# **Unalakleet** (*YOO-nuh-luh-kleet*)

## **People and Place**

Location 1



Unalakleet is located on Norton Sound at the mouth of the Unalakleet River, 148 miles southeast of Nome and 395 miles northwest of Anchorage. Unalakleet is located in the Cape Nome Recording District and the Nome Census Area, but is not located within an organized Borough. The community encompasses 2.9 square miles of land and 2.3 square miles of water.

# Demographic Profile<sup>2</sup>

In 2010, there were 688 inhabitants in Unalakleet, making it the 88<sup>th</sup> largest of 352 total Alaskan communities with recorded populations that year. Between 2000 and 2009, the population of Unalakleet decreased by 2.95%, with an average annual growth rate of -0.32%, indicating a slow rate of population decline. The change in population from 1990 to 2010 is provided in Table 1.

A majority of Unalakleet residents identified themselves as American Indian and Alaska Native in 2010 (77.3%). Other ethnic groups present in Unalakleet in that year included White (15%), two or more races (6.4%), Hispanic or Latino (1%), Black or African American (0.6%), Asian (0.6%), and some other race (0.1%). The percentage of the population identifying themselves as American Indian and Alaska Native decreased by 8%, with corresponding increases in the percentages of the population identifying themselves as White, two or more races, some other race, Asian, Black or African American, and Hispanic or Latino. Changes in racial and ethnic composition from 2000 to 2010 are shown in Figure 1.

The average household size in Unalakleet in 2010 was 3.06, a decrease from 3.4 persons per household in 1990 and 3.33 in 2000. The total number of households in Unalakleet increased from 207 in 1990 to 224 in 2000 to 225 occupied housing units in 2010. Of the 268 total housing units surveyed for the 2010 Decennial Census, 138 were owner-occupied, 87 were renter-occupied, and 43 were vacant or used only seasonally. Throughout this period no residents of Unalakleet were reported to be living in group quarters.

-

<sup>&</sup>lt;sup>1</sup> Alaska Dept. of Comm. and Rural Affairs. (n.d.). *Community Database Online*. Retrieved October 17, 2011 from http://www.commerce.state.ak.us/dca/commdb/CF BLOCK.htm.

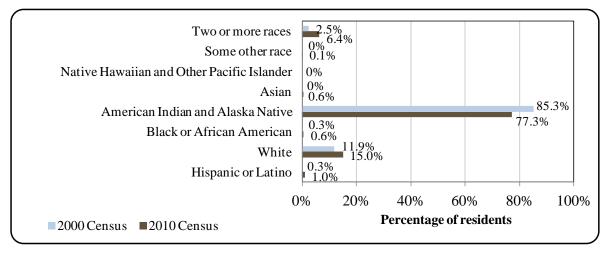
<sup>&</sup>lt;sup>2</sup> U.S. Census Bureau (n.d.). *Profile of selected social, economic and housing characteristics of all places within Alaska*. Datasets utilized include the 2000 (SF1 100% and SF3 sample data) and 2010 (Demographic Profile SF) Decennial Census and the 2010 American Community Survey 5-year estimates. Retrieved November 1, 2011 from http://factfinder2.census.gov/faces/nav/jsf/pages/index.xhtml.

Table 1. Population in Unalakleet from 1990 to 2010 by Source.

Year	U.S. Decennial Census <sup>1</sup>	Alaska Dept. of Labor Estimate of Permanent Residents <sup>2</sup>
1990	714	-
2000	747	<del>-</del>
2001	-	737
2002	-	727
2003	-	739
2004	-	730
2005	-	713
2006	-	728
2007	-	723
2008	-	722
2009	-	725
2010	688	-

<sup>&</sup>lt;sup>1</sup> (1) U.S. Census Bureau (1990). *CP-1: General Population Characteristics of all places within Alaska*. Retrieved November 1, 2011 from http://www.census.gov/prod/www/abs/decennial/1990.html. (2) U.S. Census Bureau (n.d.). *Profile of selected social, economic and housing characteristics of all places within Alaska*. Datasets utilized include the 2000 (SF1 100% and SF3 sample data) and 2010 (Demographic Profile SF) Decennial Census and the 2010 American Community Survey 5-year estimates. Retrieved November 1, 2011 from http://factfinder2.census.gov/faces/nav/jsf/pages/index.xhtml.

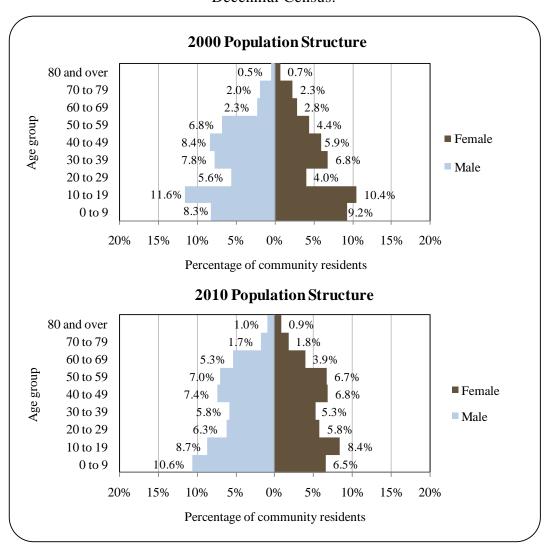
Figure 1. Racial and Ethnic Composition, Unalakleet: 2000-2010 (U.S. Census).



In 2010, the gender makeup in Unalakleet was 53.9% male and 46.1% female, slightly more skewed than the state as a whole (52% male, 48% female). The median age was estimated to be 33.1 years, lower than both the U.S. national average of 36.8 years and the median age for Alaska, 33.8 years. In 2010, the greatest percentage of the population fell within the age group zero to 19 years old, with the next largest percentage falling within the age group 40-59 years old. Relatively few individuals were age 70 or older in 2010. The overall population structure of Unalakleet in 2000 and 2010 is shown in Figure 2.

<sup>&</sup>lt;sup>2</sup> Alaska Department of Labor. (2011). *Current population estimates for Alaskan Communities*. Retrieved April 15, 2011, from http://labor.alaska.gov/research/pop/popest.htm.

Figure 2. Population Age Structure in Unalakleet Based on the 2000 and 2010 U.S. Decennial Census.



According to the 2006-10 American Community Survey (ACS),<sup>3</sup> in terms of educational attainment, 79.7% of Unalakleet residents aged 25 and over were estimated to hold a high school diploma or higher degree in 2010, compared to 90.7% of Alaskan residents overall. Also in 2010, 10.6% of residents aged 25 and over were estimated to have less than a ninth grade education, compared to 3.5% of Alaskan residents overall; 9.7% were estimated to have a ninth to 12<sup>th</sup> grade education but no diploma, compared to 5.8% of Alaskan residents overall; 44.3% were estimated to have a high school diploma or equivalent, compared to 27.4% of Alaskan residents overall; 13.1% were estimated to have some college but no degree, compared to 28.3% of Alaskan residents overall; 5.4% were estimated to have an Associate's degree, compared to

\_

<sup>&</sup>lt;sup>3</sup> While American Community Survey (ACS) estimates can provide a good snapshot estimate for larger populations, smaller populations can be misrepresented by ACS estimates if demographic information is not collected from a representative sample of the population. This is especially problematic for Alaskan communities with small populations that have a low probability of being adequately sampled.

8% of Alaskan residents overall; 15.3% were estimated to have a Bachelor's degree, compared to 17.4% of Alaskan residents overall; and 1.5% were estimated to have a graduate or professional degree, compared to 9.6% of Alaskan residents overall.

