

Russian River Boundary

Kenai National Wildlife Refuge

Legal History and Location



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Region 7
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[Note: Original photographs obtained from office files of Kenai NWR, Soldotna; USFWS Region 7 Engineering Office, Anchorage; and Chugach National Forest Office, Anchorage. Photographs included in this appendix may not be to scale due to enlargement or reduction of photocopies or reprints.]

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Introduction

This brief report reviews the legal history of the Kenai National Wildlife Refuge's Russian River boundary. The report also comments on boundary location factors for the existing unsurveyed Russian River boundary between Kenai NWR and Chugach National Forest. Extensive appendices containing copies of administrative orders, maps, MTPs, U.S. Survey field notes, selected Alaska statutes, case file abstracts, photographs, and other items are included.

Legal History of Boundary

The establishment of Chugach National Forest and the former Kenai National Moose Range predates the Kenai NWR. The following ascending chronology lists Federal administrative and legislative actions pertinent to the Russian River boundary. This case history begins with a proclamation establishing the Chugach National Forest in 1907 and ends with the 1983 Federal Register notice containing the legal description of Kenai NWR. Though Chugach National Forest, Kenai National Moose Range, and Kenai NWR have had numerous boundary adjustments and land status modifications since their creation, only those orders or actions of direct significance on the Russian River boundary are included below.

Presidential Proclamation (7/23/1907), signed by Theodore Roosevelt, established Chugach National Forest. The initial Forest boundary encompassed the Prince William Sound region and did not extend into the Kenai Peninsula. (See Appendix A for proclamation and map).

Presidential Proclamation No. 852 (2/23/1909), also signed by Theodore Roosevelt, greatly enlarged Chugach National Forest, extending its boundaries to include most of the Kenai Peninsula and the Russian River in its entirety. (See Appendix B for proclamation and map).

Presidential Proclamation No. 1307 (8/2/1915), signed by Woodrow Wilson, altered Chugach National Forest by significantly reducing its size. This proclamation uses the Russian River as a portion of the modified western Chugach boundary. The following description of the Russian River boundary is the basis for later boundary descriptions between Kenai NWR and Chugach National Forest. Excerpts from Proclamation No. 1307 follow. (See Appendix C for entire proclamation and map) .

“ . . . do proclaim that the Chugach National Forest is changed and that its boundaries are now as shown upon the diagram hereto annexed and forming a part hereof, and further described as follows:

“ . . . to a point (17) in latitude 60° 43' North due east from the triangulation point established on East Foreland by the U.S. Coast and Geodetic Survey; thence due east to a point (18) due north of the junction of Russian River with the Kenai River; thence due south to the junction (19) of Russian River with the Kenai River; thence up Russian River following the thread of the stream to the head of Upper Russian Lake (20); thence across the divide directly to the junction of Moose Creek with Resurrection River (21); . . . ”

Presidential Proclamation No. 1741 (5/29/1925), signed by Calvin Coolidge, made another major boundary adjustment for Chugach National Forest. Though no eliminated or added National Forest parcels abutted the Russian River boundary, the diagram attached to this proclamation (See Appendix D) is referenced in PLO 3400 (5/28/1964), which adjusted Kenai National Moose Range boundaries. The metes and bounds description of PLO 3400 specifically refers to this diagram in its description of the Russian River boundary.

Other administrative orders, e.g., EO 1260 in 1910 and a Presidential Proclamation in 1919, made significant boundary changes for Chugach National Forest but did not affect the Russian River boundary.

Executive Order 8979 (12-16-41), signed by Franklin D. Roosevelt, established the Kenai National Moose Range and described it with metes and bounds. This executive order created a common border for the Kenai National Moose Range and Chugach National Forest that extended south from a point on the south shore of Chickaloon Bay in Turnagain Arm, to a point 3 miles southeast of Upper Russian Lake. The metes and bounds description of this executive order used the existing western boundary of Chugach National Forest for the newly created eastern boundary of Kenai National Moose Range. Pertinent excerpts of the EO 8979 follow. (See Appendix E for entire EO).

“SEWARD MERIDIAN

“Beginning at the point of intersection of the west boundary of the Chugach National Forest with the line of mean high tide on the south shore of Chickaloon Bay, in Turnagain Arm of Cook Inlet, in latitude 60°53' N., and longitude 150° W.;

“Thence from said initial point, Northwesterly. . . . [Description continues in counter-clockwise direction].

“Thence northeasterly, along the crest of Kenai Mountains to the west boundary of Chugach National Forest at a point three miles southeasterly from the head of Upper Russian Lake; Thence northerly, along the west boundary of Chugach National Forest to the place of beginning.”

Public Land Order 3400 (5/28/1964), signed by Interior Secretary Stewart Udall, adjusted the boundaries of the Kenai National Moose Range. The PLO's purpose was to realign the Moose Range boundaries to conform with existing survey lines and protracted diagram lines on unsurveyed lands. The metes and bounds description of the boundary along Russian River references the text and diagrams of Presidential Proclamations Nos. 1307 (8/2/1915) and

1741 (5/29/25). (See Appendices C & D). The PLO 3400 left the boundary unchanged along Russian River as established in 1941 by EO 8979. However, the boundary southeasterly from the head of Upper Russian Lake becomes more precisely defined with this PLO. Also, U.S. Geological Survey topographic maps are used as a reference for the boundary. Excerpts from the legal description in PLO 3400 follow. (See Appendix F for entire text of PLO 3400).

"Beginning at the point of intersection of the boundary of the Chugach National Forest, with the line of mean high tide on the south shore of Chickaloon Bay, in Turnagain Arm of Cook Inlet in approximate latitude 60° 53' N., and longitude 150° W.; thence Northwesterly . . . [Continues in counter-clockwise direction].

"Thence by metes and bounds, on great circle courses with the following approximate forward bearings and distances, and with topographic references as shown on presently current editions of U.S. Geological Survey Quadrangles (scale 1:63,360): . . .

". . . to a point where an unnamed stream flows easterly into Resurrection River in approximate latitude 60°18'20" N., and approximate longitude 149°46'39" W., said confluence being on the boundary of Chugach National Forest as said boundary is exhibited on the diagram accompanying Presidential Proclamation No. 1307 on August 2, 1915, and said confluence being approximately 3 miles southeasterly from the head of Upper Russian Lake;

"Thence northerly along the west boundary of Chugach National Forest as said boundary is defined by words and diagrams in Presidential Proclamations Nos. 1307 (Aug. 8, 1915) and 1741 (May 29, 1925), to the place of beginning."

[Note: Chugach National Forest, 3301 C Street, Anchorage, Alaska, has a small disorganized collection of documents and maps that includes some official Chugach maps that accompanied Presidential Proclamations. Chugach National Forest maps not available in the Anchorage office probably are locatable in the National Archives, Washington, D.C.]

Public Law 96-487 (ANILCA - 12/2/1980) redesignated Kenai National Moose Range as Kenai National Wildlife Refuge. Two sections of ANILCA have bearing on the Kenai NWR boundary. One is Section 103 "MAPS", and the other is Section 303 "ADDITIONS TO EXISTING REFUGES." Section 103(b) prescribes the timely publication of maps and legal descriptions for ANILCA lands, and allows minor boundary adjustments for Wildlife Refuges and other conservation units. Section 303(4)(A) describes Kenai NWR. Language from both sections follows.

"Sec. 103.(b) As soon as practicable after the enactment of this Act, a map and legal description of each change in land management status effected by this Act,

including the National Wilderness Preservation System, shall be published in the Federal Register and filed with the Speaker of the House of Representatives and the President of the Senate, and each such description shall have the same force and effect as if included in this Act: Provided, however, That correction of clerical and typographical errors in each such legal description and map may be made.

“Each such map and legal description shall be on file and available for public inspection in the office of the Secretary. Whenever possible boundaries shall follow hydrographic divides or embrace other typographic or natural features. Following reasonable notice in writing to the Congress of his intention to do so the Secretary and the Secretary of Agriculture may make minor adjustments in the boundaries of the areas added to or established by this Act as units of National Park, Wildlife Refuge, Wild and Scenic Rivers, National Wilderness Preservation, and National Forest Systems and as national conservation areas and national recreation areas. For the purpose of this subsection, a minor boundary adjustment shall not increase or decrease the amount of land within any such area by more than 23,000 acres.”

“Section 303(4) Kenai National Wildlife Refuge.—(A) The Kenai National Wildlife Refuge shall consist of the existing Kenai National Moose Range, including lands, waters, interests, and whatever submerged lands, if any, were retained in Federal ownership at the time of statehood, which shall be redesignated as the Kenai National Wildlife Refuge, and an addition of approximately two hundred and forty thousand acres of public lands as generally depicted on the map entitled “Kenai National Wildlife Refuge”, dated October 1978. . . .”

Notice - Federal Register Vol. 48, No. 38 (2/24/1983), contains the boundary description for Kenai NWR mandated by ANILCA. Unlike the counter-clockwise boundary descriptions found in EO 8979 (1941) and PLO 3400 (1964), the Kenai NWR boundary is described in the clockwise fashion of 1915 Presidential Proclamation No. 1307. Significantly, this boundary description also returns to terminology and descriptors used in the Russian River description of the 1915 Proclamation, language not found in EO 8979 (1941) or PLO 3400 (1964).

The Federal Register Notice (48 FR 7958-7959) describing the Kenai NWR boundary along the Russian River follows.

*“*Thence northwesterly, along the centerline of the Chickaloon River, approximately 4 1/4 miles to a point due North of the thread of the Russian River at its junction with the Kenai River, in the westerly portion of section 33, T. 7 N., R. 4 W., Seward Meridian;”*

“Thence due South, approximately 11 1/2 miles to the junction of the Russian River with the Kenai River in section 33, T. 5 N., R. 4 W., Seward Meridian;

“Thence up the Russian River, following the thread of the stream, approximately 16 miles to the head of Upper Russian Lake located in section 30, T. 3 N., R. 3 W., Seward Meridian;”

“Thence across the divide, on an approximate forward bearing of S. 83 1/2° E., approximately 1 1/2 miles to an intersection with Summit Creek in section 28, T. 3 N., R. 3 W., Seward Meridian; . . .

*“*Department of Interior 1:250,000 scale map issued in 1981, incorrectly depicts this portion of the description.”*

The legal description of Kenai NWR (48 FR 7959) has a single footnote which is significant because it apparently regards the nebulous location of the junction of the Russian and Kenai rivers. The footnote states that a 1981 DOI map inaccurately depicts the boundary description from the Chickaloon River to the Russian River. While this vague footnote mentions a discrepancy between the official map and the text of the legal description, it does not illuminate the discrepancy. First, it does not identify precisely which 1981 DOI map at scale 1:250,000 is referenced, and secondly, it does not note specifically how the map incorrectly depicts this portion of the description.

