

**THE PACIFIC SALMON COMMISSION**

**JOINT NORTHERN BOUNDARY TECHNICAL  
COMMITTEE**

**U.S./CANADA NORTHERN BOUNDARY AREA  
2022 SALMON FISHERIES MANAGEMENT REPORT  
AND 2023 PRELIMINARY EXPECTATIONS**

**REPORT TCNB (23)-01**

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## LIST OF ACRONYMS WITH DEFINITIONS

<b>AABM</b>	Aggregate Abundance Based Management
<b>AAH</b>	Annual Allowable Harvest
<b>ADF&amp;G</b>	Alaska Department of Fish & Game
<b>AUC</b>	Area-under-the-curve
<b>DFO</b>	Canadian Department of Fisheries and Oceans
<b>ESSR</b>	Excess to Spawning Salmon Requirement
<b>FSC</b>	Food, Social, and Ceremonial
<b>ITQ</b>	Individual Transferable Quota
<b>MFLNRO</b>	Ministry of Forest, Lands, and Natural Resource Operations
<b>NBC</b>	Northern British Columbia Dixon Entrance to Kitimat including Queen Charlotte Islands.
<b>NBTC</b>	Northern Boundary Technical Committee
<b>NMFS</b>	National Marine Fisheries Service
<b>PSC</b>	Pacific Salmon Commission
<b>PST</b>	Pacific Salmon Treaty
<b>PSSI</b>	Pacific Salmon Strategy Initiative
<b>SFC</b>	Skeena Fisheries Commission
<b>SEAK</b>	Southeast Alaska
<b>TAC</b>	Total Allowable Catch
<b>TRTC</b>	Total Return to Canada

# TABLE OF CONTENTS

	<u>Page</u>
MEMBERSHIP OF THE NORTHERN BOUNDARY TECHNICAL COMMITTEE .....	ii
LIST OF ACRONYMS WITH DEFINITIONS .....	1
LIST OF TABLES .....	3
LIST OF FIGURES .....	4
EXECUTIVE SUMMARY .....	5
2022 FISHERIES .....	5
MANAGEMENT PERFORMANCE .....	7
2023 FORECASTS .....	8
INTRODUCTION .....	9
SOUTHERN SOUTHEAST ALASKA .....	9
2022 Salmon Forecast .....	9
Review of the 2022 Fishing Season .....	9
Management Performance Relative to Pacific Salmon Treaty Requirements .....	13
2023 Southeast Alaska Pink Salmon Forecast .....	14
NORTHERN BRITISH COLUMBIA .....	15
2022 Salmon Forecast .....	15
Review of 2022 Fishing Season - Net and Troll Fisheries .....	16
Management Performance Relative to Treaty Requirements .....	21
2023 Salmon Forecast .....	22
TABLES .....	24
FIGURES .....	66

# LIST OF TABLES

	<u>Page</u>
Table 1.–Weekly commercial catch and fishing effort by opening in the 2022 Alaska District 101 purse seine fishery. ....	25
Table 2.–Weekly commercial catch and fishing effort by opening in the 2022 Alaska District 102 purse seine fishery. ....	26
Table 3.–Weekly commercial catch and fishing effort by opening in the 2022 Alaska District 103 purse seine fishery. ....	27
Table 4.–Weekly commercial catch and fishing effort by opening in the 2022 Alaska District 104 purse seine fishery. ....	28
Table 5.–Weekly commercial catch and fishing effort by opening in the 2022 Alaska District 101 drift gillnet fishery. ....	29
Table 6.–Weekly commercial catch and fishing effort by opening in the 2022 Alaska District 106 drift gillnet fishery. ....	30
Table 7.–Weekly commercial catch and fishing effort by opening in the 2022 Annette Island Reserve purse seine fishery. ....	31
Table 8.–Weekly commercial catch and fishing effort by opening in the 2022 Annette Island Reserve gillnet fishery. ....	32
Table 9.–Southern Southeast Alaska pink salmon escapement indices by stock group and district for 2022 (in millions). ....	33
Table 10.–Preliminary annual allowable harvest (AAH) calculations for the Alaska District 104 week 27-30 purse seine fishery, 1999-2022. ....	34
Table 11.–Preliminary annual allowable harvest (AAH) calculations for the Alaska District 101 gillnet fishery, 1999-2022. ....	35
Table 12.–Weekly commercial catch and fishing effort in the 2022 Canadian Area 1 gillnet fishery. ....	36
Table 13.–Weekly commercial catch and fishing effort in the 2022 Canadian Area 1 seine fishery. ....	37
Table 14.–Weekly commercial catch and fishing effort in the 2022 Canadian Area 1/101 troll fishery (preliminary). ....	38
Table 15.–Weekly commercial catch and fishing effort in the 2022 Canadian Area 3 Entrance (sub-areas 1 to 4) gillnet fishery. ....	39
Table 16.–Weekly commercial catch and fishing effort in the 2022 Canadian Area 3 Inside (sub-areas 7 to 17) gillnet fishery. ....	40
Table 17.–Weekly commercial catch and fishing effort in the 2022 Canadian total Area 3 gillnet fishery. ....	41
Table 18.–Weekly commercial catch and fishing effort in the 2022 Canadian Area 3 Entrance (sub-areas 1 to 4) seine fishery (preliminary). ....	42
Table 19.–Weekly commercial catch and fishing effort in the 2022 Canadian Area 3 Inside (sub-areas 7 to 17) seine fishery. ....	43
Table 20.–Weekly commercial catch and fishing effort in the 2022 Canadian total Area 3 seine fishery (preliminary). ....	44
Table 21.–Weekly commercial catch and fishing effort in the 2022 Canadian Area 3/103 troll fishery. ....	45
Table 22.–Weekly commercial catch and fishing effort in the 2022 Canadian total Area 4 gillnet fishery. ....	46
Table 23.–Weekly commercial catch and fishing effort in the 2022 Canadian total Area 4 seine fishery. ....	47
Table 24.–Weekly commercial catch and fishing effort in the 2022 Canadian Area 4/104 troll fishery. ....	48
Table 25.–Weekly commercial catch and fishing effort in the 2022 Canadian total Area 5 gillnet fishery. ....	49
Table 26.–Weekly commercial catch and fishing effort in the 2022 Canadian total Area 5 seine fishery. ....	50
Table 27.–Weekly commercial catch and fishing effort in the 2022 Canadian Area 5/105 troll fishery. ....	51

Table 28.—Annual gillnet and seine effort for Canadian Areas 1, 3, 4, and 5, 1980-2022.....	52
Table 29.—Escapements to Canadian Areas 3, 4, and 5 in 2022 (preliminary).....	55
Table 30.—Annual salmon escapements for Canadian Area 1, 1970 – 2022. ....	56
Table 31.—Annual escapements for Canadian Area 3, 1970 -2022.....	58
Table 32. —Annual escapements for Canadian Area 4, 1970 – 2022.....	60
Table 33.—Annual escapements for Canadian Area 5, 1970 - 2022.....	62
Table 34.—Annual allowable harvest (AAH) calculations for Canadian Area 3 Entrance (sub-areas 1 to 4) net fishery, 1999-2022. The pink salmon escapement requirement in Alaskan districts 101, 102, and 103 is 10,750,000.....	64
Table 35.—Annual allowable harvest (AAH) calculations for Canadian Area 1/101 troll fishery, 1999-2022. The pink salmon escapement requirement in Alaskan districts 101, 102, and 103 is 10,750,000.....	65

## LIST OF FIGURES

Figure 1.—Alaska Department of Fish and Game southern Southeast Alaska regulatory districts. ....	67
Figure 2.—Alaska District 101 drift gillnet and District 104 purse seine treaty fisheries. ....	68
Figure 3.—Canadian Statistical Areas 1-10, northern British Columbia. ....	69
Figure 4.—Canadian Statistical Area 1 management sub-areas.....	70
Figure 5.—Canadian Statistical Area 3 management sub-areas.....	71
Figure 6.—Canadian Statistical Area 4 management sub-areas.....	72
Figure 7.—Canadian Statistical Area 5 management sub-areas.....	73

# EXECUTIVE SUMMARY

This report reviews:

- 1) catch, effort, and management actions in the 2022 Northern Boundary Area troll and net fisheries of southern Southeast Alaska Districts 101 to 108 and northern British Columbia Areas 1, 3, 4, and 5;
- 2) management performance relative to Pacific Salmon Treaty requirements for sockeye and pink salmon;
- 3) preliminary expectations and fishing plans for 2023.

## *2022 FISHERIES*

Pink salmon returns were below average throughout Southeast Alaska and the southern Southeast Alaska pink salmon harvest was 14.2 million (Districts 101-108, all harvest codes, all gear), which was 67% of the recent ten-year average. For all Southeast Alaska, excluding the Yakutat area, the pink salmon harvest was 17.4 million fish, which was above the preseason forecast point estimate of 16 million, and within the 10-24 million 80% confidence interval range of the forecast.

The total 2022 Southeast Alaska pink salmon escapement index of 10.03 million index fish ranked 30<sup>th</sup> since 1960. Biological escapement goals were met in all three subregions. On a finer scale, escapements were within or above management targets for 13 of 15 districts in the region. The Southern Southeast Subregion includes the area from Sumner Strait south to Dixon Entrance (Districts 101–108). The escapement index value of 5.80 million was within the escapement goal range of 3.0 to 8.0 million index fish.

Sockeye salmon harvests in the Alaska boundary area were above the 1985–2021 average in the District 101 and 104 traditional purse seine fisheries, were average in the District 102 and 103 purse seine fisheries, and were well below the treaty period average in the District 101 drift gillnet fishery. The Hugh Smith Lake adult sockeye salmon escapement was 1,657 fish, which was well below the optimal escapement goal range of 8,000 to 18,000 adult sockeye salmon. Based on the expanded peak foot survey count, the escapement of sockeye salmon into McDonald Lake was 34,100 fish, which was below the sustainable escapement goal range of 55,000 to 120,000.

Summer chum salmon harvests in the Alaska boundary area were above the 1985–2021 average in the District 101–104 traditional purse seine fisheries and well below the average in the District 101 drift gillnet fishery. The Southern Southeast chum salmon stock group is composed of an aggregate of 15 summer-run chum salmon streams on the inner islands and mainland of southern Southeast Alaska, from Sumner Strait south to Dixon entrance, with a sustainable escapement goal of 62,000 index spawners (based on the aggregate peak survey to all 15 streams). Summer chum salmon escapements were above average at many index streams in southern SEAK, and the index of 136,000 fish in 2022 easily met the escapement goal.

Coho salmon harvests in the Alaska boundary area were below average in the District 101–104 traditional purse seine fisheries and below average in the District 101 drift gillnet fishery. Coho salmon escapement counts and estimates in southern Southeast Alaska were within or below goal ranges. The combined peak count of 11,945 coho salmon in the 14 surveyed streams in the Ketchikan survey index was above the escapement goal of 4,250–8,500 fish. The total escapement of 892 coho salmon to Hugh Smith Lake was within the biological escapement goal range of 500–1,600 fish.

In Canadian Area 1, there are no longer commercial net interception fisheries on passing salmon stocks. Area 1 pink salmon stocks are even year dominant, in 2022 the return was expected to be below or near average returns. Pink salmon returns to Area 1 were mixed, with the Naden Harbour watersheds well below escapement targets, while Masset Inlet watersheds returns were just below targets. Returns in 2022 were not strong enough to support a commercial fishing opportunity. Additionally, continued low returns of chum salmon were observed, with no harvestable surpluses identified. Therefore, no pink salmon or chum salmon-directed terminal gillnet and seine fisheries occurred in 2022. There were two troll fisheries operating in Area 1 in 2022, the pink salmon-directed AB-Line fishery and the Chinook Individual Transferable Quota (ITQ) fishery, coho salmon retention was permitted in both fisheries. Under the Pacific Salmon Strategy Initiative (PSSI), the coho-directed troll fishery was closed in 2022. This closure is expected to be in place until there is clear evidence of growth and abundance of Northern Coho salmon stocks.

The Area 3 commercial gillnet fishery did not open this year due to a lack of harvestable surplus within the fishery implementation window. Under PSSI, new timing mitigation measures have been implemented in this fishery to protect wild Chinook salmon and chum salmon stocks. In 2022, pink salmon-directed seine fisheries allowed for the retention of chum salmon and sockeye salmon during certain openings based on their abundance. The season saw a total of four seine openings, each spanning 16 hours, and a combined effort of 32 boat days. The final catch was 2,347 sockeye salmon, 109,654 pink salmon, and 19,616 chum salmon. Catches for sockeye salmon, pink salmon, and chum salmon in Area 3 were well below the last decadal average (2012-2021) for seine catches, which were 6,839, 439,407, and 39,063, respectively.

Due to the above-average return of Skeena Sockeye and in-season sockeye salmon escapements past the Skeena Tyee test fishery that exceeded the commercial trigger, Area 4 commercial gillnet and seine fisheries opened on July 15 and 16, respectively. The Area 4 gillnet fishery spanned 4 statistical weeks for a total of 16 openings and 1,785 vessel operating days, which was higher than the last decadal average effort. For the season, the gillnet fishery in Area 4 harvested a total of 482,487 sockeye salmon and 100,838 pink salmon. The harvest for both species exceeds the ten-year average (2012-2021) of 98,342 and 85,104, respectively. The commercial seine ITQ fishery opened on July 20, and there were 3 separate 5-day openings that took place across 4 statistical weeks. The total effort for the fishery was 156 boat days. The seine fishery closed on August 7<sup>th</sup> with a 2022 season total of 230,025 sockeye and 377,434 pink salmon harvested. Harvest of both sockeye and pink were higher than the last decadal average (2012-2021) of 29,185 and 101,047, respectively.

Area 5 did not open to commercial net fishing in 2022 due to lack of identified harvestable surplus Skeena sockeye salmon.

The preliminary post-season sockeye salmon escapement estimate to the upper Nass River of 444,704 exceeded the escapement target of 200,000. The preliminary post-season sockeye salmon escapement estimate to the Skeena River was 2,528,148 exceeding the escapement target of 900,000, with a preliminary total run estimate of 4.36 million. Pink salmon returns throughout the North Coast area were higher than the last decadal average, except in Area 5. There has been an improvement in chum salmon escapements within Areas 3 and 4, which can be attributed to the implementation of management actions aimed at reducing impacts to wild chum salmon through the respective chum salmon rebuilding plans.



## ***MANAGEMENT PERFORMANCE***

Pacific Salmon Treaty (PST) based harvest sharing agreements were renewed in 2019 for the Northern Boundary Area fisheries—Alaska District 104 purse seine, Alaska District 101 drift gillnet, Canadian Area 3 net, and Canadian Area 1 troll. The agreements are “abundance based” where the allowable harvest is a percentage of the Annual Allowable Harvest (AAH). The AAH is the total return of applicable stocks minus the lesser of 1) the actual escapement, or 2) the escapement goal. Catches over or under the AAH are summed to allow for annual variation.

In the Alaska District 104 purse seine fishery, the Nass and Skeena River sockeye salmon run size determines the AAH of these stocks prior to statistical week 31. In the Alaska District 101 gillnet fishery, the AAH is based solely on the run size of Nass River sockeye salmon. The run size of Alaskan pink salmon returning to Districts 101-103 determines the AAH of these stocks in Canada’s Area 3 (1-4 net) and Area 1 troll fisheries. The agreement specifies a harvest in the District 104 purse seine fishery, from the beginning of the season through statistical week 30, of 2.45% of the combined AAH for both the Nass and Skeena River sockeye salmon runs. The District 104 purse seine fishery opens by regulation on the first Sunday in July. In 2022, the first potential opening was July 3 (statistical week 28). The pre-week 31 fishing plan for District 104 was based on the preseason Canadian Department of Fisheries and Oceans (DFO) forecast returns of approximately 2.69 million Nass and Skeena River sockeye salmon.

In the 2022 Treaty period (Alaska statistical weeks 28-30), a total of 49,025 sockeye salmon were harvested. During an 8-hour opening in Week 28, 716 sockeye salmon were harvested (Table 4). In statistical week 29, the seine fleet harvested 1,765 and 13,732 sockeye salmon in a 12-hour and a 15-hour opening. In statistical week 30, a total of 6,116 sockeye salmon were harvested during an initial 15-hour opening, and 26,696 sockeye salmon were harvested during a second 15-hour opening. A total of 31 purse seine vessels fished in District 104 during the Treaty period. Based on historical data, it’s expected that 60% to 80% of Treaty period sockeye salmon originate from the Nass and Skeena Rivers. Therefore, it was estimated that the District 104 purse seine fishery would harvest between 29,000 and 39,000 Nass and Skeena River sockeye salmon during the 2022 Treaty period. The preliminary estimate for the number of Nass and Skeena River sockeye salmon harvested in the District 104 purse seine fishery was 34,658 fish, which less than the final AAH determined post season.

In the District 101 (Tree Point) drift gillnet fishery, the AAH is calculated as the total run of Nass River sockeye salmon minus either the escapement requirement of 200,000 or the actual in-river escapement, whichever is less. The agreement specifies a harvest of 13.8% of the AAH of the Nass River sockeye salmon run. It was forecasted that the return of Nass River sockeye salmon in 2022 would be around 560,000. Subtracting the escapement goal of 200,000 from this would result in an AAH of about 360,000 fish. Using this forecast, the 2022 allowable harvest in the District 101 drift gillnet fishery was approximately 49,680 Nass River sockeye salmon. A total of 26,553 sockeye salmon were harvested, which was 26% of the 1985-2021 average of 104,070 fish and was the sixth lowest harvest since the inception of the PST. Based on genetics, the preliminary estimate for the number of Nass River sockeye salmon harvested at Tree Point during the 2022 season was 18,392 fish.

The District 101 drift gillnet fishery opens by regulation on the third Sunday in June, which was June 19 (statistical week 26) in 2022. During the early weeks of the fishery, management is based on the run strength of Alaskan wild stock chum salmon and sockeye salmon and on the strength of the Nass River sockeye salmon. Beginning in the third week of July, when pink salmon stocks begin to enter the fishery in large numbers, management emphasis shifts, by regulation, to that species. By the regulations outlined in the District 101 Pink Salmon Management Plan, the fishing time for the gillnet fishery in this district is set in relation to the purse seine fishing time, when both fleets are concurrently harvesting the same pink salmon

stocks.

For 2022, Canada was to manage the Area 3-1 to 3-4 net fisheries to achieve an annual catch share of 2.49% of the AAH of Alaskan Districts 101, 102, and 103 pink salmon. With a total return of approximately 24.64 million pink salmon, the Alaskan Districts 101, 102, and 103 AAH was approximately 13.89 million pinks. Given this AAH, the resulting Area 3-1 to 3-4 Canadian commercial net total allowable catch was approximately 345 thousand Alaskan Districts 101, 102, and 103 origin pink salmon. In 2022, preliminary Canadian pink salmon catch in was 89,947, and the Alaska stock component of this catch is estimated to be 57,733, or 0.42 % of the AAH. This result is below the annex agreement of 2.49%.

In addition, Canada was to manage the Area 1 troll fishery to achieve an annual catch share of 2.57% of the AAH of Alaskan Districts 101, 102 and 103 pink salmon. With a total return of 24.64 million pink salmon, the resulting Area 1 Canadian commercial troll total allowable catch of this AAH was approximately 13.89 million pink salmon of Alaskan Districts 101, 102 and 103 origin. The Area 1 harvest was 87,168 pink salmon, with an estimated 67,837 being of Alaskan origin. This equates to 0.49% of the Alaskan District 101, 102 and 103 pink salmon AAH, well below the annex agreement of 2.57%.

## 2023 FORECASTS

The Southeast Alaska pink salmon harvest in 2023 is predicted to be in the *weak* range, with a point estimate of 19 million fish (80% prediction interval: 12-29 million fish). The 2023 harvest forecast of 19 million pink salmon is just over half of the recent 10-year average harvest of 33 million pink salmon. A forecast of 19 million pink salmon would be a significant drop from the previous odd-year harvest in 2021 (48.5 million) and is only 39% of the average odd-year harvest over the past 10 odd years (49 million). The harvest forecast was primarily based on juvenile pink salmon abundance indices collected by the NOAA/ADF&G Southeast Coastal Monitoring Project in northern Southeast Alaska inside waters during June and July. A multiple regression model was developed, using monthly peak juvenile CPUE (standardized catch based on 20-minute trawl sets) for the June and July surveys and an Icy Strait Temperature Index.