History, Traditional Knowledge, and Culture<sup>4</sup>

Archaeologists have dated house remnants along the beach ridge from 200 B.C. to 300 A.D. The name Unalakleet means "from the southern side." Unalakleet has long been a major trade center as the terminus for the Kaltag Portage, an important winter travel route connecting to the Yukon River. Indians on the upper river were considered "professional" traders with a monopoly on the Indian-Eskimo trade across the Kaltag Portage. The Russian-American Company built a post here in the 1830s. In 1898, reindeer herders from Lapland were brought to Unalakleet to establish sound herding practices. In 1901, the Army Signal Corps built over 605 miles of telegraph line from St. Michael to Unalakleet, over the portage to Kaltag and Fort Gibbon. The city was incorporated in 1974.

Unalakleet has a history of diverse cultures and trade activity. Unalakleet has a vibrant local economy, along with a traditional Unaligmiut Eskimo subsistence lifestyle. Fish, seal, caribou, moose, and bear are utilized as subsistence resources. The sale of alcohol is prohibited in the community, although importation and possession is allowed.

#### **Natural Resources and Environment**

Unalakleet has a subarctic climate with considerable maritime influences when Norton Sound is ice-free, usually from May to October. Winters are cold and dry. Average summer temperatures range 47 to 62 °F (8.3 to 16.7 °C); winter temperatures average -4 to 11 °F (-20 to -11.7 °C). Extremes have been measured from -50 to 87 °F (-45.6 to 30.6 °C). Precipitation averages 14 inches annually, with 41 inches of snow. <sup>5</sup>

Unalakleet is located near the Andreafsky Wilderness Area. The United States Congress designated the Andreafsky Wilderness Area in 1980. The area now has a total of 1,300,000 acres and is managed by the U.S. Fish & Wildlife Service. The expansive 1.3 million acres of the Andreafsky Wilderness Area cover only slightly more than 5 percent of the monstrously vast 20-million-acre Yukon Delta National Wildlife Refuge, America's largest unit of the National Wildlife Refuge System. Most of the delta is wetland tundra and marsh, and about one-third of it lies underwater. Here you'll find moose, foxes, beavers, martens, minks, wolves, wolverines, caribou, large populations of black and brown bears, and millions of salmon. Forests of white spruce and balsam poplar grow along the riverbanks of the Andreafsky River through the Wilderness Area. Near the headwaters the forests give way to alpine tundra, and a relatively flat, treeless delta. Fishing is excellent, and the bears know it. Both rivers are scenic, but the East Fork has more trees and runs closer to the mountains. One hundred twenty-five miles of the Andreafsky River and 137 miles of the East Fork River are designated National Wild and Scenic

<sup>5</sup> Ibid.

4

<sup>&</sup>lt;sup>4</sup> Alaska Dept. of Comm. and Rural Affairs. (n.d.). *Community Database Online*. Retrieved October 17, 2011 from http://www.commerce.state.ak.us/dca/commdb/CF\_BLOCK.htm.

Rivers, attracting river runners and anglers. Summers are cool and gentle by Alaskan standards, with days of fog. Winters are cold, dry, and severe.<sup>6</sup>

# **Current Economy**<sup>7</sup>

Both commercial fishing for herring and herring roe and subsistence activities are major components of Unalakleet's economy. Norton Sound Economic Development Council (NSEDC) operates a fish processing plant. Government and school positions are relatively numerous. Tourism is becoming increasingly important; there is world-class silver fishing in the area. Top employers in 2010 included Bering Strait School District, Norton Sound Economic Development Corp., Native Village of Unalakleet, City of Unalakleet, Norton Sound Health Corp., Alaska Commercial Co., Pro-West Contractors LLC, Kawerak Inc., and State of Alaska.

In 2010, per capita income in Unalakleet was estimated to be \$20,575 and the median household income was estimated to be \$47,222, compared to \$15,845 and \$42,083 in 2000, respectively. Taking inflation into account by converting the 2000 values to 2010 dollars, the real per capita income in 2000 is shown to have been \$20,836 and the real 2000 median household income was \$55,339. This shows that per capita income decreased very slightly over the period, and there was also a real decrease in median household income. In 2010, Unalakleet ranked 147<sup>th</sup> of 305 Alaskan communities with per capita income that year, and 147<sup>th</sup> out of 299 Alaskan communities with household income data. However, Unalakleet's small population size may have prevented the ACS from accurately portraying economic conditions. A potentially more accurate understanding of per capita income is obtained through economic data compiled by the Alaska Local and Regional Information (ALARI) database maintained by the Alaska Department of Labor and Workforce Development. According to the ALARI database, the per capita income in Unalakleet in 2010 was \$18,022, which indicates a more pronounced decrease in per capita income compared to the real per capita income values reported by the U.S. Census in 2000.

Based on the 2006-2010 ACS, 56.6% of the population age 16 and older was estimated to be in the civilian labor force, compared to the statewide rate of 68.8%. The local unemployment rate was 9.5%, compared to the statewide unemployment rate of 5.9%. Approximately 14.5% of local residents were living below the poverty line, compared to 9.6% of Alaskans overall. It should be noted that income and poverty statistics are based on wage income and other money sources; the relatively low income figures and high poverty rates reported for Unalakleet are not reflective of the value of subsistence to the local economy. In addition, these unemployment and poverty statistics are likely inaccurate given the small population of Unalakleet. A more accurate estimate is based on the ALARI database, which indicates that the unemployment rate in 2010 was 13.3%.

Based on household surveys conducted for the 2006-2010 ACS, the greatest percentage of workers was employed in the private sector (47%), while 46.6% were employed in the public sector and 6.5% were self-employed. Out of 247 people aged 16 and over that were estimated to

<sup>9</sup> Alaska Department of Labor and Workforce Development (n.d.). Alaska Local and Regional Information Database. Retrieved April 23, 2012 from http://live.laborstats.alaska.gov/alari/.

5

<sup>&</sup>lt;sup>6</sup> The University of Montana (n.d.). *Andreafsky Wilderness*. Retrieved March 22, 2012 from <a href="http://www.wilderness.net/index.cfm?fuse=NWPS&sec=wildView&WID=11">http://www.wilderness.net/index.cfm?fuse=NWPS&sec=wildView&WID=11</a>.

<sup>&</sup>lt;sup>7</sup> Unless otherwise noted, all monetary data are reported in nominal values.

<sup>&</sup>lt;sup>8</sup> See footnote 4

<sup>&</sup>lt;sup>10</sup> See footnote 3.

<sup>&</sup>lt;sup>11</sup> <u>See</u> footnote 9.

be employed in the civilian labor force in 2010, the greatest percentage worked in educational services, health care, and social assistance (42.2%), transportation, warehousing, and utilities (15.5%), and construction (10.7%). Smaller percentages of the workforce were estimated to be employed in public administration (7.8%), other services except public administration (2.4%), arts, entertainment, recreation, accommodations, and food services (3.4%), professional, scientific, management, administration, and waste management (2.9%), retail trade (2.4%), manufacturing (7.3%), and agriculture, forestry, fishing, hunting, and mining (5.3%). However, given the data reported in the *Commercial Fisheries* section below, the number of individuals employed in the farming, fishing, and forestry industries may be underestimated by census statistics as fishermen may hold another job and characterize their employment accordingly. Information about employment by industry is presented in Figure 3, and employment is broken down by occupation in Figure 4.

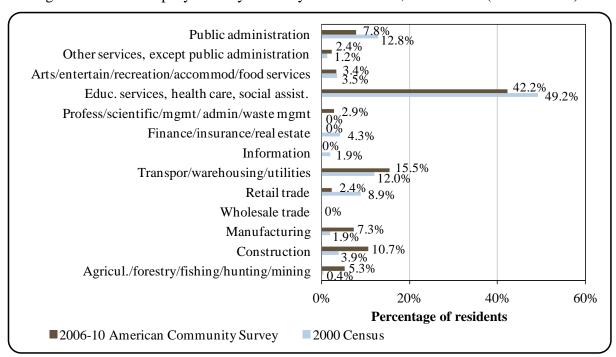
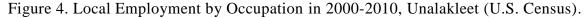
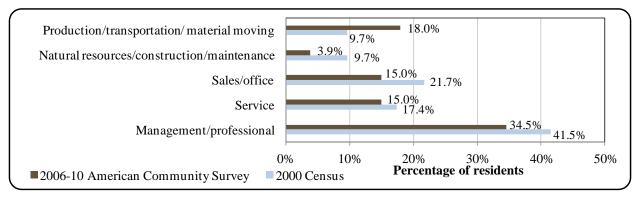


Figure 3. Local Employment by Industry in 2000-2010, Unalakleet (U.S. Census).





