencing juvenile anglers.
3. Adult anglers may not bother to obtain licences for juvenile anglers.
4. B.C. resident juvenile anglers may obtain more than one licence because of the novelty of the licence available at no charge.
5. Adult anglers may obtain more licences for their children in order to share their catch limits.

Other surveys (Cox 1977; Cumming 1979; Pelletier, Lacasse and Ducharme 1981; Thomson 1974) indicate that the average number of days fished by resident juvenile anglers is one-third to two-thirds the average number of days fished by their adult counterparts. It is assumed that each B.C. juvenile resident angler fishes half as many days as an adult. The estimated

effort for B.C. resident juvenile anglers is provided in Table 12.

Results of previous Visitors Surveys (James 1986, James 1985) indicate that the majority of visiting anglers came to the province to fish or for a vacation. Juvenile visiting anglers would probably be members of families on fishing trips or vacations. These juveniles would be more likely to fish than would resident juveniles. The assumption is, therefore, that visiting juveniles fish proportionally more than resident juveniles but less than visiting adults. It is assumed that visiting juveniles fish 75% the number of days fished by visiting adults. The estimated effort for visiting juvenile anglers is provided in Table 12.

The catch by juvenile anglers is estimated to be the effort by juvenile anglers multiplied by the catch rates for adult anglers. It is assumed that juvenile anglers generally fish with and are assisted by adults so the catch rates are equal. The estimated catches by juveniles are presented in Table 12. These catches are not included in the previously discussed catches by adult anglers.

TABLE 11

1987/88 JUVENILE ANGLER CATCH AND EFFORT

B.C. Resident Juvenile Anglers

	<u>Licence Population</u>	<u>Survey, Population</u>
Angler Days	112,000	168,000
Chinook	21,000	32,000
Coho	65,000	97,000

Visiting Juvenile Anglers

	<u>Licence Population</u>	<u>Survey, Population</u>
Angler Days	37,000	150,000
Chinook	8,000	33,000
Coho	24,000	95,000

¹ The catch and effort estimates are made using juvenile population estimates based on 1987/88 juvenile licence sales.

² The catch and effort estimates are made using juvenile population estimates based on prior survey results.

DISCUSSION

Potential Survey Biases

Certain types of error are associated with any type of survey. One type of error is referred to as nonresponse and results from the failure to measure or contact the entire survey sample (Cochrane 1977). Biased measurements could be obtained if the characteristics of the measured group differ from the group that was not measured. Individuals that voluntarily return questionnaires as part of a mail survey are possibly more interested in the questionnaire subject and could differ from those who don't return questionnaires. Tidal Diary respondents could be more active and successful anglers than nonrespondents. Estimates of fishing activity from this source alone could be biased upwards.

Nonrespondents were surveyed by telephone as part of the 1987/88 Diary program. Survey results indicate that 73% of the nonrespondents fished compared to 74% of the respondents. A chi-square test indicated no difference between these participation rates at the .05 level of significance. Nonrespondents reported fishing more days and catching more salmon, on the average, although these differences are not significant as indicated by t-tests at the .05 level of significance. Catch per angler day (CPUE) can be considered to be a measure of fishing success. The chinook and coho CPUE for respondents were higher but not significantly so as indicated by t-tests at the .05 level of significance. Therefore, the hypothesis that nonrespondents were as successful as the respondents was not rejected.

Another source of error is recall bias and arises because individuals cannot always accurately recall details after time has passed. The result could be either under or over estimating, depending on the subject. This type of bias can be a problem in

postseason mail surveys such as the Visitors Survey when the recall period is long. Diary program participants, however, are asked to recall the last half month only and keep records as they fish for the remainder of the month. For each half month, a recalled set of data and a current set of data are collected. Generally, respondents indicated fishing more days and catching more fish when recalling than when keeping current records. The differences between the recalled and current data are significant as indicated by analyses of variance at the .05 level of significance for coho and total salmon.

Error can also result from inaccurate reporting by the respondents. Salmon drawings with identification points were supplied to all of the diarists to assist in correct species identification.