On the first point, it may be assumed the 1981 DOI map reference regards the October 1978 official maps (scale 1:250,000) of Kenai NWR (USGS 1981), which are cited in Federal Register Notice 48-38, 1983. Those maps were printed in 1981, as indicated by the notation date below the lower right-hand corner edging on Sheets 1 through 4 of the Kenai NWR official maps (USGS 1981). Each of the 1981 map sheets also carries the date “October 1978” in blue lettering at the map’s extreme lower right-hand corner. The possibility remains however that the authors of the legal description in the Federal Register may have been referencing some other 1981 DOI map. A USGS information specialist at the Earth Science Information Center in Reston, Virginia, unsuccessfully attempted to determine whether other 1981 DOI maps may have been printed and issued (personal communication, Schwartz 1996). It should be further noted that 1:63,360 scale “Official Maps” for Kenai NWR dated October 1978, stored at the Region 7 Division of Realty, Cartographic Unit, show a boundary that appears to conform with the Kenai NWR maps (scale 1:250,000) cited above (USGS 1981).

The second point involves the undefined but inaccurate map depiction. If one assumes the footnote referenced map is the official Kenai NWR map, and since the boundary along the Chickaloon River appears correct on that map, it can be assumed the footnote refers to the north-south boundary line running from the Chickaloon River southerly to that “point due North of the thread of the Russian River at its junction with the Kenai River.” The official Kenai NWR map, at scale 1:250,000, depicts this portion of the boundary as longitudinal meridian 150°00’.

The authors of the footnote may have considered the boundary point at the confluence of the Kenai and Russian rivers to be situated some distance west or east of the meridian. If so, it would have been one reason to generate a corrective footnote in the metes and bounds description.

[Note: This is my speculation based on an assumption, but it is the most reasonable explanation given the information found in the course of my research. In an effort to clarify the footnote and map, I attempted to contact former USFWS staffers Bill Mattice, Clay Hardy, and Bill Reffalt. I did speak briefly with Bill Mattice (personal communication 1996) but did not contact Clay Hardy or Bill Reffalt. In a brief telephone interview on July 19, 1996, Mr. Mattice recalled doing a cursory review of all Alaska Refuge legal descriptions following a technical review by a Region 7 cartographer. Mr. Mattice also recalled the Refuge boundary footnotes in the Federal Register that noted map discrepancies. He stated that he attempted to identify and locate such maps after searching several sources, such as the BLM, the USFWS Realty Office in Washington, D.C., and the ANCSA Office, Washington, D.C. He stated rather emphatically, "The maps do not exist and never did!" When asked, he was unsure who originally authored the boundary descriptions in the Federal Register. Mr. Mattice speculated the staff of the BLM Cadastral Survey Office in Denver, Colorado, generated the original descriptions.]

It should be noted that later editions of USGS topographic maps, "Seward" and "Kenai", scale 1:250,000, likewise show the boundary line running along the longitudinal meridian. Further, pre-ANILCA USGS topographic maps at scale 1:63,360 (Seward B-8 and Kenai B-1) similarly show the Moose Range-National Forest Boundary conforming to later 1:250,000 scale depictions of the Refuge-National Forest boundary along the longitudinal meridian.

Key terms in the 1983 Notice (48 FR) and in the 1915 Presidential Proclamation (No. 1307) are "junction" and "thread of the stream"; terms that require some scrutiny for a good understanding and accurate determination of the Kenai NWR - Chugach National Forest boundary. A brief exploration of factors and considerations for the Russian River boundary location follows.

Boundary Location

Locating the Kenai NWR boundary along the Russian River is (and will be for some time) a problematic exercise for the researcher, the cadastral land surveyor, land law attorney, judge, jury, and/or court appointed referees who may be required in the future. Some factors to consider for locating the river boundary between Kenai NWR, Chugach National Forest, and other potential future landholders are addressed below.

Boundary survey status

The Russian River runs through four townships. Three townships are unsurveyed and one township is partially surveyed according to current MTPs. (See Appendix H for MTPs; See Appendix I for Historical Index Reports.)

Two patented holdings are situated proximal to the Russian River but neither has a boundary along or across the river. Mineral Survey 2489 (See MTP in Appendix H) lays east of the Russian River and within the Chugach National Forest in Sec. 9, T. 4 N., R. 4 W., S.M. The U.S. Survey 2633 (See MTP in Appendix H) is near the Russian River outlet of Upper Russian Lake. This parcel, whose southern boundary meanders along the north shore of Upper Russian Lake, lays entirely within Kenai NWR.

Especially significant is a third patented survey, U.S. Survey 3037, situated on the north bank of the Kenai River and across from the mouth of the Russian River. (See Appendix J for survey plat and field notes.) This 1951 survey locates a portion of the Chugach National Forest boundary north of the Kenai River. The survey plat shows the "west boundary of the Chugach National Forest", which begins at a meander corner on the north bank of the Kenai River. Page 1 of the survey fieldnotes references the confluence of the thread of the Russian River and Kenai River for establishing the meander corner. Page 2 of the fieldnotes states the surveyor established a brass-capped iron rod monument at this meander corner on the boundary. The brass-capped monument replaced a blazed and marked, six inch diameter spruce post previously established by the U.S. Forest Service as a Chugach National Forest boundary marker. Randy Schrank (personal communication 1996), a current land surveyor for Chugach National Forest, is not familiar with the earlier Forest Service survey and very much doubts that records of such a survey exist in their Anchorage office. The pre-1951 Forest Service survey would have no standing as an official survey, but it is noteworthy that Forest Service personnel placed a boundary marker at the same location later monumented by BLM surveyors as the point due north of the confluence of the threads of the two rivers.

This writer briefly visited the vicinity of U.S. Survey 3037 on July 29, 1996, and located an original 1951 brass-capped monument at W.C.M.C. 3 at a footpath on the river bank. The original monument for W.C.M.C. 1, which established a point on the Refuge-Forest boundary, was not found. However, a W.C.M.C. 1 replacement monument established by a USFS cadastral

surveyor in 1978 was located approximately 30 feet north of the Kenai River water's edge and approximately 15 feet south of a post and rail fence along a road edge. A ground level aluminum cap contains the stamped words "U.S. Dept. of Agriculture Cadastral Survey Forest Service". It also bears stamped letters and numbers which read, from top to bottom, "WC CNF C1 MC". A squared 3.5 inch by 3.5 inch treated wooden post without markings is 3 feet east of the monument. A large cottonwood tree, 53.45 feet northwest of the monument, is a bearing tree marked with red paint and a scratched aluminum plate posted by "RDH 11/78". According to "corner card" files maintained by the Chugach National Forest office, the 1978 replacement monument was established because the original monument was lost to bank erosion (Schrank, personal communication 1996). The ADF&G Division of Sport Fish (1996: 3) notes that the river bank in the vicinity of the monument has disturbed vegetation, a history of being trampled by anglers, and bank erosion secondary to beaver activity.

The awkward and problematic language of the Kenai NWR metes and bounds description (See Appendix G) regarding the "junction" of the Russian and Kenai Rivers may have implications for the Refuge-Forest boundary north of the Kenai River. Though the 1951 BLM survey established a monument referencing the confluence of the Russian and Kenai Rivers, the boundary point described as "*the thread of the Russian River at its junction with the Kenai River*" is an ever changing location, possibly shifting as much as 1,000 east-west linear feet seasonally. Several conflicting informal opinions were offered to this writer regarding what weight should be given to the metes and bounds description for boundary identification versus an established survey monument. The author queried real estate specialists, surveyors, and cartographers from three Federal agencies. A few individuals strongly opined the monument permanently fixed the boundary north of the Kenai River while others were uncertain or suggested the boundary changed with the shifting confluence of the Russian and Kenai rivers.

To summarize, the boundary between Kenai NWR and Chugach National Forest is unsurveyed. The "confluence" of the thread of the Russian and Kenai rivers was identified in 1951 by the BLM and at an undetermined earlier date by the U.S. Forest Service. A single BLM meander corner monument was established due north of that confluence on the bank of the Kenai River for U.S. Survey 3037. The U.S. Forest Service established another meander corner monument in 1978 after the original was lost to bank erosion. The changing boundary point described as "*the thread of the Russian River at its junction with the Kenai River*" may affect the Refuge-Forest boundary location from the Kenai River north to the Chickaloon River.

The "thread of the stream" as boundary

Paraphrasing the metes and bounds description of 48-38 FR 7958, the thread of the Russian River is the Kenai NWR boundary from its junction with the Kenai River to the head of Upper Russian Lake, approximately 16 miles upstream from the mouth of the river. What is the thread of a stream?

Several similar but inconsistent definitions exist for the "thread of the stream". Works on boundary law and surveying offer varying definitions of the phrase (Robillard and Bouman 1992; Brown, Robillard and Wilson 1986; Bureau of Land Management 1973; Minnick 1989; Wattles 1979; Simpson 1994; American Congress on Surveying . . . 1978). Three authoritative, lengthy, and somewhat conflicting definitions follow.

1. ***Thread of a River*** *The thread of a river is the line formed an equal distance from the shores, and is not to be confused with the center of the main channel which may be closer to one bank than the other. The thread of a lake is the center line which passes through the thread of the inlet and the thread of the outlet. Where there is no inlet or outlet, the thread passes through the center of the lake on its longest axis. The thread of a river or lake is determined when the water is in its natural and ordinary stage, at medium height (75 Me.329 and 46 Am. R. 397). In New York it was held that the thread of a nonnavigable river is the center line of the water at its lowest stage (Horton v. Niagara L. & O. Power Co., 247 NYS 741). In Oregon in Micelli v. Andrus, 61 Or. 78 the thread at ordinary low stage was also held.* (Brown, Robillard and Wilson 1986:200).
2. ***Division line where stream is boundary.*** *In the case of streams, both navigable and nonnavigable, in those states where riparian owners hold title to the bed of navigable streams forming a boundary between two tracts of land, the boundary line is the center of the main current or, as it is sometimes called, the "thread" or "thalweg" of the stream. The boundary is not the center of the current at the time the boundaries were first established. And, unless specifically so provided, a meander line is not a boundary. "This thread of the current may shift from time to time. As it shifts the boundary also shifts, unless this change is caused by an avulsion."* (Robillard and Bouman 1992:777).
3. ***Thread of river (or stream)*** – *The line equidistant from the edge of the water on the two sides of the stream at the ordinary stage of the water. In some cases it has been construed to mean the median line of the main channel of the stream; the state law should be consulted in any case. See also thread of river, middle.*
Thread of river, middle – *The line equidistant between the low-water lines on the two sides of a river, extending from headland to headland without considering arms, inlets, creeks, and affluents as parts of the river. See also thread of river (or stream).* (American Congress on Surveying . . . 1978:165).

Survey of navigable versus nonnavigable streams

Where is the thread of the Russian River? Retired BLM senior Riparian Boundary Specialist James Simpson, presently engaged in surveying practice restricted to water boundaries and navigability studies, recently authored a work titled, *River & Lake Boundaries, Surveying Water*

Boundaries-- A Manual (Simpson 1994). He states on page 31, "When approaching a water boundary problem, your first decision must be: Is the water body navigable or is it nonnavigable?" and ". . .the results of a boundary determination and title can differ greatly between a navigable waters and a nonnavigable waters decision." Indeed, for water boundary surveys the BLM's *Manual for Surveying Instructions* (Bureau of Land Management 1973: 166-170) differentiates between median lines, thalweg lines, and partition lines on navigable and nonnavigable waters. Simpson's statements suggest a boundary survey prior to a determination of navigability or nonnavigability would be premature. Ironically, the impending BLM navigability determination for the Russian River that triggered this report on the legal boundary of the river is a key determinant for eventual boundary location. The definition of the thread of the Russian River, and ultimately the survey and location of the thread, depends upon ownership and title of submerged streambed and adjacent uplands. The title to these lands will be decided in part by the river's navigability status. A treatise addressing the survey of water boundaries makes a more emphatic statement where issues of navigability are concerned.

