



**State of Alaska  
Department of Fish and Game  
Habitat and Restoration Division**

**Nomination for Waters  
Important to Anadromous Fish**

Region SOUTHCENTRAL

USGS Quad Seward A-4

Anadromous Water Catalog Number of Waterway 226-50-16106  $\frac{1}{2}$  16106-0010

Name of Waterway Watershed in Puffin Cove  USGS Name  Local Name

Addition  Deletion  Correction  Backup Information

**For Office Use**

Nomination # <u>01 067</u>	<u>J. Win</u>	<u>11/20/01</u>
Revision Year: <u>2001</u>	Regional Supervisor	Date
Revision to: Atlas <input checked="" type="checkbox"/> Catalog	<u>E. Win</u>	<u>10/31/01</u>
Both	AWC Project Biologist	Date
Revision Code: <u>B-1</u>	<u>Z. Brown</u>	<u>12/18/01</u>
	Drafted	Date

**OBSERVATION INFORMATION**

Species	Date(s) Observed	Spawning	Rearing	Present	Anadromous
Coho Salmon	8/2/00		x		<input type="checkbox"/>
Dolly Varden	8/2/00		x		<input type="checkbox"/>
Red Salmon	8/2/00		x		<input type="checkbox"/>
					<input type="checkbox"/>
					<input type="checkbox"/>

**IMPORTANT:** Provide all supporting documentation that this water body is important for the spawning, rearing or migration of anadromous fish, including: number of fish and life stages observed; sampling methods, sampling duration and area sampled; copies of field notes; etc. Attach a copy of a map showing location of mouth and observed upper extent of each species, as well as other information such as: specific stream reaches observed as spawning or rearing habitat; locations, types, and heights of any barriers; etc.

**Comments:**

Please see attached document "Cutthroat Trout Distribution and Abundance" for supporting documentation.

ALASKA DEPT. OF  
FISH & GAME  
JAN 31 2001  
REGION II  
HABITAT AND RESTORATION  
DIVISION

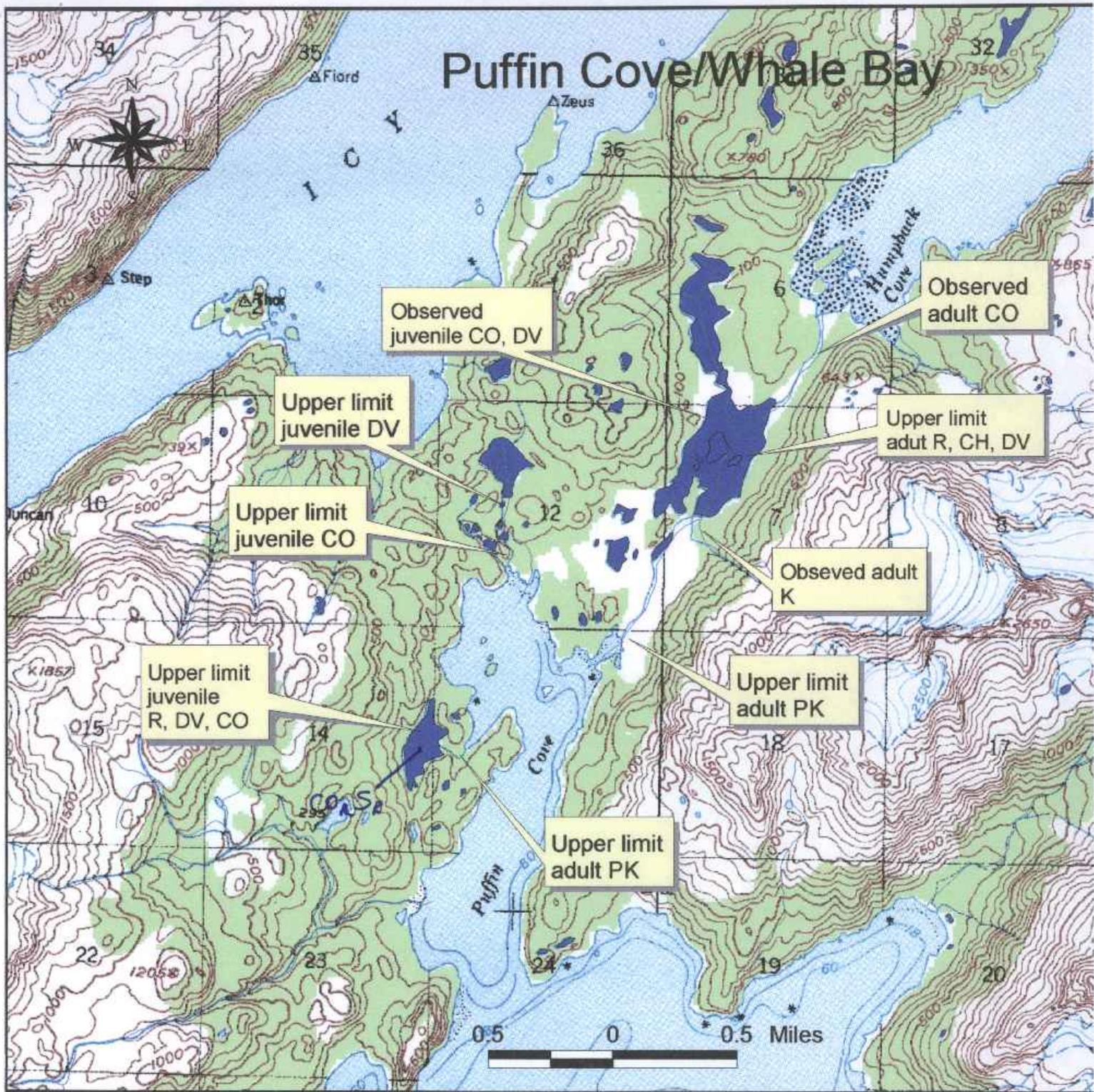
Name of Observer (please print): Teresa Hunt  
Signature: Teresa Hunt  
Address: P.O. Box 129  
Girdwood, Alaska 99587

