

**Operational Plan:Upper Cook Inlet Salmon Personal
Use Harvest Monitoring (2013-2015)**

by

Kristine Dunker

May 2013

Alaska Department of Fish and Game

Divisions of Sport Fish and Commercial Fisheries



Symbols and Abbreviations

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Weights and measures (metric)		General		Mathematics, statistics	
centimeter	cm	Alaska Administrative Code	AAC	<i>all standard mathematical signs, symbols and abbreviations</i>	
deciliter	dL	all commonly accepted abbreviations	e.g., Mr., Mrs., AM, PM, etc.	alternate hypothesis	H_A
gram	g	all commonly accepted professional titles	e.g., Dr., Ph.D., R.N., etc.	base of natural logarithm	e
hectare	ha	at	@	catch per unit effort	CPUE
kilogram	kg	compass directions:		coefficient of variation	CV
kilometer	km	east	E	common test statistics	(F, t, χ^2 , etc.)
liter	L	north	N	confidence interval	CI
meter	m	south	S	correlation coefficient	
milliliter	mL	west	W	(multiple)	R
millimeter	mm	copyright	©	correlation coefficient (simple)	r
		corporate suffixes:		covariance	cov
Weights and measures (English)		Company	Co.	degree (angular)	$^\circ$
cubic feet per second	ft ³ /s	Corporation	Corp.	degrees of freedom	df
foot	ft	Incorporated	Inc.	expected value	E
gallon	gal	Limited	Ltd.	greater than	>
inch	in	District of Columbia	D.C.	greater than or equal to	≥
mile	mi	et alii (and others)	et al.	harvest per unit effort	HPUE
nautical mile	nmi	et cetera (and so forth)	etc.	less than	<
ounce	oz	exempli gratia	e.g.	less than or equal to	≤
pound	lb	(for example)		logarithm (natural)	ln
quart	qt	Federal Information Code	FIC	logarithm (base 10)	log
yard	yd	id est (that is)	i.e.	logarithm (specify base)	log ₂ , etc.
		latitude or longitude	lat. or long.	minute (angular)	'
Time and temperature		monetary symbols (U.S.)	\$, ¢	not significant	NS
day	d	months (tables and figures): first three letters	Jan, ..., Dec	null hypothesis	H_0
degrees Celsius	°C	registered trademark	®	percent	%
degrees Fahrenheit	°F	trademark	™	probability	P
degrees kelvin	K	United States (adjective)	U.S.	probability of a type I error (rejection of the null hypothesis when true)	α
hour	h	United States of America (noun)	USA	probability of a type II error (acceptance of the null hypothesis when false)	β
minute	min	U.S.C.	United States Code	second (angular)	"
second	s	U.S. state	use two-letter abbreviations (e.g., AK, WA)	standard deviation	SD
Physics and chemistry				standard error	SE
all atomic symbols				variance	
alternating current	AC			population sample	Var
ampere	A			sample	var
calorie	cal				
direct current	DC				
hertz	Hz				
horsepower	hp				
hydrogen ion activity (negative log of)	pH				
parts per million	ppm				
parts per thousand	ppt, ‰				
volts	V				
watts	W				

REGIONAL OPERATIONAL PLAN SF.2A.2013.03

**UPPER COOK INLET SALMON PERSONAL USE HARVEST
MONITORING (2013-2015)**

by

Kristine Dunker

Alaska Department of Fish and Game, Division of Sport Fish, Anchorage

Alaska Department of Fish and Game
Division of Sport Fish

May 2013

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SIGNATURE PAGE

Project Title: Upper Cook Inlet Salmon Personal Use Harvest Monitoring

Project leader(s): Kristine Dunker

Division, Region, and Area Division of Sport Fish , Region II, Anchorage Office

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Period Covered 2013 - 2015

Field Dates: Fisheries occur between June and August each year

Plan Type: Category II

Approval

Title	Name	Signature	Date
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INTRODUCTION

Prior to the state's subsistence priority law in 1978, individuals could meet their needs for fish under the subsistence fishing regulations in Cook Inlet. Court actions changed the definition of subsistence in 1978 and precluded some from participating in customary and traditional subsistence fisheries. The Board of Fisheries (BOF) countered these court changes by creating a new fishery class called "personal use" in areas that have a surplus of salmon beyond escapement, subsistence, commercial and sport needs. The intent of personal use fishing regulations are to permit the taking of fish when that take does not jeopardize the sustained yield of the resource and does not negatively impact an existing resource use or is in broad public interest (Alaska Administrative Code (5 AAC 77.001)).

With the establishment of area personal use fisheries, management plans and regulations governing harvest opportunities were implemented to ensure salmon harvests are sustainable. Harvest monitoring is essential for sustained yield salmon management.

This operational plan focuses on four of the personal use salmon fisheries that occur in Upper Cook Inlet (UCI) above Anchor Point including:

1. gill netting at the mouth of the Kasilof River from June 15 through June 24,
2. dip netting at the mouth of the Kasilof River from June 25 through August 7,
3. dip netting at the mouth of the Kenai River from July 10 through July 31, and
4. dip netting at the mouth of Fish Creek opened by emergency order only.

A single permit authorizes an Alaskan resident to participate in all four fisheries. This permitting process identifies an Alaskan household and assigns a uniquely numbered harvest record to each permit. Permit regulations require returning the harvest record to the Department by August 15th. A permit holder may obtain their annual limit of 25 salmon per head of household and 10 additional salmon per listed dependent. Each household permit is allowed the incidental take of 10 flounders. Since 1996, both permits issued and salmon harvest in the personal use fisheries in Upper Cook Inlet have increased to approximately 34,500 permits (Table 1; Figure 1), and harvests have approached 645,000 salmon (Table 2).

The timing of these personal use fisheries capitalizes on sockeye salmon abundance. Often sockeye salmon comprises more than 95% of the total salmon harvest in the personal use fisheries of Upper Cook Inlet (Table 2). With few exceptions, participants are allowed to harvest all species of salmon, but Chinook salmon must be released in the dipnet fisheries of the Kasilof River and Fish Creek. The harvest of only one Chinook salmon per permit is allowed in the Kenai River dipnet fishery. Effective in 2005, the Board of Fisheries granted the harvest of flounder under this salmon permit with a household limit of ten flounder. Methods, means, dates and period duration are in regulation to provide predictable fishing opportunities (5 AAC 77.540). Additionally, managers possess authority to increase or decrease fishing time or area in times of above average or below average returns for conservation purposes. Nelson et al. (1999) provides a historical perspective of personal use salmon fishery development in Upper Cook Inlet, Reimer and Sigurdsson (2004) provide a historical harvest report from 1996-2003, Dunker and Lafferty (2007) provide harvest and participation trends from 2004-2006, and Dunker 2011 provides harvest and participation trends from 2007-2009. A report covering the period between 2010 and 2012 is currently in preparation.

OBJECTIVES

1. Estimate participation (household days fished) in each of the four personal use fisheries. All estimates of participation will be within 5% of true value 95% of the time.
2. Estimate sockeye salmon harvest in each of the four personal use fisheries. Estimates of sockeye salmon harvest from the Kasilof dipnet, Kenai dipnet, and the Kasilof gillnet fishery will be within 5% of true values 95% of the time. Estimates from the Fish Creek dipnet fishery will be within 20% of true values 95% of the time.
3. Estimate Chinook salmon harvest in the Kenai dipnet and the Kasilof gillnet fishery. Estimates of Chinook salmon harvest will be within 10% of true values 95% of the time.
4. Estimate coho salmon harvest in the Kasilof and Kenai dipnet fisheries. Estimates of coho salmon harvest will be within 15% of true values 95% of the time.
5. Estimate pink salmon harvest in the Kasilof and Kenai dipnet fisheries. Estimates of pink salmon harvest will be within 15% of true values 95% of the time.

SECONDARY OBJECTIVES

1. Estimate the incidental harvest of flounder in each of the four personal use fisheries.

To accomplish the above objectives, we will annually print 45,000 – 50,000 personal use permits and distribute them via 63 vendors so Alaskan households may participate in the Upper Cook Inlet personal use fisheries.