The forecasted return of Nass River sockeye salmon to Canada is expected to be below the average of 616,000 total return to Canada (TRTC) for the years 1994-2022. The predicted return for 2023 ranges from 257,000 (75% probability) to 522,000 (25% probability), with a point estimate of 366,000 (50% probability), based on a sibling-regression model. The total Skeena River sockeye salmon return is expected to be abundant with a pre-season return forecast from 1.5 million (90% probability) to 6.80 million (10% probability), with a point estimate of 3.19 million (50% probability), based on the sibling-regression model. Below average pink salmon returns are anticipated to Areas 1, 3, 4 and 5, based on brood year escapements.

# INTRODUCTION

This report reviews the 2022 Boundary Area pink, chum, coho, and sockeye salmon gillnet and purse seine fisheries of southern Southeast Alaska and northern British Columbia and outlines preliminary expectations and fishing plans for 2023. The document is submitted to the Pacific Salmon Commission as required in Article IV of the Pacific Salmon Treaty. Weekly catch and effort data are provided by opening, district or area, gear, and species (sockeye salmon, pink, chum, coho, and Chinook salmon) for Northern Boundary Area fisheries for 2022. Sub-area catch data is also presented for all salmon species for Canadian Area 3. Maps showing the statistical fishing districts or areas for southern Southeast Alaska and northern British Columbia are provided in Figures 1 to 7.

## SOUTHERN SOUTHEAST ALASKA

### 2022 Salmon Forecast

The 2022 pink salmon harvest in Southeast Alaska was expected to be *weak*, with a point estimate of 16 million fish and a forecast range of 10-24 million fish. Formal forecasts were not made for subregions or for species other than pink salmon in Southeast Alaska.

### Review of the 2022 Fishing Season

Commercial fisheries harvested 18.0 million salmon in southern Southeast Alaska in 2022. This total includes Traditional, Hatchery Terminal Harvest Area, and Annette Island Reserve fisheries; purse seine, drift gillnet, and troll gear; in Districts 101 through 108, 150, and 152. The salmon harvest was comprised of 14.2 million (79%) pink salmon, 2.5 million (14%) chum salmon, 484,861 (2%) coho salmon, 696,687 (4%) sockeye salmon, and 65,582 (0.4%) Chinook salmon.

### Districts 101 to 107 Purse Seine Fisheries

The management strategy for the southern Southeast Alaska inside purse seine fishery was based on in-season pink salmon returns to Districts 101 through 107. However, there were exceptions to this management scheme in the District 102 fisheries that were specifically directed towards fall chum salmon. In the following sections “average” refers to the 1985–2021 average.

#### *District 101 Purse Seine Fishery*

The District 101 purse seine fishery opened July 3, 2022, for the first of 15 fishing periods (Table 1). The fishery harvested 5,776,497 pink salmon, 49,398 sockeye salmon, 201,483 chum salmon, 25,800 coho salmon, and 105 Chinook salmon (Table 1). The fishery was open for 85% of the average number of days, and the number of boats involved in the fishery was 36% of the average. The pink salmon harvest of 5,776,497 was 106% of average. Sockeye salmon harvests were average for most of the season, and the catch of 94,591 fish was 108% the average. The total chum salmon catch of 201,483 fish was 71% of the average and the total coho salmon harvest of 49,398 fish was 136% of average.

#### *District 102 Purse Seine*

The early season lower District 102 openings near Kendrick Bay that traditionally access returns of Southern Southeast Regional Aquaculture Association (SSRAA) enhanced summer chum salmon returning to Kendrick Bay did not occur this year due to Chinook salmon conservation concerns and SSRAA cost

recovery pursuits. The traditional seine fishery in District 102 that targets local stocks of pink salmon opened Sunday, July 3 (statistical week 28). During the traditional fishing period, there were 17 openings that ranged from 15 to 39 hours in duration (Table 2).

The District 102 purse seine fishery harvested 1,898,198 pink salmon, 42,681 sockeye salmon, 779,958 chum salmon, 20,108 coho salmon, and 80 Chinook salmon (Table 2). The fishery did not open in statistical weeks 26 and 27, and the number of days open was 46% of the average. There were two openings targeting fall chum salmon. The first opening occurred in statistical week 37 and had 10 fishing vessels harvest 4,852 chum salmon. The second opening, in statistical week 38, received less effort with 7 vessels harvesting 4,627 chum salmon (Table 2).

Pink salmon harvests were below average from statistical week 31 through 36 of the 2022 season, and the total harvest of 1,898,198 fish was 48% of the average (Table 2). Sockeye salmon catches were below average in the beginning of the season and above average at the end of the season. The total sockeye salmon catch of 42,681 fish was 167% of the average. Catches of summer-run chum salmon peaked in mid-July and the total chum salmon catch of 779,958 fish was 167% of the average. This was driven by an above average SSRAA hatchery chum salmon return for Kendrick Bay. Catches of coho salmon gradually increased until it peaked in statistical week 32 with a harvest of 4,751 fish then gradually decreased until the end of the season. The total harvest of 20,108 fish was 42% of the average.

#### *District 103 Purse Seine*

The District 103 purse seine fishery opened July 14, 2022, for the first of 12 fishing periods (Table 3). The fishery harvested 1,313,395 pink salmon, 25,323 sockeye salmon, 311,180 chum salmon, 31,380 coho salmon, and 817 Chinook salmon (Table 3). During the 2022 fishing season, the number of days that the fishery was open was below average. Additionally, the number of boats fishing was 61% of the average, which was also below average.

Pink salmon catches peaked in statistical week 32 with a harvest of 482,997 fish (Table 3). The second largest catch per opening occurred during the mid-week opener for statistical week 34 with 316,243 pink salmon harvested. The total pink salmon harvest of 1,313,395 was 35% of the average. Sockeye salmon catches were slightly above average and the total catch of 25,323 fish was 113% of average. Chum salmon harvests were well above average from statistical week 30 through statistical week 32 but dropped sharply in the final three weeks of the fishery. The total chum salmon harvest of 311,180 fish was 293% of the average and driven primarily by the hatchery return to Port Asumcion. Catches of coho salmon were average and the total coho salmon harvest of 31,380 fish was 107% of the average.

#### *District 104 Purse Seine Fishery*

The District 104 purse seine fishery opens by regulation on the first Sunday in July. In 2022, the first potential opening was July 3 (statistical week 28). The Treaty period (Alaska statistical weeks 28-30) fishing plan for District 104 was based on the preseason Canadian Department of Fisheries and Oceans (DFO) forecast returns of approximately 3,250,000 Nass and Skeena River sockeye salmon. In the 2022 Treaty period, an estimated 49,025 sockeye salmon were harvested during an 8-hour opening during week 28, a 12-hour and a 15-hour opening in week 29, and two 15-hour openings in week 30 (Table 4). A total of 31 purse seine vessels fished at some time in the district during the Treaty period. Due to historical data, it was anticipated that 29,000 to 39,000 Nass and Skeena River sockeye salmon would be harvested in the District 104 purse seine fishery during the 2022 treaty period, as 60% to 80% of Treaty-period sockeye salmon were from these two rivers. The final total number of Nass and Skeena River sockeye salmon harvested, and the catch by stock, will not be available until catch, escapement, and stock composition estimates are finalized for the year.

In 2022, a total of 2,525,681 pink salmon, 476,385 sockeye salmon, 338,050 chum salmon, 64,381 coho salmon, and 12,981 Chinook salmon were harvested in the District 104 purse seine fishery (Table 4). The number of days that the fishery was open, and the number of boats fishing were below average. Purse seine fisheries were on non-retention for Chinook salmon throughout most of the season, except for statistical weeks 31 through 35. During that period, the first opening for statistical week 32 was also non-retention for Chinook salmon. The total sockeye salmon harvest for the Treaty period, which was 49,025 fish, was 55% of the average treaty period harvest. The total sockeye salmon harvest of 476,385 was 107% of the average of 445,000 fish. Coho salmon harvests were below historical averages, resulting in an overall harvest of 64,381 fish, which was 60% of the average. The total pink salmon harvest of 2,525,681 was 32% of the average. The chum salmon harvest of 338,050 was 121% of the long-term average.

#### *Districts 105, 106, and 107 Purse Seine Fisheries*

For the 2022 season, the combined Districts 105, 106, and 107 traditional state managed purse seine fisheries harvested 197,614 pink salmon, 40,780 chum salmon, 3,423 coho salmon, and 10,400 sockeye salmon.

### **District 101 Drift Gillnet Fishery**

The 2019 PST agreement calls for abundance-based management of the District 101 drift gillnet fishery. The agreement specifies a harvest of 13.8% of the AAH of the Nass River sockeye salmon run. For the 2022 season, DFO forecast a total return of 437,000 Nass River sockeye salmon. The AAH is calculated as the total run of Nass River sockeye salmon minus either the escapement requirement of 200,000 or the actual in-river escapement, whichever is less. The District 101 drift gillnet fishery opens by regulation on the third Sunday in June, which was June 19 in 2022. The early weeks of the fishery are managed based on the run strength of Alaskan wild stock chum salmon and sockeye salmon, as well as the run strength of Nass River sockeye salmon. Beginning in the third week of July, the management emphasis shifts to pink salmon stocks as they begin to enter the fishery in large numbers, in accordance with regulation. By regulation, the District 101 Pink Salmon Management Plan begins the third Sunday in July and establishes gillnet fishing time in relation to the District 101 purse seine fishing time. Beginning in statistical week 37 (September 4) management was based on the strength of wild stock fall chum salmon and coho salmon.

In 2022, the District 101 drift gillnet fishery opened Sunday June 19 (statistical week 26). The fishery was open near or above average number of days throughout the season, but the number of boats fishing during weekly openings was consistently below average. The total number of individual boats fishing during the season was 51 boats, which was approximately 50% of the average of 102 boats. A total of 26,553 sockeye salmon were harvested, which was only 26% of the average of 104,000 fish. Additionally, it was the sixth lowest harvest since the inception of the PST. Harvests of sockeye salmon were below treaty period averages throughout the season and were well below average in the beginning weeks of the season. The cumulative sockeye salmon harvest prior to the initiation of the Pink Salmon Management Plan in statistical week 30 was 16,475 fish, or about 62% of the season's total sockeye salmon harvest. The preliminary estimate of Nass River sockeye salmon harvested at Tree Point in 2022 was 18,392 fish.

Pink salmon harvests were below average most of the season and the total harvest of 381,076 fish was 81% of average. Chum salmon harvests were average in most weeks of the fishery and the total harvest of 332,128 fish was 116% of average. Coho salmon harvests were below average for the season and the total harvest of 27,462 fish was 57% of the treaty period average. The Chinook salmon harvest was below average for the season.

## **District 106 Drift Gillnet Fishery**

The 2022 harvest in the District 106 commercial gillnet fishery included 86,448 pink salmon, 45,437 sockeye salmon, 173,048 chum salmon, 50,901 coho salmon, and 800 Chinook salmon (Table 6). One hundred and eighteen boats participated in the District 106 fishery during the 2022 season, which is 85% of 10-year average of 138 boats. Chinook salmon harvest was below average, and the total Chinook salmon harvest of 800 fish was 42% of the recent 10-year average. Sockeye salmon harvests were below average all season, and the total sockeye salmon harvest of 45,437 fish was 84% of the recent 10-year average. The overall harvest of 50,901 coho salmon was 45% of the recent 10-year average of 114,000 fish. Pink salmon harvests were below average throughout the season, and the overall harvest of 86,448 fish was 29% of the recent 10-year average. Chum salmon harvests were near or above average throughout the season and the overall harvest of 173,048 chum salmon was 117% of the recent 10-year average.

## **Annette Island Reserve Fisheries**

In 2022, the Annette Island purse seine fishery harvested 1,709,069 pink salmon, 46,279 chum salmon, 9,615 sockeye salmon, 5,751 coho salmon, and 394 Chinook salmon. The 2022 Annette Island drift gillnet fishery harvested 282,191 pink salmon, 72,536 chum salmon, 4,429 sockeye salmon, 5,900 coho salmon, and 1,137 Chinook salmon (Tables 7-8).

## **Pink, Sockeye, and Chum Salmon Escapements**

The total 2022 SEAK pink salmon escapement index of 10.03 million index fish ranked 30<sup>th</sup> since 1960. Biological escapement goals were met in all three subregions (Table 9). On a finer scale, escapements met management targets for 13 of 15 districts in the region and for 33 of the 46 pink salmon stock groups in Southeast Alaska. The Southern Southeast Subregion includes the area from Sumner Strait south to Dixon Entrance (Districts 101–108). The escapement index value of 5.80 million was within the escapement goal range of 3.0 to 8.0 million index fish. The pink salmon harvest of 14.2 million in the Southern Southeast Subregion was 67% of the recent 10-year average. The overall Southeast Alaska pink salmon harvest of 17.4 million fish was approximately 57% of the recent 10-year average of 30.4 million.

Sockeye salmon escapement levels throughout SEAK generally met goals in 2022, with lower bounds of escapement goal ranges achieved for 10 of the 12 sockeye salmon systems with formal escapement goals. The Hugh Smith Lake adult sockeye salmon escapement was 1,657 fish, which was well below the optimal escapement goal range of 8,000 to 18,000 adult sockeye salmon. Based on the expanded peak foot survey count, the escapement of sockeye salmon into McDonald Lake was 34,100 fish, which was below the sustainable escapement goal range of 55,000 to 120,000 fish.

For summer-run chum salmon, lower bound sustainable escapement goals were achieved for two of the three subregions in SEAK. The Southern Southeast summer-run chum salmon stock group is composed of an aggregate of 15 summer-run chum salmon streams on the inner islands and mainland of southern SEAK, from Sumner Strait south to Dixon Entrance, with a sustainable escapement goal of 62,000 index spawners (based on the aggregate peak survey to all 15 streams). Summer-run chum salmon escapements were above average at many index streams in southern SEAK, and the index of 136,000 fish in 2022 met the escapement goal. Cholmondeley Sound is the only area in southern SEAK with a formal escapement goal for fall chum salmon. Fall chum salmon runs are monitored in Cholmondeley Sound through aerial surveys at Disappearance and Lagoon creeks. The escapement index of 42,000 fish was near the upper end of the sustainable escapement goal range of 30,000 to 48,000 index spawners (based on the aggregate peak survey to both streams).

## **Management Performance Relative to Pacific Salmon Treaty Requirements**

### **District 104 Purse Seine Fishery**

The 2019 revision of the PST Agreement calls for the implementation of abundance-based management in the District 104 purse seine fishery. The agreement allows the District 104 purse seine fishery to harvest 2.45% of the AAH of Nass and Skeena River sockeye salmon prior to statistical week 31. The AAH is calculated as the total run of Nass and Skeena River sockeye salmon minus either the escapement requirement of 1.1 million or the actual in-river escapement, whichever is less. The AAH value of 2.45% was based on the weighted-average percent of the Nass and Skeena River sockeye salmon AAH that would have been harvested in this fishery during the period of 1985–1996 if the pre-statistical week 31 harvest had been exactly 120,000 sockeye salmon each year. Catches from 1997 were not included in the baseline calculation due to unusually high sockeye salmon abundance in the fishery. The Alaska Department of Fish and Game’s management intent is to harvest Nass and Skeena River sockeye salmon at the allowable AAH percentage. The PST recognizes that overages and underages will occur and provides an overage/underage provision intended to hold the Parties accountable for their catch shares but permit a reasonable degree of management flexibility.

The total return of Nass and Skeena River sockeye salmon in 2022 was 4,961,172 fish. This return would have allowed a treaty-period catch in the District 104 purse seine fishery of 94,599 Nass and Skeena River sockeye salmon. The 2022 total catch of sockeye salmon during the District 104 treaty period was 49,025 fish. Annual AAH fishery performance in the District 104 fishery is presented in Table 10 with bilaterally accepted numbers through 2021 and preliminary run reconstruction estimates for 2022. The preliminary estimates of Nass and Skeena River sockeye salmon harvested during the Treaty period in the District 104 purse seine fishery for 2022 was 34,658 fish.

### **District 101 Drift Gillnet Fishery**

The 2019 PST Agreement calls for abundance-based management of the District 101 drift gillnet fishery. The agreement allows the District 101 gillnet fishery to harvest 13.8% of the AAH of the Nass River sockeye salmon run. The AAH is calculated as the total run of Nass River sockeye salmon minus either the escapement requirement of 200,000 sockeye salmon, or the actual in-river escapement, whichever is less. The 13.8% AAH value was based on the weighted-average percent of the Nass River sockeye salmon run that was harvested in this fishery during years 1985–1997. The ADF&G management intent is to harvest Nass River sockeye salmon at the allowable AAH percentage. The PST recognizes that overages and underages will occur and provides an overage/underage provision intended to hold the Parties accountable for their harvest shares while permitting a reasonable degree of management flexibility.

The total return of Nass River sockeye salmon in 2022 was 623,024 fish. This return allows a catch in the District 101 gillnet fishery of 58,377 Nass River sockeye salmon. The 2022 total catch of sockeye salmon in the District 101 gillnet fishery was 26,553 fish, which was only 26% of the 1985–2021 average of 104,070 fish and was the sixth lowest harvest since the inception of the PST. Annual AAH fishery performance in the District 101 gillnet fishery is presented in Table 11 with bilaterally accepted numbers through 2021 and preliminary run reconstruction estimates for 2022. The preliminary estimate for Nass River sockeye salmon harvested in the District 101 drift gillnet fishery in 2022 was 18,392 fish.

## **2023 Southeast Alaska Pink Salmon Forecast**

The SEAK pink salmon harvest in 2023 is predicted to be in the *weak* range, with a point estimate of 19 million fish (80% prediction interval: 12-29 million fish). If 19 million pink salmon are harvested, it would be just over half of the recent 10-year average of 33 million pink salmon. The harvest forecast was based on juvenile pink salmon abundance indices collected by the NOAA/ADF&G Southeast Coastal Monitoring Project in northern SEAK inside waters during June and July. A multiple regression model was developed, using monthly peak juvenile CPUE (standardized catch based on 20-minute trawl sets) for the June and July surveys and an Icy Strait Temperature Index. Formal forecasts are not made for species other than pink salmon in SEAK.



# NORTHERN BRITISH COLUMBIA

## 2022 Salmon Forecast

### Area 1 Expectations

- Sockeye** There are no significant local sockeye salmon stocks in Area 1 and no directed commercial fisheries on passing stocks.
- Pink** Based on the trend of below average escapements for the last 3 cycles, Haida Gwaii pink salmon are expected to have below average to near average returns. Additionally, Alaskan forecasts, which are based on juvenile pink salmon abundance indices, are forecasting for weak returns due to abnormally warm waters since 2014.
- Chum** Returns have been variable and trending downward in recent years. Fisheries will only occur on terminal surpluses identified in-season.

### Area 3 Expectations

- Sockeye** The predicted TRTC for Nass River sockeye salmon is expected to increase, with a forecasted range from 380,000 (75% probability) to 828,000 (25% probability) and a point estimate of 560,000 (50% probability), based on a sibling-regression model. Nass River sockeye salmon returns will be carefully monitored to account increasing uncertainty and recent trends towards lower survival. Fishery opportunities will be determined in-season.
- Pink** Pink salmon returns to the Nass River watershed have been dominant in odd-years since the 1980s. Area 3 even-year pink salmon are influenced mostly by returns to Kwinimass and Khutzeymateen Rivers. Area 3 even-year pink salmon have been trending above average over the last 3 generations. Fisheries will be determined based on in-season estimates of abundance.
- Chum** Area 3 chum salmon stocks remain below target escapement levels, though recent improvements in aggregate return are encouraging. Nonetheless, fishing opportunities will be constrained to reduce impacts to wild chum salmon returning to Area 3 streams.