"Before a decision can be made as to how to survey a body of water or as to jurisdiction of the court, the question of navigability must be determined. In doing so the court will use any evidence it feels just and proper. [Authors cite Sanders v. Placid Oil Co., 861 F.2nd 1374 (5th Cir. 1988).] (Robillard and Bouman 1992:853)

Author Roy Minnick, surveyor and boundary location specialist, has developed college courses regarding water boundaries and related topics in California. In 1990 he taught a course titled "Water Boundaries for Land Surveyors" for the Alaska Surveying and Mapping Conference in Anchorage. A short book used for his course states water boundaries in non-tidal water bodies are generally determined by State law (Minnick 1990:21). Case law examples used by Minnick do not shed light on what role Alaska State law might play in Russian River scenarios. However, Alaska Statutes, Title 9. Code of Civil Procedure, address rules for construing real estate descriptions (Sec. 09.25.040), action to establish boundaries (Sec. 09.45.020), and marking of boundaries (Sec. 09.45.030). (See Appendix K for Title 9 Statutes). Section 09.25.040 mentions the phrase "thread of the stream" in reference to nonnavigable stream boundaries, but it is not defined. Hypothetically, these State laws may play some future role in locating boundaries and resolving possible litigation among titleholders to the bed of the Russian and Kenai Rivers, such as CIRI or the State of Alaska. Minnick (1990:1,22) also notes the difficulty and challenge in locating river boundaries due to inconsistent law and facts, calling water boundary location perhaps the most difficult type of location. It also generates considerable litigation among adjacent owners of riparian and submerged lands.

Other boundary location considerations

Definitions. Defining and locating the northernmost endpoint of the thread of the Russian River will be a significant issue in future boundary determinations. The meaning of the terms

“thread of the stream” and “junction” are less than clear. The BLM established the “confluence” of the threads of the Russian and Kenai rivers in its 1951 survey. Some definitions for the “thread of a stream” state, and others imply, that a “thread of the stream” boundary is not fixed. Rather, the thread of the stream changes over time with the accretion, avulsion, erosion, and reliction that may occur along the stream. As the thread of the stream moves, so does the boundary. Also, it should be noted that the term “junction” typically is not used in water boundary descriptions and may be open to interpretation. Most boundary law or survey references checked did not define “junction” in their texts or their glossaries. One reference that does define “junction”, *Definitions of Surveying and Associated Terms* (American Congress on Surveying . . . 1978:86), describes it rather imprecisely as “the place or point of union, meeting, or junction”. “Junction” is synonymous with the word “confluence” according to *Webster's New Collegiate Dictionary* (Woolf 1979:627).

Where is the mouth of the Russian River? Confident location of the most downstream point of the thread of the Russian River is hindered by the ill-defined mouth of the Russian River. An inspection of historic aerial photos and current river channels indicates that the point at which the Russian River discharges into the Kenai River can vary markedly according to the water stage of the Kenai River. For instance, aerial photographs taken May 13, 1991, show the clear waters of the Russian River discharging into turbid Kenai River waters in the vicinity of the ferry crossing during relatively low water stage (see Appendix L). On that date the Cooper Landing stream gage for the Kenai River recorded a relatively low flow of 1,320 cubic feet per second (cfs) (see Appendix M). In contrast, an August 3, 1983, color aerial photo of the same location shows the Russian River discharging into a channel of the Kenai River nearly 1/4 mile upstream of the confluence indicated by the 1991 photograph (see Appendix L). The Kenai River flow at the Cooper Landing stream gage for the August photo measured 5,670 cfs (see Appendix M). A cursory review of selected historic aerial photographs and corresponding Kenai River streamflow data show the point of confluence of the two streams vary significantly according to water stage.

Water stage variability, and the marked hydrographic changes associated with high and low flows, relocates the mouth of the Russian River seasonally. Dynamic hydrographic characteristics suggest a possibility that the 1951 BLM cadastral survey incorrectly located the monument referencing the confluence of the Russian and Kenai rivers, and thereby misidentified the Refuge-Forest boundary (see Appendix J, U.S. Survey 3037 Field Notes). The 1951 BLM field survey took place during the week of “momentary maximum” discharge for the Kenai River for the entire water year 1951. The Kenai River flowed 8,960 cfs on September 8, 1951 (see Appendix M). A crude analysis of a 1951 aerial photo showing stream and island morphology (see Appendix L), later historic aerial photos, and streamflow data date-matched to those photos strongly suggests the monument at Meander Corner 1 of U.S. Survey 3037 fixed the Refuge-Forest boundary perhaps 800-1,000 feet west (downstream) of the confluence of the two streams.

A view of the Kenai River upstream from the vicinity of the ferry cable easily gives the impression that the Kenai River channel on the opposing bank is the mouth of the Russian River (see Appendix L for 1963 ferry crossing photograph). The large island at the confluence of the

Russian and Kenai rivers is not easily discernable as a Kenai River island when viewed from ground level in the vicinity of the ferry and the area surveyed in 1951. The June 25, 1951, vertical aerial photograph shows the spatial relationship between the Kenai River, the island, the Kenai River channel south of the island, and the Russian River 3 months prior to the September BLM land survey for U.S. Survey 3037 (see Appendix L). Kenai River flow was less at the time of the June aerial photo than at the time of the September survey.

The State of Alaska considers the mouth of the Russian River to be upstream of the large island at the two rivers' confluence. According to Kenai NWR Ranger Rick Johnston, Alaska Department of Fish and Game fish biologists have considered this upstream location to be the confluence of the two rivers for about 30 years. They have made fisheries management decisions, promulgated regulations, posted sport fishing regulations, taken law enforcement actions, and published Russian River informational materials for sockeye fishing based upon their long-standing determination that the confluence of the Russian and Kenai rivers is upstream of the large island. (See Appendix S for Kenai NWR correspondence, plus Forest Service and State of Alaska attachments.)

Islands at the confluence. Other issues regarding boundary location could focus on the large island in the Kenai River and other smaller islands that exist near the mouth of the Russian River. Current Kenai NWR Ranger/Pilot Rick Johnston indicated the Refuge and Chugach National Forest have no formal administrative agreement about the large island for management purposes, but Refuge staff, rather than Chugach Forest staff, manages the island and contacts the public on the island (see memorandum in Appendix S).

Management aside, inconsistencies in the mapping and platting of the islands near the confluence of Russian and Kenai rivers complicate questions of boundary location and land status. For instance, the largest island is approximately 1,200 feet long but does not appear on current BLM MTPs or USGS topographic quadrangles *Kenai (B-1)* and *Seward (B-8)*, scale 1:63,360. The USGS published the maps in 1950 and 1951 respectively, with photogrammetrically mapped topography from 1950 aerial photographs. However, the island does appear on State of Alaska status plats (see Appendix N), numerous historic aerial photographs, the 1986 USGS provisional topographic map *Kenai (B-1) NE* (scale 1: 25,000), a 1995 USFS land status map titled *Current Land Status Kenai / Russian River*, and a 1980 BIA site map of the lower Russian River (BIA 1993; see Appendix O). Further, a casual comparison of historic stream photographs in the vicinity of the ferry crossing with the current stream shows several small islands have disappeared in the past 3 decades (see Appendix L).

In addition to problems associated with mapping and platting inconsistencies, island ownership is often a thorny and complex issue where the navigability or nonnavigability of surrounding stream waters can determine the title and boundaries of the island. In his book regarding river and lake boundaries, James Simpson (1994: 231-268) writes an entire chapter with several case studies on island definitions, surveying procedures, accretion to islands, island formations, and title claims; all topics that may have applicability to the islands near the mouth of the Russian River. One

example among several potentially complicating factors is in a scenario where the Russian River is determined to be nonnavigable. The large island at the confluence of the rivers could have navigable waters on one side and nonnavigable waters on the other, a situation where differing laws and surveying rules would apply to the same island.

Unsurveyed islands. The unsurveyed status of the large island and other smaller islands near the confluence of Russian and Kenai rivers may affect eventual land status of the islands. In a 1992 precedent setting case in Michigan (*Wolff v. U.S.*, 6th Cir. No 91-2252), title to an unsurveyed public domain island passed by State law to the successor-in-interest of the patentee of the adjacent, surveyed shore lands (USFWS 1992). The 10th Circuit Court recently decided another case (*Koch v. U.S.*, No. 93-1298) regarding islands in a nonnavigable reach of the Colorado River (Clark 1995; Simpson 1994: 241-243). The court found adjacent upland owners held title to six unsurveyed islands. A subsequent Department of Justice request for *certiorari* to the U.S. Supreme Court was denied (personal communication, Carroll 1996). However unlikely the possibility, a similar situation could develop for unsurveyed Kenai NWR islands if adjacent riparian lands are conveyed but islands are not. [Note: The unsurveyed status of the above mentioned islands is not unique for islands within Alaska Refuges (Allen 1995). A sampling of 52 unsurveyed Refuge townships by Region 7 cartographic staff for islands omitted from public land surveys suggests 2,115 such islands may exist in Alaska Refuges.]

Alaska earthquake - 1964. The 1964 Alaska earthquake effected the physical geography of the Kenai Peninsula, including the Russian River basin. It is possible the Russian River, and therefore the Refuge boundary, has been altered by tectonic displacement. Generally, the Russian River land area is in a region that was displaced horizontally (southerly), displaced vertically (subsidence), and tilted. Specific notable events and changes in the area that followed the March 27, 1964, earthquake include the collapse of the Kenai River bridge at Cooper Landing, the tilt of the western end of Kenai Lake shore land to a level 3 feet lower than the eastern end, temporary reverse flow of the Kenai River on its uppermost one mile reach, and a land tilt averaging 1 foot per 10 miles in the Kenai Lowland physiographic area. Any future research attempt to quantify changes that may have occurred along the Russian River, especially at the confluence of the Kenai and Russian rivers, should begin with a review of studies generated by the U.S. Geological Survey and the Coast and Geodetic Survey during the 1960s. The USGS's professional paper series titled *The Alaska Earthquake March 27, 1964*, and the Coast and Geodetic Survey's 3 volume *The Prince William Sound, Alaska, Earthquake of 1964 and Aftershocks*, offer comprehensive and detailed information on the physical effects of this historic tectonic event.

Land status - CIRI selections. In addition to questions of shifting water boundaries and island ownership, land status change of the Russian River's lower reaches could affect boundary location. Future boundary location impacts secondary to CIRI's application for cemetery site and historical place could extend approximately 1.75 river-miles upstream from the mouth of the Russian River. (See Appendix H for MTP; Appendix P for case file abstract AKAA 011096.) The previously mentioned large island near the confluence of the Russian and Kenai Rivers is

included in the CIRI 14(h)(1) selection according to the 1995 USFS land status map noted earlier. A second CIRI application for a cemetery site and historical place exists along an approximate 1-mile run of the Russian River 2 miles downstream from the Upper Russian Lake outlet. (see Appendix H for MTP; see Appendix P for case file abstract AKAA 011097.)