### Governance

Unalakleet is a Second-class city that is not located in an organized Borough. Total municipal revenue received by Unalakleet increased overall between 2000 and 2010. The city administered a 5% sales tax in 2010, as well as a liquor and accommodations tax. Municipal revenue figures were taken from financial audits. When adjusted for inflation, <sup>12</sup> total municipal revenues increased 23.0% between 2000 and 2010 from \$1.04 million, to \$1.65 million. In 2010, most (25.4%) municipal revenues were collected from local taxes, followed by gaming revenues (19.1%) and service charges (18.5%). Sales taxes accounted for 24.7% of total revenues in 2010, compared to 23.6% in 2000. In addition, state allocated Community Revenue Sharing accounted for 8.0% of total revenues that year, compared to 2.8% from State Revenue Sharing in 2000. Unalakleet received fisheries related grants between 2000 and 2010 for projects including a harbor feasibility and design and construction project. In addition, grants were received from NSEDC. Information regarding municipal finances can be found in Table 2.

Unalakleet was included under the Alaska Native Claims Settlement Act (ANCSA) and is federally recognized as a Native village. The authorized traditional entity, recognized by the Bureau of Indian Affairs (BIA) is the Unalakleet Native Corporation. The regional native corporation to which Unalakleet belongs is the Bering Straits Native Corporation.

Table 2. Selected Municipal, State, or Federal Revenue Streams for the Community of Unalakleet from 2000 to 2010.

Year	Total Municipal Revenue <sup>1</sup>	Sales Tax Revenue <sup>2</sup>	State/Community Revenue Sharing <sup>3,4</sup>	Fisheries- Related Grants (State and Federal) <sup>5</sup>
2000	\$1,039,880	\$245,605	\$29,130	n/a
2001	\$1,095,705	\$272,800	\$28,086	n/a
2002	\$1,244,650	\$275,860	\$28,512	\$800,000
2003	\$1,522,050	\$275,000	\$28,635	\$5,000,000
2004	\$1,161,000	\$271,753	-	n/a
2005	\$1,380,749	\$278,802	-	n/a
2006	\$1,408,092	\$262,773	-	\$75,000
2007	\$1,469,668	\$254,948	-	n/a
2008	\$1,528,444	\$344,136	-	n/a
2009	\$1,985,792	\$377,471	\$132,883	n/a
2010	\$1,653,644	\$408,411	\$132,360	n/a

Alaska Dept. of Comm. and Rural Affairs. (n.d.). *Financial Documents Delivery System*. Retrieved April 15, 2011from http://www.commerce.state.ak.us/dcra/commfin/CF FinRec.cfm.

<sup>&</sup>lt;sup>2</sup>Alaska Dept. of Comm. and Econ. Dev. (n.d.). *Alaska Taxable* (2000-2010). Retrieved April 15, 2011 from http://www.commerce.state.ak.us/dca/osa/osa\_summary.cfm.

<sup>&</sup>lt;sup>3</sup>Alaska Dept. of Rev. (n.d.). (2000-2009) Taxes and Fees Annual Report. Retrieved April 15, 2011from https://www.tax.state.ak.us.

<sup>&</sup>lt;sup>4</sup> The State Revenue Sharing program ceased in 2003 and was replaced by the Community Revenue Sharing program starting in 2009.

<sup>&</sup>lt;sup>5</sup>Alaska Dept. of Comm. and Rural Affairs. (n.d.). *Community Funding Database*. Retrieved April 15, 2011from http://www.commerce.state.ak.us/dca/commdb/CF\_Grants.htm.

<sup>&</sup>lt;sup>12</sup> Inflation calculated using Anchorage CPI from Alaska DOL: http://labor.alaska.gov/research/cpi/cpi.htm.

The closest office of the Alaska Department of Fish and Game (ADF&G) is located in Unalakleet, and the closest office of the Alaska Department of Commerce, Community, and Economic Development is located in Nome. The closest offices of the Alaska Department of Natural Resources, the National Marine Fisheries Service (NMFS), the Bureau of Citizenship and Immigration Services, and U.S. Immigration and Customs Enforcement are located in Anchorage.

#### **Infrastructure**

### Connectivity and Transportation

Unalakleet has a state-owned 5,900 foot long by 150 foot wide gravel runway and a gravel strip that is 1,900 feet long and 75 feet wide. There are regular flights to Anchorage. In June 2012, round-trip airfare between Unalakleet and Anchorage was \$450. 13 Cargo is lightered from Nome to the dock in Unalakleet. Local overland travel is mainly by ATVs, snowmobiles, and dogsleds in winter. 14

### Facilities 15

Water is derived from an infiltration gallery on Powers Creek and is treated and stored in a million-gallon steel tank. The water source is not sufficient during extremely cold weather. One-hundred-ninety (190) households are connected to the piped water and sewer system and have complete plumbing. Only two households haul water and honeybuckets. Residents haul refuse to the baler facility for transportation to the landfill. Refuse collection is available for commercial customers. Matanuska Electric Association owns and operates the electrical system in Unalakleet, through the Unalakleet Valley Electric Cooperative.

Law enforcement services are provided by a Village Public Safety Officer (VPSO) and a state troopers post. Fire and rescue services are provided by the city volunteer fire department using Project Code Red Equipment. There is a city jail and a community hall, as well as a school gym, two school libraries, and a public library.

### Medical Services<sup>16</sup>

Health care is provided by the Anikkan Inuit Illuaqutaat Sub-Regional Clinic, which is owned by the Village Council and operated by the Norton Sound Health Corporation. The clinic is a Community Health Aid Program site and a qualified Emergency Care Center. Emergency services have river and air access and are provided by volunteers and a health aide. The nearest hospital is located in Nome.

<sup>&</sup>lt;sup>13</sup> Airfare was obtained on the travel website http://www.travelocity.com for a round-trip ticket for travel from June 1 to June 8, 2012. Retrieved on December 1, 2011.

<sup>&</sup>lt;sup>14</sup> Alaska Dept. of Comm. and Rural Affairs. (n.d.). Community Database Online. Retrieved October 17, 2011 from http://www.commerce.state.ak.us/dca/commdb/CF BLOCK.htm. 15 Ibid.

<sup>16</sup> Ibid.

Educational Opportunities<sup>17</sup>

The Unalakleet school provides instruction to students from pre-school through 12<sup>th</sup> grade. In 2011, the school had 188 students and 18 teachers.

### **Involvement in North Pacific Fisheries**

History and Evolution of Fisheries

Commercial salmon fisheries began to develop shortly after the purchase of Alaska by the U.S. in 1867. However, the Norton Sound commercial salmon fishery developed later than in other regions of the State. In 1959 and 1960, biologists from the Division of Commercial Fisheries conducted an inventory of salmon resources and determined that harvestable surpluses were present in several Norton Sound river systems. They encouraged processors to develop the fishery after statehood as part of an effort to bring economic benefits to this area of rural Alaska. The first commercial harvest occurred in 1961, and salmon markets in the area have been sporadic since that time. Harvests increased through the 1990s, and have declined since then.<sup>18</sup>

Commercial exploitation of halibut and groundfish first extended into the Bering Sea region in 1928 after development of diesel engines, which allowed fishing vessels to undertake longer trips. <sup>19</sup> King crab fisheries developed in the Bering Sea beginning in the 1950s, and Norton Sound is one of the historical centers of this fishery.