### Area 4 Expectations

- Sockeye** The total Skeena River sockeye salmon return is expected to be modest with a pre-season return forecast from 1.00 million (90% probability) to 4.53 million (10% probability) and a point estimate of 2.13 million (50% probability) based on the sibling model. Fishing opportunities will be determined based on in-season estimates of abundance.
- Pink** A below average pink salmon return is expected due to a poor brood year return in 2020. Fisheries will be determined based on in-season estimates of abundance.
- Chum** Skeena River chum salmon escapements are depressed and there will be no chum salmon retention in Area 4.

## Area 5 Expectations

- Sockeye** Commercial fisheries targeting sockeye salmon will depend on Skeena River returns.
- Pink** Pink salmon targeted fisheries in Area 5 are not anticipated, but will be dependent on fishing opportunities in Area 4.
- Chum** Local chum salmon stocks are depressed, and no surplus is anticipated.

## Review of 2022 Fishing Season - Net and Troll Fisheries

### Area 1

Area 1 no longer has commercial net interception fisheries targeting passing salmon stocks. Instead, the focus shifted to local pink salmon and chum salmon stocks (Figure 3). Pink salmon stocks are primarily even-year dominant, however, the returns were expected to below average to average in 2022. Pink salmon returns to Area 1 were mixed, with the Naden Harbour watersheds well below escapement targets while Masset Inlet watersheds returns were just below targets. In addition, chum salmon returns to Area 1 have been consistently at or below management targets for the past two decades. This trend of low chum salmon abundance continued in 2022, with no harvestable surpluses identified. Returns in 2022 were not strong enough to support commercial fishing opportunities, therefore no terminal gillnet or seine fisheries occurred in Area 1 (Tables 12-13).

The Area 1 troll fishery was managed considering domestic Chinook salmon, sockeye salmon, and chum salmon stocks of concern, and the PST Aggregate Abundance-Based Management Chinook salmon ceiling. An ITQ system governed the harvest of all Chinook salmon. The Chinook-directed salmon fishery in portions of Area 1 was opened from August 10 to September 30, in response to concerns of Fraser River and West Coast Vancouver Island Chinook salmon stocks of concern. The pink salmon-directed troll fishery in Dixon Entrance was open from July 1 to September 30 at the A-B Line. The coho salmon-directed troll fishery was closed due to PSSI in late June, however coho retention was permitted in the pink salmon-directed A-B Line and Chinook salmon ITQ troll fisheries. This closure is expected to be in place until there is clear evidence of growth and abundance of northern coho salmon stocks. Chum salmon retention was restricted throughout the season to protect mainland and Haida Gwaii stocks.

Sockeye salmon retention in the A-B Line is dependent on pre-season forecasted returns to the Skeena River and in-season abundance indicators being above the commercial trigger of 1.05 million. The 2022 pre-season forecast and early in-season estimates for Skeena River sockeye salmon were above the commercial trigger of 1.05 million and therefore sockeye salmon retention was permitted in the A-B Line opening with the majority of catches occurring between July 1 to August 4.

The preliminary catch estimate for the Area 1 portion (includes Area 101) of the troll fishery is 319 sockeye salmon, 99,845 coho salmon, 87,185 pink salmon, and 43,166 Chinook salmon (Table 14).

### Area 3

Management units (sub-areas) of Statistical Area 3 are outlined in Figure 5. The Area 3 sockeye salmon gillnet fishery has traditionally commenced in mid-June to assess the stock strength of returning Nass-bound sockeye salmon. Since 1994, in-season escapement estimates have been provided by the Nisga'a fishwheel operations that are conducted in the lower Nass River, approximately five miles upstream from the old Nass River gillnet test fishery site. In 2022, fishwheel operations began on June 1 and closed for the season on September 10. Several high-water events caused the shutdown of one or both fishwheels during periods of high discharge when it was unlikely that fish would be able to physically swim through the Gitwinksihlkw canyon. These events occurred from June 1–13, June 18–23, June 26–July 6, and August 31–September 4.. Water levels at the fishwheel were the highest on record over the 29 years of operation. The Nass River fishwheel operation, along with the Nisga'a Fisheries Program, continues to be an example of quality stock assessment and effective fisheries co-management.

In general, the Area 3 net fishery is managed for Nass River sockeye salmon until mid-July. After this the outer Area 3 net fishery is managed based on Nass and Skeena River pink salmon and Skeena River sockeye salmon stock abundance. The inside Area 3 (sub-areas 3–7 to 17) net fishery is managed for Nass River sockeye salmon and local pink salmon abundance from mid-July to late August or early September. In 2022, gillnet fisheries in Area 3 were closed due to lack of harvestable surpluses of Nass River sockeye salmon as identified at the fishwheels (Table 15-17). High water levels contributed to the slow migration of fish up the Nass River, as water levels decreased in the season, escapement past the fishwheels steadily increased. In 2022, all Area 3 seine fisheries, which were pink salmon-directed fisheries, operated with non-retention/non-possession restrictions for coho salmon, Chinook salmon, and steelhead. Incidental sockeye salmon retention was not restricted in the statistical week 7/4 (US statistical week, US SW 30). Chum salmon retention was permitted in 3 of the 4 seine fishery openings, chum salmon retention was not permitted in statistical week 7/5 (US SW 31), due to increased abundance of wild Canadian chum salmon in Area 3 at this time. Seine opportunities ceased on July 5 until escapement into the main pink salmon rivers showed improvement (Table 18-20). Unfortunately, pink salmon escapements did not improve, and no further opportunities were granted. DFO took a conservative approach going into the pink salmon season due to extreme flooding events in 2017/2018 that drastically affected two consecutive brood years. Typically, pink salmon escapement is not strong during an even year with an American forecast that is projected to be below average. Finally, in 2022 no troll fishery opportunities were identified in Areas 3/103 (Table 21).

The first commercial fishery opening in Area 3 was in Statistical Week 7/3 (US SW 29), with a single 16-hour opening on July 12, targeting pink salmon, with retention of chum salmon permitted. Fishing was restricted to sub-areas 3-3 and 3-7, the outside of Area 3 southwest of Wales Island and south of Sommerville Island. Fishing effort was low, with only 3 vessels participating in the opening. A total of 1,100 pink salmon and 3,735 chum salmon were caught during the week (Table 18-20). Two additional 16-hour seine openings occurred on July 18 and 19 (Statistical week 7/4 or US SW 30) with low effort, 8 and 9 boat days, respectively. Opening occurred in sub-areas 3-3 and 3-7, with retention of pink salmon, sockeye salmon, and chum salmon, all other species remained prohibited. The total weekly seine catch was 42,540 pink salmon, 2,347 sockeye salmon, and 15,881 chum salmon (Table 18-20). The final 16-hour seine opening in Area 3 for 2022 occurred on July 25 (statistical week 7/5 or US SW 31) with only pink salmon retention. Effort remained low, with 12 boat days, resulting in a final weekly catch of 66,017 pink salmon. Pink salmon fishing started slow and despite showing improvement as the season progressed, continued to track below historic catch levels. Seine opportunities ceased on July 25 until escapement into the main pink salmon rivers showed improvement. Unfortunately, pink salmon escapements did not improve, and no further opportunities were granted. The 2022 season finished with a total of 4 seine openings, each 16 hours in duration with a total effort of 32 boat days. The final catch equated to 2,347 sockeye salmon, 109,654 pink salmon, and 19,616 chum salmon (Table 17). Catches in 2022 for pink salmon, chum salmon, and

sockeye salmon were well below the last decadal average (2012-2021) seine catch in Area 3 of 439,407, 39,063, and 6,839 pieces, respectively.

Nisga'a Fish and Wildlife department conducted four marine individual sale fisheries in Area 3 on August 10, 11, 13, and 14, with a total participation of 5 to 7 gillnet vessels in each opening. Total Nisga'a Treaty and Harvest Agreement catches in the Nass River and the marine approach areas included 52,159 sockeye salmon, 1,722 coho salmon, 10,587 pink salmon, 387 chum salmon, and 3,864 Chinook salmon. In-river, the Gitanyow First Nation had an approved In-land Economic Demonstration Fishery, which harvested 15,000 sockeye salmon at a site on the Meziadin River. In 2022, two pink salmon-directed Marine Demonstration Fisheries were approved in Area 3, but not implemented.

The end of season preliminary TRTC estimates for Nisga'a Treaty accounting are 48,700 sockeye salmon, 197,000 coho salmon, 479,000 pink salmon, 85,000 chum salmon, and 21,000 Chinook salmon. The preliminary post-season sockeye salmon escapement estimate to the upper Nass River of 444,704 exceeded the escapement target of 200,000. The Meziadin River sockeye salmon escapement of 343,765 was well above both the 2012-2021 average (146,053) and the desired escapement target of 160,000 fish. The Kwinageese River sockeye salmon escapement of 5,115 is above the 2012-2021 average of 5,664 fish.

#### **Area 4**

The sibling model forecast predicted a 50% probability of approximately 2.13 million sockeye salmon returning to the Skeena River in 2022 with a 10% probability of the return exceeding 4.53 million and a 90% probability of the return exceeding 1.00 million. It was expected that there would be a surplus of fish, but the ability to conduct commercial fisheries would be dependent on in-season estimates of abundance. Further, for spawning purposes, an escapement of 900,000 was required, and for food, social, and ceremonial (FSC) purposes, a harvest of 150,000 by First Nation's was required. In-season abundance indicators include the Tyee test fishery, various in-river fish counting facilities, harvest rate and CPUE models, First Nation's FSC fish catches, and commercial catches in Area 4 and other fishing areas in Northern BC and southern Southeast Alaska. In 2022, the Tyee test fishery operated from June 10 to September 26.

Area 4 gillnet and seine fisheries operated with a non-retention/non-possession restriction for chum salmon, coho salmon, Chinook salmon, and steelhead salmon. Further management actions include mandatory operational revival boxes, daylight-only fisheries, and time and area fishing restrictions. Throughout the season, the commercial gillnet fleet in Area 4 was required to implement additional management actions under PSSSI, including selective gill net restrictions such as half nets, 20-minute soak times, and restricted fishing areas. These measures were put in place to address weak stock concerns.

Early in-season Skeena River sockeye salmon TRTC forecasts (2.4 million), allowed for an Area 4 gillnet fishery that started on July 15. There were a total of 16 openings and 1,785 vessel operating days (Table 22), which is higher than the last decadal average (Table 28). In week 7/3 (US SW 29), there were 2 gillnet openings, with a total effort of 182 boats days, and a harvest of 36,572 sockeye salmon and 182 pink salmon. Skeena River sockeye salmon escapement past Tyee remained high and the Skeena River sockeye forecasts increased to 2.9 million in week 7/4 (US SW 30). In response, DFO opened the gillnet fishery for 4 days. Over the 4 days of fishing there was a total effort of 476 boat days and a harvest of 129,781 sockeye salmon and 9,966 pink salmon. Catches of sockeye salmon in the gillnet fishery peaked in week 7/5 (US SW 31), where the fishery opened for 4 days (492 boat days) and harvested 166,565 sockeye salmon and 29,297 pink salmon. The fishery was opened for 5 days in week 8/1 (US SW 32) in response to continued strong escapement past Tyee and increases in the TRTC forecast. In week 8/1, the fishery had a total effort of 522 boat days and harvested 140,530 sockeye salmon and 55,211 pink salmon. The fishery's final week occurred in week 8/2 (US SW 33) to protect the weak and wild stocks returning to the Skeena River that

contribute to the aggregate. This final opening occurred on August 7<sup>th</sup>, opened for 17 hours, and had an effort of 83 boat days. There were 9,039 sockeye salmon and 6,182 pink salmon harvested in this final opening. For the 2022 season, the gillnet fishery in Area 4 harvested a total of 482,487 sockeye salmon and 100,838 pink salmon. The harvest for both species exceeds the previous ten-year average (2012-2021) of 98,342 and 85,104 fish, respectively.

The 2022 commercial seine ITQ fishery opened on July 20 for a total of 3, 5-day openings, spanning 15 days and had a total effort of 156 boat days (Table 23). The seine ITQ fishery runs for 5 days from Wednesday through Sunday of each week. As a result of this schedule, the openings are into two statistical weeks, based on how statistical weeks are defined. The first seine opening in week 7/4 (US SW 30) occurred for 2 days with a total effort of 31 boat days harvesting 30,077 sockeye salmon and 1,500 pink salmon. As the forecasted TRTC and escapement of Skeena River sockeye past the Tyee test fishery remained strong, another seine opening occurred in week 7/5 (US SW 31). Fishing occurred over 5 days with a total effort of 50 boat days and harvest of 100,994 sockeye salmon and 103,042 pink salmon. Sockeye salmon catches in the seine fishery began to decline after week 7/5 and continued into statistical weeks 8/1 and 8/2 (US SW 32 and 33, respectively). The seine fishery was opened for 5 days in week 8/1 with an effort of 63 boat days and harvest of 81,795 sockeye salmon and 193,912 pink salmon. The final week of fishing occurred in week 8/2 with a 1 day opening and an effort of 12 boat days, harvesting 17,159 sockeye salmon and 78,980 pink salmon. The seine fishery closed on August 7. The 2022 season total harvests were 230,025 sockeye salmon and 377,434 pink salmon (Table 23). Harvest of sockeye and pink were higher than the last decadal average (2012-2021) of 29,185 and 101,047, respectively.

Recreational fishing for Skeena River sockeye salmon was closed until July 19 when it opened to 1 fish per day and increased to 2 on July 20. On May 24, Chinook salmon recreational fishing was closed in the entire Skeena River watershed and in the river and lakes in Region 6, flowing into PFMA's 3 to 6, but not including the Nass and Kitimat rivers. In the marine water of Area 4, all salmon species began open. Sockeye salmon opened to an increased limit of 4 fish per day on July 20 in the tidal waters of Areas 3, 4, and 5 (Figures 5-7). To address conservation concerns, recreational fishing for Chinook salmon was reduced to non-retention in Areas 3, 4, and 5 from June 15 to July 31. Chinook salmon retention resumed on August 1 with a limit of 1 Chinook salmon per day until August 31. The Area 3 & 4 Creel Program operated from May 1, 2022, to August 31, 2022. During this time there were approximately 11,624 vessel trips made by recreational vessels with an estimated retained catch of 4,432 Chinook salmon, 31,620 coho salmon, 3,986 pink salmon, 50 chum salmon, and 13 sockeye salmon. The Area 3 & 4 Creel Program collects catch information from the recreational fishery surrounding Prince Rupert and Port Edward on the North Coast of B.C. It is focused in Areas 3 and 4, comprising the waters of Chatham Sound between the mouths of the Nass and Skeena Rivers. Chatham Sound is bordered by the Alaska/BC border to the North, Dundas and Stephens Island groups to the West, and Porcher Island to the South, covering an area of approximately 4,200 km<sup>2</sup>.

First Nation's FSC fisheries throughout the Skeena River mainstem and marine approach waters reported a harvest of 109,341 sockeye salmon, 698 coho salmon, 2,253 pink salmon, 253 chum salmon, and 2,626 Chinook salmon. In addition, 3 Excess to Spawning Salmon Requirement (ESSR) fisheries were licensed in the Moricetown Canyon, Babine Lake – Fulton River, and Babine River counting fence. The Moricetown Canyon ESSR fishery was pink salmon directed and reported a final catch of 496 pink salmon. The Babine Lake – Fulton River ESSR was sockeye salmon directed and reported a final catch of 479,763 sockeye salmon. Finally, the Babine River counting fence ESSR was jack sockeye salmon directed and reported a final catch of 10,632 jack sockeye salmon.

The Skeena River TRTC is estimated throughout the season using escapement estimates from Tyee, marine catch in Area 3/4/5, and reconstructed (historic) run-timing proportions for Skeena River sockeye salmon as they enter Area 3/4/5, but forward-lagged to Tyee for calculation purposes. Two versions of the TRTC

estimate are provided in-season: a simple p50 estimate based on several “average” run-timing scenarios with no consideration of escapement estimate variability, and a stochastic p50 version incorporating run-timing and escapement variability. Post-season analysis indicated that the 50% peak entry date of Skeena River sockeye salmon into the outer portion of the Skeena sockeye fishing area was July 30, which is 5 days later than the average date of July 22/23. The later run-timing for Skeena River sockeye salmon in 2022 is consistent with the observed trend of later return timing over the last decade.

The preliminary post-season sockeye salmon escapement estimate to the Skeena River is 2,528,148 fish, which exceeds the escapement target of 900,000. The preliminary total run estimate is 4,358,330 fish. Escapement to the Pinkut spawning channels and creek were exceeded with an abundance of 88,519 effective spawners out of a total capacity of 88,000. The target of 29,000 female sockeye salmon in Pinkut channel was met, however the female loading target of 10,000 was not achieved in Pinkut creek, with only 8,500 of the target met. The total combined female sockeye salmon loading in the Pinkut spawning channels was 37,875. Egg targets were not met in Pinkut channel (73 million eggs) or Pinkut creek (25 million eggs). The combined escapement to Fulton River spawning channels #1 and #2 and the Fulton River above the fence was 374,000 effective spawners, out of a total capacity of 381,000. The female loading targets of 58,000 and 110,000 in spawning channel #2 and spawning channel #1/Fulton River, respectively, were achieved. At the Fulton River facility, the 270 million egg deposition target for spawning channel #1/Fulton River was not achieved. However, the 145 million egg deposition target for channel #2 was achieved. The majority of wild Skeena River sockeye salmon escapements were below average, accounting for only 10% of the aggregate escapement. The remaining 90% was composed of enhanced Pinkut and Fulton sockeye salmon.

## **Area 5**

Area 5 July openings are traditionally managed in conjunction with Area 4 to target Skeena Sockeye and harvest opportunities may occur until mid- August when local Pink stocks become abundant. In 2022, there were no commercial net fisheries in Area 5 (Tables 25-27).

### ***Fishing Effort (Seine and Gillnet)***

In Area 1, there were no commercial gillnet or seine openings (Table 28). As such, the total commercial gillnet effort was 0 boat days, which was below the 2000-2009 average effort of 3 boat days, and the same as the 2010-2019 decadal average effort of 0 boat days. The total Area 1 seine effort of 0 boat days was also below the 2000-2009 average of 1 boat day, and the 2010-2019 decadal average of 2 boat days.

In Area 3, there were no commercial gillnet openings, which was below the 2000-2009 average of 13 openings and the 2010-2019 decadal average of 9 openings. There were 4 seine openings, which was below the 2000-2009 and 2010-2019 averages of 12 and 8 openings, respectively (Table 28). The total commercial gillnet effort was 0 boat days, which was well below the 2000-2009 average effort of 2,522 boat days, and the 2010-2019 decadal average effort of 1,013 boat days. The total Area 3 seine effort of 32 boat days was also well below the 2000-2009 average of 369 boat days, and the 2010-2019 decadal average of 145 boat days.

In Area 4, there were commercial gillnet and seine openings in 2022. Throughout the 16 openings, commercial gillnet effort was 1,785 boat days. Gillnet boat days were lower than the 2000-2009 average of 2,892 but higher than the 2010-2019 average of 634 boat days. The total number of gillnet openings in 2022 exceed the 2000-2009 and 2010-2019 decadal averages of 10 and 5 openings, respectively. Over the course of 15 days, the seine fleet fished for a total effort of 156 boat days. The seine fleet effort was below the 2000-2009 average effort of 257 boat days but exceed the previous decadal average (2010-

2019) effort of 41 boat days. The number of seine openings in 2022 exceeded both the 2000-2009 and 2010-2019 averages of 10 and 4 openings, respectively (Table 28).

Finally, in Area 5, there were no commercial gillnet or seine openings, so effort was 0 boats days. The gillnet effort was lower than the average boat days and openings from 2000-2009 and 2010-2019, which were 50 boat days over 6 openings and 5 boat days over 2 openings, respectively. Similarly, the 2022 seine effort was below the previous 2 decadal averages of 36 boat days over 9 openings and 1 boat day over 1 opening, respectively (Table 28).

### ***Salmon Escapements***

The 2022 cumulative preliminary escapements for Canadian Areas 3 to 5 are 2,992,342 sockeye salmon; 65,164 coho salmon; 1,712,479 pink salmon; 78,157 chum salmon; and 30,105 Chinook salmon (Table 29).