Land status - Hydropower reservations. Power Site Classification 409, subject to Section 24, Federal Power Act, affects Kenai NWR land status for lands within 1/4 mile of the Kenai River from the mouth of the Russian River to a point 0.8 river-miles upstream from the mouth of the Russian River. However, the possibility that PSC 409 could affect boundary location is remote. A 20-year dormant, pending petition for full revocation and restoration exists for PSC 409. A 1983 BLM land report recommended PSC 409 be revoked in its entirety. The revocation process requires a hydro-power assessment (water power evaluation) by a BLM hydrologist. That assessment is tentatively scheduled to be initiated in the fall of 1997. A prior land withdrawal for Power Project No. 119, which affected the same area, was vacated in 1985. (See Appendix H for MTP; Appendix Q for case file abstract AKAA 011716 and other documents pertinent to PSC 409 and PP 119.)

Land Status - Wilderness designation. Along the Russian River, Kenai NWR lands are within a designated wilderness area except for those Refuge lands on the river's lower 1 mile reach where the electric transmission line crosses the river. Though the wilderness area boundary does not affect the Kenai NWR boundary along the Russian River, this significant aspect of land status is noted here because the wilderness area designation influences present activity and could influence future boundary and land status issues. (See Appendix H for MTP depicting wilderness boundary.)

State of Alaska's view - Submerged lands in Kenai NWR. Based on the Tustumena Lake decision, title to submerged lands within Kenai NWR was reserved by the United States at the time of statehood and, therefore, the navigability or nonnavigability of the river is irrelevant for purposes of future State title to submerged Refuge lands of Russian River. However, the State of Alaska (Swanson 1988; Shobe 1991) has taken exception to the Tustumena Lake decision, suggesting it did not apply to other water bodies of the former Kenai National Moose Range (see Appendix R for State correspondence). Though the State of Alaska did not include the Russian River in its 1992 notice of intent to sue for quiet title, future action by the State could affect future boundary location of Kenai NWR from the confluence of Russian and Kenai rivers to the head of Upper Russian Lake.

The moving and ill-defined boundary of the Russian River, especially at the junction of the Russian and Kenai rivers, raises questions beyond the scope of this report. The potential impact of boundary issues on Kenai NWR lands is difficult to gauge. Though the future effect of a floating boundary and its imprecise terminus is unclear, copious amounts of case law clearly show a shifting water body boundary and a poorly identified boundary corner invite dispute.

Summary and Comments

The use of the Russian River as legal boundary began in a metes and bounds description contained in a 1915 Presidential Proclamation that altered Chugach National Forest boundaries. Several administrative and legislative actions occurred in the following 68 years that modified the Russian River boundary description. The 1941 EO8979 establishing the Kenai National Moose Range, the 1964 PLO 3400 boundary adjustment, and the 1983 post-ANILCA Federal Register Notice contain slightly different metes and bounds descriptive language but they did not substantially alter the Russian River boundary. The metes and bounds descriptions, including the current description, contain problematic word use that may be interpreted differently, especially the terms "junction" and "thread of the stream", and the wording "the thread of the Russian River at its junction with the Kenai River". Also, a vague footnote in the 1983 post-ANILCA metes and bounds description addressing the Russian River references a DOI map erroneously depicting the legal boundary description. The exact nature of the discrepancy between the map and the metes and bounds description is unclear, but may have significance.

Many factors and variables affect the location of the existing Russian River boundary and the ultimate land status of stream bed and adjacent uplands. The boundary between Kenai NWR and Chugach National Forest is unsurveyed, though a 1951 BLM survey established a monument on the north bank of the Kenai River that references the "confluence" of the Russian and Kenai rivers. Conflicting definitions of Russian River boundary descriptors exist, e.g., the term "the thread of the stream" has varying definitions by authoritative authors. The stream boundary shifts as the thread of the stream shifts. The question of navigability must be determined before surveying water bodies. State of Alaska statutes may play a role in locating water body boundaries and in resolving disputes between riparian and streambed title holders. Hydrologic and geomorphic dynamics of the Kenai River, as documented by historic aerial photographs and USGS discharge data, shifts the confluence of the Russian and Kenai rivers seasonally. Numerous inconsistencies exist in the mapping and platting of islands at the confluence of the Russian and Kenai rivers. A recent precedent setting court decision in Colorado found adjacent upland owners held title to unsurveyed, public domain, river islands. If conveyed, CIRC's 14(h)(1) selections along the Russian River could affect boundary location along the stream. The State of Alaska holds that the Tustumena Lake decision involves only the lake and does not apply to other submerged lands within the former Kenai National Moose Range. The Russian River is a shifting and imprecise boundary that could invite dispute. The extent to which boundary issues may impact Kenai NWR lands is difficult to gauge.

Three concluding comments are offered below.

1. It may be desirable to obtain two authoritative opinions on the Russian River boundary regarding the legal descriptions, the location of the boundary (especially near the mouth of the Russian River), the implications of their findings on future Refuge land status on the lower Russian River, and the implications, if any, of their findings regarding the Refuge/Forest boundary

north of the Kenai River. The legal opinion could come from a land or water law attorney with the DOI Solicitor's Office in Anchorage. The other opinion should come from a BLM cadastral land surveyor with water boundary expertise.

2. It may be useful to conduct a simple hydrologic field investigation at the confluence of the Kenai and Russian rivers during the 1997 field season. Three one-day site visits, coinciding with high, middle, and low water stages, to measure streamflows, to determine channel dimensions, and to survey water edge elevations might help locate the indistinct "thread of the Russian River at its junction with the Kenai River" in contrasting hydrologic situations. The results would help to more accurately identify a periodic or seasonal shift in the boundary of the Kenai NWR and Chugach National Forest that occurs presently, or may have occurred historically.

3. It may be beneficial to request that BLM survey the unsurveyed townships in the vicinity of the Russian River, to include the Kenai NWR - Chugach National Forest boundary, as a means to help simplify the potential land status changes and limit attendant boundary disputes. A survey also might prevent the possible loss of unsurveyed public domain islands to any future owner of adjacent uplands.

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Appendices

- A. Presidential Proclamation. July 23, 1907.
- B. Presidential Proclamation No. 852. February 23, 1909.
- C. Presidential Proclamation No. 1307. August 2, 1915.
- D. Presidential Proclamation No. 1741. May 29, 1925.
- E. Executive Order 8979. December 16, 1941.
- F. Public Land Order 3400. May 22, 1964.
- G. Federal Register Notice, Volume 48, Number 38. February 24, 1983.
- H. Federal Master Title Plats:
 - T. 5 N., R. 4 W., S.M.
 - T. 5 N., R. 4 W., S.M. (Supplements 1 & 2, Sections 33-36)
 - T. 4 N., R. 4 W., S.M.
 - T. 3 N., R. 4 W., S.M.
 - T. 3 N., R. 3 W., S.M.
- I. Historical Index Reports:
 - T. 5 N., R. 4 W., S.M.
 - T. 4 N., R. 4 W., S.M.
 - T. 3 N., R. 4 W., S.M.
 - T. 3 N., R. 3 W., S.M.
- J. U.S. Survey No. 3037, Alaska. Field Notes (1951) and Plat (1952).
- K. Alaska Statutes, Title 9. Code of Civil Procedure.
 - Sec. 09.25.040 Rules for construing real estate descriptions.
 - Sec. 09.45.020 Action to establish boundaries.
 - Sec. 09.45.030 Marking of boundaries.
- L. Photographs, ordered chronologically:
 - Black & white aerial photograph; vicinity Russian and Kenai rivers, June 25, 1951.
 - Section of black & white aerial photograph (enlarged), July 1, 1962.
 - Ferry crossing Kenai River (enlarged), June 1963.
 - Aerial photo of Kenai River at ferry crossing, looking north, July 1969.
 - Aerial photo of Kenai River at ferry crossing, looking southeast, (n.d.; 1969?) .

Section of color aerial photo, Aeromap #I-7, August 3, 1983.
Color infra-red aerial photograph, mouth of Russian River, CFL208.26, June 2, 1988.
Color aerial photograph vicinity mouth of Russian River; Aeromap #176, May 13, 1991.
Color aerial photograph vicinity mouth of Russian River, Aeromap #177, May 13, 1991.
Color aerial photograph vicinity mouth of Russian River, Aeromap #154, May 13, 1991.

[Note: Original photographs obtained from office files of Kenai NWR, Soldotna; USFWS Region 7 Engineering Office, Anchorage; and Chugach National Forest Office, Anchorage. Photographs included in this appendix may not be to scale due to enlargement or reduction of photocopies or reprints.]

M. USGS Stream Gage Data

Russian River near Cooper Landing; 1951-1954.
Kenai River at Cooper Landing; 1951-1960, 1962, 1963, 1969, 1983, 1988, 1991, 1996.

N. Alaska Status Plats:

T. 5 N., R. 4 W., S.M.
Section 33, T. 5 N., R. 4 W., S.M.
Section 32, T. 5 N., R. 4 W., S.M.
Section 28, T. 5 N., R. 4 W., S.M.

O. Historic hand drawn maps:

USFS - Section of "Russian River Recreation Area" topographic map, (1929?).
BIA - Site Map, Russian River / Kenai River Site AA 11100, April 1980, revised.

P. BLM Case Abstracts:

AKAA 011096 Regional selection, 14(h)(1) application.
AKAA 011097 Regional selection, 14(h)(1) application.

Q. BLM Case Abstract and Hydro-power documents:

AKAA 011716, Withdrawal, power site classification.
Power Project No. 119, Reservation by Federal Power Commission (1921).
Partial vacation of Power Project No. 119 (1934).
Geological Survey Order affecting Power Site Classification No. 409 (1950).
PLO No. 2203 opening lands under Sec 24 FPA; PP 119; PSC 409 (1960).
PLO No. 2311 amending PLO 2203 (1961).
BLM Land Report recommending revocation of PP 119 and PSC 409 withdrawals (1983).
BLM request for revocation for Power Project 119 and others (1985).
FERC vacation of PP 119 and other power project withdrawals (1985).

R. State of Alaska correspondence to BLM:

Ron Swanson to Robert Arndorfer, January 5, 1988.
Carol Shobe to Wayne Bowden, January 15, 1991.

S. Kenai NWR correspondence to author, with attachments:

Memorandum from Rick Johnston, Kenai NWR Ranger, November 6, 1996.

MOU between Chugach National Forest and Kenai National Moose Range,
February 19, 1971.

Sportsman's Lodge site land lease and miscellaneous related items.

Alaska Fish and Game regulation 5 AAC 56.050.

Russian River sport fishing pamphlets published by the State of Alaska.

Appendix A

Presidential Proclamation. July 23, 1907.

Warning is hereby given to all persons not to make settlement upon any of the lands reserved by this proclamation, unless and until they are listed by the Secretary of Agriculture and opened to homestead settlement or entry by the Secretary of the Interior under the Act of Congress, approved June eleventh, nineteen hundred and six, entitled, "An Act To provide for the entry of Agricultural lands within forest reserves." Provided. That lands heretofore restored to settlement or entry under the provisions of the foregoing act shall be excepted from the force and effect of this proclamation.

Reserved from settlement.

Vol. 34, p. 233.

Lands excepted.

IN WITNESS WHEREOF, I have hereunto set my hand and caused the seal of the United States to be affixed.