Commercial fishing of herring by domestic fishermen dates back to 1916 when a fall food fishery began in Golovin Bay. By 1981, the herring fleet in Norton Sound was harvesting approximately 20% of the observed biomass with over 300 fishermen were participating in the fishery. The observed herring biomass within the Norton Sound District was 53,786 tons in 2011. The observed herring biomass within the Norton Sound District was 53,786 tons in 2011.

In 1976, red king crab (legal) biomass within the Norton Sound was approximately 1.7 million crabs. By 1982, that number had fallen to roughly 0.8 million crabs. In 1999, the estimated crab population reached a near historical high of 1.6 million, which fell again to approximately 0.8 million in 2002. In 2008, the legal population was estimated at 1.5 million. Total open access red king crab harvest for the Norton Sound District in 2008 was 364,235 pounds. Total Community Development Quota (CDQ) red king crab harvest that year was 30,900 pounds. <sup>22</sup>

<sup>&</sup>lt;sup>17</sup> Alaska Department of Education and Early Development. (2012). *Statistics and Reports*. Retrieved April 24, 2012 from http://eed.alaska.gov/stats/.

<sup>&</sup>lt;sup>18</sup> Clark, McGregor, Mecum, Krasnowski and Carroll. 2006. *The Commercial Salmon Fishery in Alaska*. Alaska Dept. of Fish and Game, Pgs. 105-146. Retrieved December 28, 2011 from http://www.adfg.alaska.gov/static/home/library/PDFs/afrb/clarv12n1\_p4.pdf.

<sup>&</sup>lt;sup>19</sup> Thompson, William F. and Norman L. Freeman. 1930. *History of the Pacific Halibut Fishery*. Report of the International Fisheries Commission. Number 5. Retrieved June 1, 2012 from http://www.iphc.int/publications/scirep/Report0005.pdf.

<sup>&</sup>lt;sup>20</sup> Lean. C. (1989). *The Development of the Norton Sound Herring Fishery*, 1979-1988. Retrieved April 3, 2012 from: http://www.sf.adfg.state.ak.us/FedAidPDFs/RIR.3N.1989.04.pdf.

<sup>&</sup>lt;sup>21</sup> Alaska Department of Fish and Game. (2012). 2012 Arctic-Yukon-Kuskokwim Herring Outlook. Retrieved April 3, 2012 from: http://www.adfg.alaska.gov/static/fishing/PDFs/commercial/2012 ayk herring outlook.pdf.

<sup>&</sup>lt;sup>22</sup> Menard, J.; Soong, J.; & Kent, S. (2010). 2008 Annual Management Report Norton Sound, Port Clarence, and Kotzebue. Retrieved April 3, 2012 from: http://www.adfg.alaska.gov/FedAidPDFs/FMR10-49.pdf.

Norton Sound has the northernmost fisheries for both Pacific herring and red king crab. Although the Norton Sound herring spawning biomass has been relatively stable in recent times, the market for herring roe has declined due to decreasing consumption of herring roe in Japan. Processor interest in the Norton Sound sac roe fishery has declined more than in other areas of the State, largely due to the timing of the fishery, which takes place later than sac roe fisheries elsewhere in the state and conflicts with the opening of the first salmon fisheries of the season. In addition, ice floes are often present in Norton Sound during the herring season. In contrast, the Norton Sound red king crab stock has shown an increasing trend since a population low in the 1990s, and today provides small summer and winter fisheries. NMFS and ADF&G jointly manage Bering Sea king crab stocks. All Nome king crab fishermen hold both state-issued king crab permits, as well as permits in the Community Development Quota (CDQ) king crab fishery. The CDQ program allocates a percentage of all Bering Sea and Aleutian Island quotas for groundfish, prohibited species, halibut, and crab to eligible communities.

In 1959 and 1960 an experimental salmon fishery was established in the Norton Sound area. State officials encouraged seafood processors to explore and develop fisheries in the region in hopes of providing economic benefits to local communities. In 1961, commercial harvesters began targeting Chinook and coho salmon in the Unalakleet and Shaktoolik areas. Back then, catch was cleaned and shipped to Anchorage for further processing. A single freezer ship processed pink and chum salmon in the area during 1961. By 1962, two floating processors were in operation, and commercial salmon fishing extended into Norton Bay, Moses Point, and Golovin Bay. Peak canning operations occurred in 1963. Commercial Chinook harvests peaked in the 1980s when the 10-year annual average harvest was about 8,000 fish. Commercial harvests of sockeye salmon have always been minor. Coho salmon harvests averaged about 40,000 annually during the 1980s. By the 1990s, that number increased to approximately 55,000 fish, but decreased by half by 2000. Pink salmon harvests are sporadic, and fluctuate by year. In 1994, almost one million pink salmon were commercially harvested while in more recent years, harvests have dropped to zero. Commercial harvests of chum salmon averaged 150,000 fish annually during the 1970s and 1980s. Stricter escapement goals reduced that number in the 1990s.<sup>26</sup>

Unalakleet is located on Norton Sound at the mouth of the Unalakleet River.<sup>27</sup> The area is not located within a Federal Statistical and Reporting Area, but is located within Pacific Halibut Fishery Regulatory Area 4E and the Bering Sea Sablefish Regulatory Area. Unalakleet participates in the Community Development Quota (CDQ) program through the NSEDC. The CDQ program was implemented to help alleviate economic distress in rural communities in western Alaska by allocating a percentage of halibut, crab, and groundfish to six CDQ non-profit organizations representing 65 communities in the Bering Strait and Aleutian Islands region.<sup>28</sup>

<sup>&</sup>lt;sup>23</sup> Ibid.

<sup>&</sup>lt;sup>24</sup> Alaska Dept. of Fish and Game. 2012. *Red King Crab Species Profile*. Retrieved June 20, 2012 from http://www.adfg.alaska.gov/index.cfm?ADFG=redkingcrab.main.

<sup>&</sup>lt;sup>25</sup> NOAA Fisheries. (n.d.). *Community Development Quota (CDQ) Program*. Retrieved June 20, 2012 from http://www.fakr.noaa.gov/cdq/default.htm.

<sup>&</sup>lt;sup>26</sup> Clark, J. H. et al. (2006). *The Commercial Salmon Fishery in Alaska*. Retrieved July 10, 2012 from: http://www.adfg.alaska.gov/static/home/library/PDFs/afrb/clarv12n1.pdf. <sup>27</sup> Ibid.

<sup>&</sup>lt;sup>28</sup> Fina, M. (2011). Evolution of Catch Share Management: Lessons from Catch Share Management in the North Pacific. *Fisheries*, Vol. 36(4). Retrieved September 12, 2012 from <a href="http://www.fakr.noaa.gov/npfmc/PDFdocuments/catch\_shares/Fina\_CatchShare\_411.pdf">http://www.fakr.noaa.gov/npfmc/PDFdocuments/catch\_shares/Fina\_CatchShare\_411.pdf</a>.

Managers of CDQ organizations authorize individual fishermen and fishing vessels to harvest a certain portion of the allocated CDQ.