Over the last five years (2008 – 2012) the number of permits issued has steadily increased except for 2012 when they dropped slightly from an all-time high in 2011 of 34,515 permits to 34,315 (Figure 1, Table 1). The anticipated demand for personal use permits is likely to continue exceeding 34,000 permits.

METHODS

STUDY DESIGN

Area license vendors issue household permits to Alaskan residents who wish to participate in the Upper Cook Inlet salmon personal use fisheries. Permits are available at Fish and Game offices in Palmer, Anchorage, Soldotna, and Homer. Permit quantities sent or delivered to vendors will be based on the number of permits issued the previous year. The total number of permits issued is a crucial number for proper harvest and participation estimation; therefore, the project manager is responsible for maintaining accurate records and providing these data to processing staff and the project biometrician. The permit has two components. The top half or “vendor copy” contains the permit holder’s address and license information, and the bottom half is the participant’s harvest recording document that must be in possession while participating in the fishery. Permit halves are returned to the Department at different times. License vendors and Department offices return the vendor copy to Research and Technical Services (RTS) in Anchorage for key punching on a monthly basis. Information to be keypunched from the top portion of the permit includes: permit number, permit holder’s name and address, sport fishing

license number, driver's license number, the number of household members, and allowable harvest (Appendix 1). This information will be utilized to contact permit holders that have not returned the bottom half of the permit with their harvest and participation information. One of the conditions of the permit requires households to return their permit by August 15th. The vendor copy is also used to estimate the number of permits issued.

Unfortunately, a few vendors will not return all of the top portions of issued permits. If we do not receive all the vendor copies, the number of permits issued will need to be estimated. Some permits will be returned for which we have no corresponding vendor copy. These are considered "orphan permits". Assuming the "orphan permits" have the same response rate as the voluntary returns for which we have a vendor copy, we will apply this response rate to the "orphan permits" to estimate the total number of permits issued for which we have no vendor copy. In the past we received approximately 100- 150 orphan permits a year. Since there are fewer than 65 vendors issuing permits, it is possible to contact vendors during and at the end of the season to minimize the loss of permit holder contact information.

Permit holders must record their participation and harvest by day on the permit and return the permit to the Department by August 15th of the year it was issued. Permit holders who do not return their permits will receive up to two courtesy reminders. A reminder letter and a copy of the permit will be mailed to non-respondents by September 30th or as soon as data entry staff have scanned all returned harvest information. A second reminder letter will be sent again a month later to those permits holders that have not responded to the first reminder notice (Appendix 2). A hiatus of four weeks is considered appropriate to allow non-respondent permit holders to reply.

We expect approximately 35,000 permits to be issued annually during this project period. Return rates have fluctuated somewhat since the UCI personal use fisheries began in 1996; however, on average, 85% of the permits are returned to ADF&G following the courtesy reminders. Since 2010, the return rate has dropped to between 80% and 81%. These have been the lowest return rates since 2002 (Table 1). If the next three years are similar to the last three, it is anticipated that 58% of permits holders (approximately 20,300 households) will return their permits by the 15 August reporting deadline. Accordingly, about 14,700 households will be sent a first reminder letter, and approximately 9,500 households will receive a second reminder letter. If return rates follow the three-year average, we anticipate that after two courtesy mailings up to 28,230 permits will be returned each year (Table 1).

As described above, up to two reminders will be mailed to permit holders who do not return their permits by the 15 August deadline. All participation and harvest information reported by permit-holders who promptly return their permits and those permits returned before the second reminder letter will be treated as a census of "compliant" households. Information obtained by permit-holders who return their permits after the second reminder letter is mailed will be treated as a sample of "non-compliant" households.

Annual estimates of participation and harvest by non-compliant households will be obtained by first calculating the mean participation (household days fished) and harvest of each species for all households that return completed permits after the second reminder mailing. Mean estimates will be expanded to include all non-respondents.

Annual estimates of participation and harvest by species for each fishery will be obtained by summing the estimates for the non-compliant households with the corresponding information obtained from permits returned by the compliant households.

Information from the 2002-2012 personal use permit-holders (Table 2) was used to predict the sampling variances and related levels of relative precision. If annual return rates for this project period are high, then the annual precision levels should well exceed the desired objective criteria listed in the objectives.

As noted above, the levels of precision achieved by this project have been substantially better than the objective criterion. Two causes for the high precision are:

1. the assumption that about 50% of permit holders will comply with the reporting deadline, these households account for more than 50% of the harvest, and this component of the total harvest estimate is measured with no sampling error; and
2. issuing reminders to all non-compliant households leads to relatively precise estimates of this component of the harvest.

As such, the precisions that we expect for the 2013-2015 surveys may not be as good as predicted if any of these factors change dramatically.

Issuing reminders to all non-compliant households is not directed at obtaining the goal objective criteria, but rather to ensure that all households with personal use permits are treated equally (so that each household is given the same opportunity to comply with reporting requirements prior to the next season).

DATA COLLECTION

All Alaskan households with a valid Alaska resident sport fishing license, as well as those who are exempt from licensing (PID), qualify to receive a permit. All listed household members are eligible to participate under their household permit.

Permits will be issued at Fish and Game offices in Anchorage, Soldotna, Palmer, and Homer. Fish and Game license vendors in the Mat-Su, Anchorage, and Kenai Peninsula area who issued Cook Inlet personal use permits in 2012 also will also issue permits in 2013, 2014, and 2015. New vendors may request to issue Cook Inlet personal use permits. Permits (Appendix 1) are sequentially numbered and perforated horizontally across the middle. Identifying information (permittees name, address, telephone number, sport fishing license number, total number of household members, total household salmon harvest limit, and Alaska driver's license number) will be completed on the top half of the permit. The number of household members and their names will also be recorded on the bottom half of the permit at the issuing office or license vendor. The issuing officer will write the total household salmon harvest limit on both halves of the permit and sign the top half. The applicant will also sign the top half of the permit. The Department or the license vendor will retain the top half (the vendor copy) of the permit with the identifying information. The bottom half will be issued to the permittee. License vendors will be given postage-paid envelopes to use to mail the vendor copies of their issued permits to RTS each month. They will be asked to return all vendor copies and unused permits to RTS by mid September. Vendors will be sent a letter and then contacted by phone or in person after the fishery closes in the beginning of August to remind them to send in their vendor copies.

Permit holders will record all fishing activity by their household on the permit, including which fishery, dates fished, salmon harvest by species and flounder harvested (Appendix 3). A check box is also provided for households that did not participate. When the permit holder's household completes fishing, they will return the permit to Fish and Game, either by hand-delivery to a Fish and Game office or by attaching postage and mailing it to the address printed on the back of the permit.

For this project period, an attempt will be made to scan as many permits as possible into the Upper Cook Inlet Personal Use database. Permits that cannot be scanned will be re-written and then scanned. Vendor copies will be scanned during the summer as they are received. As completed permits are returned, harvest and effort information will be scanned and marked as returned in the database.

Non-respondents will be identified, and the first reminder letter (Appendix 2) will be mailed by September 30th or as soon as data scanning is complete each year. Non-respondents to this first mailing will be identified, and a second reminder letter will be mailed to the non-respondents four weeks later.

In the circumstance where more than one permit has been issued to an individual or household, the name, address, sport fishing license and or driver's license number will be used to detect multiple permits prior to sending a reminder letter. Permit holders with multiple permits should only receive one set of reminder letters.

The permit number will be printed on the reminder letter. The reminder letter will also contain a blank copy of the harvest information portion of the permit, in case the permit holder has lost or misplaced the original.

A second reminder will be issued to permit holders who do not respond to the first reminder. RTS/IM staff will be responsible for creating a file containing names, addresses and permit numbers for permit holders to receive reminder permits. A mailing service will be used to merge this information into a form letter and mail the reminder permits.

Records from returned permits will be scanned, and the mailing to which they responded will be identified. Note that some respondents will send their original permit although they are responding to a reminder letter. The date of the response will be used to identify the response and not the form the response is returned on. Forms will be electronically scanned and identified by the permit number. Each permit number will be used to identify the source of data in all database records.