Done at the City of Washington this 20th day of July, in the year of our Lord one thousand nine hundred and seven, and [SEAL.] of the Independence of the United States the one hundred and thirty-second.

THEODORE ROOSEVELT

By the President:
ALVEY A. ADEE
Acting Secretary of State.

BY THE PRESIDENT OF THE UNITED STATES OF AMERICA

July 23, 1907.

A PROCLAMATION

WHEREAS, the public lands in the Territory of Alaska, which are hereinafter indicated, are in part covered with timber, and it appears that the public good would be promoted by utilizing said lands as a National Forest;

Chugach National Forest, Alaska. Preamble. Post, pp. 2153, 2231.

Now, therefore, I, Theodore Roosevelt, President of the United States of America, by virtue of the power in me vested by section twenty-four of the Act of Congress, approved March third, eighteen hundred and ninety-one, entitled, "An act to repeal timber-culture laws, and for other purposes." do proclaim that there are hereby reserved from settlement, entry, or sale, and set apart as a public reservation, for the use and benefit of the people, all the tracts of land, in the Territory of Alaska, shown as the Chugach National Forest on the diagram forming a part hereof, and further described as follows: All of the public land lying within a line beginning at the southern extremity of Cape Puget, Alaska, on the east coast of Kenai Peninsular; thence in a general northerly direction, following the coast line, to the western extremity of Portage Bay; thence northwesterly to the divide between Turnagain Arm and Portage Bay; thence in a general northerly direction along the divide between Knik Arm and Port Welles and in a general easterly direction along the main divide of the Chugach Mountains, continuing thence to a point on left bank of Copper River opposite the northern extremity of Cottonwood Island; thence southerly, down left bank of said Copper River, to its southern extremity; thence in a southwesterly direction to the southern extremity of Cape Cleare; thence in a northwesterly direction to the southern extremity of Cape Puget, the place of beginning, and embracing all islands within said described line;

National forest, Alaska. Vol. 28, p. 1103.

Description.

Excepting from the force and effect of this proclamation the several areas contained within boundaries formed by circles described with a radius of a mile, each, from the centers of the following named towns and settlements, to wit: Eyak, Orca, Tahtetlahk, Ellamar, Valdez, Fort Liscum, Einiklik, Chenaga, Nutchek and Latouche:

Lands excepted.

Proviso.
Valid rights not
affected.
Vol. 15, p. 539.

Provided, that this proclamation shall not be so construed as to deprive any person of any valid right possessed under the Treaty for the cession of the Russian possessions in North America to the United States, concluded at Washington on the thirtieth day of March, eighteen hundred and sixty-seven, or acquired under any act of Congress relating to the Territory of Alaska;

Lands excepted.

And further excepting from the force and effect of this proclamation all lands which are at this date embraced in any legal entry or covered by any lawful filing or selection duly of record in the proper United States Land Office, or upon which any valid settlement has been made pursuant to law, if the statutory period within which to make entry or filing of record has not expired; and also excepting all lands which at this date are embraced within any withdrawal or reservation for any use or purpose with which this reservation for forest uses is inconsistent: *Provided*, that these exceptions shall not continue to apply to any particular tract of land unless the entryman, settler, or claimant continues to comply with the law under which the entry, filing, or settlement was made, or unless the reservation or withdrawal with which this reservation is inconsistent continues in force; not excepting from the force and effect of this proclamation, however, any part of the National Forest hereby established which may have been withdrawn to protect the coal therein, but this proclamation does not vacate any such coal land withdrawal; and provided that these exceptions shall not apply to any land embraced in any selection, entry, or filing, which may have been permitted to remain of record subject to the creation of a permanent reservation.

Coal lands.

Reserved from
settlement.

Warning is hereby given to all persons not to make settlement upon any of the lands reserved by this proclamation, unless and until they are listed by the Secretary of Agriculture and opened to homestead settlement or entry by the Secretary of the Interior under the Act of Congress, approved June eleventh, nineteen hundred and six, entitled, "An Act To provide for the entry of Agricultural lands within forest reserves."

Vol. 34, p. 233.

IN WITNESS WHEREOF, I have hereunto set my hand and caused the seal of the United States to be affixed.

Done at the City of Washington this 23d day of July, in the year of our Lord one thousand nine hundred and seven, and of [SEAL.] the Independence of the United States the one hundred and thirty-second.

THEODORE ROOSEVELT

By the President:
ROBERT BACON
Acting Secretary of State.

August 12, 1907.

BY THE PRESIDENT OF THE UNITED STATES.

A PROCLAMATION.

Lower Brule Indian Reservation,
S. Dak.
Preamble.
Vol. 34, p. 124.

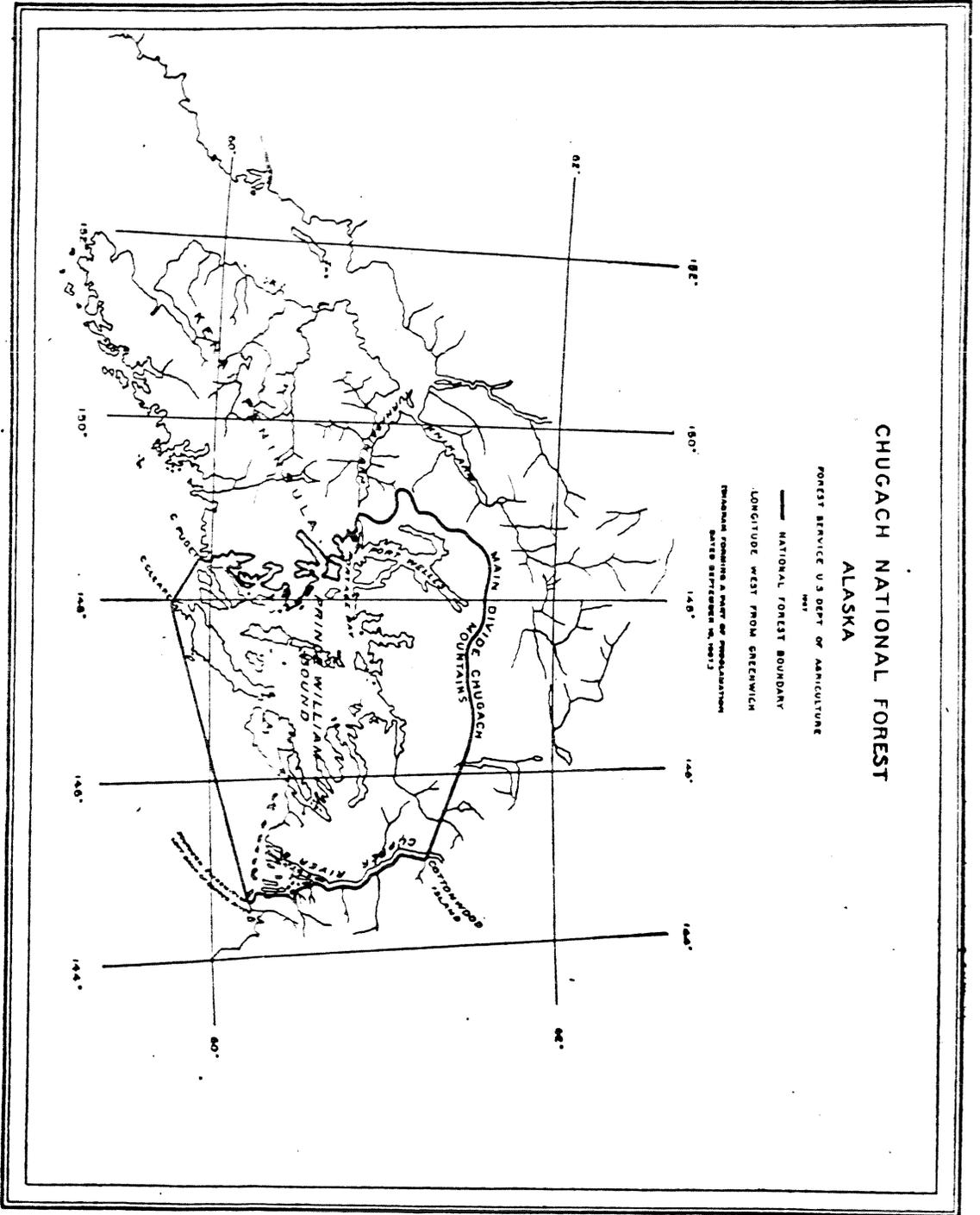
Whereas the Act of Congress, approved April 21, 1906 (34 Stat., 124), provided that all of the west half of Townships one hundred and six, one hundred and seven, one hundred and eight, one hundred and nine and one hundred and ten north, Range seventy-seven west of the fifth principal meridian, and Fractional Townships one hundred and six, one hundred and seven, one hundred and eight, one hundred and nine and one hundred and ten north, Range seventy-eight West of the fifth principal meridian, and Fractional Township one hundred and ten north, Range seventy-nine west

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CHUGACH NATIONAL FOREST ALASKA

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Appendix B

Presidential Proclamation No. 852. February 23, 1909.

BY THE PRESIDENT OF THE UNITED STATES OF AMERICA

February 23, 1909.

A PROCLAMATION

WHEREAS, an Executive Order dated July second, nineteen hundred and eight, consolidated the Chugach National Forest and the Afognak Forest and Fish Culture Reserve under the name of the Chugach National Forest;

Chugach National Forest, Alaska. Preamble. *Ande.* pp. 2149, 2153. Vol. 27, p. 1062.

And whereas, it appears that the public good would be promoted by adding to the Chugach National Forest certain lands within the Territory of Alaska, which are in part covered with timber;

Now, therefore, I, Theodore Roosevelt, President of the United States of America, by virtue of the power in me vested by the Act of Congress, approved June fourth, eighteen hundred and ninety-seven, entitled, "An Act Making appropriations for sundry civil expenses of the Government for the fiscal year ending June thirtieth, eighteen hundred and ninety-eight, and for other purposes," do proclaim that the Chugach National Forest is hereby enlarged and that its boundaries are as shown on the diagram forming a part hereof, and further described as follows: The island of Afognak and the adjacent islands which were set apart by proclamation dated December twenty-fourth, eighteen hundred and ninety-two, as the "Afognak Forest and Fish Culture Reserve," and also all of the public land lying within a line beginning at a point on the left bank of Copper River, due east of the northern extremity of Cottonwood Island; thence easterly along the divide between the watershed of Bremner River and Chitina River to a point due north of the southern extremity of Cape Suckling; thence due south to the southern extremity of Cape Suckling; thence in a northwesterly direction to the southern extremity of the left bank of Copper River; thence in a southwesterly direction to the southern extremity of Cape Cleare; thence in a northwesterly direction to the southern extremity of Cape Puget; thence in a general northwesterly direction along the divide of the foothills to its intersection with the main divide of the Kenai Mountains; thence in a general westerly direction along said main divide, between the waters of Resurrection Bay and Kenai Lake, and continuing southwesterly along said main divide to the head of Sheep Creek; thence southerly down the left bank of said creek to Kachemak Bay; thence in a general southerly, westerly and northerly direction along the shores of said bay, Cook Inlet and Knik Arm, at the mean low tide line, to the right bank of Knik River; thence easterly up the right bank of Knik River to the main divide of the Chugach Mountains; thence in a general easterly direction along the main divide of the Chugach Mountains to a point on the left bank of Copper River, due east of the northern extremity of Cottonwood Island, the place of beginning, and embracing all islands within said described line;

Boundaries enlarged.