### **Processing Plants**

According to ADF&G's 2010 Intent to Operate list, one shoreside processing plant is present in the community. The Norton Sound Seafoods Products plant in Unalakleet is owned by the NSEDC, the CDQ group for the Norton Sound area. The processing plant was established in 1992.<sup>29</sup> The Unalakleet facility processes Red King crab, salmon and halibut.<sup>30</sup> In 2010, the plant employed a total of 100 workers during peak season (from June through September).<sup>31</sup>

#### Fisheries-Related Revenue

Unalakleet received fisheries-related revenue from the Shared Fisheries Business Tax and port/dock usage fees between 2000 and 2010. Revenue received from the Shared Fisheries Business Tax varied considerably during this period, from \$145 in 2004 to \$15,706 in 2010. Revenue received from port/dock usage fees remained relatively stable between 2000 and 2007, then more than doubled in 2008 before decreasing substantially in 2009 and 2010. Information about fisheries-related revenue received by Unalakleet between 2000 and 2010 is presented in Table 3.<sup>32</sup>

### Commercial Fishing

In 2010, a total of 126 Unalakleet residents held 151 commercial fishing permits issued by the Commercial Fisheries Entry Commission (CFEC) for the crab, herring, groundfish, and salmon fisheries (Table 4). Overall, the number of permits, permit holders, and permits reported as fished decreased before increasing again between 2000 and 2010. The number of crab CFEC permits and permit holders decreased between 2000 and 2010, while the number of crab CFEC permits reported as fished increased and then decreased during this period. In 2010, crab CFEC permits were issued for the Norton Sound king crab pot fishery using vessels under 60 feet. The number of herring CFEC permits and permit holders increased slightly during this period, while the number of herring CFEC permits reported as fished was highly variable. In 2010, 71 herring CFEC permits were issued for the Norton Sound gill net fishery, while one was issued for the Norton Sound herring food/bait gill net fishery. There was one groundfish CFEC permit held between 2000 and 2002, and two held in 2010 for the statewide miscellaneous saltwater finfish hand troll fishery. Both groundfish CFEC permits were reported as fished in 2010, the first year during this period that groundfish CFEC permits were reported as fished. The number of salmon CFEC permit holders increased slightly between 2000 and 2010, while the number of salmon CFEC permits decreased slightly and the number of permits reported as fished increased during

<sup>&</sup>lt;sup>29</sup> A survey conducted by NOAA's Alaska Fisheries Science Center with shore-based processing plant managers in

<sup>&</sup>lt;sup>30</sup> Norton Sound Economic Development Corporation (n.d.). Norton Sound Seafood Products. Retrieved April 26, 2012 from http://www.nsedc.com/nssp.html.

<sup>&</sup>lt;sup>31</sup> See footnote 29.

<sup>&</sup>lt;sup>32</sup> A direct comparison between fisheries-related revenue and total municipal revenue cannot reliably be made as not all fisheries-related revenue sources are included in the municipal budget.

this period. In 2010, 70 salmon CFEC permits were issued for the Norton Sound gill net fishery, while one permit was issued for the Lower Yukon gill net fishery and one permit was issued for the Peninsula-Aleutians set gill net fishery. There were no Federal Fisheries Permits held by Unalakleet residents between 2000 and 2010. There was one groundfish License Limitation Program (LLP) permit held between 2000 and 2010, though the permit was not reported as fished between 2001 and 2010. There were 13 Unalakleet residents holding 13 crab LLP permits in 2010, a number that decreased slightly between 2000 and 2010 (Table 4).

The number of crew license holders in Unalakleet varied between 2000 and 2010, with an average of 49 crew license holders per year. The number of fish buyers in Unalakleet also varied during this period, with an average of five fish buyers in Unalakleet between 2000 and 2010. There was one shore-side processing facility located in Unalakleet during this period. The number of vessels owned primarily by Unalakleet residents decreased between 2000 and 2010, as did the number of vessels homeported in Unalakleet (Table 5).

The number of vessels landing catch in Unalakleet varied during this period, averaging 54 per year. The number of pounds of catch landed in Unalakleet and the associated ex-vessel revenue was considered confidential in 2002, 2004, and 2009 due to a small number of participants. In other years between 2000 and 2010, landings were variable, averaging 2,730,640 pounds per year (Table 5). During this period, the ex-vessel revenue received from catch landed in Unalakleet increased substantially. In 2010, Unalakleet ranked 32<sup>nd</sup> in landings and 39<sup>th</sup> in exvessel revenue out of 67 Alaskan communities with landings and ex-vessel revenue reported that year.

Landings by species and associated ex-vessel revenue in Unalakleet were considered confidential between 2000 and 2010, with the exception of crab landings and revenue between 2000 and 2010 (zero landings recorded) and herring landings in 2000 and 2001. Herring landings and ex-vessel revenue increased substantially between 2000 and 2001. Information on landed pounds and ex-vessel revenue by species in Unalakleet between 2000 and 2010 is presented in Table 9. Landings by Unalakleet residents were considered confidential between 2000 and 2010 due to a small number of participants with the exception of landings for crab, herring, and salmon in select years. Landings of crab and associated ex-vessel revenue increased and then decreased between 2000 and 2009. Landings and associated ex-vessel revenue for herring were highly variable between 2000 and 2003, 2005 and 2007, and 2009 and 2010. Landings and ex-vessel revenue for salmon were also variable in 2001 and between 2003 and 2008. Information on landed pounds and ex-vessel revenue by Unalakleet residents is presented in Table 10.

There were no halibut quota share account holders (Table 6) or sablefish quota share account holders (Table 7) between 2000 and 2010, and no crab quota share account holders between 2005 and 2010 (Table 8).

Table 3. Known Fisheries-Related Revenue (in U.S. Dollars) Received by the Community of Unalakleet: 2000-2010.

Revenue source	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010
Raw fish tax <sup>1</sup>	n/a										
Shared Fisheries Business Tax <sup>1</sup>	\$2,213	\$10,431	\$9,800	\$2,309	\$145	\$1,226	\$2,393	\$5,661	\$7,283	\$9,818	\$15,706
Fisheries Resource Landing Tax <sup>1</sup>	n/a										
Fuel transfer tax <sup>2</sup>	n/a										
Extraterritorial fish tax <sup>2</sup>	n/a										
Bulk fuel transfers <sup>1</sup>	n/a										
Boat hauls <sup>2</sup>	n/a										
Harbor usage <sup>2</sup>	n/a										
Port/dock usage <sup>2</sup>	\$12,000	\$11,000	\$11,000	\$11,000	\$11,000	\$12,000	\$12,000	\$12,000	\$25,000	\$2,500	\$2,000
Fishing gear storage on public land <sup>3</sup>	n/a										
Marine fuel sales tax <sup>3</sup>	n/a										
Total fisheries-related revenue <sup>4</sup>	\$14,213	\$21,431	\$20,800	\$13,309	\$11,145	\$13,226	\$14,393	\$17,661	\$32,283	\$12,318	\$17,706
Total municipal revenue in millions <sup>5</sup>	\$1.04 M	\$1.10 M	\$1.24 M	\$1.52 M	\$1.16 M	\$1.38 M	\$1.41 M	\$1.47 M	\$1.53 M	\$1.99 M	\$1.65 M

Note: n/a indicates that no data were reported for that year.

<sup>&</sup>lt;sup>1</sup> Alaska Dept. of Comm. and Econ. Dev. (n.d.) *Alaska Taxable (2000-2010)*. Retrieved April 15, 2011 from http://www.commerce.state.ak.us/dca/osa/osa summary.cfm.

<sup>&</sup>lt;sup>2</sup> Alaska Dept. of Comm. and Rural Affairs. (n.d.) *Financial Documents Delivery System*. Retrieved April 15, 2011 at http://www.commerce.state.ak.us/dcra/commfin/CF\_FinRec.cfm.

<sup>&</sup>lt;sup>3</sup> Reported by community leaders in a survey conducted by the AFSC in 2011.

<sup>&</sup>lt;sup>4</sup> Total fisheries related revenue represents a sum of all known revenue sources in the previous rows.

<sup>&</sup>lt;sup>5</sup> Total municipal revenue represents the total revenue that the city reports each year in its municipal budget. Alaska Dept. of Comm. and Rural Affairs. (n.d.) *Financial Documents Delivery System*. Retrieved April 15, 2011 at http://www.commerce.state.ak.us/dcra/commfin/CF FinRec.cfm.

Table 4. Permits and Permit Holders by Species, Unalakleet: 2000-2010.