In Area 1, sockeye salmon escapements were 24,600, which exceeded the previous two decadal average escapements (Table 30). While improved escapements were observed in 2022, escapement targets were not met in all three of the streams with defined management targets. Pink salmon escapements in Area 1 also exceeded the previous two decadal averages, with escapement targets being met in 2 of 3 streams in the Masset watershed.

In Area 3, all salmon species met or exceeded escapement goals. Sockeye salmon, pink salmon, and chum salmon escapements exceeded the previous two decadal averages (Table 31). However, coho salmon and Chinook salmon escapements remain lower than the previous decadal average in the Nass watershed.

In Area 4, a strong escapement of sockeye salmon and pink salmon were observed in 2022. Coho salmon and chum salmon remain below the previous decadal average but escapements appear to be improving escapements. Chinook salmon escapement remains low, with escapements below historical averages (Table 32).

In Area 5, sockeye salmon escapements were above average compared to the previous two decades. Pink salmon escapements were very low, and coho salmon and Chinook salmon escapements are unknown (Table 33).

## **Management Performance Relative to Treaty Requirements**

### **Areas 3 (1-4) Pink Net Catch (Preliminary)**

For 2022, Canada was to manage the Area 3-1 to 3-4 net fisheries to achieve an annual catch share of 2.49% of the AAH of Alaskan Districts 101, 102, and 103 pink salmon. With a total return of approximately 24.64 million pink salmon, the Alaskan Districts 101, 102, and 103 AAH was approximately 13.89 million pinks. The resulting Area 3-1 to 3-4 Canadian commercial net total allowable catch of this AAH was approximately 345,000 Alaskan Districts 101, 102, and 103 origin pink salmon (Table 34).

In the Canadian northern boundary area, pink salmon returns were anticipated to be average for Area 3 and below average for Area 4, based on brood year return strength. Escapement to Areas 3 and 4 were above the last decadal average (Table 31-32). In 2022, preliminary Canadian pink salmon catch in was 89,947 fish, and the Alaskan stock component of this catch is estimated to be 57,733 fish, or 0.42 % of the AAH.

This result is below the annex agreement of 2.49% (Table 34).

### **Area 1 Pink Troll Fishery (Preliminary)**

For 2022, Canada was to manage the Area 1 troll fishery to achieve an annual catch share of 2.57% of the AAH of Alaskan Districts 101, 102, and 103 pink salmon. With a total return of 24.64 million pink salmon, the resulting Area 1 Canadian commercial troll total allowable catch of this AAH was approximately 13.89 million Alaskan Districts 101, 102 and 103 origin pink salmon (Table 35).

The Canadian commercial troll fishery, targeting pink salmon, was open in the northern portion of Area 1 (Dixon Entrance A-B Line) from July 1 to September 30. The pattern of total Area 1 weekly pink salmon troll catch, in 2022, is illustrated in Table 14. Pink retention was also permitted during the Chinook salmon-directed fishery in parts of Area 1, which was open from August 10 to September 30. Effort directed at pink salmon in Area 1 was minimal in 2022, with pink salmon being harvested as by-catch in fisheries directed at Chinook salmon. The fishery harvested a total of 87,168 pink salmon, with an estimated 67,837 fish being of Alaskan origin. This equates to 0.49% of the Alaskan District 101, 102, and 103 pink salmon AAH, well below the annex agreement of 2.57% (Table 35).

## **2023 Salmon Forecast**

Expectations and fishing plans for 2023 are still preliminary. Specific opening dates and fishing patterns are determined through domestic consultations and since this process has not yet been completed it is too early to provide further details.

### **Area 1 Expectations**

- Sockeye** There are no significant local sockeye salmon stocks in Area 1 and no directed commercial fisheries on passing stocks.
- Pink** Haida Gwaii pink salmon are expected to be below average, based on the trend of low brood year escapements, and that Alaskan forecasts, based on juvenile pink abundance indices, are forecasting for weak returns.
- Chum** Poor productivity has been observed over the past decade. East Haida Gwaii, West Haida Gwaii, and North Haida Gwaii Conservation Units are expected to continue to be well below average. Fisheries will only occur on terminal surpluses, if identified in-season.

### **Area 3 Expectations**

- Sockeye** Based on a sibling-regression model, Nass River sockeye salmon returns are forecasted to below the 1994 – 2022 average of 616,000 TRTC, ranging from 257,000 (75% probability) to 522,000 (25% probability), with a point estimate of 366,000 (50% probability). Nass sockeye returns will be carefully monitored to account increasing uncertainty and recent trends towards lower survival. Fishery opportunities will be determined in-season.
- Pink** Pink salmon returns to the Nass watershed have been dominant in odd-years since the 1980s. TRTC estimates range from 174,000 (75% probability) to 586,000 (25% probability), with a



point estimate of 318,000 (50% probability). The 2023 TRTC estimate is below the long-term average (1994-2022) of 324,000. Fisheries will be determined based on in-season estimates of abundance.

***Chum*** Recent improvements in the aggregate return of chum salmon since 2020 are encouraging, but the stocks in Area 3 remain below target escapement levels. Nonetheless, fishing opportunities will be constrained to reduce impacts to wild chum salmon returning to Area 3 streams.

#### **Area 4 Expectations**

***Sockeye*** Based on the sibling model, the total Skeena River sockeye salmon return is expected to be abundant with a pre-season return forecast ranging from 1.5 million (90% probability) to 6.80 million (10% probability) and a point estimate of 3.19 million (50% probability). Fishing opportunities will be determined based on in-season estimates of abundance.

***Pink*** A below average pink salmon return is expected in 2023. Fisheries will be determined based on in-season estimates of abundance.

***Chum*** Skeena River chum salmon escapements are depressed and there will be no chum salmon retention in Area 4.

#### **Area 5 Expectations**

***Sockeye*** Commercial fisheries targeting sockeye salmon will depend on Skeena River returns.

***Pink*** Commercial fisheries targeting pink salmon in Area 5 will be determined in season and be dependent on fishing opportunities in Area 4.

***Chum*** Local chum salmon stocks are depressed, and no surplus is anticipated.

## TABLES

Table 1.—Weekly commercial catch and fishing effort by opening in the 2022 Alaska District 101 purse seine fishery.

Week	Openings	Closures	Effort			Catch					Total
			Boats	Hours	Boat Hours	Chinook	Sockeye	Coho	Pink	Chum	
28	July 3, 2022	July 3, 2022	21	15	315	0	695	162	15,542	6,216	22,615
28B	July 7, 2022	July 7, 2022	22	15	330	0	610	117	34,094	3,011	37,832
29	July 10, 2022	July 10, 2022	24	15	360	0	511	125	24,024	3,427	28,087
29B	July 14, 2022	July 14, 2022	42	15	630	0	4,327	786	110,582	10,499	126,194
30	July 17, 2022	July 17, 2022	23	15	345	0	2,753	459	67,899	8,201	79,312
30B	July 21, 2022	July 21, 2022	23	15	345	0	3,407	808	81,822	12,268	98,305
31	July 24, 2022	July 24, 2022	14	15	210	0	1,341	416	120,033	8,340	130,130
31B	July 28, 2022	July 28, 2022	40	15	600	0	3,079	1,014	332,774	22,879	359,746
32	July 31, 2022	August 1, 2022	46	39	1,794	0	4,335	1,960	861,892	37,995	906,182
32B	August 4, 2022	August 5, 2022	41	39	1,599	7	11,465	2,049	756,934	23,476	793,931
33	August 8, 2022	August 9, 2022	62	39	2,418	0	4,351	3,256	1,239,236	24,286	1,271,129
33B	August 12, 2022	August 13, 2022	61	39	2,379	50	3,066	3,024	804,299	12,476	822,915
34	August 16, 2022	August 17, 2022	50	39	1,950	26	7,123	6,048	812,615	14,131	839,943
34B	August 20, 2022	August 21, 2022	41	39	1,599	19	1,675	3,046	364,653	8,505	377,898
35	August 24, 2022	August 25, 2022	22	39	858	3	660	2,610	150,098	5,773	159,144
Season Total			51	393	15,732	105	49,398	25,880	5,776,497	201,483	6,053,363

Table 2.—Weekly commercial catch and fishing effort by opening in the 2022 Alaska District 102 purse seine fishery.

Week	Openings	Closures	Effort			Catch					Total
			Boats	Hours	Boat Hours	Chinook	Sockeye	Coho	Pink	Chum	
28	July 3, 2022	July 3, 2022	19	15	285	-	525	237	4,921	36,100	41,783
28B	July 7, 2022	July 7, 2022	47	15	705	-	1,065	401	9,141	71,847	82,454
29	July 10, 2022	July 10, 2022	12	15	180	-	43	27	36	9,719	9,825
29B	July 14, 2022	July 14, 2022	6	15	90	-	334	101	615	42,460	43,510
30	July 17, 2022	July 17, 2022	45	15	675	-	2,807	913	91,799	116,793	212,312
30B	July 21, 2022	July 21, 2022	50	15	750	-	3,636	2,024	110,782	151,856	268,298
31	July 24, 2022	July 24, 2022	41	15	615	-	2,470	2,144	196,158	134,987	335,759
31B	July 28, 2022	July 28, 2022	16	15	240	-	1,394	806	75,347	24,565	102,112
32	July 31, 2022	August 1, 2022	25	39	975	-	5,091	2,245	474,520	63,651	545,507
32B	August 4, 2022	August 5, 2022	30	39	1,170	-	9,850	2,506	416,464	50,190	479,010
33	August 8, 2022	August 9, 2022	26	39	1,014	6	8,681	1,997	194,243	19,025	223,952
33B	August 12, 2022	August 13, 2022	20	39	780	49	4,090	1,806	166,530	20,346	192,821
34	August 16, 2022	August 17, 2022	10	39	390	2	1,649	1,682	87,949	19,336	110,618
34B	August 20, 2022	August 20, 2022	5	15	75	5	427	384	24,515	3,533	28,864
35	August 24, 2022	August 25, 2022	14	39	546	5	547	1,886	44,084	6,071	52,593
37	September 9, 2022	September 9, 2022	10	12	120	13	68	671	984	4,852	6,588
38	September 15, 2022	September 15, 2022	7	12	84	-	4	278	110	4,627	5,019
Season Total			106	330	8,694	80	42,681	20,108	1,898,198	779,958	2,741,025

Table 3.—Weekly commercial catch and fishing effort by opening in the 2022 Alaska District 103 purse seine fishery.

Week	Openings	Closures	Effort			Catch					Total
			Boats	Hours	Boat Hours	Chinook	Sockeye	Coho	Pink	Chum	
29B	July 14, 2022	July 14, 2022	13	15	195	-	261	96	684	28,957	29,998
30	July 17, 2022	July 17, 2022	14	15	210	-	1,038	487	5,560	33,310	40,395
30B	July 21, 2022	July 21, 2022	13	15	195	-	1,657	1,165	20,097	49,916	72,835
31	July 24, 2022	July 24, 2022	12	15	180	16	929	893	12,935	33,439	48,212
31B	July 28, 2022	July 28, 2022	9	15	135	46	1,249	865	22,300	19,671	44,131
32	July 31, 2022	August 1, 2022	18	39	702	247	5,158	6,023	134,295	52,347	198,070
32B	August 4, 2022	August 5, 2022	33	39	1,287	338	5,964	7,314	348,702	44,974	407,292
33	August 8, 2022	August 9, 2022	30	39	1,170	5	4,973	5,079	278,798	19,046	307,901
33B	August 12, 2022	August 12, 2022	13	15	195	119	1,593	1,708	79,350	5,964	88,734
34	August 16, 2022	August 16, 2022	3	15	45	4	294	313	42,065	712	43,388
34B	August 20, 2022	August 21, 2022	34	39	1,326	38	2,000	5,752	316,243	19,726	343,759
35	August 24, 2022	August 25, 2022	12	39	468	4	207	1,685	52,366	3,118	57,380
Season Total			73	300	6,108	817	25,323	31,380	1,313,395	311,180	1,682,095

Table 4.–Weekly commercial catch and fishing effort by opening in the 2022 Alaska District 104 purse seine fishery.

Week	Openings	Closures	Effort			Catch					
			Boats	Hours	Boat Hours	Chinook	Sockeye	Coho	Pink	Chum	Total
28	July 3, 2022	July 3, 2022	4	8	32	-	716	182	734	2,154	3,786
29	July 10, 2022	July 10, 2022	18	12	216	-	1,765	299	3,462	11,217	16,743
29B	July 14, 2022	July 14, 2022	19	15	285	-	13,732	2,975	31,749	27,474	75,930
30	July 17, 2022	July 17, 2022	23	15	345	-	6,116	1,674	32,831	20,165	60,786
30B	July 21, 2022	July 21, 2022	15	15	225	20	26,696	3,086	226,673	30,535	287,010
31	July 24, 2022	July 24, 2022	21	15	315	444	20,307	3,527	148,599	33,097	205,974
31B	July 28, 2022	July 28, 2022	35	15	525	778	28,207	4,831	167,884	30,411	232,111
32	July 31, 2022	August 1, 2022	33	39	1,287	1,906	110,481	7,134	408,985	45,731	574,237
32B	August 4, 2022	August 5, 2022	51	39	1,989	6,767	110,178	13,964	682,543	70,673	884,125
33	August 8, 2022	August 9, 2022	50	39	1,950	9	69,434	9,344	339,864	33,633	452,284
33B	August 12, 2022	August 13, 2022	45	39	1,755	1,598	16,009	5,656	227,105	17,017	267,385
34	August 20, 2022	August 21, 2022	22	39	858	701	27,371	5,382	161,040	8,661	203,155
35	August 24, 2022	August 25, 2022	25	39	975	758	45,373	6,327	94,212	7,282	153,952
Season Total			72	329	10,757	12,981	476,385	64,381	2,525,681	338,050	3,417,478

Table 5.–Weekly commercial catch and fishing effort by opening in the 2022 Alaska District 101 drift gillnet fishery.

Week	Openings	Closures	Effort			Catch					
			Boats	Hours	Boat Hours	Chinook	Sockeye	Coho	Pink	Chum	Total
26	June 19, 2022	June 23, 2022	22	96	2,112	360	2,688	32	158	1,661	4,899
27	June 26, 2022	June 30, 2022	33	96	3,167	528	3,356	122	2,891	10,010	16,907
28	July 3, 2022	July 7, 2022	39	96	3,743	446	4,720	139	11,152	39,360	55,817
29	July 10, 2022	July 14, 2022	40	96	3,839	153	5,711	356	29,268	59,902	95,390
30	July 17, 2022	July 21, 2022	44	96	4,223	142	4,645	559	51,185	63,836	120,367
31	July 24, 2022	July 28, 2022	48	96	4,607	188	1,742	1,467	74,834	46,150	124,381
32	July 31, 2022	August 5, 2022	40	120	4,799	40	1,174	1,484	107,492	33,620	143,810
33	August 7, 2022	August 12, 2022	35	120	4,199	12	1,057	1,280	47,239	24,616	74,204
34	August 14, 2022	August 19, 2022	28	120	3,360	4	758	2,598	29,673	15,162	48,195
35	August 21, 2022	August 26, 2022	30	120	3,599	2	468	2,394	21,392	11,452	35,708
36	August 28, 2022	September 1, 2022	26	96	2,496	1	127	2,735	5,378	9,531	17,772
37	September 4, 2022	September 8, 2022	27	96	2,592	2	71	4,001	976	9,796	14,846
38	September 11, 2022	September 15, 2022	28	96	2,688		27	3,686	65	4,322	8,100
39/40	September 18, 2022	September 22, 2022	17	96	1,824	3	9	6,579	3	2,710	9,304
40*	September 25, 2022	September 29, 2022		96							
Season Total			51	1,536	47,248	1,881	26,553	27,432	381,128	332,128	769,700

\*Week 40 is confidential due to less than 3 vessels. Harvest has been combined with Week 39.

Table 6.–Weekly commercial catch and fishing effort by opening in the 2022 Alaska District 106 drift gillnet fishery.

Week	Openings	Closures	Effort			Catch					
			Boats	Hours	Boat Hours	Chinook	Sockeye	Coho	Pink	Chum	Total
26	June 19, 2022	June 21, 2022	22	48	1,056	59	2,067	50	21	3,244	5,441
27	June 26, 2022	June 29, 2022	43	48	2,064	159	8,792	381	575	8,889	18,796
28	July 3, 2022	July 6, 2022	52	48	2,495	263	8,441	1,230	1,438	14,938	26,310
29	July 10, 2022	July 12, 2022	45	48	2,159	61	4,517	792	2,215	17,181	24,766
30	July 17, 2022	July 19, 2022	46	48	2,207	27	3,108	638	7,682	26,643	38,098
31	July 24, 2022	July 26, 2022	57	48	2,735	52	4,985	924	18,315	40,038	64,314
32	July 31, 2022	August 2, 2022	65	72	4,680	74	5,807	1,364	21,962	24,020	53,227
33	August 7, 2022	August 10, 2022	65	96	6,240	26	5,463	4,175	21,426	19,878	50,968
34	August 14, 2022	August 17, 2022	37	120	4,440	6	1,416	3,620	5,632	4,707	15,381
35	August 21, 2022	August 24, 2022	41	96	3,936	6	440	4,278	4,574	2,340	11,638
36	August 28, 2022	August 31, 2022	42	72	3,023	1	267	5,658	2,126	3,087	11,139
37	September 4, 2022	September 7, 2022	48	72	3,455	14	121	5,738	470	3,646	9,989
38	September 11, 2022	September 14, 2022	38	72	2,735	12	8	7,493	11	2,314	9,838
39	September 18, 2022	September 21, 2022	33	48	1,583	40	5	13,313	1	1,906	15,265
40	September 25, 2022	September 29, 2022	8	48	384	0		1,247		217	1,464
Season Total			118	984	43,194	800	45,437	50,901	86,448	173,048	356,634



Table 7.–Weekly commercial catch and fishing effort by opening in the 2022 Annette Island Reserve purse seine fishery.

Week	Openings	Closures	Effort		Catch					
			Boats <sup>1</sup>	Hours	Chinook	Sockeye	Coho	Pink	Chum	Total
27	June 26, 2022	June 26, 2022	1	15	83	32	8	188	192	503
28	July 4, 2022	July 4, 2022	1	15	94	104	26	14,52	1065	2,741
28B	July 8, 2022	July 8, 2022	1	15	115	298	170	23,581	2543	26,707
29	July 10, 2022	July 10, 2022	1	15	31	109	1,187	18,870	1190	21,387
29B	July 13, 2022	July 13, 2022	1	15	19	1,139	130	44,347	2981	48,616
29C	July 15, 2022	July 15, 2022	1	15	12	1,801	217	40,914	4244	47,188
30	July 18, 2022	July 18, 2022	1	15	10	948	152	52,660	4893	58,663
30B	July 20, 2022	July 20, 2022	1	15	10	607	115	56,549	3467	60,748
31	July 24, 2022	July 24, 2022	1	15	3	255	225	103,122	2255	105,860
31B	July 27, 2022	July 27, 2022	1	15	9	274	230	109,800	2352	112,665
31C	July 29, 2022	July 29, 2022	1	15		179	122	99,194	2861	102,356
32	August 1, 2022	August 2, 2022	1	39		346	286	174,666	3740	179,038
32B	August 4, 2022	August 5, 2022	1	39	4	537	433	208,872	3921	213,767
33	August 7, 2022	August 8, 2022	1	39	1	413	470	308,472	4346	313,702
33B	August 11, 2022	August 12, 2022	1	39	3	154	328	170,181	2663	173,329
34	August 15, 2022	August 16, 2022	1	39		476	741	177,536	2375	181,128
34B	August 18, 2022	August 19, 2022	1	39		209	234	65,728	686	66,857
35	August 21, 2022	August 21, 2022	1	15		1,711	251	32,457	327	34,746
35B	August 23, 2022	August 24, 2022	1	39		39	167	20,309	126	20,641
37	September 6, 2022	September 6, 2022	1	15		3	35	78	19	135
37B	September 9, 2022	September 9, 2022	1	15		17	224	93	33	367
39	September 18, 2022	September 18, 2022	1	15						
Season Total				498	394	9,651	5,751	1,709,069	46,279	1,771,144

<sup>1</sup>All landing under Annette Island fisheries are placed under one Commercial Fisheries Entry Commission license, therefore it is shown as one boat. Information is based solely on data given to the department by Annette Island salmon processors and is not confirmed by ADF&G managers as complete.