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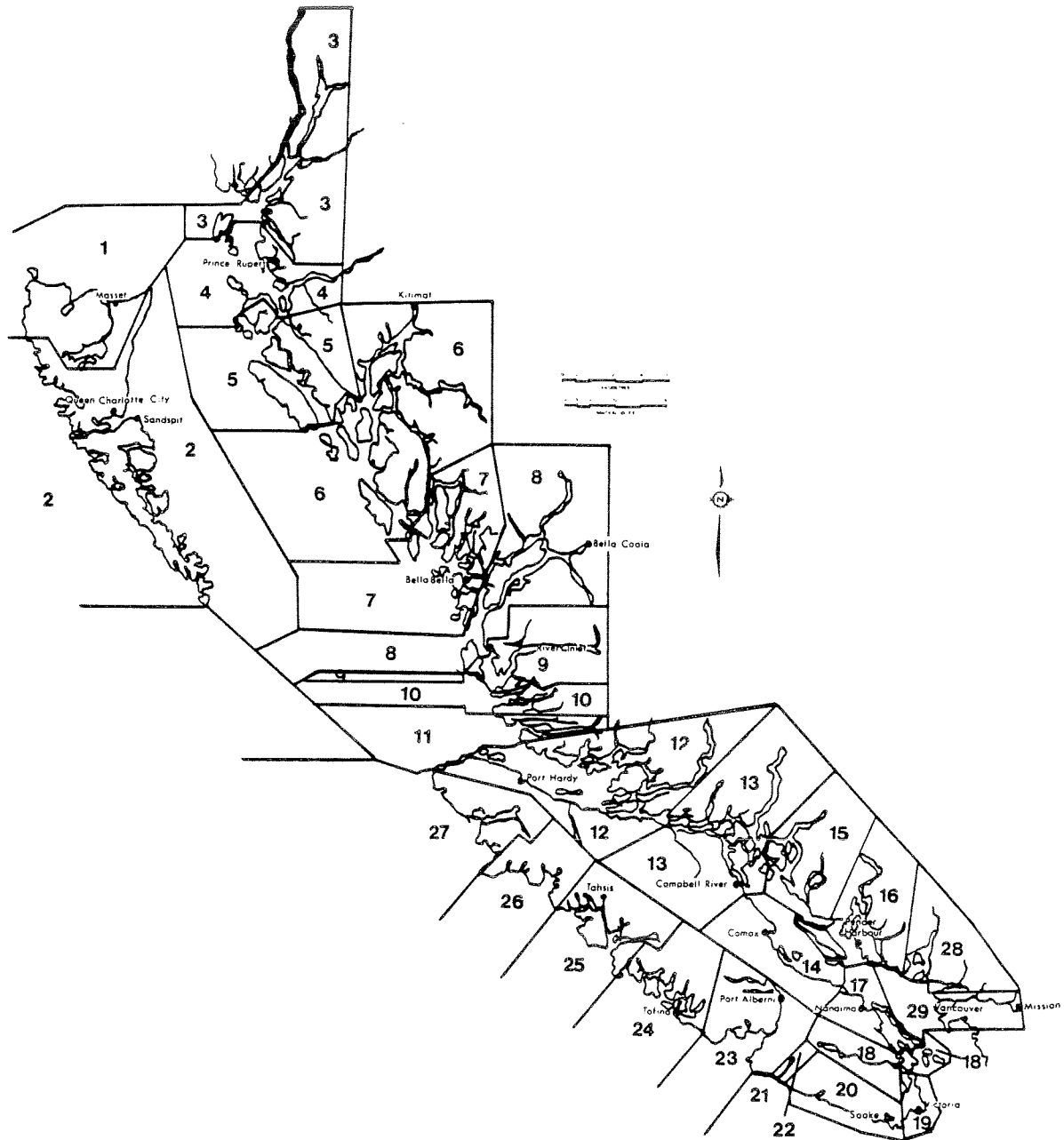
Statistics Canada. 1988. British Columbia Municipal Population Estimates.

Thomson, I.D. 1974. Prince Edward Island school survey of anglers. Recreational Fisheries Branch. Fisheries and Marine Service, Environment Canada. 32p.