Species		2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010
Groundfish (LLP) 1	Total permits	1	1	1	1	1	1	1	1	1	1	1
	Active permits	1	0	0	0	0	0	0	0	0	0	0
	% of permits fished	100%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%
	Total permit holders	1	1	1	1	1	1	1	1	1	1	1
Crab (LLP) 1	Total permits	15	15	18	18	16	15	14	13	13	13	13
	Active permits	2	6	6	6	6	7	6	4	3	4	4
	% of permits fished	13%	40%	33%	33%	37%	46%	42%	30%	23%	30%	30%
	Total permit holders	15	15	18	18	16	15	14	13	13	13	13
Federal Fisheries	Total permits	0	0	0	0	0	0	0	0	0	0	0
Permits <sup>1</sup>	Fished permits	0	0	0	0	0	0	0	0	0	0	0
	% of permits fished	-	-	-	-	-	-	-	-	-	-	-
	Total permit holders	0	0	0	0	0	0	0	0	0	0	0
Crab (CFEC) <sup>2</sup>	Total permits	13	16	27	22	15	11	9	8	8	6	5
	Fished permits	5	6	16	12	9	6	7	6	7	4	3
	% of permits fished	38%	38%	59%	55%	60%	55%	78%	75%	88%	67%	60%
	Total permit holders	12	15	19	13	11	9	8	7	6	5	5
Other shellfish (CFEC) <sup>2</sup>	Total permits	0	0	0	0	0	0	0	0	0	0	0
	Fished permits	0	0	0	0	0	0	0	0	0	0	0
	% of permits fished	-	-	-	-	-	-	-	-	-	-	-
	Total permit holders	0	0	0	0	0	0	0	0	0	0	0
Halibut (CFEC) <sup>2</sup>	Total permits	1	0	2	3	3	1	0	0	0	0	0
	Fished permits	1	0	1	1	2	1	0	0	0	0	0
	% of permits fished	100%	-	50%	33%	67%	100%	-	-		-	-
	Total permit holders	1	0	2	3	3	1	0	0	0	0	0
Herring (CFEC) <sup>2</sup>	Total permits	69	67	64	63	63	60	64	65	67	68	72
	Fished permits	21	11	7	6	0	15	11	8	12	6	14
	% of permits fished	30%	16%	11%	10%	%	25%	17%	12%	18%	9%	19%
	Total permit holders	70	70	64	64	63	61	65	65	69	69	75

Table 4 cont'd. Permits and Permit Holders by Species, Unalakleet: 2000-2010.

Species		2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010
Sablefish (CFEC) <sup>2</sup>	Total permits	0	0	0	0	0	0	0	0	0	0	0
	Fished permits	0	0	0	0	0	0	0	0	0	0	0
	% of permits fished	-	-	-	-	-	-	-	-	-	-	-
	Total permit holders	0	0	0	0	0	0	0	0	0	0	0
Groundfish (CFEC) <sup>2</sup>	Total permits	1	1	1	0	0	0	0	0	0	0	2
	Fished permits	0	0	0	0	0	0	0	0	0	0	2
	% of permits fished	0%	0%	0%	-	-	-	-	-	-	-	100%
	Total permit holders	1	1	1	0	0	0	0	0	0	0	2
Other Finfish (CFEC) <sup>2</sup>	Total permits	3	3	3	0	0	0	0	0	0	0	0
	Fished permits	1	1	0	0	0	0	0	0	0	0	0
	% of permits fished	33%	33%	0%	-	-	-	-	-	-	-	-
	Total permit holders	3	3	3	0	0	0	0	0	0	0	0
Salmon (CFEC) <sup>2</sup>	Total permits	73	69	65	65	65	63	67	66	69	70	72
	Fished permits	40	29	5	20	24	26	39	43	52	46	56
	% of permits fished	55%	42%	8%	31%	37%	41%	58%	65%	75%	66%	78%
	Total permit holders	76	69	64	64	65	63	69	69	76	75	81
Total CFEC Permits <sup>2</sup>	Permits	160	156	162	153	146	135	140	139	144	144	151
	Fished permits	68	47	29	39	35	48	57	57	71	56	75
	% of permits fished	43%	30%	18%	25%	24%	36%	41%	41%	49%	39%	50%
	Permit holders	115	110	103	100	100	97	105	108	118	121	126

<sup>&</sup>lt;sup>1</sup> National Marine Fisheries Service. (2011). Data on License Limitation Program, Alaska Federal Processor Permits (FPP), Federal Fisheries Permits (FFP), and Permit holders. NMFS Alaska Regional Office. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

<sup>&</sup>lt;sup>2</sup> Alaska Commercial Fisheries Entry Commission. (2011). Alaska commercial fishing permits, permit holders, and vessel licenses, 2000 – 2010. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

Table 5. Characteristics of the Commercial Fishing Sector in Unalakleet: 2000-2010.

Year	Crew License Holders <sup>1</sup>	Count of All Fish Buyers <sup>2</sup>	Count of Shore- Side Processing Facilities <sup>3</sup>	Vessels Primarily Owned by Residents <sup>4</sup>	Vessels Homeported <sup>4</sup>	Vessels Landing Catch in Unalakleet <sup>2</sup>	Total Net Pounds Landed in Unalakleet <sup>2,5</sup>	Total Ex- Vessel Value of Landings in Unalakleet <sup>2,5</sup>
2000	68	7	1	85	103	71	2,482,527	\$311,633
2001	29	6	1	87	97	96	4,268,028	\$431,962
2002	20	2	1	77	85	57		
2003	27	5	1	62	73	51	3,068,738	\$246,486
2004	23	3	1	67	78	23		
2005	41	6	1	54	66	80	4,245,772	\$809,061
2006	52	5	1	56	68	71	2,316,674	\$654,099
2007	62	7	1	52	65	88	1,260,057	\$790,747
2008	74	4	1	47	59	12	1,440,263	\$1,306,525
2009	67	3	1	45	53	10		
2010	73	4	1	51	59	31	2,763,063	\$1,490,781

*Note: Cells showing – indicate that the data are considered confidential.* 

<sup>&</sup>lt;sup>1</sup> Alaska Department of Fish and Game. (2011). Alaska sport fish and crew license holders, 2000 – 2010. ADF&G Division of Administrative Services. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

<sup>&</sup>lt;sup>2</sup> Alaska Department of Fish and Game, and Alaska Commercial Fisheries Entry Commission. (2011). Alaska fish ticket data. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

<sup>&</sup>lt;sup>3</sup> Alaska Department of Fish and Game. (2011). Data on Alaska fish processors. ADF&G Division of Commercial Fisheries. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

<sup>&</sup>lt;sup>4</sup> Alaska Commercial Fisheries Entry Commission. (2011). Alaska commercial fishing permits, permit holders, and vessel licenses, 2000 – 2010. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

<sup>&</sup>lt;sup>5</sup> Totals only represent non-confidential data.

Table 6. Halibut Catch Share Program Participation by Residents of Unalakleet: 2000-2010.

Year	Number of Halibut Quota Share	Halibut Quota	Halibut IFQ Allotment (pounds)
	Account Holders	Shares Held	* ′
2000	0	0	0
2001	0	0	0
2002	0	0	0
2003	0	0	0
2004	0	0	0
2005	0	0	0
2006	0	0	0
2007	0	0	0
2008	0	0	0
2009	0	0	0
2010	0	0	0

Source: National Marine Fisheries Service. (2011). Alaska Individual Fishing Quota (IFQ) permit data. NMFS Alaska Regional Office. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

Table 7. Sablefish Catch Share Program Participation by Residents of Unalakleet: 2000-2010.

Year	Number of Sablefish Quota Share Account Holders	Sablefish Quota Shares Held	Sablefish IFQ Allotment (pounds)
2000	0	0	0
2001	0	0	0
2002	0	0	0
2003	0	0	0
2004	0	0	0
2005	0	0	0
2006	0	0	0
2007	0	0	0
2008	0	0	0
2009	0	0	0
2010	0	0	0

Source: National Marine Fisheries Service. (2011). Alaska Individual Fishing Quota (IFQ) permit data. NMFS Alaska Regional Office. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

Table 8. Bering Sea and Aleutian Island Crab Catch Share Program Participation by Residents of Unalakleet: 2000-2010.