DATA REDUCTION

RTS staff will scan the permit applications and harvest information when returned. To reduce duplication of reminders, permit applications will be searched for identical fishing license numbers and/or identical driver's license numbers recorded on more than one permit. If matching numbers are detected, all but one of the permits will be marked as "duplicate" in the database so that the total count of participants will be correct and so the person will only be contacted once in each reminder. The permit number that replaces the original will be coded in the "dupapp" field of the original permit.

As permits return with harvest information, permit information will be scanned and entered into the database. If a permit holder returns two copies of their permit all the information will be entered into “raw” database tables. This table contains information from all permits and harvest reports that are processed. The table is then filtered for duplicate or invalid permits and harvest reports and records copied to “corrected” database tables. The corrected tables will be used for all reporting, and the “raw” tables will be used to monitor complete and accurate entry of information.

Current software programming identifies outliers during the keypunching process. Erroneous information, keystroke errors, and outliers are identified in comparison to established criteria listed below. Identified errors are flagged and checked by comparing the keypunched/ scanned data to the permit itself. If the entered data accurately reflects what is written on the permit then no changes will be made. Lists of flagged records remaining after all corrections are made will be given to the project leader for further evaluation. Only those records that meet all checks will be placed in the “corrected” database tables.

The following represents a list of the most common issues discovered during data entry and editing. Each issue requires a unique but standard approach that is consistently addressed for each year that these fisheries take place.

1. Records marked as having no vendor card (NOVENDCARD=1) but there is a fishing license or drivers license number coded.
2. Outliers: Harvests that are higher than the legal limit allowed for the household. Harvests of more than one Chinook salmon or over 100 salmon or more than 10 flounders.
3. On occasion, gear is not recorded in the Kasilof River fisheries. Dates of the participation and harvest will be used to correct this omission. The Kasilof gillnet fishery is open from June 15–24, and the dip net fishery is open from June 25 through August 7. Accordingly, harvest and participation recorded during *June 15-24* in the Kasilof with an unspecified gear will be assumed to be Kasilof gill net. Harvest and participation recorded *after June 24* in the Kasilof with an unspecified gear will be assumed to be Kasilof dip net.
4. Unreasonable dates: Dates that are not from 1990 (the year used for unknown dates), or the current year. Those should be changed to the current year or 1990. All 1990 dates should be the first of the month, if not they should be checked and changed to the current year.
5. Dates outside legal season: Records not within the correct time periods for the fishery.

Fishery	Start Date	End Date
Kasilof Gill Net	June 15	June 24
Kasilof Dip Net	June 25	Aug 7
Kenai River Dip Net	July 10	July 31
Fish Creek Dip Net	Announced by EO	

In 2002-2008 the Fish Creek personal use dip net fishery did not open because of low sockeye escapements. However, it did open for one week in August of 2009, one week in

July 2010, and one weekend in July 2011. It did not open in 2012, and it is uncertain if Fish Creek will open for personal use during this project period.

6. Permits that cannot be identified as returned, but have harvest data: Permits that do not have harvrptlog marked (meaning harvest record returned), but do have harvest data (either a harvest date or fish harvested) or are marked True in the “did not fish” field.
7. Duplicates without replacements: Permits that are marked as duplicates but have no final, replacement permit associated with them.
8. Duplicates with harvest or participation: Permits that are marked as duplicates but have a harvest date, harvest, or “did not fish” information. This information needs to be transferred to the final, replacement permit. (See the paragraph about two copies of one permit, above).
9. Permits that are marked as returned blank (BLANKRPT=1), but there is a harvest date or harvest.
10. No mailing: Permits that have harvest data or did not fish = true, but are not assigned to a mailing.
11. Permits apparently incorrectly marked as returned: Permits that are marked as returned (harvrptlog = true or are assigned to a mailing), but are not duplicates, have no harvest data, are not marked did not fish = True.
12. Permits that have harvest records but are not in the permit file. Every permit in the harvest file must have a record in the permit file.

The permit will be identical to the template used in 2011 and 2012 permit. In 2011, the permit design closely followed the previous three years’ format but was modified slightly to be compatible with the new scanning software (Appendix 1). This change allows permits to be scanned directly into the Personal Use database. This system has the potential to save both time and money associated with entering data for approximately 35,000 permits. However, the return rate using the new permit design will continue to be monitored as the return rate has dropped since 2011 when the new permit design came online. The smaller printing on the permit which is needed to accommodate the software requirements is speculated as one of the causes for the reduced return rate. A delay in entering data and sending out reminder letters in 2011 and 2012 is likely another. However, a larger initiative is beginning within Fish and Game to modernize how licenses and other Fish and Game products, such as these permits, are issued. It is possible that by the end of this project period households participating in personal use fisheries will be able to obtain their permits and report their harvests electronically.

DATA ANALYSIS

Because some vendors do not return all of their permits, the total number of permits issued will be estimated as:

$$\hat{N} = \frac{o}{\hat{p}} + M \quad (1)$$

where:

- \hat{N} = the total number of household permits issued,
- o = the number of permits issued and returned by households before the first reminder letter, but with no vendor card (the “orphan permits”),
- $\hat{p} = \frac{m}{M}$ = the response rate before the first reminder letter among households with vendor cards,
- m = the number of permits returned before the first reminder letter mailing with vendor cards,
- M = the total number of permits with vendor cards.

With variance estimated as:

$$\hat{V}[\hat{N}] = \left[\frac{o^2 \hat{V}[\hat{p}]}{\hat{p}^4} \right], \quad (2)$$

where,

$$\hat{V}[\hat{p}] = \left(\frac{\hat{p}(1 - \hat{p})}{M - 1} \right).$$

The estimated number of permits issued will then be divided in 4 groups:

$$\hat{N} = N_{cf} + N_{cz} + \hat{N}_{df} + \hat{N}_{dz}, \quad (3)$$

where:

- N_{cf} = the number of compliant households who reported fishing,
- N_{cz} = the number of compliant households who reported they did not fish,
- $\hat{N}_{df} = (\hat{N} - (N_{cf} + N_{cz}))\hat{w}$,
the estimated number of non-compliant households who fished,

where $\hat{w} = \frac{n_{df}}{n_d}$

n_d = the number of non-compliant households responding to the last reminder,

n_{df} = the number of non-compliant households who responded to the last reminder and reported fishing, and

- \hat{N}_{dz} = the estimated number of non-compliant households who reported they did not fish.

$$= \hat{N} - (N_{cf} + N_{cz} + \hat{N}_{df})$$

Harvest for each species or participation for each site is estimated by the following procedure (with subscripts denoting parameter of estimation deleted for simplicity):

$$\hat{H} = H_{cf} + \hat{H}_{df}; \quad (4)$$

where:

\hat{H} = estimated total harvest or participation;

H_{cf} = harvest or participation reported by compliant households, and;

\hat{H}_{df} = estimated harvest by non-compliant households = $\hat{N}_{df} \bar{h}_{df}$

where \bar{h}_{df} = the mean harvest or participation per household for non-compliant households that fished

$$= \frac{\left(\sum_{j=1}^{n_{df}} h_{dfj} \right)}{n_{df}};$$

h_{dfj} = reported harvest by household j that responded, was non-compliant, and fished

n_{df} = the number of households that responded, were non-compliant, and fished.

Variance will be calculated as (Goodman 1960):

$$\hat{V}[\hat{H}] = \hat{V}[\hat{H}_{df}] = \hat{N}_{df}^2 \hat{V}[\bar{h}_{df}] + \bar{h}_{df}^2 \hat{V}[\hat{N}_{df}] - \hat{V}[\bar{h}_{df}] \hat{V}[\hat{N}_{df}], \quad (5)$$

where:

$$\hat{V}[\hat{N}_{df}] = \hat{V}[\hat{N}] \hat{V}[\hat{w}] = \hat{N}^2 \hat{V}[\hat{w}] + \hat{w}^2 \hat{V}[\hat{N}] - \hat{V}[\hat{w}] \hat{V}[\hat{N}], \quad (6)$$

$$\hat{V}[\hat{w}] = \left(\frac{\hat{w}(1 - \hat{w})}{n_d - 1} \right),$$

$$\hat{V}[\bar{h}_{df}] = \left(1 - \frac{n_{df}}{\hat{N}_{df}} \right) \frac{s_{df}^2}{n_{df}}, \text{ and} \quad (7)$$

$$s_{df}^2 = \frac{\sum_{j=1}^{n_{df}} (h_{dfj} - \bar{h}_{df})^2}{n_{df} - 1}. \quad (8)$$

Standard errors are simply the square root of the variance estimate.