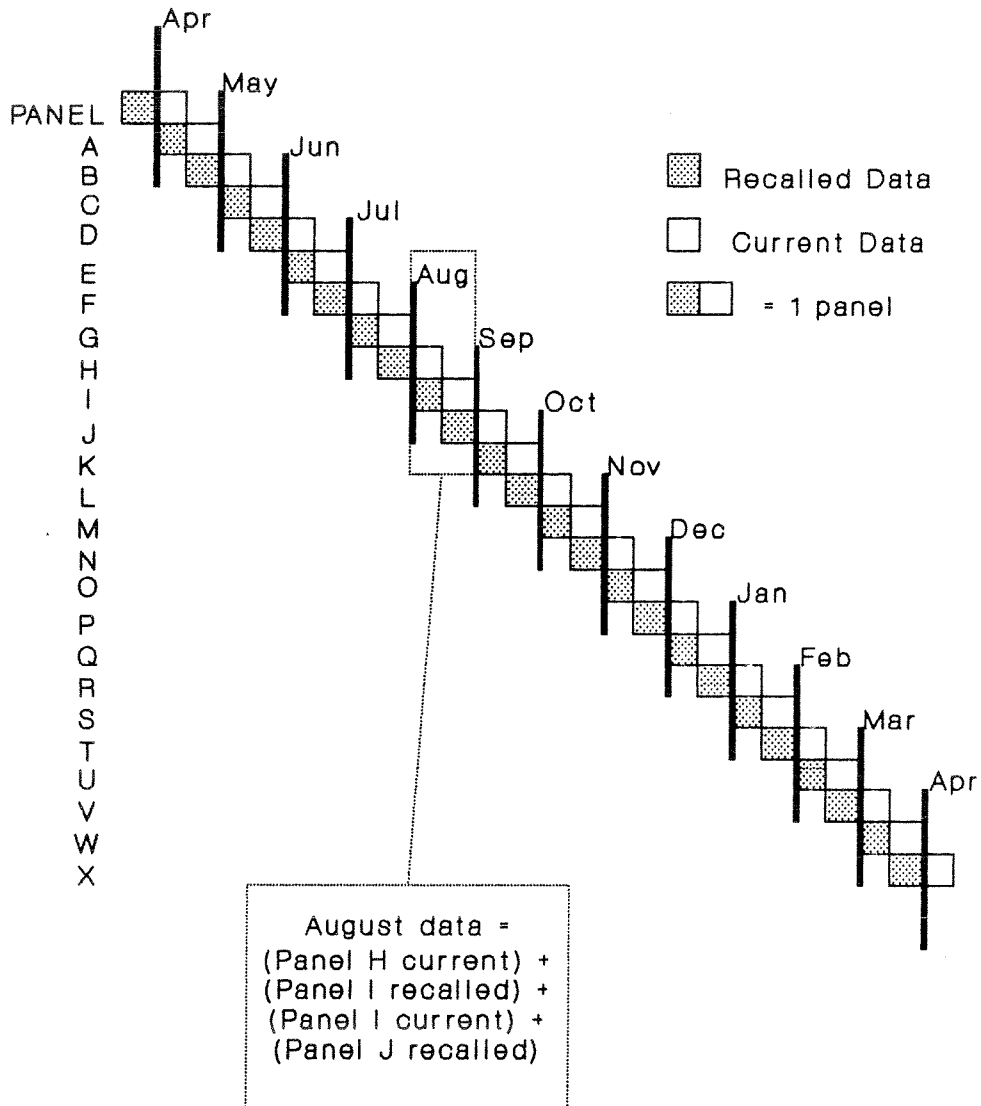
APPENDIX ASPECIES LIST
COMMON AND SCIENTIFIC NAMES OF FISH RECORDED

<u>Common Name</u>	<u>Scientific Name</u>
Chinook	<i>Oncorhynchus tshawytscha</i>
Coho	<i>Oncorhynchus kisutch</i>
Other salmon	<i>Oncorhynchus spp.</i>
Lingcod	<i>Ophiodon elongatus</i>
Rockfish	<i>Sebastes spp.</i>
Halibut	<i>Hippoglossus stenolepis</i>

APPENDIX B
STATISTICAL AREA MAP



APPENDIX C

TIDAL SPORTFISHING DIARY PROGRAM -
PANEL PRESENTATION

APPENDIX D

FORM SAMPLES

1. Tidal Sportfishing Diary - Page 1

Tidal Sportfishing Diary (I)													
Please record the fishing information even if you caught no fish.													
Date	Area (See map)	Fishing From: Boat, Shore, Pier, Bar or Diving	Chinook			Coho			Other Salmon		Other Fish		
			released	kept	# marked	released	kept	# marked	Pink kept	Other Salmon kept	Lingcod kept	Rockfish kept	Halibut kept
Sat Aug 1													
Sun 2													
Mon 3													
Tue 4													
Wed 5													
Thu 6													
Fri 7													
Sat 8													
Sun 9													
Mon 10													
Tue 11													
Wed 12													
Thu 13													
Fri 14													
Sat 15													
Sun 16													
Mon 17													
Tue 18													
Wed 19													
Thu 20													
Fri 21													
Sat 22													
Sun 23													
Mon 24													
Tue 25													
Wed 26													
Thu 27													
Fri 28													
Sat 29													
Sun 30													
Mon 31													

☐ Did not fish during this period.