Table 8.—Weekly commercial catch and fishing effort by opening in the 2022 Annette Island Reserve gillnet fishery.

Week	Openings	Closures	Effort		Catch					
			Boats <sup>1</sup>	Hours	Chinook	Sockeye	Coho	Pink	Chum	Total
25	June 12, 2022	June 15, 2022	1	72	29	7		3	144	183
26	June 19, 2022	June 22, 2022	1	72	201	874	18	257	1,935	3,285
27	June 26, 2022	June 29, 2022	1	72	326	375	26	2,124	2,830	5,681
28	July 3, 2022	July 7, 2022	1	96	330	585	64	14,814	7,248	23,041
29	July 10, 2022	July 15, 2022	1	120	144	779	78	26,951	16,293	44,245
30	July 17, 2022	July 21, 2022	1	96	51	762	102	36,845	15,105	52,865
31	July 24, 2022	July 29, 2022	1	120	30	327	159	52,753	11,982	65,251
32	July 31, 2022	August 5, 2022	1	120	22	435	123	73,271	8,206	82,057
33	August 7, 2022	August 12, 2022	1	120	3	109	122	23,086	2,724	26,044
34	August 14, 2022	August 19, 2022	1	120	1	102	197	29,445	2,032	31,777
35	August 21, 2022	August 26, 2022	1	120		47	173	14,954	534	15,708
36	August 28, 2022	September 1, 2022	1	96		4	867	5,184	1,753	7,808
37	September 4, 2022	September 8, 2022	1	96		22	1,878	2,466	1,239	5,605
38	September 11, 2022	September 14, 2022	1	72			641	38	185	864
39	September 18, 2022	September 21, 2022	1	72		1	1,452		326	1,779
40	September 25, 2022	September 29, 2022	1	96	0	0	0	0	0	0
Season Total				1,560	1,137	4,429	5,900	282,191	72,536	366,193

<sup>1</sup>All landing under Annette Island fisheries are placed under one Commercial Fisheries Entry Commission license, therefore it is shown as one boat. Information is based solely on data given to the department by Annette Island salmon processors and is not confirmed by ADF&G managers as complete.

Table 9.—Southern Southeast Alaska pink salmon escapement indices by stock group and district for 2022 (in millions).

Stock group	District	Pink salmon index 2022	Management target lower	upper	Met minimum escapement	Recent 10-year average
E Behm	101	1.52	0.67	1.77		1.85
Portland	101	0.36	0.1	0.28	+	0.49
W Behm	101	0.48	0.25	0.66		0.12
Kasaan	102	0.46	0.24	0.64		0.86
Moirá	102	0.08	0.05	0.13		0.16
E Dall	103	0.21	0.13	0.36		0.27
Hetta	103	0.58	0.30	0.79		0.80
Klawock	103	0.68	0.42	1.11		0.88
Sea Otter Sound	103	0.11	0.10	0.28		0.18
Affleck Canal	105	0.23	0.14	0.38		0.24
Shiple Bay	105	0.17	0.11	0.28		0.17
Burnett	106	0.12	0.05	0.14		0.10
Ratz Harbor	106	0.05	0.04	0.12		0.11
Totem Bay	106	0.10	0.05	0.13		0.07
Whale Pass	106	0.12	0.07	0.18		0.12
Anan	107	0.39	0.21	0.57		0.33
Union Bay	107	0.09	0.05	0.12		0.10
Stikine	108	0.03	0.02	0.06		0.05
District Total	101	2.36	1.02	2.71		2.94
District Total	102	0.54	0.29	0.77		1.02
District Total	103	1.58	0.95	2.54		2.14
District Total	105	0.40	0.25	0.66		0.41
District Total	106	0.39	0.21	0.57		0.39
District Total	107	0.48	0.26	0.69		0.43
District Total	108	0.03	0.02	0.06		0.05
Southern Southeast Alaska Total		5.80	3.00	8.00		7.38

Table 10.–Preliminary annual allowable harvest (AAH) calculations for the Alaska District 104 week 27-30 purse seine fishery, 1999-2022.

Year	Nass/Skeena Total Return	Nass/Skeena Escapement	Allowable Nass/ Skeena AAH	Allowable Dist. 104 Nass/Skeena Harvest (2.45%)	Total Pre-Week 31 Sockeye Harvest	Actual Nass/Skeena Harvest	Overage/ Underage Per Year	Cumulative: +overage / (-underage)
1999	1,771,048	936,705	834,343	20,441	7,664	3,232	-17,209	-17,209
2000	5,318,228	1,100,000	4,218,228	103,347	48,969	29,221	-74,126	-91,335
2001	4,965,291	1,100,000	3,865,291	94,700	203,090	167,854	73,154	-18,181
2002	2,776,502	1,051,333	1,725,169	42,267	26,554	18,627	-23,640	-41,820
2003	3,306,520	1,100,000	2,206,520	54,060	84,742	44,258	-9,802	-51,622
2004	2,621,000	1,100,000	1,521,000	37,265	30,758	19,233	-18,032	-69,653
2005	1,770,474	1,000,144	770,330	18,873	35,690	19,442	569	-69,085
2006	3,650,525	1,100,000	2,550,525	62,488	89,615	68,940	6,452	-62,632
2007	2,752,074	1,100,000	1,652,074	40,476	112,135	75,615	35,139	-27,493
2008	2,531,701	1,100,000	1,431,701	35,077	6,262	4,880	-30,197	-57,690
2009	1,602,959	1,053,858	549,101	13,453	15,971	10,128	-3,325	-61,015
2010	1,395,616	956,954	438,662	10,747	4,617	1,091	-9,656	-70,671
2011	2,487,985	1,100,000	1,387,985	34,006	25,280	16,599	-17,407	-88,078
2012	2,737,173	1,100,000	1,637,173	40,111	18,300	9,598	-30,513	-118,590
2013	981,476	642,461	339,015	8,306	13,102	4,228	-4,078	-122,668
2014	3,824,535	1,100,000	2,724,535	66,751	114,375	74,005	7,254	-115,414
2015	3,015,042	1,100,000	1,915,042	46,919	43,873	21,433	-25,486	-140,900
2016	2,140,259	1,100,000	1,040,259	25,486	110,346	65,039	39,553	-101,347
2017	1,422,783	1,100,000	322,783	7,908	12,036	6,916	-993	-102,340
2018	2,086,458	1,100,000	986,458	24,168	19,743	9,999	-14,169	-116,510
2019	1,208,155	862,549	337,606	8,271	9,399	4,450	-3,821	-120,331
2020	1,983,411	1,100,000	883,411	21,644	6,923	5,300	-16,344	-136,675
2021 <sup>a</sup>	2,229,497	1,100,000	1,129,497	27,673	49,304	32,312	4,639	-132,035
2022 <sup>a</sup>	5,185,000	1,100,000	4,085,000	94,599	49,025	34,658	-59,941	-191,976

<sup>a</sup> Preliminary information pending completion of run reconstruction analyses.

Table 11.—Preliminary annual allowable harvest (AAH) calculations for the Alaska District 101 gillnet fishery, 1999-2022.

Year	Nass River Total Return	Nass River Escapement	Allowable Nass River AAH	Allowable Alaska Harvest (13.8%)	Total District 101 Gillnet Seasonal Sockeye Harvest	Actual Nass River Alaska Harvest	Overage/ Underage Per Year	Cumulative: +overage / (-underage)
1999	842,806	200,000	642,806	88,707	160,028	129,794	41,087	41,087
2000	625,983	200,000	425,983	58,786	94,651	46,305	-12,481	28,606
2001	580,616	167,258	413,358	57,043	80,041	55,096	-1,947	26,659
2002	1,403,976	200,000	1,203,976	166,149	120,353	90,553	-75,596	-48,937
2003	1,177,472	200,000	977,472	134,891	105,263	72,942	-61,949	-110,886
2004	986,098	200,000	786,098	108,482	142,357	110,340	1,858	-109,028
2005	666,880	200,000	466,880	64,429	79,725	55,319	-9,110	-118,138
2006	775,110	200,000	575,110	79,365	62,770	47,948	-31,417	-149,555
2007	602,208	164,745	437,463	60,370	66,822	46,369	-14,001	-163,556
2008	380,397	200,000	180,397	24,895	34,113	24,359	-536	-164,092
2009	575,336	200,000	375,336	51,796	69,859	55,270	3,474	-160,618
2010	438,941	200,000	238,941	32,974	62,680	26,613	-6,361	-166,979
2011	556,710	200,000	356,710	49,226	88,618	55,122	5,896	-161,083
2012	476,818	200,000	276,818	38,201	62,342	38,983	782	-160,301
2013	501,428	200,000	301,428	41,597	54,578	35,471	-6,126	-166,427
2014	549,685	200,000	349,685	48,257	55,828	29,022	-19,235	-185,662
2015	868,749	200,000	668,749	92,287	28,155	14,867	-77,420	-263,081
2016	438,311	200,000	238,311	32,887	39,912	14,388	-18,499	-281,580
2017	362,540	200,000	162,540	22,431	25,073	12,444	-9,987	-292,134
2018	315,972	200,000	115,972	16,004	19,920	11,303	-4,701	-297,677
2019	377,745	200,000	177,745	24,529	15,996	11,269	-13,260	-310,937
2020	295,194	200,000	95,194	13,137	9,342	7,528	-5,609	-316,545
2021 <sup>a</sup>	502,538	200,000	302,538	41,750	21,577	14,677	-27,073	-343,619
2022 <sup>a</sup>	585,000	200,000	385,000	53,130	26,553	18,056	-35,074	-378,693

<sup>a</sup> Preliminary information pending completion of run reconstruction analyses.

Table 12.—Weekly commercial catch and fishing effort in the 2022 Canadian Area 1 gillnet fishery.

<b>Julian Week</b>	<b>Stat Week</b>	<b>Ending Date</b>	<b>Sockeye</b>	<b>Coho</b>	<b>Pink</b>	<b>Chum</b>	<b>Chinook</b>	<b>Total</b>	<b>Boat Days*</b>	<b>Hours Open</b>	<b>Days Fishing**</b>
<b>FISHERY DID NOT OPEN</b>			-	-	-	-	-	-	-	-	-
<b>Total</b>			-	-	-	-	-	-	-	-	-

2022 catch figures are based on Phone-in (FOS) estimates

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 13.—Weekly commercial catch and fishing effort in the 2022 Canadian Area 1 seine fishery.

<b>Julian Week</b>	<b>Stat Week</b>	<b>Ending Date</b>	<b>Sockeye</b>	<b>Coho</b>	<b>Pink</b>	<b>Chum</b>	<b>Chinook</b>	<b>Total</b>	<b>Boat Days*</b>	<b>Hours Open</b>	<b>Days Fishing**</b>
<b>FISHERY DID NOT OPEN</b>			-	-	-	-	-	-	-	-	-
<b>Total</b>			-	-	-	-	-	-	-	-	-

2022 catch figures are based on Phone-in (FOS) estimates

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 14.—Weekly commercial catch and fishing effort in the 2022 Canadian Area 1/101 troll fishery (preliminary).

Julian Week	Stat Week	Ending Date	Sockeye	Coho	Pink	Chum	Chinook***	Total	Boat Days*	Hours Open	Days Fishing**
27	71	Jul. 2	0	583	937	Closed	Closed	1,520	9	48	2
28	72	Jul. 9	90	3,841	9,507	Closed	Closed	13,438	56	168	7
29	73	Jul. 16	55	6,789	11,895	Closed	Closed	18,739	61	168	7
30	74	Jul. 23	69	10,494	17,077	Closed	Closed	27,640	106	168	7
31	75	Jul. 30	79	9,094	15,149	Closed	Closed	24,322	97	168	7
32	81	Aug. 6	26	4,764	15,411	Closed	Closed	20,201	92	168	7
33	82	Aug. 13	0	19,438	6,460	Closed	15,181	41,079	298	168	7
34	83	Aug. 20	0	19,101	5,678	Closed	11,910	36,689	490	168	7
35	84	Aug. 27	0	11,638	3,677	Closed	9,770	25,085	387	168	7
36	91	Sep. 3	0	8,293	941	Closed	3,276	12,510	215	168	7
37	92	Sep. 10	0	2,996	44	Closed	848	3,888	76	168	7
38	93	Sep. 17	0	2,089	409	Closed	1,201	3,699	50	168	7
39	94	Sep. 24	0	432	0	Closed	725	1,157	22	168	7
40	101	Oct. 1	0	293	0	Closed	255	548	16	144	6
<b>Total</b>			<b>319</b>	<b>99,845</b>	<b>87,185</b>	<b>0</b>	<b>43,166</b>	<b>230,515</b>	<b>1,975</b>	<b>2,208</b>	<b>92</b>

2022 catch figures are based on Phone-in (FOS) estimates.

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

\*\*\*Chinook Area hail catch pro-rated with validated Chinook landings.



Table 15.—Weekly commercial catch and fishing effort in the 2022 Canadian Area 3 Entrance (sub-areas 1 to 4) gillnet fishery.

<b>Julian Week</b>	<b>Stat Week</b>	<b>Ending Date</b>	<b>Sockeye</b>	<b>Coho</b>	<b>Pink</b>	<b>Chum</b>	<b>Chinook</b>	<b>Total</b>	<b>Boat Days*</b>	<b>Hours Open</b>	<b>Days Fishing**</b>
<b>FISHERY DID NOT OPEN</b>			-	-	-	-	-	-	-	-	-
<b>Total</b>			-	-	-	-	-	-	-	-	-

2022 catch figures are based on Phone-in (FOS) estimates

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 16.—Weekly commercial catch and fishing effort in the 2022 Canadian Area 3 Inside (sub-areas 7 to 17) gillnet fishery.

<b>Julian Week</b>	<b>Stat Week</b>	<b>Ending Date</b>	<b>Sockeye</b>	<b>Coho</b>	<b>Pink</b>	<b>Chum</b>	<b>Chinook</b>	<b>Total</b>	<b>Boat Days*</b>	<b>Hours Open</b>	<b>Days Fishing**</b>
<b>FISHERY DID NOT OPEN</b>			-	-	-	-	-	-	-	-	-
<b>Total</b>			-	-	-	-	-	-	-	-	-

2022 catch figures are based on Phone-in (FOS) estimates

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 17.—Weekly commercial catch and fishing effort in the 2022 Canadian total Area 3 gillnet fishery.

<b>Julian Week</b>	<b>Stat Week</b>	<b>Ending Date</b>	<b>Sockeye</b>	<b>Coho</b>	<b>Pink</b>	<b>Chum</b>	<b>Chinook</b>	<b>Total</b>	<b>Boat Days*</b>	<b>Hours Open</b>	<b>Days Fishing**</b>
<b>FISHERY DID NOT OPEN</b>			-	-	-	-	-	-	-	-	-
<b>Total</b>			-	-	-	-	-	-	-	-	-

2022 catch figures are based on Phone-in (FOS) estimates

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 18.—Weekly commercial catch and fishing effort in the 2022 Canadian Area 3 Entrance (sub-areas 1 to 4) seine fishery (preliminary).

Julian Week	Stat Week	Ending Date	Sockeye	Coho	Pink	Chum	Chinook	Total	Boat Days*	Hours Open	Days Fishing**
29	73	Jul. 16	0	0	0	0	0	0	0	16	1
30	74	Jul. 23	550	0	16,918	2,800	0	19,718	5	32	2
31	75	Jul. 30	0	0	2,789	0	0	2,789	1	16	1
<b>Total</b>			<b>550</b>	<b>0</b>	<b>19,707</b>	<b>2,800</b>	<b>0</b>	<b>23,057</b>	<b>6</b>	<b>64</b>	<b>4</b>

2022 catch figures are based on Phone-in (FOS) estimates

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 19.—Weekly commercial catch and fishing effort in the 2022 Canadian Area 3 Inside (sub-areas 7 to 17) seine fishery.

Julian Week	Stat Week	Ending Date	Sockeye	Coho	Pink	Chum	Chinook	Total	Boat Days*	Hours Open	Days Fishing**
29	73	Jul. 16	0	0	1,100	3,735	0	4,835	3	16	1
30	74	Jul. 23	1,797	0	25,622	13,081	0	40,500	12	32	2
31	75	Jul. 30	0	0	63,225	0	0	63,225	11	16	1
<b>Total</b>			<b>1,797</b>	<b>0</b>	<b>89,947</b>	<b>16,816</b>	<b>0</b>	<b>108,560</b>	<b>26</b>	<b>64</b>	<b>4</b>

2022 catch figures are based on Phone-in (FOS) estimates

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 20.—Weekly commercial catch and fishing effort in the 2022 Canadian total Area 3 seine fishery (preliminary).

Julian Week	Stat Week	Ending Date	Sockeye	Coho	Pink	Chum	Chinook	Total	Boat Days*	Hours Open	Days Fishing**
29	73	Jul. 16	0	0	1,100	3,735	0	4,835	3	16	1
30	74	Jul. 23	2,347	0	42,540	15,881	0	60,768	17	32	2
31	75	Jul. 30	0	0	66,017	0	0	66,017	12	16	1
<b>Total</b>			<b>2,347</b>	<b>0</b>	<b>109,654</b>	<b>19,616</b>	<b>0</b>	<b>131,617</b>	<b>32</b>	<b>64</b>	<b>4</b>

2022 catch figures are based on Phone-in (FOS) estimates.

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 21.—Weekly commercial catch and fishing effort in the 2022 Canadian Area 3/103 troll fishery.

<b>Julian Week</b>	<b>Stat Week</b>	<b>Ending Date</b>	<b>Sockeye</b>	<b>Coho</b>	<b>Pink</b>	<b>Chum</b>	<b>Chinook</b>	<b>Total</b>	<b>Boat Days*</b>	<b>Hours Open</b>	<b>Days Fishing**</b>
<b>FISHERY DID NOT OPEN</b>			-	-	-	-	-	-	-	-	-
<b>Total</b>			-	-	-	-	-	-	-	-	-

2022 catch figures are based on Phone-in (FOS) estimates.

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 22.—Weekly commercial catch and fishing effort in the 2022 Canadian total Area 4 gillnet fishery.

Julian Week	Stat Week	Ending Date	Sockeye	Coho	Pink	Chum	Chinook	Total	Boat Days*	Hours Open	Days Fishing**
27	71	Jul. 2	CLOSED	CLOSED	CLOSED	CLOSED	CLOSED	0	0	0	0
28	72	Jul. 9	CLOSED	CLOSED	CLOSED	CLOSED	CLOSED	0	0	0	0
29	73	Jul. 16	36,572	CLOSED	182	CLOSED	CLOSED	36,754	182	34	2
30	74	Jul. 23	129,781	CLOSED	9,966	CLOSED	CLOSED	139,747	476	68	4
31	75	Jul. 30	166,565	CLOSED	29,297	CLOSED	CLOSED	195,862	492	68	4
32	81	Aug. 6	140,530	CLOSED	55,211	CLOSED	CLOSED	195,741	552	85	5
33	82	Aug. 13	9,039	CLOSED	6,182	CLOSED	CLOSED	15,221	83	17	1
34	83	Aug. 20	CLOSED	CLOSED	CLOSED	CLOSED	CLOSED	0	0	0	0
35	84	Aug. 27	CLOSED	CLOSED	CLOSED	CLOSED	CLOSED	0	0	0	0
<b>Total</b>			<b>482,487</b>	<b>0</b>	<b>100,838</b>	<b>0</b>	<b>0</b>	<b>583,325</b>	<b>1,785</b>	<b>272</b>	<b>16</b>

2022 catch figures are based on Phone-in (FOS) estimates.

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.



Table 23.—Weekly commercial catch and fishing effort in the 2022 Canadian total Area 4 seine fishery.