SCHEDULE AND DELIVERABLES

The following milestones must be met to keep the survey on schedule each year:

- Project staff designs, modifies and reviews the permit prior to April 2nd.
- Permits are printed and delivered to the office by the second week in May.
- Permits are bundled and distributed to area offices and vendors by the first week of June. Permits for Anchorage vendors are distributed to vendors by the project biologist. Permits for Mat-Su and Kenai Peninsula vendors are distributed by the area offices and/or the project biologist.
- Vendor portions of the permits will be collected from license vendors by August 31st.
- All permit holder identification information from the top copies of the permits and harvest information from returned permits will be scanned by September 30th or at the earliest prioritized schedule for the data entry staff. Non-respondents will then be identified and sent a reminder letter.
- Non-respondents from the first mailing will be identified, and second reminder letters will be mailed one month later. The target date for the second reminder mailing is October 30th.
- License numbers and harvest and participation information from respondents to the second reminder will be keypunched or scanned by November 30th, or a month following the second reminder letter.
- The final, clean data set, along with metadata and log of the edits will be given to project leader. Ideally, this will occur by the end of December.
- Annual summary tables of participation and harvest will be available for management purposes by early January.

RESPONSIBILITIES

Principal Investigator: Supervises all aspects of the project and coordinates with all project staff to ensure that project milestones are on schedule. Primary author of the project operational plan, reports, correspondence with license vendors and permit holders. Responsible for permit modifications, permit distribution and tracking, issuing reminders, contracting printing services and project budgeting.

Analyst Programmer: Assists the principal investigator with all programming aspects of the database application used for project permitting, harvest reporting and data archiving. Conducts data quality reviews prior to finalizing the database and develops data files for principal investigator and project biometrician.

Project Biometrician: Assists the principal investigator with data analysis, reporting and operational planning.

Key Punch Clerk Supervisor: Assists the principal investigator by supervising the data entry process. Ensures that permit information and harvest reporting are entered into the database according to the operational plan and conducts daily quality control measures of all key punching clerks entering permit or harvest information into the database.

BUDGET SUMMARY

Code	Line Item	Cost (K)
100	Personal Services	46.9
200	Travel	1.2
300	Contractual	17
400	Commodities	0.6
500	Equipment	0.0
700	Grants	0.0
Total		65.7

Budget Manager: Kristine Dunker, Fishery Biologist

Project Personnel:

Name	Job Class	Months Budgeted
Kirk Brogdon	Analyst Programmer V	1.0
Raili Kedzior	Administrative Clerk II	1.0
Andrea Hamby	Administrative Clerk II	1.0
Diane Novinska	Administrative Clerk II	2.0
Vacant	Administrative Clerk II	1.0
Kristine Dunker	Fishery Biologist III	1.0
Total		7.0

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TABLES

Table 1. Number of permits issued and response rates by mailing..

Year	Permits Issued		Permits Returned						Permits not Returned			
	Number ^a	SE	voluntary		mailing 1		mailing 2		total		Number	%
			Number	%	Number	%	Number	%	Number	%	Number	%
1996	14,576		9,986	69%	2,501	17%	569	4%	13,452	92%	1,124	8%
1997	14,919		7,031	47%	4,792	32%	1,148	8%	13,756	92%	1,163	8%
1998	15,535	19	8,209	53%	3,391	22%	1,590	10%	13,190	85%	2,345	15%
1999	17,197	25	8,960	52%	3,771	22%	1,485	9%	14,216	83%	2,981	17%
2000	16,107	11	8,070	50%	3,962	25%	1,546	10%	13,582	84%	2,525	16%
2001	16,915	1	8,515	50%	3,896	23%	1,987	12%	14,398	85%	2,517	15%
2002	17,568	1	8,881	51%	3,247	18%	2,156	12%	14,284	81%	3,284	19%
2003	19,110	2	9,602	50%	3,587	19%	2,537	13%	15,726	82%	3,384	18%
2004	21,910	2	10,653	49%	2,075	10%	5,020	23%	17,748	82%	3,868	18%
2005	21,905	1	12,760	59%	4,150	19%	2,171	10%	19,081	88%	2,680	12%
2006	18,563	1	11,658	63%	3,632	20%	1,242	7%	16,532	89%	1,996	11%
2007	23,046	1	14,090	61%	4,250	18%	1,972	9%	20,312	88%	2,734	12%
2008	23,722	1	13,743	58%	4,385	19%	2,131	9%	20,259	85%	3,289	14%
2009	29,619	1	18,426	63%	4,715	16%	1,888	6%	25,029	85%	4,384	15%
2010	31,590	1	17,193	55%	5,355	17%	2,674	9%	25,222	81%	6,092	19%
2011	34,515	3	20,276	60%	4,825	14%	2,080	6%	27,181	80%	6,789	20%
2012	34,315	3	20,266	60%	4,610	14%	2,172	7%	27,048	81%	6,616	19%
Minimum	14,576		7,031	47%	2,075	10%	569	4%	13,190	80%	1,124	8%
Mean	21,830		12,254	56%	3,950	19%	2,022	10%	18,295	85%	3,398	15%
Maximum	34,515		20,276	69%	5,355	32%	5,020	23%	27,181	92%	6,789	20%
Mean												
2010-2012	33,473	2	19,245	58%	4,930	15%	2,309	7%	26,484	81%	6,499	19%

^a Voluntary households are those that voluntarily returned their completed permits without being mailed a reminder letter.

Table 2. Salmon harvests, standard errors and relative precision in Upper Cook Inlet Personal Use Fisheries, 2000-2011.

Kenai River Dip Net

Year	Days	Days Fished			Sockeye			Chinook			Coho			Pink			Chum			Total		
	Open	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP
<i>Kenai River Dip Net</i>																						
2002	22	14,840	56	1%	180,028	844	1%	606	11	4%	1,721	64	7%	5,662	102	4%	551	36	13%	188,568	874	1%
2003	22	15,263	50	1%	223,580	891	1%	1,016	18	3%	1,332	68	10%	1,647	98	12%	249	22	17%	227,824	905	1%
2004	22	18,513	35	0%	262,831	583	0%	792	7	2%	2,661	66	5%	2,103	27	3%	387	12	6%	268,774	905	1%
2005	22	20,977	18	0%	295,496	273	0%	997	3	1%	2,512	24	2%	1,806	12	1%	321	2	1%	301,132	275	0%
2006	20	12,685	16	0%	127,630	183	0%	1,034	3	1%	2,235	15	1%	11,127	37	1%	551	9	3%	142,577	203	0%
2007	22	21,908	23	0%	291,270	335	0%	1,509	4	1%	2,111	24	2%	1,939	23	2%	472	17	7%	297,301	337	0%
2008	22	20,772	27	0%	234,109	338	0%	1,362	10	1%	2,609	21	2%	10,631	49	1%	504	8	3%	249,215	343	0%
2009	22	26,171	35	0%	339,993	524	0%	1,189	7	1%	2,401	29	2%	5,482	27	1%	285	7	5%	349,350	525	0%
2010	22	28,342	44	0%	389,552	702	0%	865	7	2%	2,870	56	4%	3,655	28	2%	508	15	6%	397,451	705	0%
2011	22	32,818	60	0%	537,765	1,105	0%	1,243	10	2%	4,745	107	4%	3,914	86	4%	915	47	10%	548,583	1,115	0%
2012	22	34,374	61	0%	526,992	1,109	0%	40	3	17%	4,008	117	6%	3770	102	5%	425	15	7%	535,236	1,120	0%
Min.	20	12,685			127,630			40			1,332			1,647			249			142,577		
Mean	22	22,424			309,931			968			2,655			4,703			470			318,728		
Max.	22	34,374			537,765			1,509			4,745			11,127			915			548,583		