1. Tidal Sportfishing Diary - Page 2

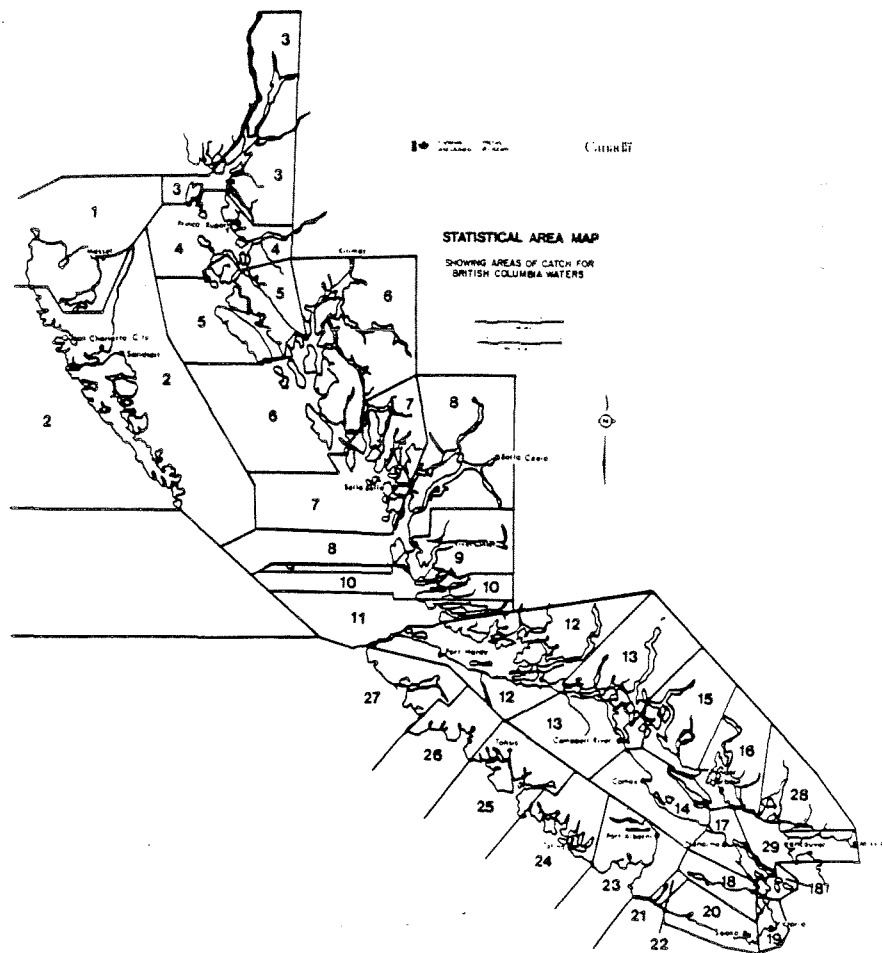
INSTRUCTIONS

Please record the following information in the appropriate column for each day fished in B.C. tidal waters during the dates covered by this diary form:

1. Statistical area: Refer to the map below and record the number that corresponds to your location.
2. Fishing from: Boat, shore, pier, river bar or diving only.
3. Chinook: The number of chinook caught and released and the number of chinook caught by you personally and kept. The number of marked (fin-clipped or tagged) chinook should be included in the number of chinook released and kept.
4. Coho: The number of coho caught and released and the number of coho caught by you personally and kept. The number of marked (fin-clipped or tagged) coho should be included in the number of coho released and kept.
5. Pink salmon: The number of pink salmon caught kept by you personally and kept.
6. Other salmon: The number of chum and sockeye salmon caught by you personally and kept.
7. Other fish: The number of lingcod, rockfish and halibut caught by you personally and kept.

Please record the fishing information even if you caught no fish.

Please mail the form at the end of the diary period using the business reply envelope supplied. If you did not fish during the diary period, please check the box at the bottom of the form and return the diary by mail.



2. Visitor Sportfishing Survey - Page 1

VISITORS SPORTFISHING SURVEY

How many visits to British Columbia did you make during the 1987/88 licence year (April 1987 - March 1988) which included fishing in B.C. tidal waters?