Year	Number of Crab Quota	Crab Quota Shares	Crab IFQ
	<b>Share Account Holders</b>	Held	Allotment (pounds)
2005	0	0	0
2006	0	0	0
2007	0	0	0
2008	0	0	0
2009	0	0	0
2010	0	0	0

Source: National Marine Fisheries Service. (2011). Alaska Individual Fishing Quota (IFQ) permit data. NMFS Alaska Regional Office. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

Table 9. Landed Pounds and Ex-vessel Revenue, by Species, in Unalakleet: 2000-2010.

			Total N	at Dour	$ds^{I}$						
	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010
Crab	0	0	0	0	0	0	0	0	0	0	0
Finfish											
Halibut											
Herring	1,979,519	4,035,863									
Other Groundfish											
Other Shellfish											
Pacific Cod											
Pollock											
Sablefish											
Salmon											
Total <sup>2</sup>	1,979,519	4,035,863									
		Ex-vessel	Value (1	nomina	U.S. de	ollars)					
	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010
Crab	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Finfish											
Halibut											
Herring	\$182,416	\$370,132									
Other Groundfish											
Other Shellfish											
Pacific Cod											
Pollock											
Sablefish											
Salmon											
$Total^2$	\$182,416	\$370,132									

*Note: Cells showing – indicate that the data are considered confidential.* 

Source: Alaska Department of Fish and Game, and Alaska Commercial Fisheries Entry Commission. (2011). Alaska fish ticket data. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

Net pounds refers to the landed weight recorded in fish tickets.

<sup>&</sup>lt;sup>2</sup> Totals only represent non-confidential data.

Table 10. Landed Pounds and Ex-vessel Revenue, by Species, by Unalakleet Residents: 2000-2010.

				Total 1	Net Pounds <sup>1</sup>						
	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010
Crab	35,088	48,806	53,814	61,542	108,007	118,509	91,225	46,587	83,387	73,259	
Finfish											
Halibut											
Herring	1,218,501	359,670	399,156	492,495		732,512	235,828	65,774		56,376	677,541
Other Groundfish											
Other Shellfish											
Pacific Cod											
Pollock											
Sablefish											
Salmon		63,771		25,573	124,997	208,586	231,511	195,320	84,005		
Total <sup>2</sup>	1,253,589	472,247	452,970	579,610	233,004	1,059,607	558,564	307,681	167,392	129,635	677,541
			Ex-ve	essel Value (	(nominal U.	S. dollars)					
	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010
Crab	\$106,436	\$160,903	\$323,741	\$243,416	\$336,231	\$405,514	\$241,493	\$131,737	\$283,186	\$230,580	
Finfish											
Halibut											
Herring	\$110,979	\$65,008	\$26,310	\$26,102		\$62,264	\$16,473	\$21,072		\$16,913	\$90,872
Other Groundfish											
Other Shellfish											
Pacific Cod											
Pollock											
Sablefish											
Salmon		\$18,452		\$10,887	\$50,424	\$110,368	\$119,665	\$117,772	\$56,310		
Total <sup>2</sup>	\$217,415	\$244,363	\$350,051	\$280,405	\$386,655	\$578,146	\$377,630	\$270,581	\$339,496	\$247,493	\$90,872

Note: Cells showing – indicate that the data are considered confidential.

Source: Alaska Department of Fish and Game, and Alaska Commercial Fisheries Entry Commission. (2011). Alaska fish ticket data. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

Net pounds refers to the landed weight recorded in fish tickets.

Totals only represent non-confidential data.

### Recreational Fishing

Between 2000 and 2010, there were between one and two sport fish guide businesses registered in Unalakleet. However, none of them were reported as active during those years. The number of sport fish guide licenses held in the community increased from five in 2000, to nine in 2010. Between those years there were an average of five sport fish guide licenses held in the community during any given year. No kept/released log book data were reported for fishing charters out of Unalakleet between 2000 and 2010.<sup>33</sup>

An average of 222 sport fishing licenses were sold to Unalakleet residents between 2000 and 2010 (irrespective of the location of the point of sale). In contrast, an average of 449 sport fishing licenses were sold in Unalakleet during this period, indicating the potential that visitors to Unalakleet participated in sport fishing activities.

Unalakleet is located within Alaska Sport Fishing Survey Area W – Seward Peninsula – Norton Sound. Information is available about both saltwater and freshwater sport fishing activity at this regional scale. Between 2000 and 2010, there was significant sport fishing activity in both saltwater and freshwater, although freshwater sport fishing was more important in the region. Alaska resident anglers consistently fished more angler days in both freshwater and saltwater (34 – 2,663 saltwater and 6,199 to 17,579 freshwater angler days) than non-Alaska residents (0 – 204 saltwater and 2,087 – 8,307 freshwater angler days) during the period. This information about the sport fishing sector in and near Unalakleet is displayed in Table 11.

The Alaska Statewide Harvest Survey, <sup>34</sup> conducted by ADF&G between 2000 and 2010, noted the following species targeted by private anglers in Unalakleet: all five species of salmon, Dolly Varden, whitefish, Arctic grayling, Northern pike, sheefish, Pacific halibut, and smelt.

**Active Sport Sport Fish Sport Fishing Sport Fishing** Fish Guide Guide Licenses Sold in Year **Licenses Sold** Licenses<sup>1</sup> Businesses<sup>1</sup> to Residents<sup>2</sup> **Unalakleet**<sup>2</sup> 

Table 11. Sport Fishing Trends, Unalakleet: 2000-2010.

<sup>&</sup>lt;sup>33</sup> Alaska Department of Fish and Game. (2011). Alaska sport fish charter logbook database, 2000-2010. ADF&G Division of Administrative Services. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

<sup>&</sup>lt;sup>34</sup> Alaska Department of Fish and Game. (2011). Alaska Sport Fishing Survey results, 2000-2010. ADF&G Division of Sport Fish, Alaska Statewide Harvest Survey project. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. http://www.adfg.alaska.gov/sf/sportfishingsurvey/ (Accessed September 2011).

Table 11 cont'd. Sport Fishing Trends, Unalakleet: 2000-2010.

	Saltw	ater	Fresh	Freshwater				
Year	Angler Days Fished – Non- residents <sup>3</sup>	Angler Days Fished – Alaska Residents <sup>3</sup>	Angler Days Fished – Non- residents <sup>3</sup>	Angler Days Fished – Alaska Residents <sup>3</sup>				
2000	196	2,663	3,789	11,795				
2001	64	988	2,087	7,816				
2002	94	1,650	4,321	12,260				
2003	30	1,530	3,632	7,211				
2004	204	497	4,183	8,439				
2005	56	1,940	8,307	6,764				
2006	90	1,400	3,547	12,535				
2007	49	530	3,688	12,400				
2008	0	655	3,761	17,579				
2009	133	897	4,198	11,995				
2010	43	34	4,334	6,199				

<sup>&</sup>lt;sup>1</sup> Alaska Department of Fish and Game. (2011). Alaska sport fish guide licenses and businesses, 2000 – 2010. ADF&G Division of Administrative Services. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

### Subsistence Fishing

Residents of Unalakleet actively practice a traditional Unaligmiut Eskimo Subsistence lifestyle. Fish, seal, caribou, moose, and bear are utilized for subsistence.<sup>35</sup> Data regarding subsistence participation by household and species and per capita subsistence harvest were not reported between 2000 and 2010 (Table 12). However, data on total harvests in the community by species are available to some extent.

In years for which data were reported for salmon harvests between 2000 and 2010, an average of 219 subsistence salmon permits were issued to Unalakleet households, with an average of 200 permits returned. This represents the use of almost one permit per household in the community, indicating the extremely wide use of salmon in the diet of households in Unalakleet. Pink salmon were the primary species harvested under subsistence permits (an average of 14,134 pink salmon per year), along with several thousand coho, Chinook, and chum salmon and several hundred sockeye salmon per year (Table 13). Data on the amount of marine invertebrates and non-salmon fish (not including halibut) harvested for subsistence use were not reported between 2000 and 2010.