Kasilof River Dip Net

Year	Days	Days Fished			Sockeye			Chinook			Coho			Pink			Chum			Total		
	Open	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP
<i>Kasilof River Dip Net</i>																						
2002	44	4,020	38	2%	46,769	530	2%	106	6	11%	1197	59	10%	1862	73	8%	139	7	10%	50,073	553	2%
2003	44	3,874	28	1%	43,870	440	2%	57	4	14%	592	49	16%	286	21	14%	30	1	7%	44,835	447	2%
2004	44	4,432	19	1%	48,315	259	1%	44	3	13%	668	21	6%	396	15	7%	90	5	11%	49,513	263	1%
2005	44	4,500	9	0%	43,151	100	0%	16	1	12%	538	16	6%	658	12	4%	102	2	4%	44,465	103	0%
2006	44	5,763	10	0%	56,144	113	0%	55	1	4%	1,057	15	3%	992	8	2%	105	4	7%	58,353	117	0%
2007	44	4,627	9	0%	43,293	105	0%	35	1	6%	487	8	3%	383	6	3%	136	2	3%	44,334	106	0%
2008	44	5,552	14	0%	54,051	153	1%	46	3	13%	509	11	4%	787	10	2%	143	4	5%	55,536	154	1%
2009	44	7,650	21	1%	73,035	246	1%	34	1	6%	1,441	30	4%	1,274	19	3%	173	3	3%	75,957	248	1%
2010	44	7,588	27	1%	70,774	303	1%	31	2	13%	1,768	45	5%	974	24	5%	279	9	6%	73,826	307	1%
2011	44	6,571	35	1%	49,766	351	1%	24	3	25%	977	39	8%	652	40	12%	144	14	19%	51,562	355	1%
2012	44	6,536	32	1%	73,419	448	1%	16	1	12%	1,170	42	7%	896	38	8%	147	11	15%	75,649	452	1%
Min.	27	1,091			9,737			16			90			19			17			9,900		
Mean	38	4,502			45,138			64			801			665			100			44,523		
Max.	44	7,650			73,419			138			1,768			1,862			279			75,957		

Kasilof River Gillnet

Year	Days	Days Fished			Sockeye			Chinook			Coho			Pink			Chum			Total		
	Open	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP
<i>Kasilof River Gillnet</i>																						
2002	10	1,025	16	3%	17,980	274	3%	192	5	5%	12	0	0%	30	2	13%	13	4	60%	18,227	277	3%
2003	10	1,206	17	3%	15,706	277	3%	400	13	6%	107	0	0%	9	0	0%	4	0	0%	16,226	284	3%
2004	10	1,272	10	2%	25,417	203	2%	163	4	5%	58	13	44%	6	1	33%	0	0	0%	25,644	205	2%
2005	11	1,506	6	1%	26,609	104	1%	87	1	2%	326	5	3%	16	1	12%	1	0	0%	27,039	104	1%
2006	10	1,724	5	1%	28,867	91	1%	287	2	1%	420	16	7%	11	0	0%	6	0	0%	29,591	94	1%
2007	10	1,570	7	1%	14,943	66	1%	343	3	2%	68	4	12%	2	0	0%	0	0	0%	15,356	66	1%
2008	10	1,534	7	1%	23,432	107	1%	151	2	3%	65	3	9%	35	4	22%	23	3	26%	23,706	107	1%
2009	10	1,761	9	1%	26,646	167	1%	127	2	3%	165	0	0%	14	1	14%	11	2	36%	26,963	167	1%
2010	10	1,855	13	1%	21,924	170	2%	136	3	4%	23	5	43%	23	5	43%	1	0	0%	22,106	170	2%
2011	10	1,846	16	2%	26,780	244	2%	167	4	5%	47	10	42%	23	1	9%	3	0	0%	27,020	244	2%
2012	10	1,696	21	2%	15,638	197	2%	103	3	6%	161	19	23%	53	19	70%	15	1	13%	15,969	199	2%
Min.	10	1,025			14,943			53			12			2			0			15,356		
Mean	15	2,301			28,346			181			318			220			37			29,029		
Max.	44	7,650			73,035			400			1,768			1,862			279			75,957		

Fish Creek Dip Net

Year	Days	Days Fished			Sockeye			Chinook			Coho			Pink			Chum			Total		
	Open	Est.	SE	RP ^a	Est.	SE	RP ^a	Est.	SE	RP ^a	Est.	SE	RP ^a	Est.	SE	RP ^a	Est.	SE	RP ^a	Est.	SE	RP ^a
<i>Fish Creek Dip Net</i>																						
2002	0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2003	0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2004	0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2005	0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2006	0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2007	0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2008	0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2009	7	1,452	8	1%	9,898	73	1%	10	0	0%	53	6	22%	66	3	9%	33	5	30%	10,060	73	1%
2010	8	2,843	14	1%	23,705	161	1%	12	2	33%	3,576	84	5%	1,721	28	3%	290	9	6%	29,303	184	1%
2011	3	1,379	14	2%	5,236	86	3%	2	0	0%	905	29	6%	155	10	13%	72	7	19%	6,371	92	3%
2012	0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Min.	0	1,379			5,236			2			53			66			33			6,371		
Mean	2	1,891			12,946			8			1,511			647			132			15,245		
Max.	8	2,843			23,705			12			3,576			1,721			290			29,303		

Unknown Fishery

Year	Days	Days Fished			Sockeye			Chinook			Coho			Pink			Chum			Total		
	Open	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP	Est.	SE	RP
Unknown Fishery																						
2002	-	1,339	26	4%	14,846	353	5%	166	10	12%	341	25	14%	916	81	17%	54	8	29%	16,323	380	5%
2003	-	1,325	21	3%	15,675	247	3%	238	25	21%	219	14	13%	140	9	13%	88	9	20%	16,360	254	3%
2004	-	1,143	13	2%	13,527	179	3%	99	3	6%	366	25	13%	210	10	9%	25	4	31%	14,227	185	3%
2005	-	270	2	1%	4,520	38	2%	32	1	6%	39	1	5%	40	2	10%	4	0	0%	4,635	38	2%
2006	-	371	2	1%	3,406	34	2%	29	1	7%	47	2	8%	304	16	10%	84	0	0%	3,870	41	2%
2007	-	534	3	1%	6,729	52	2%	37	1	5%	61	3	10%	28	1	7%	6	0	0%	6,861	52	1%
2008	-	622	4	1%	6,890	63	2%	41	2	10%	66	3	9%	412	9	4%	58	3	10%	7,467	64	2%
2009	-	719	7	2%	7,968	84	2%	25	1	8%	144	10	14%	133	4	6%	57	5	17%	8,327	85	2%
2010	-	760	8	2%	8,300	125	3%	15	1	13%	168	7	8%	109	2	4%	12	1	16%	8,605	125	3%
2011	-	836	11	3%	10,695	136	2%	17	1	12%	80	5	12%	135	17	25%	72	7	19%	10,962	137	2%
2012	-	937	14	3%	13,295	219	3%	4	1	49%	173	25	28%	127	9	14%	36	5	27%	13,635	221	3%
Min.		270			3,406			4			39			28			4			3,870		
Mean		4,794			70,719			249			683			1,397			143			72,613		
Max.		32,818			537,765			1,509			4,745			11,127			915			548,583		