Julian Week	Stat Week	Ending Date	Sockeye	Coho	Pink	Chum	Chinook	Total	Boat Days*	Hours Open	Days Fishing**
27	71	Jul. 2	CLOSED	CLOSED	CLOSED	CLOSED	CLOSED	0	0	0	0
28	72	Jul. 9	CLOSED	CLOSED	CLOSED	CLOSED	CLOSED	0	0	0	0
29	73	Jul. 16	0	CLOSED	0	CLOSED	CLOSED	0	0	0	0
30	74	Jul. 23	30,077	CLOSED	1,500	CLOSED	CLOSED	31,577	31	90	4
31	75	Jul. 30	100,994	CLOSED	103,042	CLOSED	CLOSED	204,036	50	112	5
32	81	Aug. 6	81,795	CLOSED	193,912	CLOSED	CLOSED	275,707	63	86	5
33	82	Aug. 13	17,159	CLOSED	78,980	CLOSED	CLOSED	96,139	12	16	1
34	83	Aug. 20	CLOSED	CLOSED	CLOSED	CLOSED	CLOSED	0	0	0	0
35	84	Aug. 27	CLOSED	CLOSED	CLOSED	CLOSED	CLOSED	0	0	0	0
<b>Total</b>			<b>230,025</b>	<b>0</b>	<b>377,434</b>	<b>0</b>	<b>0</b>	<b>607,459</b>	<b>156</b>	<b>304</b>	<b>15</b>

2022 catch figures are based on Phone-in (FOS) estimates.

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 24.—Weekly commercial catch and fishing effort in the 2022 Canadian Area 4/104 troll fishery.

<b>Julian Week</b>	<b>Stat Week</b>	<b>Ending Date</b>	<b>Sockeye</b>	<b>Coho</b>	<b>Pink</b>	<b>Chum</b>	<b>Chinook</b>	<b>Total</b>	<b>Boat Days*</b>	<b>Hours Open</b>	<b>Days Fishing**</b>
<b>FISHERY DID NOT OPEN</b>			-	-	-	-	-	-	-	-	-
<b>Total</b>			-	-	-	-	-	-	-	-	-

2022 catch figures are based on Phone-in (FOS) estimates.

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 25.—Weekly commercial catch and fishing effort in the 2022 Canadian total Area 5 gillnet fishery.

<b>Julian Week</b>	<b>Stat Week</b>	<b>Ending Date</b>	<b>Sockeye</b>	<b>Coho</b>	<b>Pink</b>	<b>Chum</b>	<b>Chinook</b>	<b>Total</b>	<b>Boat Days*</b>	<b>Hours Open</b>	<b>Days Fishing**</b>
<b>FISHERY DID NOT OPEN</b>			-	-	-	-	-	-	-	-	-
<b>Total</b>			-	-	-	-	-	-	-	-	-

2022 catch figures are based on Phone-in (FOS) estimates.

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 26.—Weekly commercial catch and fishing effort in the 2022 Canadian total Area 5 seine fishery.

<b>Julian Week</b>	<b>Stat Week</b>	<b>Ending Date</b>	<b>Sockeye</b>	<b>Coho</b>	<b>Pink</b>	<b>Chum</b>	<b>Chinook</b>	<b>Total</b>	<b>Boat Days*</b>	<b>Hours Open</b>	<b>Days Fishing**</b>
<b>FISHERY DID NOT OPEN</b>			-	-	-	-	-	-	-	-	-
<b>Total</b>			-	-	-	-	-	-	-	-	-

2022 catch figures are based on Phone-in (FOS) estimates.

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 27.—Weekly commercial catch and fishing effort in the 2022 Canadian Area 5/105 troll fishery.

<b>Julian Week</b>	<b>Stat Week</b>	<b>Ending Date</b>	<b>Sockeye</b>	<b>Coho</b>	<b>Pink</b>	<b>Chum</b>	<b>Chinook</b>	<b>Total</b>	<b>Boat Days*</b>	<b>Hours Open</b>	<b>Days Fishing**</b>
<b>FISHERY DID NOT OPEN</b>			-	-	-	-	-	-	-	-	-
<b>Total</b>			-	-	-	-	-	-	-	-	-

2022 catch figures are based on Phone-in (FOS) estimates.

\*Boat Days are the sum of daily vessels operating in a 24-hour period.

\*\*Days Fishing are the sum of the daily fishery openings independent of hours open.

Table 28.—Annual gillnet and seine effort for Canadian Areas 1, 3, 4, and 5, 1980-2022.

Year	Gear	Area 1		Area 3		Area 4		Area 5	
		Boat Days	Days Fishing	Boat Days	Days Fishing	Boat Days	Days Fishing	Boat Days	Days Fishing
1980	GN	0	0	2,980	20	5,726	13	852	15
	SN	0	0	912	20	6	2	158	15
1981	GN	0	0	2,127	26	13,170	26	552	11
	SN	0	0	1,189	26	401	8	49	11
1982	GN	0	0	3,155	34	8,799	18	548	17
	SN	0	0	1,649	34	827	6	197	17
1983	GN	6	12	2,377	22	4,699	15	501	14
	SN	108	12	2,157	22	0	0	55	14
1984	GN	18	27	2,929	23	7,705	22	435	15
	SN	543	27	1,580	20	761	6	355	14
1985	GN	74	24	813	21	12,504	26	169	16
	SN	241	24	1,099	17	819	9	241	12
1986	GN	345	27	1,125	25	6,095	21	529	23
	SN	328	35	1,221	24	94	8	389	22
1987	GN	39	13	1,015	19	5,803	17	192	13
	SN	156	13	1,780	18	215	7	269	12
1988	GN	56	18	727	18	14,141	23	305	17
	SN	190	16	888	15	273	4	229	15
1989	GN	20	11	1,525	26	8,638	28	428	22
	SN	78	11	1,059	18	70	18	87	17
1990	GN	12	17	977	26	8,583	32	282	21
	SN	215	17	556	15	60	20	296	15
1991	GN	16	13	1,813	36	10,931	25	375	24
	SN	64	5	2,958	18	178	7	228	18
1992	GN	68	21	2,527	31	12,110	25	368	24
	SN	239	16	1,016	18	197	10	128	17
1993	GN	26	15	3,692	43	10,909	22	183	22
	SN	15	15	1,816	16	329	12	71	13
1994	GN	82	16	3,443	23	8,130	20	430	12
	SN	164	7	698	9	0	0	5	1
1995	GN	270	29	4,305	31	12,062	19	434	22
	SN	322	7	2,536	15	484	9	154	13
1996	GN	19	18	4,433	36	13,487	25	507	26
	SN	79	15	1,117	20	975	14	347	19
1997	GN	536	23	2,759	23	9,558	21	269	20
	SN	313	8	809	15	172	11	25	13
1998	GN	5	11	1,197	16	1,041	6	47	3
	SN	12	2	204	9	0	0	4	0
1999	GN	1	5	3,300	17	238	3	0	0
	SN	0	0	1,001	15	26	2	6	2

Table 28. –Continued.

Year	Gear	Area 1		Area 3		Area 4		Area 5	
		Boat Days	Days Fishing	Boat Days	Days Fishing	Boat Days	Days Fishing	Boat Days	Days Fishing
2000	GN	15	4	2,321	17	5,150	19	164	3
	SN	0	0	282	12	544	9	54	11
2001	GN	2	1	1,031	11	5,380	19	86	12
	SN	0	0	244	13	393	9	57	11
2002	GN	2	2	2,882	19	3,559	13	43	11
	SN	7	2	294	15	218	15	64	15
2003	GN	0	0	3,417	17	2,484	8	27	5
	SN	0	0	210	15	118	9	32	11
2004	GN	0	3	3,241	13	1,581	6	78	5
	SN	0	0	448	13	218	13	28	7
2005	GN	0	0	2,645	16	198	2	0	0
	SN	0	0	291	18	0	0	19	6
2006	GN	7	5	3,487	15	6,376	17	71	13
	SN	0	0	236	7	682	16	3	6
2007	GN	0	0	1,694	9	1,796	7	11	2
	SN	0	0	478	15	85	9	82	15
2008	GN	0	0	595	7	2,213	9	18	7
	SN	0	0	61	3	274	14	10	1
2009	GN	0	0	1,517	8	187	2	0	0
	SN	0	0	115	10	33	4	15	5
2010	GN	0	0	929	6	466	3	14	1
	SN	8	4	17	2	0	0	1	1
2011	GN	0	0	675	7	1,070	6	7	5
	SN	0	0	109	4	117	9	0	0
2012	GN	0	0	831	6	992	5	9	3
	SN	0	0	110	5	79	5	0	0
2013	GN	0	0	1,457	9	199	2	0	0
	SN	0	0	179	12	0	0	0	0
2014	GN	0	0	1357	10	1,831	8	9	7
	SN	9	7	146	9	132	7	5	1
2015	GN	0	0	1778	28	303	5	0	0
	SN	0	0	365	10	10	2	0	0
2016	GN	0	0	574	9	853	10	5	4
	SN	0	0	141	13	20	5	0	0
2017	GN	0	0	1078	9	0	0	0	0
	SN	0	0	249	14	0	0	0	0
2018	GN	0	0	379	4	625	10	2	2
	SN	0	0	111	5	52	15	0	0
2019	GN	0	0	567	7	0	0	0	0
	SN	0	0	58	3	0	0	0	0

Table 28. –Continued.

Year	Gear	Area 1		Area 3		Area 4		Area 5	
		Boat Days	Days Fishing	Boat Days	Days Fishing	Boat Days	Days Fishing	Boat Days	Days Fishing
2020	GN	0	0	0	0	201	2	0	0
	SN	35	9	13	1	0	0	0	0
2021	GN	0	0	0	0	0	0	0	0
	SN	0	0	72	4	0	0	0	0
2022	GN	0	0	0	0	1,785	16	0	0
	SN	0	0	32	4	156	15	0	0
AVG 80-89	GN	55.8	13.2	1,877.3	23.4	8,728.0	20.9	451.1	16.3
	SN	164.4	13.8	1,353.4	21.4	346.6	6.8	202.9	14.9
	<b>TOTAL</b>	<b>220.2</b>	<b>27.0</b>	<b>3,230.7</b>	<b>44.8</b>	<b>9,074.6</b>	<b>27.7</b>	<b>654.0</b>	<b>31.2</b>
AVG 90-99	GN	103.5	16.8	2,844.6	28.2	8,704.9	19.8	289.5	17.4
	SN	142.3	9.2	1,271.1	15.0	242.1	8.5	126.4	11.1
	<b>TOTAL</b>	<b>245.8</b>	<b>26.0</b>	<b>4,115.7</b>	<b>43.2</b>	<b>8,947.0</b>	<b>28.3</b>	<b>415.9</b>	<b>28.5</b>
AVG 00-09	GN	2.6	1.5	2,283.0	13.2	2,892.4	10.2	49.8	5.8
	SN	0.7	0.2	265.9	12.1	256.5	9.8	36.4	8.8
	<b>TOTAL</b>	<b>4.0</b>	<b>1.7</b>	<b>2,548.9</b>	<b>25.3</b>	<b>3,148.9</b>	<b>20.0</b>	<b>86.2</b>	<b>14.6</b>
AVG 10-19	GN	0.0	0.0	962.5	9.5	633.9	4.9	4.6	2.2
	SN	1.7	1.1	148.5	7.7	41.0	4.3	0.6	0.2
	<b>TOTAL</b>	<b>1.7</b>	<b>1.1</b>	<b>1,111.0</b>	<b>17.2</b>	<b>674.9</b>	<b>9.2</b>	<b>5.2</b>	<b>2.4</b>



Table 29.—Escapements to Canadian Areas 3, 4, and 5 in 2022 (preliminary).

<b>Area</b>	<b>Sockeye</b>	<b>Coho</b>	<b>Pink</b>	<b>Chum</b>	<b>Chinook</b>
3	444,704	32,977	500,236	76,968	10,987
4	2,528,148	32,187	1,208,408	1,189	19,118
5	19,490	UNK	3,835	UNK	-

Table 30.—Annual salmon escapements for Canadian Area 1, 1970 – 2022.

YEAR	SOCKEYE	COHO	PINK	CHUM	CHINOOK
1970	26,500	24,050	432,650	24,800	800
1971	16,500	14,335	6,050	44,500	500
1972	17,500	26,150	329,900	8,600	1,000
1973	38,000	58,350	4,000	50,000	900
1974	39,000	97,100	201,400	41,800	1,000
1975	16,500	47,000	3,950	53,050	1,500
1976	40,900	153,500	285,050	53,500	700
1977	36,750	55,400	4,900	60,300	800
1978	20,300	61,250	217,500	56,200	600
1979	20,650	34,750	3,250	32,450	400
1980	33,200	17,140	290,795	14,768	600
1981	23,000	18,000	3,650	26,100	750
1982	28,500	35,250	362,000	70,800	1,400
1983	19,500	20,600	2,130	35,225	600
1984	18,500	28,850	1,213,900	52,775	300
1985	43,200	23,700	1,875	63,800	1,500
1986	13,500	32,900	838,500	82,500	500
1987	9,100	32,650	4,500	51,100	2,000
1988	23,600	28,900	566,100	29,950	2,200
1989	11,200	16,550	1,300	18,975	2,800
1990	200	10,270	1,389,560	4,700	2,000
1991	4,400	11,350	600	1,000	1,900
1992	12,100	8,200	994,800	6,300	2,000
1993	500	2,500	350	50,060	1,000
1994	8,700	UNK	647,000	32,150	2,000
1995	7,100	UNK	1,000	19,855	1,500
1996	19,300	UNK	2,924,000	6,725	3,000
1997	12,000	UNK	UNK	31,050	2,500
1998	14,000	38,400	747,200	32,100	3,000
1999	15,550	28,000	2,700	33,000	3,200
2000	19,200	22,600	465,000	13,520	3,600
2001	3,900	6,674	1	3,804	UNK
2002	9,850	13,474	939,003	7,000	3,500
2003	7,500	2,538	UNK	34,081	4,000
2004	10,000	719	177,500	4,000	UNK
2005	5,000	1,500	UNK	1,650	UNK
2006	27,200	UNK	250,250	18,300	UNK
2007	8,500	UNK	UNK	1,950	UNK
2008	9,100	UNK	607,750	600	UNK
2009	7,500	UNK	UNK	35,520	UNK
2010	18,025	UNK	1,135,000	200	UNK
2011	7,000	UNK	UNK	25,400	UNK

Table 30.—Continued.

<b>YEAR</b>	<b>SOCKEYE</b>	<b>COHO</b>	<b>PINK</b>	<b>CHUM</b>	<b>CHINOOK</b>
<b>2012</b>	19,050	UNK	207,200	4,000	UNK
<b>2013</b>	9,000	UNK	35,000	1,000	UNK
<b>2014</b>	19,800	UNK	1,030,000	UNK	UNK
<b>2015</b>	UNK	UNK	UNK	UNK	UNK
<b>2016</b>	10,600	UNK	250,000	8,500	UNK
<b>2017</b>	12,500	UNK	UNK	2,500	UNK
<b>2018</b>	6,800	UNK	553,200	5,000	UNK
<b>2019</b>	5,900	UNK	UNK	14,000	UNK
<b>2020</b>	7,900	UNK	802,400	UNK	UNK
<b>2021</b>	6,200	UNK	UNK	UNK	UNK
<b>2022*</b>	24,600	UNK	844,000	UNK	UNK
<b>AVG 70-79</b>	27,260	57,189	148,865	42,520	820
<b>AVG 80-89</b>	22,330	25,454	328,475	44,599	1,265
<b>AVG 90-99</b>	9,385	16,453	745,246	21,694	2,210
<b>AVG 00-09</b>	10,775	7,918	406,584	12,043	3,700
<b>AVG 10-19</b>	12,075	UNK	535,067	7,575	UNK

\*preliminary

Table 31.—Annual escapements for Canadian Area 3, 1970 -2022.

YEAR	SOCKEYE	COHO	PINK	CHUM	CHINOOK
1970	115,503	43,300	224,750	35,400	18,250
1971	247,524	44,325	136,525	28,825	17,000
1972	178,716	20,850	244,250	81,125	19,800
1973	284,682	9,400	70,786	66,025	3,550
1974	193,703	16,435	84,915	121,570	3,775
1975	70,874	15,410	141,758	30,550	6,025
1976	143,405	32,700	158,175	64,650	5,590
1977	400,371	35,605	229,155	57,775	9,060
1978	147,718	33,100	401,445	75,970	10,190
1979	212,944	18,655	50,625	42,313	8,180
1980	155,515	22,405	130,777	54,794	9,072
1981	255,818	34,429	204,425	16,508	7,925
1982	306,070	31,055	427,135	29,476	6,575
1983	185,150	36,360	738,205	45,115	8,055
1984	182,450	67,650	531,035	67,425	12,620
1985	361,208	44,539	508,855	48,971	7,999
1986	187,261	34,910	375,245	34,900	17,375
1987	184,242	31,652	371,866	31,387	8,695
1988	136,760	10,551	185,065	47,050	7,370
1989	112,609	20,690	641,270	33,770	12,525
1990	155,472	38,510	154,968	30,980	12,103
1991	269,850	16,777	388,100	23,835	3,967
1992	645,964	16,118	196,808	15,684	16,415
1993	440,740	7,510	314,102	79,951	24,126
1994	179,262	15,329	155,356	33,199	2,440
1995	237,991	13,967	349,017	40,451	1,256
1996	219,825	11,613	344,860	22,990	2,619
1997	237,312	3,989	216,527	20,302	957
1998	193,810	9,781	151,940	138,490	1,268
1999	197,550	13,216	464,775	33,467	724
2000	138,042	17,339	322,990	20,718	19,348
2001	117,692	26,366	826,632	30,472	32,340
2002	338,879	30,224	598,264	17,813	14,804
2003	199,458	18,254	841,856	40,002	28,274
2004	141,913	15,062	542,500	54,033	16,875
2005	146,813	19,418	944,415	30,855	15,571
2006	149,598	15,644	129,050	43,975	28,061
2007	113,637	9,181	589,059	17,225	24,964
2008	155,860	12,383	58,676	14,593	22,138
2009	179,652	17,262	640,955	20,680	29,576
2010	163,317	168,914	256,789	10,885	20,729
2011	192,584	85,910	160,418	9,879	10,826

Table 31.—Continued.

<b>YEAR</b>	<b>SOCKEYE</b>	<b>COHO</b>	<b>PINK</b>	<b>CHUM</b>	<b>CHINOOK</b>
<b>2012</b>	159,112	125,756	282,396	19,446	9,797
<b>2013</b>	210,263	518,485	543,757	16,635	9,034
<b>2014</b>	260,102	307,428	438,618	20,347	13,108
<b>2015</b>	389,503	42,517	390,255	51,800	19,465
<b>2016</b>	277,484	191,096	275,997	63,857	10,192
<b>2017</b>	229,000	180,000	322,000	25,000	4,984
<b>2018</b>	230,508	73,000	218,684	48,487	14,956
<b>2019</b>	245,476	128,091	160,466	28,198	11,981
<b>2020</b>	215,462	7,790	552,508	60,535	4,074
<b>2021</b>	348,826	12,365	562,047	65,095	15,763
<b>2022*</b>	444,704	32,977	500,236	76,968	10,987
<b>AVG 70-79</b>	199,544	26,978	174,238	60,420	10,142
<b>AVG 80-89</b>	206,708	33,424	411,388	40,940	9,821
<b>AVG 90-99</b>	277,778	14,681	273,645	43,935	6,588
<b>AVG 00-09</b>	168,154	18,113	549,440	29,037	23,195
<b>AVG 10-19</b>	235,735	182,120	304,938	29,453	12,507

\*preliminary

Table 32. –Annual escapements for Canadian Area 4, 1970 – 2022.