<sup>&</sup>lt;sup>2</sup> Alaska Department of Fish and Game. (2011). Alaska sport fish and crew license holders, 2000 – 2010. ADF&G Division of Administrative Services. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. [URL not publicly available as some information is confidential.]

Alaska Department of Fish and Game. (2011). Alaska Sport Fishing Survey results, 2000 – 2010. ADF&G Division of Sport Fish, Alaska Statewide Harvest Survey project. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. http://www.adfg.alaska.gov/sf/sport fishingsurvey/ (Accessed September 2011).

<sup>&</sup>lt;sup>35</sup> Alaska Dept. of Comm. and Rural Affairs. (n.d.). *Community Database Online*. Retrieved October 17, 2011 from http://www.commerce.state.ak.us/dca/commdb/CF\_BLOCK.htm.

Halibut fishing in the community appears minimal. Between 2003 and 2010, one Subsistence Halibut Registration Certificate (SHARC) was issued each year. However, information on permit activity and the number of pounds of halibut harvested was not reported (Table 14).

In years for which data were reported between 2000 and 2010, a total of 142 beluga whales were reported harvested. Of those, most (62.0%) were reported harvested between 2000 and 2002. In 2002 and 2006, there were an estimated two and three walrus harvested for subsistence, respectively. Information on subsistence harvest of marine mammals in Unalakleet between 2000 and 2010 is presented in Table 15.

Table 12. Subsistence Participation by Household and Species, Unalakleet: 2000-2010.

Year	% Households Participating in Salmon Subsistence	% Households Participating in Halibut Subsistence	% Households Participating in Marine Mammal Subsistence	% Households Participating in Marine Invertebrate Subsistence	% Households Participating in Non-Salmon Fish Subsistence	Per Capita Subsistence Harvest (pounds)
2000	n/a	n/a	n/a	n/a	n/a	n/a
2001	n/a	n/a	n/a	n/a	n/a	n/a
2002	n/a	n/a	n/a	n/a	n/a	n/a
2003	n/a	n/a	n/a	n/a	n/a	n/a
2004	n/a	n/a	n/a	n/a	n/a	n/a
2005	n/a	n/a	n/a	n/a	n/a	n/a
2006	n/a	n/a	n/a	n/a	n/a	n/a
2007	n/a	n/a	n/a	n/a	n/a	n/a
2008	n/a	n/a	n/a	n/a	n/a	n/a
2009	n/a	n/a	n/a	n/a	n/a	n/a
2010	n/a	n/a	n/a	n/a	n/a	n/a

Note: n/a indicates that no data were reported for that year.

Source: Alaska Department of Fish and Game. 2011. Community Subsistence Information System (CSIS). ADF&G Division of Subsistence. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. http://www.adfg.alaska.gov/sb/CSIS/ (Accessed February 2011).

Table 13. Subsistence Fishing Participation for Salmon, Marine Invertebrates, and Non-Salmon Fish, Unalakleet: 2000-2010.

Year	Subsistence Salmon Permits Issued <sup>1</sup>	Salmon Permits Returned <sup>1</sup>	Chinook Salmon Harvested <sup>1</sup>	Chum Salmon Harvested <sup>1</sup>	Coho Salmon Harvested <sup>1</sup>	Pink Salmon Harvested <sup>1</sup>	Sockeye Salmon Harvested <sup>1</sup>	Lbs of Marine Inverts <sup>2</sup>	Lbs of Non- Salmon Fish <sup>2</sup>
2000	206	188	2,390	2,936	5,931	10,522	203	n/a	n/a
2001	205	140	2,810	2,918	6,270	11,279	359	n/a	n/a
2002	225	222	2,367	3,877	5,490	15,557	280	n/a	n/a
2003	220	210	2,585	1,785	6,192	21,777	283	n/a	n/a
2004	245	200	1,868	1,797	4,600	15,557	303	n/a	n/a
2005	225	221	1,742	1,240	5,723	17,983	499	n/a	n/a
2006	211	208	1,974	1,109	5,716	11,814	205	n/a	n/a
2007	220	213	1,570	1,117	4,916	10,288	255	n/a	n/a
2008	217	201	1,279	960	5,680	12,425	120	n/a	n/a
2009	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
2010	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a

*Note: n/a indicates that no data were reported for that year.* 

Table 14. Subsistence Halibut Fishing Participation, Unalakleet: 2003-2010.

Year	SHARC Issued	SHARC Cards Fished	SHARC Halibut Lbs Harvested
2003	1	n/a	n/a
2004	1	n/a	n/a
2005	1	n/a	n/a
2006	1	n/a	n/a
2007	1	n/a	n/a
2008	1	n/a	n/a
2009	1	n/a	n/a
2010	1	n/a	n/a

*Note: n/a indicates that no data were reported for that year.* 

Source: Fall, J.A. and D. Koster. (2011). Subsistence harvests of Pacific halibut in Alaska, 2009. Alaska Department of Fish and Game Division of Subsistence, Technical Paper No. 357, Anchorage. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle.

<sup>&</sup>lt;sup>1</sup> Fall, J.A., C. Brown, N. Braem, J.J. Simon, W.E. Simeone, D.L. Holen, L. Naves, L. Hutchinson-Scarborough, T. Lemons, and T.M. Krieg. 2011, revised. Alaska subsistence salmon fisheries 2008 annual report. Alaska Department of Fish and Game Division of Subsistence, Technical Paper No. 359, Anchorage. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle.

<sup>&</sup>lt;sup>2</sup> Alaska Department of Fish and Game. (2011). Community Subsistence Information System (CSIS). ADF&G Division of Subsistence. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle. http://www.adfg.alaska.gov/sb/CSIS/ (Accessed February 2011).

Table 15. Subsistence Harvests of Marine Mammal Resources, Unalakleet: 2000-2010.

Year	# of Beluga Whales <sup>1</sup>	# of Sea Otters <sup>2</sup>	# of Walrus <sup>2</sup>	# of Polar Bears <sup>2</sup>	# of Steller Sea Lions <sup>3</sup>	# of Harbor Seals <sup>3</sup>	# of Spotted Seals <sup>3</sup>
2000	29	n/a	n/a	n/a	n/a	n/a	n/a
2001	21	n/a	n/a	n/a	n/a	n/a	n/a
2002	38	n/a	2	n/a	n/a	n/a	n/a
2003	5	n/a	n/a	n/a	n/a	n/a	n/a
2004	4	n/a	n/a	n/a	n/a	n/a	n/a
2005	4	n/a	n/a	n/a	n/a	n/a	n/a
2006	10	n/a	3	n/a	n/a	n/a	n/a
2007	6	n/a	n/a	n/a	n/a	n/a	n/a
2008	9	n/a	n/a	n/a	n/a	n/a	n/a
2009	7	n/a	n/a	n/a	n/a	n/a	n/a
2010	9	n/a	n/a	n/a	n/a	n/a	n/a

Note: n/a indicates that no data were reported for that year.

<sup>&</sup>lt;sup>1</sup> Frost, K.J., and R.S. Suydam. 2010. Subsistence harvest of beluga or white whales (*Delphinapterus leucas*) in northern and western Alaska, 1987–2006. J. Cetacean Res. Manage. 11(3): 293–299. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle.

<sup>&</sup>lt;sup>2</sup> U.S. Fish and Wildlife Service. 2011. Marking, Tagging and Reporting Program data bases for northern sea otter, Pacific walrus and polar bear. Office of Marine Mammals Management. Anchorage, Alaska. Data compiled by Alaska Fisheries Information Network for Alaska Fisheries Science Center, Seattle.

<sup>&</sup>lt;sup>3</sup> Wolfe, R.J., Fall, J.A. and M. Riedel. 2009. The subsistence harvest of harbor seals and sea lions by Alaska Natives in 2008. Alaska Native Harbor Seal Commission and Alaska Department of Fish and Game Division of Subsistence, Technical Paper No. 347, Anchorage.