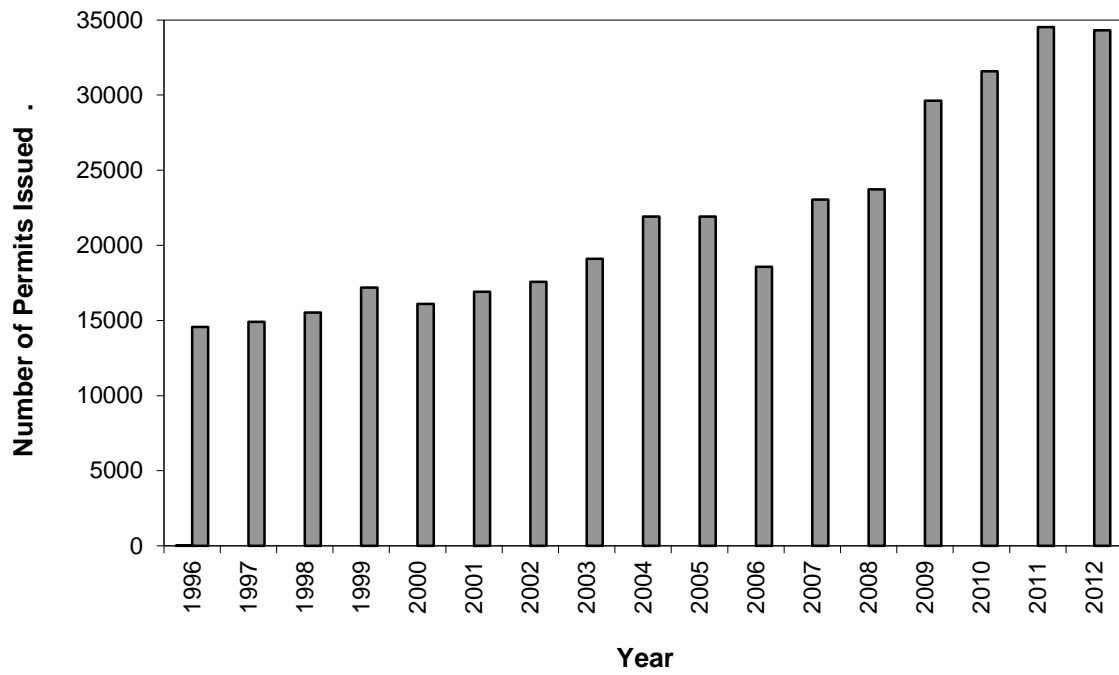
Upper Cook Inlet Personal Use Fisheries Total

Year	Days	Days Fished			Sockeye			Chinook			Coho			Pink			Chum			Total		
	Open	Est.	SE	RP ^a	Est.	SE	RP ^a	Est.	SE	RP ^a	Est.	SE	RP ^a	Est.	SE	RP ^a	Est.	SE	RP ^a	Est.	SE	RP ^a
Upper Cook Inlet Personal Use Fisheries Total																						
2002	-	20,625	86	1%	218,688	1,176	1%	1,138	24	4%	2,637	112	8%	1,821	46	5%	276	39	28%	224,560	1,197	1%
2003	-	21,224	74	1%	259,623	1,092	1%	1,070	17	3%	3,271	91	5%	8,470	149	3%	757	38	10%	273,191	1,136	1%
2004	-	25,360	43	0%	350,091	678	0%	1,098	9	2%	3,754	75	4%	2,715	32	2%	502	14	5%	358,158	689	0%
2005	-	27,253	21	0%	369,776	311	0%	1,132	3	1%	3,415	29	2%	2,520	17	1%	428	3	1%	377,271	314	0%
2006	-	20,543	20	0%	216,047	236	0%	1,405	4	1%	3,759	27	1%	12,434	41	1%	746	10	3%	234,391	242	0%
2007	-	28,677	29	0%	356,717	386	0%	1,924	5	1%	2,727	26	2%	2,352	24	2%	614	17	5%	364,334	388	0%
2008	-	28,491	34	0%	318,594	412	0%	1,601	11	1%	3,249	24	1%	11,869	52	1%	727	10	3%	336,040	416	0%
2009	-	37,754	46	0%	457,539	629	0%	1,384	7	1%	4,204	45	2%	6,969	34	1%	559	13	5%	470,655	631	0%
2010	-	41,387	56	0%	514,254	808	0%	1,059	8	1%	8,405	113	3%	6,482	47	1%	1,091	20	4%	531,291	818	0%
2011	-	43,450	72	0%	630,242	1,176	0%	1,453	11	1%	6,754	122	4%	4,880	100	4%	1,169	50	8%	644,498	1,187	0%
2012	-	43,543	74	0%	629,344	1232	0%	163.5	4.8	6%	5,512	128	5%	4,846	111	4%	623	19	6%	640,489	1244	0%
Min.		14,923			145,545			163			777			844			88			151,113		
Mean		26,267			320,510			1,107			3,721			4,574			528			330,439		
Max.		43,543			630,242			1,924			8,405			12,434			1,169			644,498		

^aRelative precision (SE *1.96)/estimate


FIGURES

Figure 1. Number of personal use permits issued in Upper Cook Inlet in 1996-2012.



APPENDICES

Appendix 1 – Example of A Personal Use Permit (New Scannable Design)

 Alaska Department of Fish & Game
2013 Upper Cook Inlet Personal Use Salmon Fishery Permit 00000
ALASKA RESIDENTS ONLY

Last Name First Name Initial

Mailing Address


City State Zip Code Phone Number - -

AK Driver's License # Sport Fishing License #

The head of a household is allowed 25 salmon and each additional member is allowed 10 salmon. A household is allowed up to 10 founders. These are your limits for the entire 2013 season. Total Household Members Total Household Salmon Limit

I have read and understood the permit requirements (listed on reverse of this card) and agree to return this permit to Alaska Department of Fish and Game by August 15th, 2013. I understand that failure to return my permit to ADF&G is a violation of 5 AAC 77.015(c) which is subject to a \$200 fine and the loss of my future personal use fishing privileges.

Permit Holder Signature Date Vendor Vendor Signature

 Alaska Department of Fish & Game
2013 Upper Cook Inlet Personal Use Salmon Fishery Permit 00000
TIPS OF TAILS MUST BE REMOVED AND SALMON HARVEST MUST BE RECORDED PRIOR TO LEAVING FISHING SITE OR CONCEALING FISH FROM VIEW

Last Name First Name Initial

Names of Other Household Members:

The head of a household is allowed 25 salmon and each additional member is allowed 10 salmon. A household is allowed up to 10 founders. These are your limits for the entire 2013 season. Total Household Members Total Household Salmon Limit

Did you fish for personal use in 2013? YES NO This permit is for gillnetting at the mouth of the Kenai River and dipnetting at the mouth of the Kenai and Kenal rivers. Dipnetting at Fish Creek is only open by Emergency Order. You must have this permit with you while fishing and you must record your harvest. Check the Southcentral Sport Fishing Regulations for legal times, gear, and species restrictions.

	DATE		LOCATION FISHED (CHOOSE ONE)			HARVEST BY SPECIES					
	MM	DD	Kenai River	Fish Creek	Kasilof River	Red	Chum	King	Coho	Pink	Flounder
1.	<input type="text"/>	<input type="text"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
2.	<input type="text"/>	<input type="text"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
3.	<input type="text"/>	<input type="text"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
4.	<input type="text"/>	<input type="text"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
5.	<input type="text"/>	<input type="text"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>

Report each day and location you fished and record your harvest, even if you did not catch anything.

Appendix 2 -Reminder letter to be mailed to nonrespondents

STATE OF ALASKA
 DEPARTMENT OF FISH & GAME
 PERSONAL USE SALMON PERMITS
 333 RASPBERRY ROAD
 ANCHORAGE, AK 99518-1599

PRESORTED
 STANDARD
 U.S. Postage
 PAID
 Anchorage, AK
 Permit No. 531

 Alaska Department of Fish & Game 00000
 2012 Upper Cook Inlet Personal Use Salmon Fishery Permit
 Return Reminder #X

DearXXXXXXXXXXXXXXXXXXXX,

Our records indicate that you have not returned your 2012 Upper Cook Inlet Personal Use Salmon Permit. Please take a few minutes to return the original permit or use the form below to report your harvest. Your harvest information is vital to continuing management and conservation of personal use salmon fisheries.

The head of a household is allowed 25 salmon and each additional member is allowed 10 salmon. A household is allowed up to 10 flounders. These are your limits for the entire 2012 season.

Total Household Members Total Household Salmon Limit

Did you fish for personal use in 2012? YES NO Remember that you must return your permit even if you did not fish. Failure to return your permit is a violation of SAAC 77.015(c) which is subject to a \$200 fine and the loss of your future personal use fishing privileges.