Vol. 30, p. 36.

Description.

Excepting from the force and effect of this proclamation the several areas contained within boundaries formed by circles described with a radius of a mile, each, from the centers of the following named towns and settlements, to wit: Eyak, Orca, Tahtetlahk, Ellamar, Valdez, Fort Lisicum, Einiklik, Chenaga, Nutchek, and Latouche; excepting also a tract of land extending one mile back from the tide line, on both sides of the bay known as Valdez Arm; following the tide line from its intersection with the line of 146° 30' longitude west from Greenwich, easterly around the head of Valdez Arm:

Lands excepted.

Provided, that this proclamation shall not be so construed as to deprive any person of any valid right possessed under the Treaty for the cession of the Russian possessions in North America to the United States, concluded at Washington on the thirtieth day of March, eighteen hundred and sixty-seven, or acquired under any act of Congress relating to the Territory of Alaska.

Proviso. Valid rights not affected. Vol. 15, p. 539.

Prior rights not affected.

The withdrawal made by this proclamation shall, as to all lands which are at this date legally appropriated under the public land laws or reserved for any public purpose, be subject to, and shall not interfere with or defeat legal rights under such appropriation, nor prevent the use for such public purpose of lands so reserved, so long as such appropriation is legally maintained, or such reservation remains in force.

Fish culture stations.
Vol. 27, p. 1052.

Since the withdrawal made by this proclamation for Forest purposes and the withdrawal made by proclamation dated December twenty-four, eighteen hundred and ninety-two, for the purpose of establishing fish culture stations and for the use of the United States Commissioner of Fish and Fisheries are consistent, both shall be effective upon the land withdrawn, but the withdrawal for fish culture stations and for the use of the United States Commissioner of Fish and Fisheries shall be the dominant one.

Agricultural lands.
Vol. 34, p. 233.

This proclamation shall not prevent the settlement and entry of any lands heretofore opened to settlement and entry under the Act of Congress approved June eleventh, nineteen hundred and six, entitled, "An Act to provide for the entry of Agricultural lands within forest reserves."

IN WITNESS WHEREOF, I have hereunto set my hand and caused the seal of the United States to be affixed.

Done at the City of Washington, this 23rd day of February, in the year of our Lord one thousand nine hundred and nine,
[SEAL.] and of the Independence of the United States the one hundred and thirty-third.

THEODORE ROOSEVELT

By the President:

ROBERT BACON
Secretary of State.

February 25, 1909.

BY THE PRESIDENT OF THE UNITED STATES OF AMERICA

A PROCLAMATION

Modoc National Forest, Cal.
Preamble.
Ante, p. 2180.
Vol. 33, p. 2375.

WHEREAS, an Executive Order dated July second, nineteen hundred and eight, consolidated the Modoc and Warner Mountains National Forests under the name of the Modoc National Forest;

And whereas, it appears that the public good would be promoted by adding to the Modoc National Forest certain lands within the State of California, which are in part covered with timber;

Boundaries enlarged.
Vol. 30, p. 36.

Now, therefore, I, Theodore Roosevelt, President of the United States of America, by virtue of the power in me vested by the Act of Congress, approved June fourth, eighteen hundred and ninety-seven, entitled, "An Act Making appropriations for sundry civil expenses of the Government for the fiscal year ending June thirtieth, eighteen hundred and ninety-eight, and for other purposes," do proclaim that the Modoc National Forest is hereby enlarged and that its boundaries are as shown on the diagram forming a part hereof.

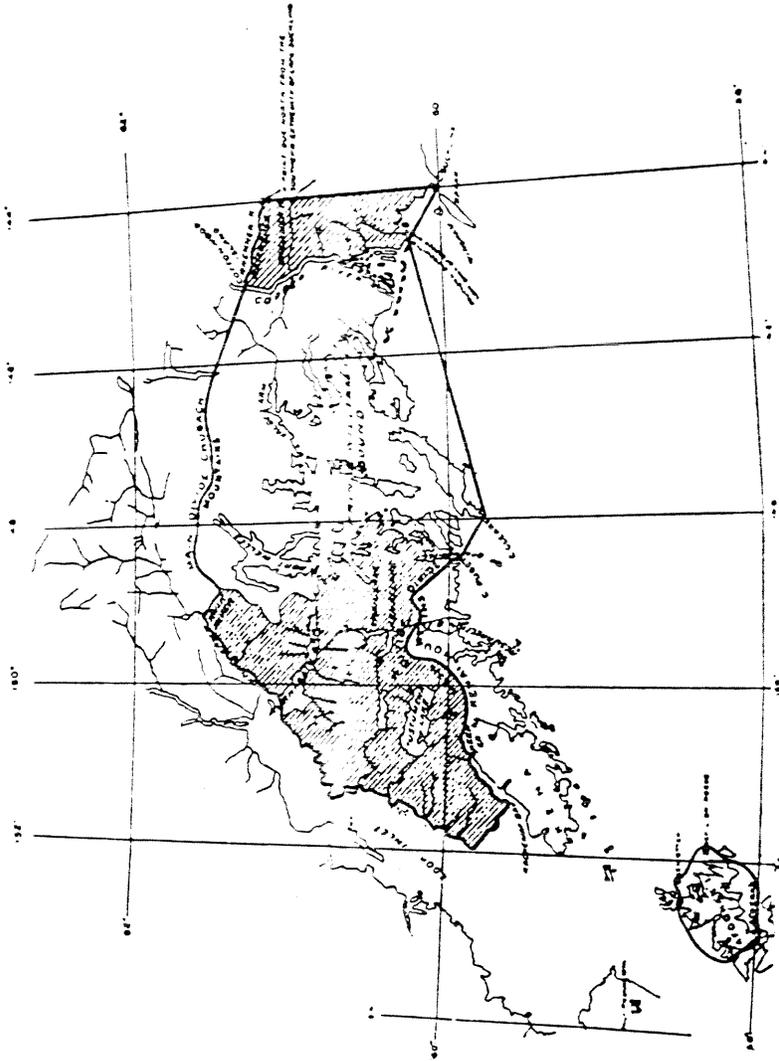
Prior rights not affected.

The withdrawal made by this proclamation shall, as to all lands which are at this date legally appropriated under the public land laws or reserved for any public purpose, be subject to, and shall not interfere with or defeat legal rights under such appropriation, nor prevent the use for such public purpose of lands so reserved, so long as such appropriation is legally maintained, or such reservation remains in force.

CHUGACH NATIONAL FOREST
ALASKA

FOREST SERVICE U.S. DEPT. OF AGRICULTURE

NATIONAL FOREST BOUNDARY
ADDITIONS
1908-1931 WITH 1934 CORRECTIONS



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Appendix C

Presidential Proclamation No. 1307. August 2, 1915.

8/2/15

By the President of the United States of America

PROC 4
(1307)
8-2-1915

A Proclamation

WHEREAS Executive Orders signed October twenty-eighth, nineteen hundred and ten, and June twenty-second, nineteen hundred and fifteen, eliminated certain lands from the Chugach National Forest; and

WHEREAS it appears that the public good will be promoted by adding to the Chugach National Forest within the Territory of Alaska certain lands, and by excluding certain areas therefrom and restoring the public lands therein in a manner authorized by the Act of Congress approved September thirtieth, nineteen hundred and thirteen, entitled "An Act To authorize the President to provide a method for opening lands restored from reservation or withdrawal, and for other purposes";

Now, therefore, I, Woodrow Wilson, President of the United States of America, by virtue of the power in me vested by the Act of Congress approved March third, eighteen hundred and ninety-one (26 Stat., 1095), entitled "An act to repeal timber-culture laws, and for other purposes", and also by the Act of Congress approved June fourth eighteen hundred and ninety-seven (30 Stat., 11 at 31 and 36), entitled "An Act Making appropriations for sundry civil expenses of the Government for the fiscal year ending June thirtieth, eighteen hundred and ninety-eight, and for other purposes", do proclaim that the Chugach National Forest is hereby changed and that its boundaries are now as shown upon the diagram hereto annexed and forming a part hereof, and further described as follows: The island of Afognak and the adjacent islands which were set apart by proclamation dated December twenty-fourth, eighteen hundred and ninety-two, as the "Afognak Forest and Fish Culture Reserve", and also all of the public land lying within a line beginning at the southern extremity of Cape Suckling (1); thence due north, along the former boundary of the Chugach National Forest, to a point (2) situated due east of the 39th mile post (3) of the Copper River and Northwestern Railway; thence due west to the said 39th mile post (3); thence in a northwesterly direction to a point (4) one statute mile inland, and due south from the point at which the meridian of longitude 146° 30' West from Greenwich intersects high tide line on the south shore of Valdez Arm; thence due west to a point (5) in longitude 147° 30' West; thence due north to a point (6) in longitude 147° 30' West, and in latitude 61° 10' North; thence due west to a point (7) due north of Point Doran;

and

original

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latitude 61° 57' West, thence due north to point (11) in longitude 141° 30' West, and in latitude 61° 20' North; thence due east to point (11) in latitude 61° 20' North, and in longitude 141° West; thence in a northeasterly direction to the head of Knik River at the foot of Knik Glacier (12); thence down the south bank of Knik River and southwesterly along the eastern shore of Knik Arm, at high tide line, to Point Campbell (13); thence in a southwesterly direction directly to Point Possession (14); thence following the eastern shore of Cook Inlet and the northern shore of Kachemak Bay, at high tide line, to the head of said Kachemak Bay and the thread of the

most northerly mouth of FOX RIVER to the head of FOX RIVER following the thread of the stream, to a point which is three statute miles inland in a direct line from high tide line at the said most northerly mouth of FOX RIVER (16); thence successively in a general southwesterly, northwesterly, northeasterly, and northwesterly direction parallel with high tide line along the north shore of Kachemak Bay and the eastern shore of Cook Inlet at a distance of three statute miles, inland, to a point (17) in latitude $60^{\circ} 43'$ North due east from the triangulation point established on East Foreland by the U. S. Coast and Geodetic Survey; thence due east to a point (18) due north of the junction of Russian River with the Kenai River; thence due south to the junction (19) of Russian River with the Kenai River; thence up Russian River following the thread of the stream to the head of Upper Russian Lake (20); thence across the divide directly to the junction of Moose Creek with Resurrection River (21); thence down Resurrection River, following the thread of the stream, to a point (22) due west of the 6th mile post (23) of the Alaska Central Railway; thence due east to the said 6th mile post (23); thence due east to a point (24) five miles distant from the said 6th mile post of the Alaska Central Railway; thence in a general northerly and northeasterly direction, parallel to the said Alaska Central Railway at a distance of five miles therefrom, to a point (25) in latitude $60^{\circ} 42'$ North; thence due east to a point (26) in longitude $148^{\circ} 47'$ West; thence due south to a point (27) in latitude $60^{\circ} 25'$ North; thence due east to a point (28) due north of the head of Puget Bay (29); thence due south to the head of Puget Bay (29); thence in a general southeasterly direction following the eastern shore of Puget Bay at high tide line to Cape Puget (30); thence in an easterly direction directly to Point Elrington (31); thence in a southeasterly direction directly to Cape Cleare (32); thence in a northeasterly direction along the eastern shore of Montague Island at high tide line to Zaikof Point (33); thence in a southeasterly direction directly to Cape Hinchinbrook (34); thence in a general northeasterly direction along the south shore of Hinchinbrook Island at high tide line to Hook Point (35); thence in a southeasterly direction directly to the north end of Wingham Island (36); thence in a southeasterly direction directly to the western extremity of Okalee Spit (37); thence in a southeasterly direction directly to the southern extremity of Cape Suckling (1), the place of beginning, and embracing all islands within said description. All latitudes and longitudes employed in defining these boundaries are referred to the Valdez Datum established by the U. S. Coast and Geodetic Survey.