Date: 01/29/01

This certifies that in my best professional judgment and belief the above information is evidence that this waterbody should be included in or deleted from the Catalog of Waters Important for Spawning, Rearing or Migration of Anadromous Fishes per AS 16.05.870.

Signature of Area Biologist: \_\_\_\_\_

Revision 3/97



ADD CO<sub>2</sub>S<sub>R</sub> TO LAKE 226-50-16106=0010  
 ADD CO<sub>2</sub>R TO STREAM 226-50-16106



United States  
Department of  
Agriculture

Forest  
Service

Glacier  
Ranger  
District

P.O. Box 129  
Forest Station Road  
Girdwood, AK 99587

File Code: 2620-3

Date: January 29, 2001

Edward W. Weiss  
Habitat Biologist  
Alaska Dept. of Fish and Game  
333 Raspberry Rd.  
Anchorage, AK 99518-1599

ALASKA DEPT. OF  
FISH & GAME

JAN 31 2001

REGION II  
HABITAT AND RESTORATION  
DIVISION

Dear Sir:

The Glacier Ranger District conducted stream surveys on 19 streams in Prince William Sound (PWS) during the 2000 field season. Of those systems sampled the survey identified undocumented fish species in two basins in Jackpot Bay (ADF&G 226-20-16080-0020, 226-20-16090-999), three tributaries to Squaw Bay (ADF&G 222-30-12920, 222-30-199, and 222-30-199), one inlet to Nassau Fiord (ADF&G 226-20-194), one inlet stream to Port Wells (ADF&G 223-20-199), and two inlet streams to Puffin Cove (ADF&G 226-50-16106, 226-50-16098). Methodology to surveys conducted included minnow trapping, snorkel counts and hook-line. The results of these surveys indicate that a number of streams surveyed hold species of both adult and juvenile salmon, trout and char that are either missing from the Anadromous Waters Catalog or have partial coverage within the system.

Specifically, those undocumented species trapped within the Jackpot system comprised 654 juvenile coho salmon, and 19 cutthroat trout. Within the upper portion of the basin 235 juvenile Dolly Varden char were found in a previously undocumented region. A total of 121 adult coho, 3 king salmon and 16 cutthroat trout were observed or sampled by hook and line. Sampling was conducted on a small, unnamed basin in Jackpot Bay. Results of minnow trapping resulted in nine juvenile Dolly Varden and 11 juvenile cutthroat trout.