	DATE		LOCATION FISHED (CHOOSE ONE)			HARVEST BY SPECIES					
	MM	DD	Kenai River	Fish Creek	Kasilof River	Red	Chum	King	Coho	Pink	Flounder
1.	<input type="text"/>	<input type="text"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
2.	<input type="text"/>	<input type="text"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
3.	<input type="text"/>	<input type="text"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
4.	<input type="text"/>	<input type="text"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>
5.	<input type="text"/>	<input type="text"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>

Report each day and location you fished and record your catch, even if you did not catch anything.

Appendix 3 - Cook Inlet personal use Fishing Regulations

UPPER COOK INLET PERSONAL USE SALMON REGULATIONS

Kenai River, Kasilof River, Fish Creek Dip Net and Kasilof River Gillnet

GET A PERMIT

- A permit is required. With one permit you may participate in all of the above fisheries.
- To receive a permit you must have a current Alaska resident sport fishing license. A resident is a person who for the preceding 12 consecutive months has maintained a permanent home in the state of Alaska and is not claiming residency anywhere else. If you are exempt from purchasing a resident license, other appropriate identification is required.
- These are household permits. One permit is issued per household, and the number of people in your household determines the number of salmon you may keep. Household members are people who are living with you and are not paying rent to you. So they may be family members, or live-in friends, but *not* visiting relatives.
- In Cook Inlet only one personal use salmon fishing permit may be issued to each household per year. A holder of an Upper Cook Inlet Personal Use Salmon Permit may not receive a permit for the Kachemak Bay gillnet fishery.
- The seasonal limit is 25 salmon per head of household with 10 additional salmon for each family member.

GO FISHING

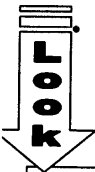
- You must have both the personal use permit and your current sport fishing license with you when while taking or transporting salmon in these personal use fisheries. That means don't leave the permit in your truck back in the parking lot!
- Each person who fishes must have a current Alaskan resident sport fishing license. **Non-residents may not fish in personal use fisheries, even when accompanying residents with permits.** This means that non-residents may accompany you, but may not handle the gear or operate a boat used in these fisheries.
- Your dip net must be a bag-shaped net supported on all sides by a rigid frame. The maximum straight line distance between any two points on the net frame as measured through the net opening may not exceed five feet. The depth of the bag must be at least one half the greatest straight line distance as measured through the net opening. No portion of the bag may be constructed of webbing that exceeds a stretched measurement of 4.5 inches. The frame must be attached to a single rigid handle and be operated by hand.
- All fish harvested must be recorded on the permit, in ink, immediately upon harvesting the fish. Immediately means before concealing the salmon from plain view or transporting the salmon from the fishing site. **Even if no fish are harvested, the date and fishery must be recorded on your permit.**
- A person may not possess salmon taken under a personal use salmon fishing permit unless both tips of the tail fin have been immediately removed from the salmon. Immediately means before concealing the salmon from plain view or transporting the salmon from the fishing site.

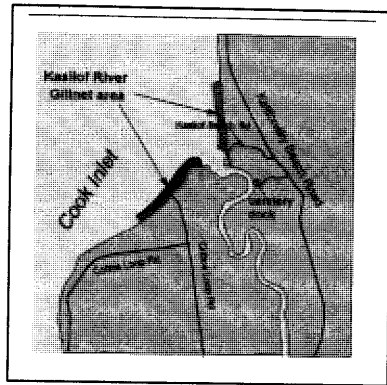


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SEND THE PERMIT BACK!

The permit must be returned to the department no later than August 15. Return it in person to any Fish and Game office or mail it to the address on the permit. The permit must be returned *regardless of whether or not you fished or caught any fish*. Notice there is a box to check on the permit if you did not fish at all. If you fish, but don't catch anything, write in the date and put zeros in the harvest boxes. **A permittee who fails to comply with reporting requirements may be denied personal use salmon harvest privileges in the future.**





GILLNET FISHERY

Gillnet fishery adjacent to the Kaslof River:

Season: The fishery opens at 6:00 a.m. June 16. Fishing is permitted only from 6:00 a.m.-6:00 p.m. The fishery will close June 25 at 6:00 p.m., but may be closed earlier by emergency order if harvests are higher than anticipated.

Legal gear: is a gillnet not to exceed 10 fathoms in length and a mesh size of six (6) inches. Depth of the net may not exceed 45 meshes. Nets must be at least 100 feet apart and only one set gillnet may be operated per household. **The permit must be in possession of the person fishing the net and that person's name must appear on the permit.**

Open area: The area open is between the ADF&G regulatory markers located near the mouth of the Kaslof River. Fishing is prohibited beyond one mile from the mean high water mark, and is also prohibited within the flowing waters or over the stream bed or channel of the Kaslof River at any stage of the tide.

King salmon: All species of salmon, including all king salmon caught, may be retained.

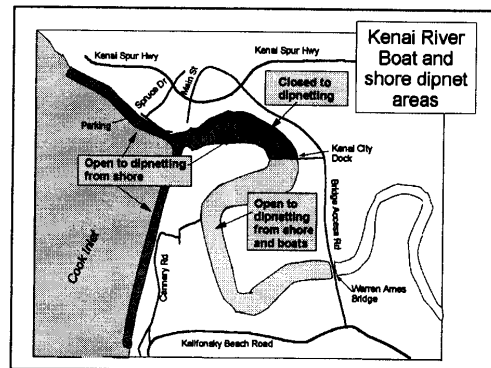
DIPNET FISHERIES

Kenai River dip net fishery:

Season: The fishery occurs from July 10 through July 31. Fishing is permitted 24 hours per day, 7 days per week.

Open area: The area open to dip netting from shore is from the commercial fishing regulatory markers outside the terminus of the river in Cook Inlet, upstream to the downstream edge of the Warren Ames Bridge, excluding that portion of the north shore of the Kenai River from an ADF&G marker below the terminus of Main Street to an ADF&G marker near the Kenai City Dock. The area open to dip netting from boats is from a regulatory marker in close proximity to the Kenai City Dock upstream to the downstream edge of the Warren Ames Bridge.

King salmon: A total of only one king salmon per permit may be retained from the Kenai and Kaslof River dip net fisheries combined. If additional king salmon are caught, they must be immediately released.

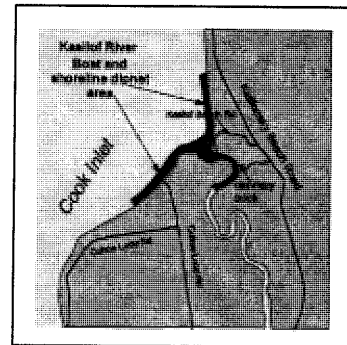


Kaslof River dip net fishery:

Season: The fishery occurs from July 10 through August 5. Fishing is permitted 24 hours per day, 7 days per week.

Open area: The area open is from the commercial fishing regulatory markers outside the terminus of the river in Cook Inlet, upstream for one mile. Dip netting in this area is permitted from shore or from a boat.

King salmon: A total of only one king salmon per permit may be retained from the Kenai and Kaslof River dip net fisheries combined. If additional king salmon are caught, they must be immediately released.

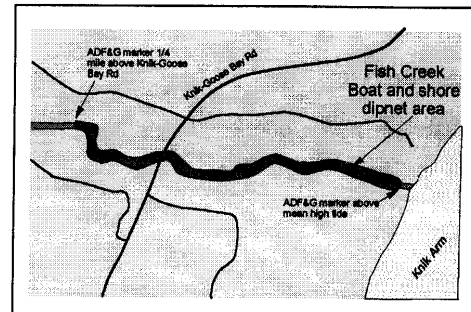


Fish Creek dip net fishery:

Season: The fishery is open from July 10 through July 31. Fishing is permitted seven days weekly from 11:00 a.m. to 11:00 p.m. However, be aware that this fishery is often closed by Emergency Order before July 31. Call 746-6300 to check.

Open area: The area open is from regulatory markers located on both sides of the terminus of Fish Creek, upstream to markers located approximately ¼ mile upstream from the Knik-Goose Bay Road. Dip netting in this area is permitted from shore or from a boat.

King salmon: King salmon may not be retained.