YEAR	SOCKEYE	COHO	PINK	CHUM	CHINOOK
1970	678,652	84,725	971,800	10,890	21,150
1971	821,850	75,795	1,173,381	5,232	18,500
1972	697,237	57,514	1,765,154	36,920	20,651
1973	820,196	41,292	1,260,186	25,476	40,341
1974	723,898	38,798	367,605	14,102	31,576
1975	822,633	22,119	1,767,907	10,375	20,319
1976	575,590	32,891	693,850	11,071	13,053
1977	951,805	37,634	976,527	10,927	29,018
1978	424,075	49,963	724,597	8,153	22,676
1979	1,166,236	24,494	515,563	5,705	18,488
1980	542,164	31,587	745,367	25,007	23,400
1981	1,424,509	26,692	1,187,835	9,385	24,524
1982	1,140,737	24,521	739,247	4,626	16,990
1983	893,724	24,978	2,610,074	1,667	23,602
1984	1,055,215	50,409	1,037,698	29,764	35,864
1985	2,174,806	19,974	2,042,150	12,198	52,407
1986	716,312	54,587	2,323,944	12,780	59,719
1987	1,324,128	32,739	3,180,414	7,652	60,948
1988	1,417,543	11,293	828,090	108,921	68,307
1989	1,137,994	44,126	4,675,527	20,331	57,192
1990	989,566	76,662	2,611,520	6,343	55,541
1991	1,232,568	52,544	4,797,937	4,680	52,792
1992	1,550,109	34,703	821,950	11,290	67,118
1993	1,629,426	23,192	663,888	10,052	68,286
1994	1,026,816	33,830	242,285	7,967	22,611
1995	1,720,292	16,293	1,641,489	7,928	34,390
1996	1,727,147	14,759	2,025,648	8,404	73,684
1997	985,097	6,333	484,476	22,250	42,539
1998	521,417	39,044	272,871	14,664	46,774
1999	624,366	71,787	1,095,352	2,650	43,775
2000	1,394,177	29,922	260,481	4,650	51,804
2001	1,508,045	74,254	1,017,612	8,620	81,504
2002	610,851	46,129	232,451	3,060	44,771
2003	1,211,762	50,484	1,517,355	1,782	56,758
2004	923,187	32,303	653,350	2,020	39,552
2005	704,559	77,732	1,213,770	2,335	29,496
2006	1,172,699	50,332	116,367	685	36,682
2007	1,042,717	26,792	632,243	474	37,054
2008	867,676	33,145	69,898	510	34,615
2009	667,603	88,215	2,515,312	1,330	36,476
2010	662,755	44,956	325,404	1,117	42,339
2011	890,829	34,338	268,774	3,705	34,190

Table 32.—Continued.

YEAR	SOCKEYE	COHO	PINK	CHUM	CHINOOK
2012	1,100,573	29,771	241,029	2,254	34,213
2013	411,373	53,671	960,000	1,347	26,757
2014	1,646,038	55,626	1,480,946	1,028	28,496
2015	1,271,427	UNK	240,101	UKN	41,658
2016	882,225	24,224	49,932	UKN	31,297
2017	887,647	16,753	465,109	700	17,413
2018	1,490,159	23,372	17,652	856	29,408
2019	570,999	27,245	297,437	1174	23,248
2020	1,488,135	10,735	31,025	71	9,660
2021	1,021,519	13,257	753,144	387	8,209
2022*	2,528,148	32,187	1,208,408	1,189	19,118
AVG 70-79	768,217	46,523	1,021,657	13,885	23,577
AVG 80-89	1,182,713	32,091	1,937,035	23,233	42,295
AVG 90-99	1,200,680	36,915	1,465,742	9,623	50,751
AVG 00-09	1,010,328	50,931	822,884	2,547	44,871
AVG 10-19	981,403	34,440	434,638	1,523	30,902

\*preliminary

Table 33.—Annual escapements for Canadian Area 5, 1970 - 2022.

YEAR	SOCKEYE	COHO	PINK	CHUM
1970	23,750	10,600	139,850	12,250
1971	55,225	9,975	80,761	25,625
1972	24,400	21,820	280,725	17,725
1973	32,425	18,000	56,375	18,975
1974	43,925	18,450	337,075	34,025
1975	50,000	33,000	170,375	10,075
1976	19,050	21,475	348,450	19,625
1977	11,400	25,410	110,275	32,170
1978	28,650	18,650	264,850	13,775
1979	16,000	17,275	43,000	13,950
1980	16,800	11,525	225,825	9,350
1981	16,000	18,025	121,850	3,120
1982	19,450	2,620	70,300	7,370
1983	12,450	4,300	81,025	4,596
1984	17,150	8,175	162,450	6,830
1985	37,250	4,350	177,075	11,765
1986	25,000	22,289	313,900	16,450
1987	26,550	6,000	127,950	10,175
1988	33,400	7,775	162,000	12,750
1989	21,900	1,000	178,500	4,750
1990	5,676	5,006	202,244	3,607
1991	32,035	2,981	70,160	4,113
1992	22,895	3,982	41,161	731
1993	33,150	1,925	39,475	1,795
1994	6,800	800	44,725	870
1995	8,700	UNK	90,900	3,880
1996	24,100	UNK	270,100	3,200
1997	28,400	500	68,750	2,260
1998	10,450	900	161,250	9,250
1999	23,500	1,150	313,450	900
2000	22,600	800	278,150	1,070
2001	21,500	323	395,650	3,080
2002	9,700	1,400	409,810	4,965
2003	42,850	1,010	233,825	4,110
2004	18,200	355	88,330	2,670
2005	14,000	770	277,400	2,600
2006	22,600	285	31,880	2,575
2007	14,150	215	114,700	1,125
2008	2,900	650	29,080	2,226
2009	35	544	164,350	3,998
2010	5,232	1,179	40,704	1,273
2011	1,760	1,330	41,975	732



Table. 33.–Continued.

YEAR	SOCKEYE	COHO	PINK	CHUM
2012	3,590	740	81,708	649
2013	28,592	946	17,174	912
2014	21,274	1,664	205,862	1,846
2015	15,198	UKN	8,635	1,052
2016	7,048	UKN	5,943	UKN
2017	11,550	UNK	4,958	UNK
2018	1,051	398	1,410	1,136
2019	3,999	147	4,198	1,113
2020	825	234	1,742	66
2021	7,300	UKN	17,631	UKN
2022*	19,490	UKN	3,835	UNK
AVG 70-79	30,483	19,466	183,174	19,820
AVG 80-89	22,595	8,606	162,088	8,716
AVG 90-99	19,571	2,156	130,222	3,061
AVG 00-09	16,854	635	202,318	2,842
AVG 10-19	9,929	915	41,257	1,089

\*preliminary

Table 34.—Annual allowable harvest (AAH) calculations for Canadian Area 3 Entrance (sub-areas 1 to 4) net fishery, 1999-2022. The pink salmon escapement requirement in Alaskan districts 101, 102, and 103 is 10,750,000.

Year	AAH of Alaska District 101, 102, 103 Pink Salmon			Actual Number and % AAH of Alaska Pink Salmon Harvested in Canadian Area 3 (1-4) Net Fishery			Overage/Underage Based on the 2.49% AAH Stipulated in the Treaty		
	Total Run	Actual Escapement	AAH	Total Pink Harvest in Area 3 (1-4) Net	Actual Number of Alaskan Pink Harvested	Actual % AAH	Allowable Harvest	Overage (Positive)/ Underage (Negative)	Cumulative Overage/ Underage
1999	53,011,083	19,900,203	42,261,083	2,224,180	1,276,329	3.02%	1,052,301	224,028	224,028
2000	22,935,854	11,936,450	12,185,854	89,980	67,465	0.55%	303,428	-235,963	-11,934
2001	62,126,912	21,903,643	51,376,912	1,155,691	911,959	1.78%	1,279,285	-367,326	-379,260
2002	43,056,270	20,178,163	32,306,270	1,163,645	766,390	2.37%	804,426	-38,036	-417,296
2003	42,771,456	20,047,003	32,021,456	924,183	668,100	2.09%	797,334	-129,234	-546,530
2004	34,999,070	16,769,261	24,249,070	559,034	448,730	1.85%	603,802	-155,072	-701,602
2005	43,651,072	17,519,566	32,901,072	894,890	690,317	2.10%	819,237	-128,920	-830,522
2006	11,524,695	8,532,450	2,992,245	143,733	112,342	3.75%	74,507	37,836	-792,687
2007	52,342,831	23,578,584	41,592,831	1,740,271	1,421,812	3.42%	1,035,661	386,150	-406,536
2008	25,728,121	13,669,062	14,978,121	12,082	10,580	0.07%	372,955	-362,375	-768,912
2009	38,891,939	16,095,463	28,141,939	432,861	276,270	0.98%	700,734	-424,464	-1,193,376
2010	23,621,861	12,113,776	12,871,861	36,334	21,353	0.17%	320,509	-299,156	-1,492,532
2011	20,770,059	11,519,923	10,020,059	201,754	180,930	1.81%	249,499	-68,569	-1,561,101
2012	31,674,423	14,216,273	20,924,423	150,740	127,120	0.61%	521,018	-393,898	-1,954,999
2013	80,810,736	32,020,713	70,060,736	1,249,570	1,149,166	1.64%	1,744,512	-595,346	-2,550,345
2014	50,784,488	22,042,385	40,034,488	450,671	347,104	0.87%	996,859	-649,755	-3,200,100
2015	20,541,455	8,508,770	12,032,685	80,266	77,331	0.64%	299,614	-222,290	-3,422,390
2016	30,543,683	15,081,340	19,793,683	430,435	393,118	1.99%	492,863	-99,745	-3,522,135
2017	21,573,460	13,215,600	10,823,460	231,197	207,268	1.91%	269,504	-62,236	-3,582,072
2018	13,437,220	9,573,382	3,863,838	68,764	58,001	1.50%	96,210	-38,208	-3,620,280
2019	26,975,678	11,507,785	16,225,678	24,251	22,963	0.14%	404,019	-381,056	-4,001,336
2020	17,358,249	11,857,328	6,608,249	1,816	1,703	0.03%	164,545	-162,842	-4,164,179
2021	56,749,471	21,685,543	45,999,471	136,045	122,218	0.27%	1,145,387	-1,023,169	-5,187,348
2022	24,640,520	11,653,311	13,890,520	89,947	57,733	0.42%	345,874	-288,141	-5,475,488

Table 35.—Annual allowable harvest (AAH) calculations for Canadian Area 1/101 troll fishery, 1999-2022. The pink salmon escapement requirement in Alaskan districts 101, 102, and 103 is 10,750,000.

Year	AAH of Alaska District 101, 102, 103 Pink Salmon			Actual Number and % AAH of Alaska Pink Salmon Harvested in Canadian Area 1 Troll Fishery			Overage/Underage Based on the 2.57% AAH Stipulated in the Treaty		
	Total Run	Actual Escapement	AAH	Total Pink Harvest in Area 1 Troll	Actual Number of Alaskan Pink Harvested	Actual % AAH	Allowable Harvest	Overage (Positive)/ Underage (Negative)	Cumulative Overage/ Underage
1999	53,011,083	19,900,203	42,261,083	31,013	25,125	0.06%	1,086,110	-1,060,984	-1,060,984
2000	22,935,854	11,936,450	12,185,854	73,358	56,042	0.46%	313,176	-257,134	-1,318,119
2001	62,126,912	21,903,643	51,376,912	132,709	116,490	0.23%	1,320,387	-1,203,896	-2,522,015
2002	43,056,270	20,178,163	32,306,270	22,918	17,723	0.05%	830,271	-812,548	-3,334,563
2003	42,771,456	20,047,003	32,021,456	74,160	61,284	0.19%	822,951	-761,668	-4,096,231
2004	34,999,070	16,769,261	24,249,070	22,198	19,499	0.08%	623,201	-603,702	-4,699,933
2005	43,651,072	17,519,566	32,901,072	27,768	23,098	0.07%	845,558	-822,460	-5,522,393
2006	11,524,695	8,532,450	2,992,245	34,854	30,134	1.01%	76,901	-46,767	-5,569,160
2007	52,342,831	23,578,584	41,592,831	61,276	55,418	0.13%	1,068,936	-1,013,518	-6,582,678
2008	25,728,121	13,669,062	14,978,121	23,243	21,171	0.14%	384,938	-363,766	-6,946,444
2009	38,891,939	16,095,463	28,141,939	61,522	50,392	0.18%	723,248	-672,855	-7,619,300
2010	23,621,861	12,113,776	12,871,861	17,950	12,708	0.10%	330,807	-318,099	-7,937,399
2011	20,770,059	11,519,923	10,020,059	44,193	41,631	0.42%	257,516	-215,885	-8,153,284
2012	31,674,423	14,216,273	20,924,423	48,223	44,739	0.21%	537,758	-493,019	-8,646,302
2013	80,810,736	32,020,713	70,060,736	84,216	80,590	0.12%	1,800,561	-1,719,971	-10,366,273
2014	50,784,488	22,042,385	40,034,488	31,775	26,798	0.07%	1,028,886	-1,002,089	-11,368,362
2015	20,541,455	8,508,770	12,032,685	41,551	39,456	0.33%	309,240	-269,784	-11,638,146
2016	30,447,094	15,081,340	19,697,094	32,343	30,949	0.16%	506,215	-475,267	-12,113,413
2017	21,573,460	13,215,600	10,823,460	33,299	31,471	0.29%	278,163	-246,692	-12,360,104
2018	13,437,220	9,573,382	3,863,838	27,194	24,478	0.63%	99,301	-74,822	-12,434,926
2019	26,975,678	11,507,785	16,225,678	56,182	53,950	0.33%	417,000	-363,050	-12,797,976
2020	17,358,249	11,857,328	6,608,249	133,167	111,616	1.69%	169,832	-58,216	-12,856,192
2021	56,749,471	21,685,543	45,999,471	81,799	77,103	0.17%	1,182,186	-1,105,084	-13,961,276
2022	24,640,520	11,653,311	13,890,520	87,168	67,837	0.49%	356,986	-289,149	-14,250,425

## FIGURES

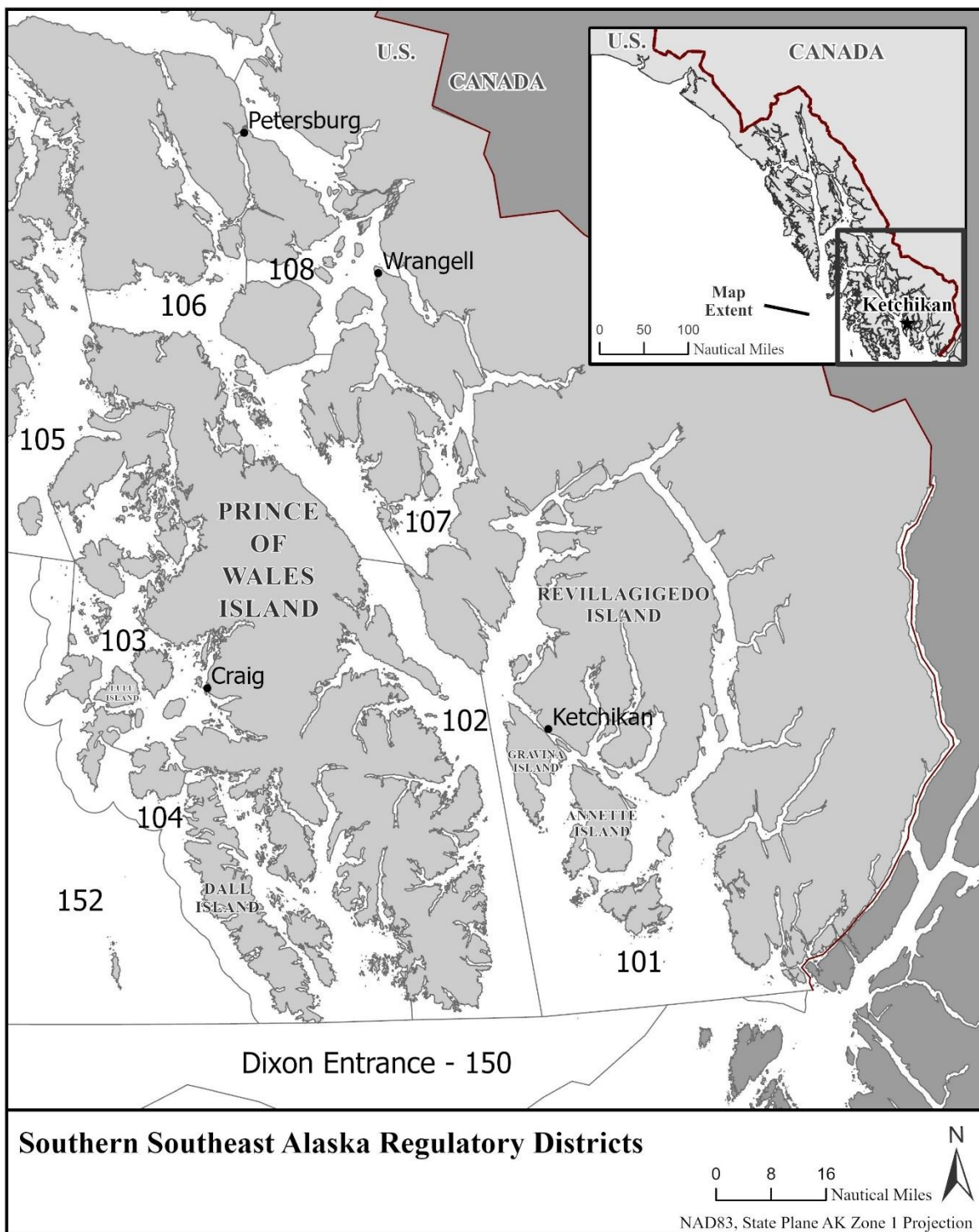


Figure 1.—Alaska Department of Fish and Game southern Southeast Alaska regulatory districts.

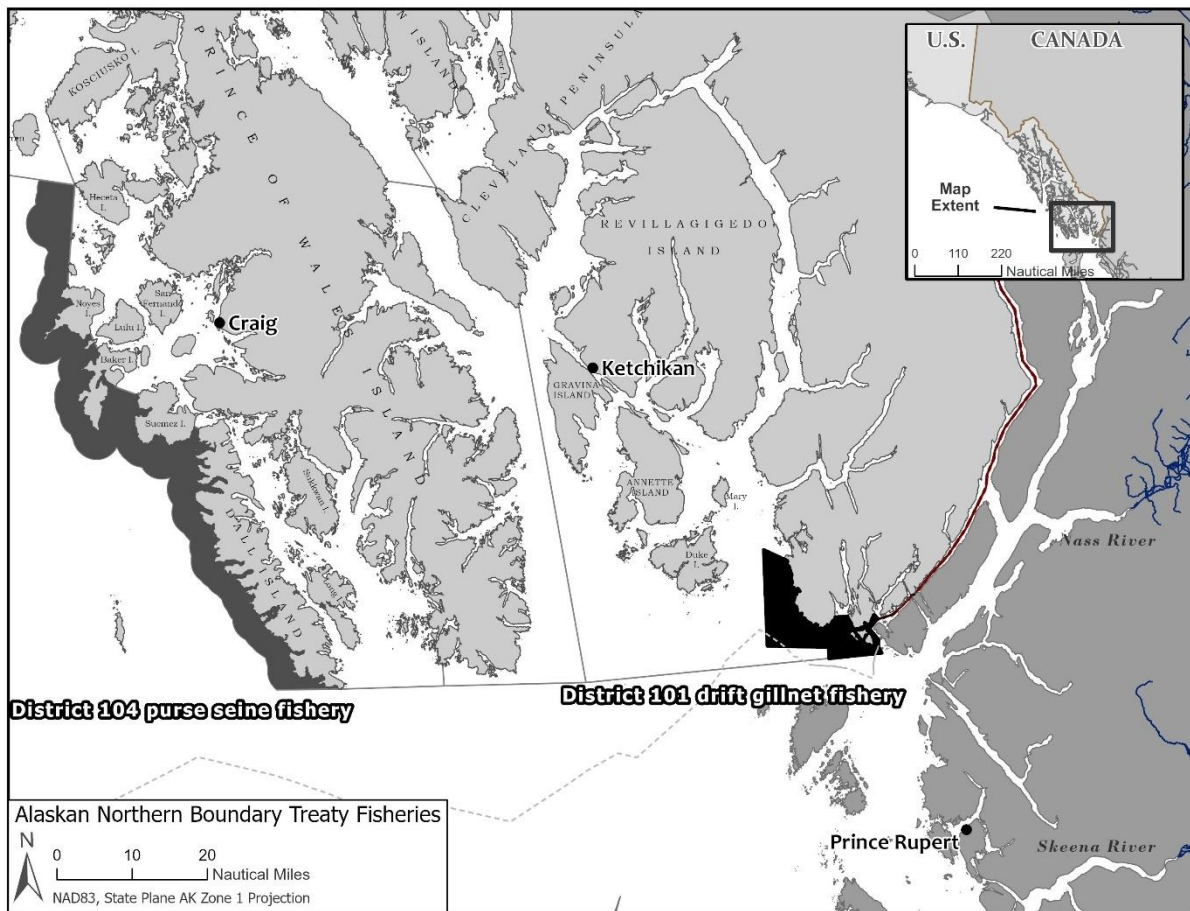


Figure 2.—Alaska District 101 drift gillnet and District 104 purse seine treaty fisheries.