Streams surveyed in Squaw Bay were snorkeled and the fish species identified included (ADF&G 222-30-12920) 143 cutthroat trout found throughout the system. Additionally, one adult cutthroat trout was caught by hook and line. Another unnamed stream snorkeled in Squaw Bay (ADF&G 222-30-199) identified 5 juvenile coho salmon, one juvenile king and 5 juvenile cutthroat trout. The last stream in Squaw Bay was an unnamed stream (ADF&G 222-30-199) that was sampled by hook and line. A total of 15 adult cutthroat trout were identified in this system.

Trapping and snorkeling techniques were used on two streams in Puffin Cove. The first stream sampled (ADF&G 226-50-16106) using minnow traps caught 197 juvenile coho salmon and 55 Dolly Varden. Snorkeling produced 196 juvenile coho and 11 Dolly Varden. Adult red salmon totaling 67 fish were observed throughout the system. The second system sampled (ADF&G 226-50-16098) with minnow traps found 139 juvenile Dolly Varden, and snorkeling produced 836 Dolly Varden. A total of 6 adult Dolly Varden were sampled by hook and line.

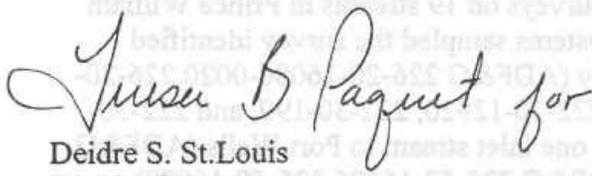


One stream in Nassau Fiord was snorkeled and found 213 juvenile Dolly Varden and 1,760 juvenile coho salmon. Adult salmon totaling 2,000 pink and an undetermined amount of chum salmon were observed.

The last system sampled in PWS was an unnamed stream on the east side of Port Wells. Snorkel surveys indicated the presence of juvenile Dolly Varden.

If you have any questions please contact Rob Spangler, District Biologist at 754-2325.

Sincerely,



Deidre S. St. Louis  
District Ranger

The District Ranger-District contacted stream surveys on 19 streams in Prince William Sound (PWS) during the 2000 field season. Of these systems sampled, 10 were identified and documented fish species in two basins in Jackson Bay (ADFG 325-30-199) and 1000-1000 (ADFG 325-30-199) these basins to Spaw Bay (ADFG 325-30-199) and two inter streams to Nassau Fiord (ADFG 325-30-199) and two inter streams to Pullin Cove (ADFG 325-30-199). Methods used to surveys conducted included minnow trapping, snorkel counts and hook-line. The results of these surveys indicate that a number of streams surveyed hold species of both adult and juvenile salmon, trout and that are either missing from the Anadromous Waters Criteria (river-basin) covered within the system.

Specifically, three undetermined species trapped within the Jackson system comprised 247 juvenile coho salmon and 19 cutthroat trout. Within the upper portion of the basin 232 juvenile Dolly Varden were found in a previously undetermined region. A total of 151 adult coho, 7 minnow trout and 10 cutthroat trout were observed or sampled by hook and line. Streamway was documented one small unnamed basin in Jackson Bay. Results of minnow trapping resulted in one juvenile Dolly Varden and 11 juvenile cutthroat trout.

Streamway surveys in Spaw Bay were conducted and the fish species identified included cutthroat trout, minnow trout, coho salmon and pink salmon. Additionally, one adult cutthroat trout was caught by hook and line. Another unnamed stream snorkeled in Spaw Bay (ADFG 325-30-199) identified 3 juvenile coho salmon, one juvenile king and 2 juvenile cutthroat trout. The last stream in Spaw Bay was an unnamed stream (ADFG 325-30-199) that was sampled by hook and line. A total of 13 adult cutthroat trout were identified in this system.

Trapping and snorkeling techniques were used on two streams in Pullin Cove. The first stream sampled (ADFG 325-30-199) using minnow traps caught 197 juvenile coho salmon and 25 Dolly Varden. Snorkeling produced 196 juvenile coho and 11 Dolly Varden. Adult red salmon totaling 67 fish were observed throughout the system. The second system sampled (ADFG 325-30-199) with minnow traps found 139 juvenile Dolly Varden, and snorkeling produced 836 Dolly Varden. A total of 6 adult Dolly Varden were sampled by hook and line.