Appendix 4 - File Structure for personal use salmon databases

Table and Field Information for Database I:\DP\CISALMXX\CISAL_SQL.DBC
 Cook Inlet Personal Use Salmon Permit Process - Corrected and Final Data
 02/12/2004 - kpbrogdon

Respondent Harvest Table:

Table: CISLHVXXC

Number of records:

Num	Field Name	Type	Width	Dec	Nulls	Default
1	HVRECID	I	4	0	No	
2	PERMITNO	I	4	0	No	
3	NOCATCH	L	1	0	No	
4	NOHRVRPT	L	1	0	No	
5	HARVDATE	T	8	0	Yes	
6	RED	I	4	0	No	
7	KING	I	4	0	No	
8	COHO	I	4	0	No	
9	PINK	I	4	0	No	
10	CHUM	I	4	0	No	
11	FISHERY	C	20	0	No	
12	KEYDATE	T	8	0	No	
13	KEYID	C	16	0	No	
14	YEAR	I	4	0	No	
15	MAILING	I	4	0	No	
16	EDITED	L	1	0	No	
17	COMMENTS	C	20	0	Yes	

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Additional Field Information For Corrected Harvest Table CISLHVXXC:

HVRECID

Comment: Unique Harvest Record ID as copied from the Raw Harvest Table

PERMITNO

Comment: Permit Holders Permit Number.

NOCATCH

Comment: Flag indicating that an unsuccessful attempt was made on this particular day.

NOHRVRPT

Comment: A date or fishery was indicated but all harvest fields are blank - if zeros or dashes are shown, then this would be a nocatch.

HARVDATE

Comment: Date that the actual Harvest or attempted harvest took place.

RED

Comment: Total Red salmon harvested on this day

KING

Comment: Total King salmon harvested on this day

COHO

Comment: Total Coho salmon harvested on this day

PINK

Comment: Total Pink salmon harvested on this day

CHUM

Comment: Total Chum salmon harvested on this day

FISHERY

Comment: Valid Fishery - Choices are Kenai, Kasilof or Fish Creek. All others are recorded as "Unknown"

KEYDATE

Comment: Date that the Harvest report was keyed by Data Entry

KEYID

Comment: Key ID of Data Entry clerk that enters the Harvest Report.

YEAR

Comment: Fishing Year that the Permit is valid for.

MAILING

Comment: Mailing value of the Harvest Report. This can be 0, 1 or 2. If harvest data is received on different mailings with identical Harvest

EDITED

Comment: Extraneous field. Not used

COMMENTS

Comment: Misc comments from Data Entry - Any comments enclosed in [BRACKETS] are programatic changes made during the conversion process.

Field Information for Corrected Permit Holder Information (XX Pertains to Year)

Respondent Permit Table (Vendor Copy)

Table: CISLPMXXC

Number of records:

Num	Field Name	Type	Width	Dec	Nulls	Default
1	PMRECID	I	4	0	No	
2	PERMITNO	I	4	0	No	
3	FIRST_NAME	C	15	0	Yes	
4	LAST_NAME	C	15	0	Yes	
5	INITIAL	C	1	0	Yes	
6	ADLNO	C	10	0	Yes	
7	LICENSE_NO	C	7	0	Yes	
8	ADDRESS	C	30	0	Yes	
9	CITY	C	30	0	Yes	
10	STATE	C	2	0	Yes	
11	ZIPCODE	C	10	0	Yes	
12	PHONE	C	13	0	Yes	
13	HHMEMBERS	C	50	0	Yes	
14	FAMILYSI	I	4	0	Yes	
15	ALLOWED	I	4	0	Yes	
16	BLANKRPT	L	1	0	No	
17	NOTFISH	L	1	0	No	
18	OFFICE	C	20	0	Yes	
19	DUPPREF	I	4	0	Yes	
20	KEYDATE	T	8	0	Yes	
21	KEYID	C	15	0	Yes	
22	DATEISS	T	8	0	Yes	
23	MAILING	I	4	0	No	
24	STATUS	C	3	0	No	
25	COMMENTS	C	50	0	Yes	
26	YEAR	I	4	0	No	

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Additional Field Information For Corrected Permit Holder Information CISLPMXXC:

PMRECID

Comment: Unique Record ID from the Raw Permit Table

PERMITNO

Comment: Unique Permit Number - Only Permits that responded are included in the table

FIRST_NAME

Comment: Permit Holders First Name

LAST_NAME

Comment: Permit Holders Last Name

INITIAL

Comment: Permit Holders Middle Initial

ADLNO

Comment: Permit Holders Drivers License Number

LICENSE_NO

Comment: Permit Holders Fishing License Number

ADDRESS

Comment: Permit Holders Street Address

CITY

Comment: Permit Holders Resident City

STATE

Comment: Permit Holders Resident State

ZIPCODE

Comment: Permit Holders Resident Zipcode

PHONE

Comment: Permit Holders Resident Phone Number

HHMEMBERS

Comment: All additional Household Members that are eligible to fish under this Permit

FAMILYSI

Comment: Permit Holders Total Family Size - This value can be calculated if it is not filled in by the vendor providing allowable Harvest and/or HHmembers exist. If not, Family Size and Allowed are set to NULL

ALLOWED

Comment: Permit Holders Allowable Harvest - This value can be calculated if it is not filled in by the vendor providing Family Size and/or HHmembers exist. If not, Family Size and Allowed are set to NULL

BLANKRPT

Comment: Flag indicating that a Harvest Report was received but was completely blank. No harvest values and the "Did Not Fish" box was not checked.

NOTFISH

Comment: Flag indicating that a Harvest Report was received and the "Did Not Fish" box was checked.

OFFICE
Comment: Issuing ADFG Office or licensed Vendor

DUPPREF
Comment: Permit numbers that refer to this permit as the master

KEYDATE
Comment: Date that the Permit was originally keyed into the Raw data table.

KEYID
Comment: Keyid of the original data entry clerk that entered the permit into the raw data table.

DATEISS
Comment: Date that the Permit was issued by either an ADFG office or a licensed vendor

MAILING
Comment: Mailing value that the Permit Holder responded to. Values are "0" for the Original, "1" for the First , "2" for the Second Reminder. Not necessarily the same as what was physically turned in as an Original will often be sent in after a reminder is recd.

STATUS
Comment: Harvest Report Status for the permit. "N" indicates Did Not Fish, "U" indicates Unknown (Blank Harvest Report) and "H" indicates actual Harvest data was received.

COMMENTS
Comment: Misc Comments. Any comments inside of [brackets] notate programatic changes from the Raw data to the corrected (ie: family size and allowable harvest corrections)

YEAR
Comment: Harvest Year that the Permit reflects.

Non Respondent Permit Holder Information (Permits Issued but no Report Returned):

Table: CISLPMXXZ

Number of records: 14418

Num	Field Name	Type	Width	Dec	Nulls	Default
1	PMRECID	I	4	0	No	
2	PERMITNO	I	4	0	No	
3	FIRST_NAME	C	15	0	Yes	
4	LAST_NAME	C	15	0	Yes	
5	INITIAL	C	1	0	Yes	
6	ADLNO	C	10	0	Yes	
7	LICENSE_NO	C	7	0	Yes	
8	ADDRESS	C	30	0	Yes	
9	CITY	C	30	0	Yes	
10	STATE	C	2	0	Yes	
11	ZIPCODE	C	10	0	Yes	
12	PHONE	C	13	0	Yes	
13	HHMEMBERS	C	50	0	Yes	
14	FAMILYSI	I	4	0	Yes	
15	ALLOWED	I	4	0	Yes	
16	BLANKRPT	L	1	0	No	
17	NOTFISH	L	1	0	No	
18	OFFICE	C	20	0	Yes	
19	DUPPREF	I	4	0	Yes	
20	KEYDATE	T	8	0	Yes	
21	KEYID	C	15	0	Yes	
22	DATEISS	T	8	0	Yes	
23	MAILING	I	4	0	No	
24	STATUS	C	3	0	No	
25	COMMENTS	C	50	0	Yes	
26	YEAR	I	4	0	No	

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Field Information should be identical to CISHPMXXC with the exception that all records are for Non Respondent Permit Holders. There should be no Harvest Records, Did Not Fish or Blank Reports for any permits in CISHPMXXZ. Status value is "Z" as opposed to "H", "N" or "U"