_____ visit(s)

Please fill in the following table, even if you did not catch any fish. Instructions for filling out the table are given below.

MONTH	AREA	DAYS	CHINOOK	COHO	OTHER SALMON	OTHER FISH	
						number	type
July	13	2	2	1	1	2	lingcod
August	14	3	0	0	0	0	

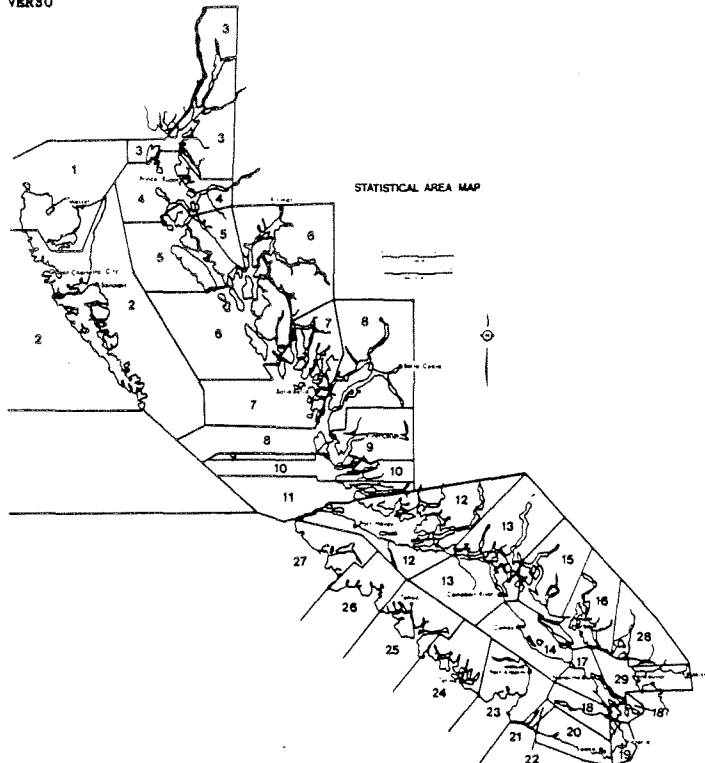
MONTH: Record the month(s) you personally fished in B.C. tidal waters in the 1987/88 licence year.

AREA: Refer to the attached map of Fisheries statistical areas, locate the area where you were fishing and record the corresponding area number. If you fished in more than one area in the month, use a separate line for each area fished and record the appropriate information for those areas on separate lines.

DAYS FISHED: Record the days you personally fished in each area in each month, including the days where nothing was caught.

CATCH: In the appropriate column, record the total number of fish caught by you personally. Do not include released fish. Please record king and spring salmon in the "chinook" column and silver salmon in the "coho" column.

FRANCAIS AU VERSO



2. Visitor Sportfishing Survey - Page 2

ENQUETE SUR LA PECHE SPORTIVE PRACTIQUEE PAR LES VISITEURS

Combien de fois avez-vous visité la Colombie Britannique pendant la période de validité de votre permis de pêche sportive dans les eaux à marée 1987-1988 (d'avril 1987 à mars 1988).

_____ visite(s)

Veuillez remplir le tableau ci-après, même si vous n'avez attrapé aucun poisson. Des instructions sont fournies ci-dessous.

MOIS	SECTEUR	JOURS	QUANTITE	COMO	AUTRES SAISONS	AUTRES POISSONS	
						nombre	espèces
juillet	13	2	2	1	1	2	morue - lingue
août	14	3	0	0	0	0	

MOIS: Indiquez le(s) mois où vous avez personnellement pêché dans les eaux à marée de la C.-B. pendant la période de validité du permis 1987-1988.

SECTEUR: Reportez-vous à la carte des secteurs statistiques des pêches (ci-dessous), trouvez le secteur où vous avez pêché et inscrivez le numéro correspondant. Si vous avez pêché dans plus d'un secteur au cours d'un même mois, utilisez une ligne pour chaque secteur et indiquez à chaque fois les renseignements correspondant au secteur.

JOURS DE PECHE: Indiquez les jours où vous avez personnellement pêché dans chaque secteur pour chaque mois, y compris les jours où vous n'avez rien attrapé.

PRISES: Dans la colonne appropriée, inscrivez le nombre total de poissons que vous avez personnellement capturés. N'incluez pas le(s) poisson(s) que vous avez rejeté.

ENGLISH ON REVERSE