**Subsistence Fisheries Project**

# **Cutthroat Trout Distribution and Abundance**

**Western Prince William Sound, Alaska**

**Project #38**

**Annual Report  
FY 2000**

**DRAFT**

**United States Department of Agriculture  
Forest Service  
Chugach National Forest  
Glacier Ranger District**

**October 2000**

**DRAFT**

### **Individual Drainages**

The following section describes the results from individual drainages surveyed. The order followed is the order that the drainages were surveyed. Names in quotes are the given / non-official name of these streams. See figures (Bar Graphs) in the appendices that list the Catch Per Unit Effort (CPUE) for snorkeling and minnow trapping streams, and for snorkeling, minnow trapping and rod and reel sampling for each lake. Not all drainages are included in the figures because not all systems were surveyed in the same fashion. For example, only the first three streams and lakes were minnow trapped. Icy Creek (see individual drainages below) was excluded from the Stream CPUE: Snorkeling figure (Bar graph) because of the high CPUE (15.045) for Coho. The high value masked the smaller CPUE values on the figure.

#### **"Two Bear"** - Alaska Dept. of Fish and Game Stream # 226-50-16106 (ADFG, 1989)

Flows into Puffin Cove - Port Bainbridge

No cutthroat were found in this system.

Stream / downstream of lake - Minnow trapping (902 min.) and snorkeling (70 min.) were used to survey the stream, with snorkeling having a higher CPUE than trapping for all species. More coho were observed than Dolly Varden. Reds, pinks and Dolly Varden were observed up to a potential barrier into the lake - a 4' falls into a plunge pool where Dolly Varden were holding.

Lake - Minnow trapping (1471 min.) snorkeling (136 min.) and rod and reel sampling (958 min.) were used to survey the lake. Minnow trapping caught coho and Dolly Varden, snorkeling had the highest CPUE and observed coho and red juveniles, and rod and reel caught 2 adult Dolly Varden and one juvenile coho.

#### **"Circus"** - Alaska Dept. of Fish and Game Stream # 226-50-16098 (ADFG, 1989)

Flows into Puffin Cove - Port Bainbridge

No cutthroat were found in this system.

Stream / downstream of lake - Minnow trapping (2818 min.) and snorkeling (360 min.) were used to survey the stream, with snorkeling having a higher CPUE (2.644) than trapping (.086). Many more Dolly Varden were observed than Coho. The upper stream may seasonally connect on the surface with the larger "Dolly" Lake that flows away from Puffin Cove into Whale Bay. At the time of survey the upper stream was intermittent with no connection to "Dolly" Lake. Adult pinks, chum, reds and Dolly Varden were present in the stream.

Lake - The "lake" was more of a small pond type feature between the upper and lower stream reaches. The lake margin was minnow trapped (903 min.), and fished (146 min) with snorkeling effort included in the stream data. Fishing effort had the higher CPUE than trapping. Dollies were dominant in the system. The pond received subsurface flows from nearby glacial systems (cold water).

#### **"Dolly"** - Alaska Dept. of Fish and Game Stream # 226-20-16300 (ADFG, 1989)

Flows into Whale Bay

No cutthroat were found in this system.

Stream / downstream of lake - Minnow trapping (4511 min.) and snorkeling (176 min.) were used to survey the stream, with snorkeling having a higher CPUE than trapping. Pinks, chum and Dolly Varden were observed in the stream. Has the highest total CPUE of stream in the surrounding drainages.

Lake - The lake was rod and reel sampled (314 min.) with only Dolly Varden being caught. Pink red, chum, 2 king salmon and Dolly Varden were observed in the lake.

#### **"Killer Willow"** - Alaska Dept. of Fish and Game Stream # 226-50-16101 (ADFG, 1989)

Flows into Puffin Cove - Port Bainbridge

No cutthroat were observed in this system.

Stream / downstream of lake - The stream was snorkeled (258 min.) finding a larger number of coho than Dolly Varden. A small falls and cascade may form a barrier into the upper reaches of the stream.