Excepting from the force and effect of this proclamation the several areas contained within boundaries formed by circles described with a radius of a mile, each, from the centers of the following named towns and settlements, to wit: Cordova (formerly Eyak), Orca, Tatitlek, Ellamar, Kiniklik, Chenaga, Nuchek, and Latouche; and also the areas heretofore excluded by Executive Orders dated October twenty-eighth, nineteen hundred and ten.

...this date legally appropriated under the public land laws or reserved for any public purpose, be subject to, and shall not interfere with or defeat legal rights under such appropriation, nor prevent the use for such public purpose of lands so reserved, so long as such appropriation is legally maintained, or such reservation remains in force.

And I do further proclaim and make known that in my judgment it is proper and necessary in the interest of equal opportunity and good administration that all of the lands hereby excluded from the Chugach National Forest subject to disposition should be restored to settlement in advance of entry, and pursuant to the authority reposed in me by the aforesaid Act of September thirtieth, nineteen hundred and thirteen (38 Stat., 113), I do hereby direct and provide that such lands, subject to valid rights and the provisions of then existing withdrawals or reservations, shall be open to actual settlers only under the provisions of the homestead laws for a period of twenty-eight days from and including nine o'clock a. m., standard time, on the thirty-fifth day from and after the date hereof, and thereafter to entry and disposition under any and all of the public land laws applicable thereto.

Persons who go upon any of the lands to be restored as herein provided and perform any act of settlement thereon from and including the date of this proclamation until nine o'clock a. m., standard time, on the thirty-fifth day from and after the date hereof, or who are on or are occupying any part of such lands at said hour, except those having valid subsisting settlement rights initiated prior to reservation and since maintained, and those having preferences to make entry under the provisions of the Act of Congress approved June eleventh, nineteen hundred and six (34 Stat., 233), entitled "An Act To provide for the entry of Agricultural lands within forest reserves", and Acts amendatory, will be considered and dealt with as trespassers and preference will be given the prior legal applicant, notwithstanding such unlawful settlement or occupancy: Provided, however, that nothing herein shall prevent persons from going upon and over the lands to examine them with a view to thereafter going upon and making settlement thereon when the lands shall become subject thereto in accordance with this proclamation. Persons having prior settlement rights or preferences, as above defined, will be allowed to make entry in conformity with existing law and regulations.

In Witness Whereof, I have hereunto set my hand and caused the seal of the United States to be affixed.

DONE at the City of Washington this second day of August, in the year of our Lord one thousand nine hundred and fifteen, and of the Independence of the United States the one hundred and fortieth.

[SEAL]

WOODROW WILSON

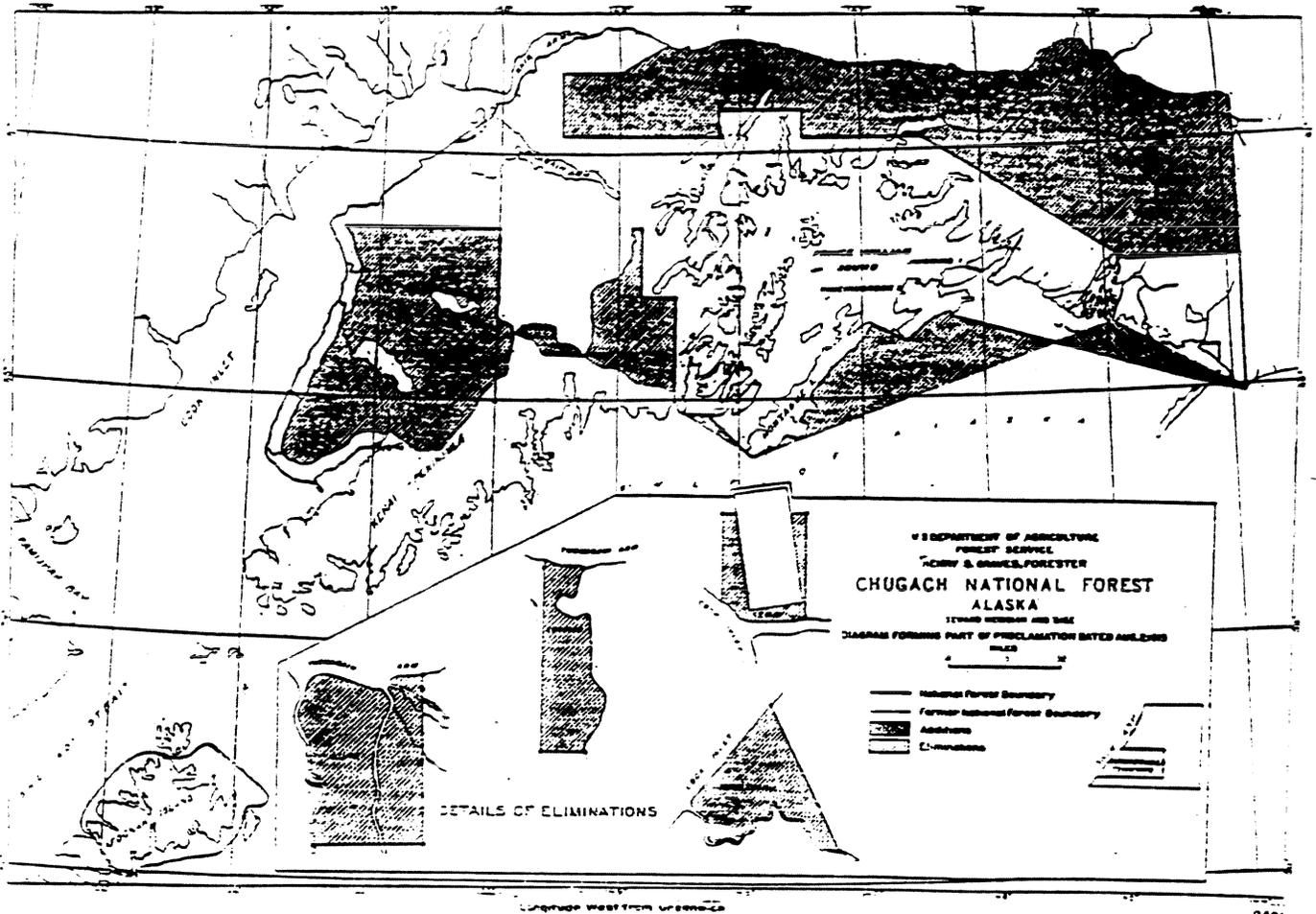
By the President:

ROBERT LANSING.

Secretary of State.

[No. 1307.]

PROCLAMATION No. 1307
Date Signed: 8/02/15



Appendix D

Presidential Proclamation No. 1741. May 29, 1925.

CHUGACH NATIONAL FOREST

ALASKA

(Sixth Proclamation)

SIXTH PROCLAMATION
PROCLAMATION No. 1741
Date Signed: 5/29/25

By the President of the United States of America

A Proclamation

WHEREAS, it appears that the public good would be promoted by adding to the Chugach National Forest within the Territory of Alaska certain lands, and by excluding certain areas therefrom and restoring the public lands subject to disposition therein to entry by ex-service men in advance of the general public in accordance with existing law;

Now, therefore, I, CALVIN COOLIDGE, President of the United States of America, by virtue of the power in me vested by the act of Congress approved March 3, 1891 (26 Stat., 1095), entitled, "An Act To repeal timber-culture laws, and for other purposes", and also by the act of Congress approved June 4, 1897 (30 Stat., 11 at 34 and 36), entitled, "An Act Making appropriations for sundry civil expenses of the Government for the fiscal year ending June thirtieth, eighteen hundred and ninety-eight, and for other purposes", do proclaim that the boundaries of the Chugach National Forest are hereby changed to include the areas indicated as additions upon the diagram hereto annexed and forming a part hereof and to exclude the areas indicated thereon as eliminations:

Provided, That this proclamation shall not be so construed as to deprive any person of any valid right possessed under the Treaty for the cession of the Russian possessions in North America to the United States, concluded at Washington on March 30, 1867, or acquired under any act of Congress relating to the Territory of Alaska.

The withdrawal made by this proclamation shall, as to all lands which are at this date legally appropriated under the public land laws or reserved for any public purpose, be subject to and shall not interfere with or defeat legal rights under such appropriation, nor prevent the use for such public purpose of lands so reserved, so long as such appropriation is legally maintained, or such reservation remains in force.

And I do further proclaim and make known that pursuant to Public Resolution No. 29 of February 14, 1920 (41 Stat., 434), as amended by Resolutions Nos. 36 and 79, approved January 21 and December 28, 1922, respectively (42 Stat., 358, 1067), it is hereby ordered that the public lands in the excluded areas, subject to valid rights and the provisions of existing withdrawals, shall be opened only to entry under the applicable homestead laws requiring residence by qualified ex-service men of the war with Germany, under the terms and conditions of said resolutions and the regulations issued thereunder, for a period of ninety-one days beginning with the sixty-third day from and after the date hereof, and thereafter to appropriation under any public land law applicable thereto by the general public. Subsequent to the date hereof and prior to the date of restoration to general disposition as herein provided, no rights may be acquired to the excluded lands by settlement in advance of entry, or otherwise, except strictly in accordance herewith.

In Witness Whereof, I have hereunto set my hand and caused the seal of the United States to be affixed.

DONE at the City of Washington this 29th day of May in the year
(SEAL) of our Lord one thousand nine hundred and twenty-five, and of the Independence of the United States of America the one hundred and forty-ninth.