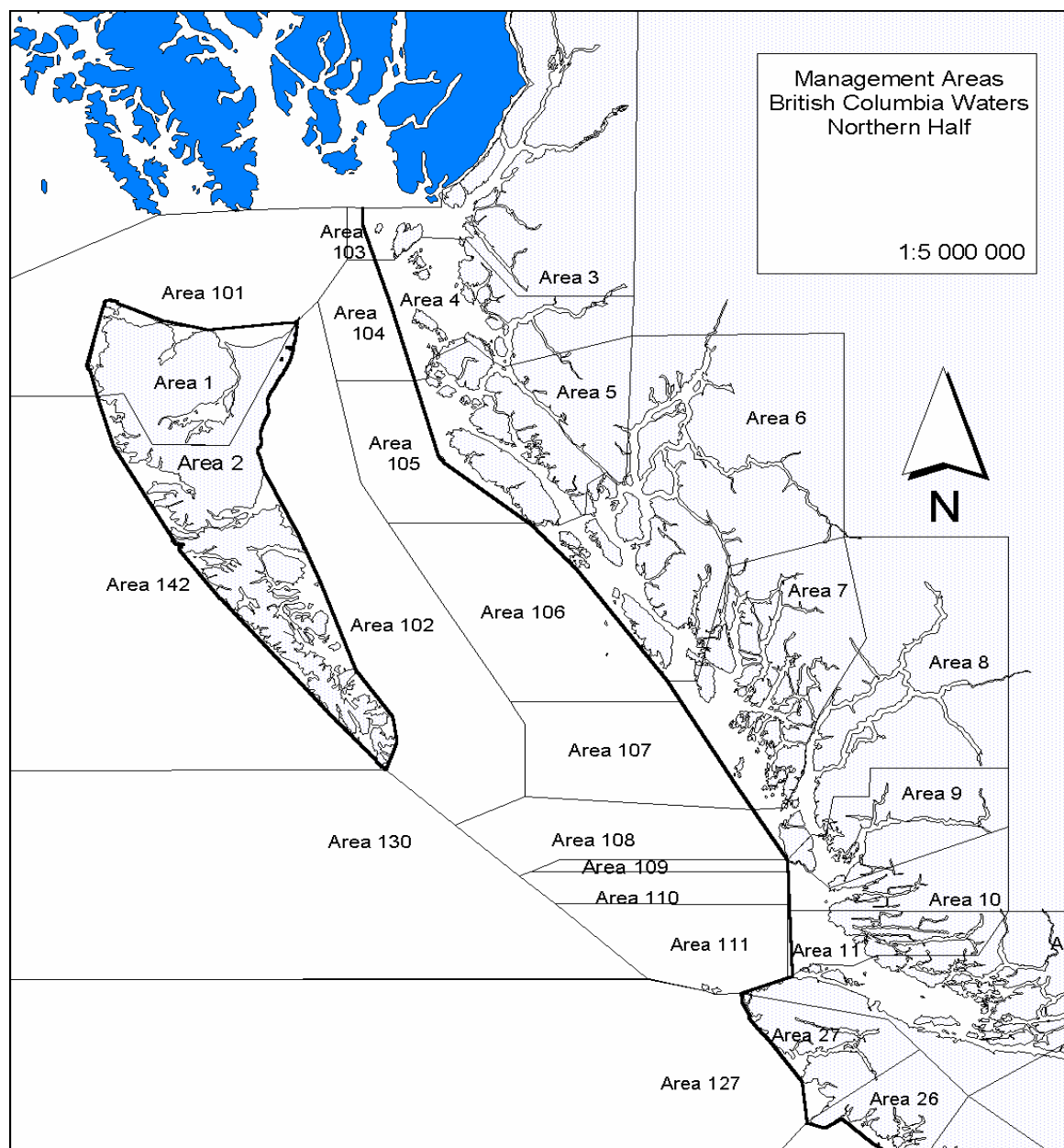


Figure 3.—Canadian Statistical Areas 1-10, northern British Columbia.

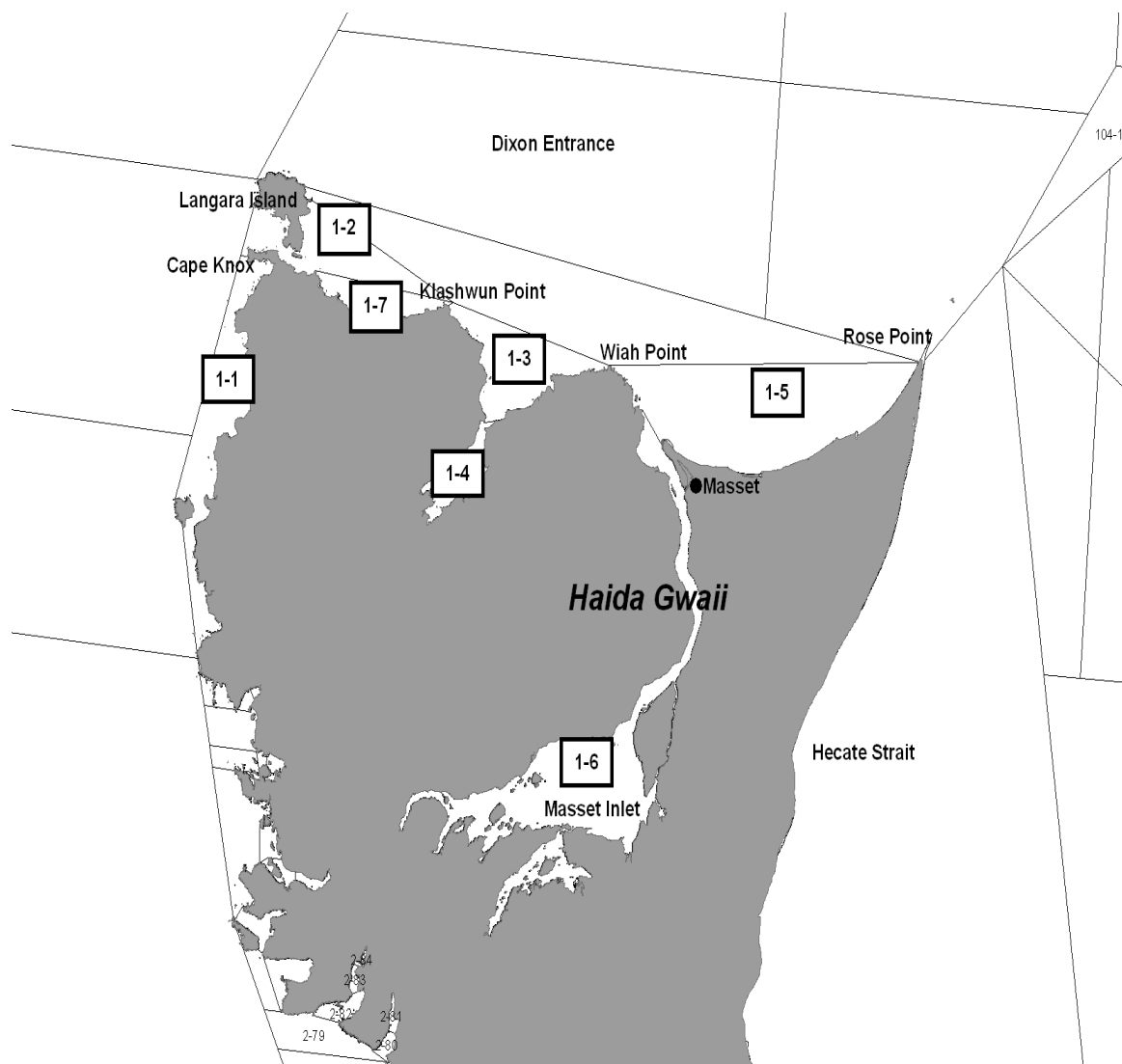


Figure 4.—Canadian Statistical Area 1 management sub-areas.



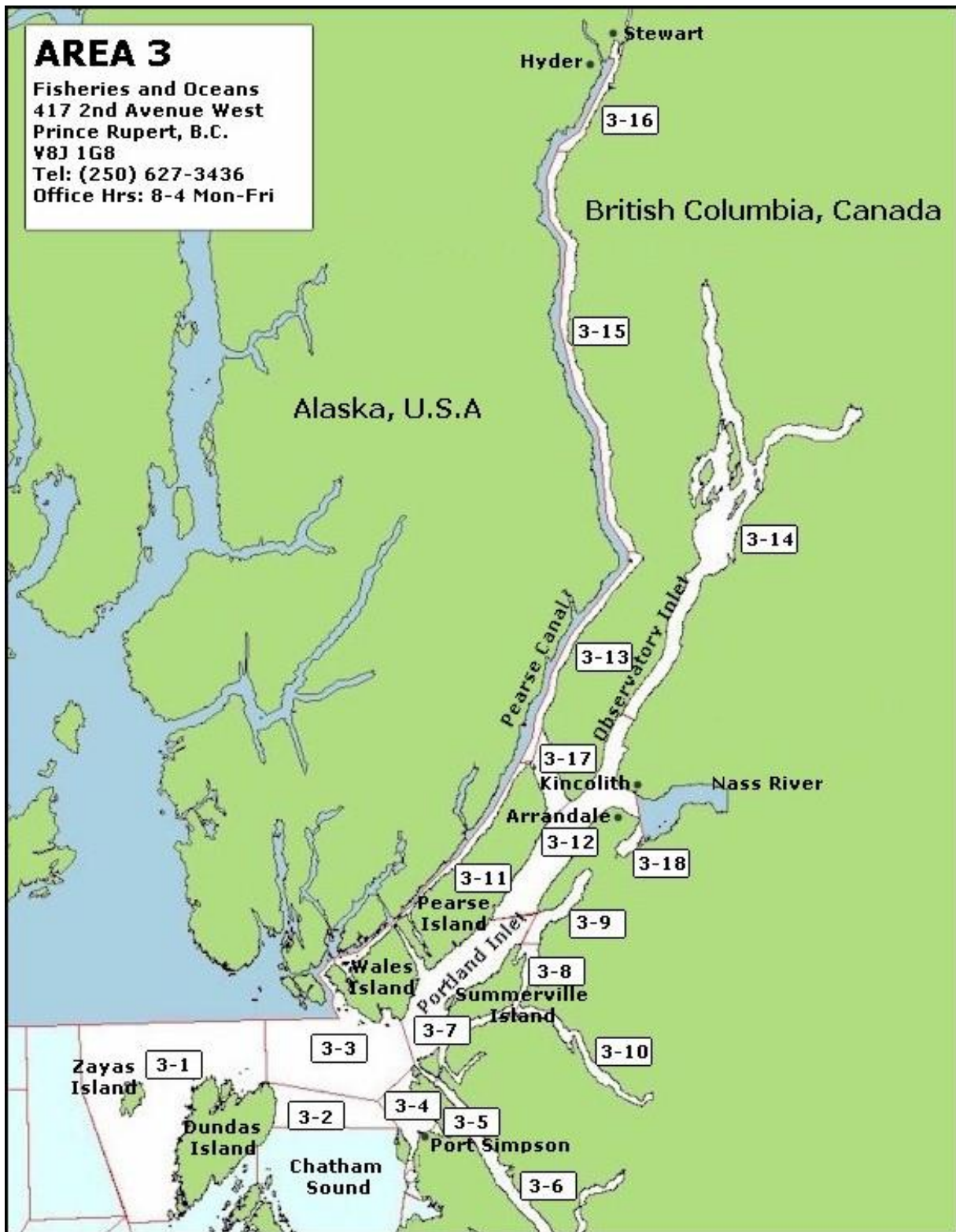


Figure 5.—Canadian Statistical Area 3 management sub-areas.

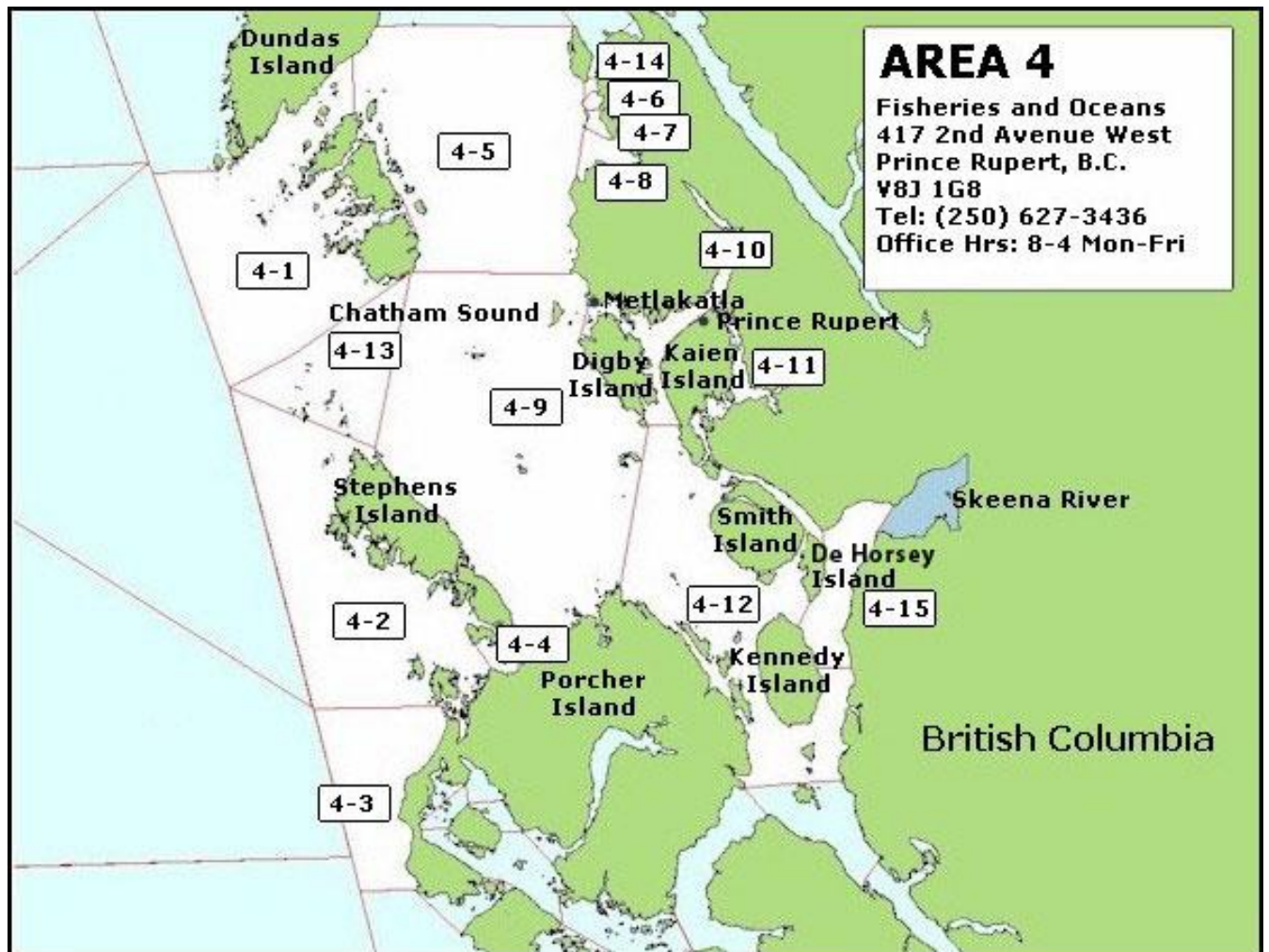


Figure 6.—Canadian Statistical Area 4 management sub-areas.

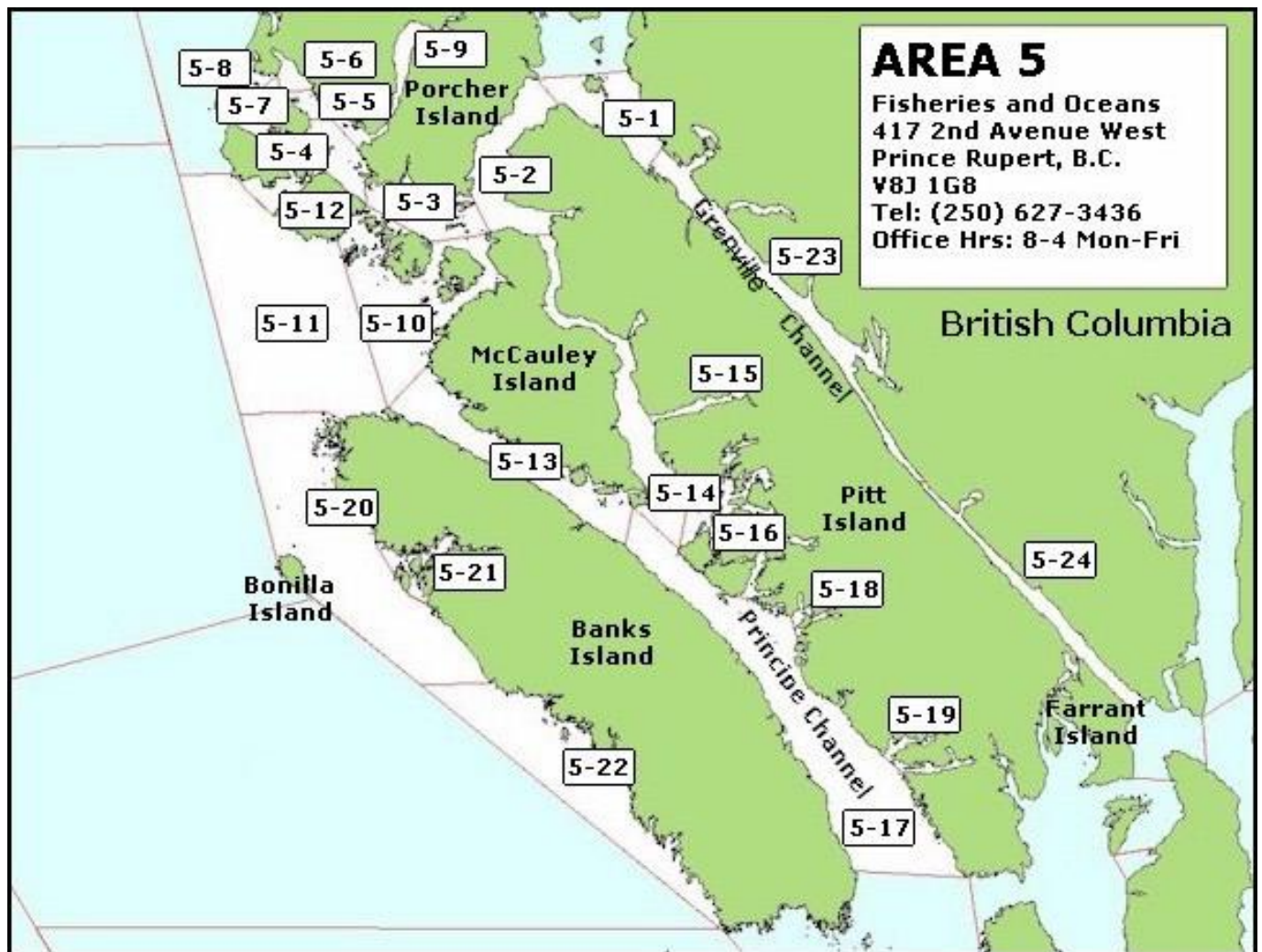


Figure 7.—Canadian Statistical Area 5 management sub-areas.