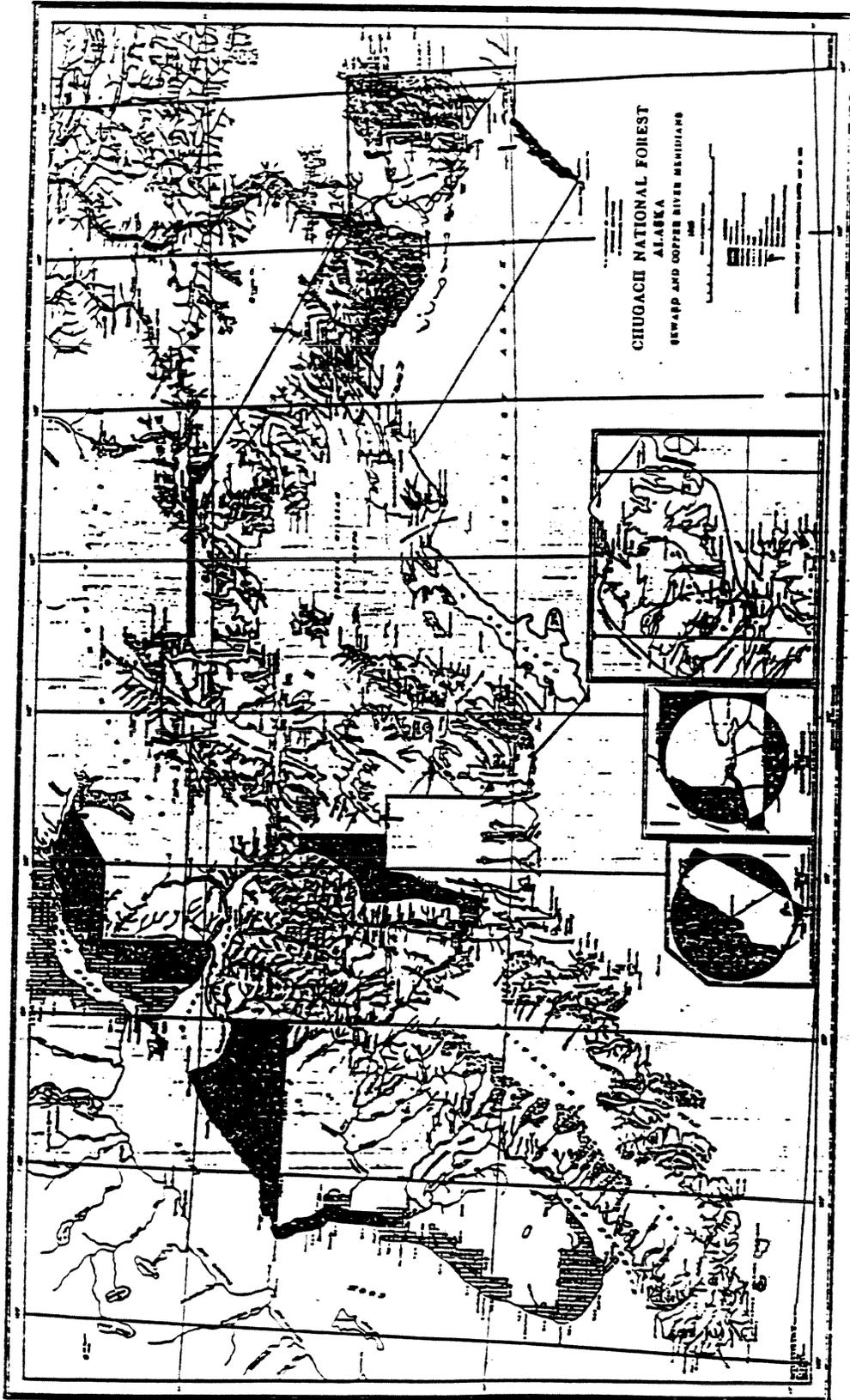
CALVIN COOLIDGE

By the President:

FRANK B. KELLOGG

Secretary of State

SIXTH PROCLAMATION
PROCLAMATION No. 1741
Date Signed: 5/29/25



Appendix E

Executive Order 8979. December 16, 1941.

IV. A vessel may expect supervision of its movements within a Defensive Sea Area, either through surface craft or aircraft. Such controlling surface craft and aircraft will be identified by a prominent display of the Union Jack. The loading or unloading by vessels of oil fuel or other inflammable or explosive materials shall be under the control of the local Naval authority, who shall require such loading or unloading to be accomplished in such manner and at such times as will safeguard the other activities within a Defensive Sea Area essential to the national defense.

V. These regulations are subject to amplification by the local U. S. Naval authority as necessary to meet local circumstances and conditions.

VI. When a U. S. Maritime Control Area is established adjacent to or abutting upon any of the above established Defensive Sea Areas, it shall be assumed that permission to enter, and other instructions issued by proper authority, shall apply to any one continuous passage through or within both areas. Permission to enter or transit the Panama Canal shall, however, continue to be a separate procedure.

VII. Any master of a vessel or other person within a Defensive Sea Area who shall disregard these regulations, or shall fail to obey an order of U. S. Naval authority to stop or heave to, or shall perform any act threatening the efficiency of mine or other defenses or the safety of navigation, or shall take any action inimical to the interests of the United States in its prosecution of the war, may be detained therein by force of arms and renders himself liable to attack by United States armed forces, and liable to prosecution as provided for in Section 44, of the Criminal Code as amended (U.S.C., title 18, Section 96).

VIII. All U. S. Government authorities shall place at the disposal of the Naval authorities their facilities for aiding in the enforcement of these regulations. The Governors of the States concerned, the local municipal officials, and the local Civil Defense agencies are called upon to render the local Naval authorities all possible assistance in the enforcement of these regulations.

IX. The Secretary of the Navy will be charged with the publication and enforcement of these regulations.

FRANKLIN D ROOSEVELT

THE WHITE HOUSE,

December 16, 1941.

EXECUTIVE ORDER 8979

ESTABLISHING THE KENAI NATIONAL MOOSE RANGE

ALASKA

By virtue of the authority vested in me as President of the United States, it is ordered that, for the purpose of protecting the natural breeding and feeding range of the giant Kenai moose on the Kenai Peninsula, Alaska, which in this area presents a unique wildlife feature and an unusual opportunity for the study in its natural environment of the practical management of a big game species that has considerable local economic value, all of the hereinafter-described areas of land and water of the United States lying on the northwest portion of the said Kenai Peninsula, be, and they are hereby, subject to valid existing rights, withdrawn and reserved for the use of the Department of the Interior and the Alaska Game Commission as a refuge and breeding ground for moose for carrying out the purposes of the Alaska Game Law of January 13, 1925, 43 Stat. 739, U.S.C., title 48, secs. 192-211, as amended:

SEWARD MERIDIAN

Beginning at the point of intersection of the west boundary of the Chugach National Forest with the line of mean high tide on the south shore of Chickaloon Bay, in Turnagain Arm of Cook Inlet, in latitude 60°53' N., and longitude 150° W.;

Thence from said initial point,

Northwesterly with the meanders of the line of mean high tide, on the south shore of Chickaloon Bay to Point Possession;

Thence southwesterly with the meanders of the line of mean high tide on the east shore of Cook Inlet to the Kaslof River;

Thence southeasterly, upstream along the right bank of the Kaslof River to the meander corner on the south boundary of sec. 33, T. 3 N., R. 11 W., Seward meridian;

Thence west, 4.09 chains, to meander corner on south boundary of sec. 32, T. 3 N., R. 11 W.;

Thence southwesterly, along the crest of the watershed, to the divide between the waters flowing into Tustumena Lake and

the waters flowing into Cook Inlet and Kachemak Bay;

Thence southeasterly, along said divide to the confluence of the Fox River and the principal stream flowing from Dinglestadt Glacier;

Thence southeasterly, up said stream and across Dinglestadt Glacier to the crest of Kenai Mountains;

Thence northeasterly, along the crest of Kenai Mountains to the west boundary of Chugach National Forest at a point three miles southeasterly from the head of Upper Russian Lake;

Thence northerly, along the west boundary of Chugach National Forest to the place of beginning.

The area described, including both public and non-public lands, aggregates 2,000,000 acres.

None of the above-described lands excepting Tps. 5 N., Rs. 8, 9, 10, and 11 W., and also excepting a strip six miles in width along the shore of Cook Inlet, extending from a point six miles east of Boulder Point to the point on Kasilof River intersected by said six-mile strip, shall be subject to settlement, location, sale, or entry, or other disposition (except for fish trap sites) under any of the public-land laws applicable to Alaska, or to classification and lease under the provisions of the act of July 3, 1926, entitled "An Act to provide for the leasing of public lands in Alaska for fur farming, and for other purposes", 44 Stat. 821, U.S.C., title 48, secs. 360-361, or the act of March 4, 1927, entitled "An Act to provide for the protection, development, and utilization of the public lands in Alaska by establishing an adequate system for grazing livestock thereon", 44 Stat. 1452, U.S.C., title 48, secs. 471-471o: *Provided, however*, That as to the foregoing excepted lands, primary jurisdiction thereover shall remain in the General Land Office of the Department of the Interior and their reservation and use as a part of the national moose range shall be without interference with the use and disposition thereof pursuant to the public-land laws applicable to Alaska: *Provided further*, That the lands in the said excepted areas shall be classified by the General Land Office, Department of the Interior, and those lands classified as not suitable for settlement shall no longer be available for that purpose: *Provided further*, That the reservation for the national moose range shall not operate to prevent the construction and operation of a highway to connect

the area open to settlement with the Seward-Sunrise road by the most practicable route: *Provided further*, That any lands within the described area that are otherwise withdrawn or reserved shall be affected by this order only so far as may be consistent with the uses and purposes for which such prior withdrawal or reservation was made.

The provisions of this order shall not prohibit the hunting or taking of moose and other game animals and game birds or the trapping of fur animals in accordance with the provisions of the said Alaska Game Law, as amended, and as may be permitted by regulations of the Secretary of the Interior prescribed and issued pursuant thereto.

This reservation shall be known as the Kenai National Moose Range.

FRANKLIN D ROOSEVELT

THE WHITE HOUSE,

December 16, 1941.

EXECUTIVE ORDER 8980

AMENDMENT OF EXECUTIVE ORDER OF JANUARY 17, 1873, TO PERMIT PERSONS HOLDING STATE, TERRITORIAL, AND MUNICIPAL OFFICES TO BE APPOINTED AS MEMBERS OF ALIEN ENEMY HEARING BOARDS

By virtue of the authority vested in me by section 1753 of the Revised Statutes of the United States, and as President of the United States, the Executive Order of January 17, 1873, as amended, prohibiting, with certain exceptions, Federal officers and employees from holding State, Territorial, and municipal offices, is hereby further amended so as to permit any person holding a State, Territorial, or municipal office to accept appointment and serve as a member of an Alien Enemy Hearing Board.

FRANKLIN D ROOSEVELT

THE WHITE HOUSE,

December 16, 1941.

EXECUTIVE ORDER 8981

NAVY HOSPITAL AREA, COCO SOLO, CANAL ZONE

By virtue of the authority vested in me by section 5 of title 2 of the Canal Zone

Appendix F

Public Land Order 3400. May 22, 1964.

RULES AND REGULATIONS

appendix to § 500.204, is hereby corrected to read: "the respective effective date."

[SEAL] MARGARET W. SCHWARTZ,
Director,
Foreign Assets Control.

[P.R. Doc. 64-5443; Filed May 28, 1964;
3:51 a.m.]

**Title 43—PUBLIC LANDS:
INTERIOR**

**Chapter II—Bureau of Land Management,
Department of the Interior**

**APPENDIX—PUBLIC LAND ORDERS
[Public Land Order 3403]**

[Anchorage 056784]

ALASKA

**Adjusting Boundaries of Kenai
National Moose Range**

By virtue of the authority vested in the President and pursuant to Executive Order No. 10355 of May 26, 1952, it is ordered as follows:

1. The boundaries of the Kenai National Moose Range, established by Executive Order No. 8979 of December 16, 1941, are hereby adjusted to the extent necessary to encompass the areas of public land and water lying within the following-described perimeter:

SEWARD MERIDIAN

Beginning at the point of intersection of the boundary of the Chugach National Forest, with the line of mean high tide on the south shore of Chickaloon Bay, in Turnagain Arm of Cook Inlet in approximate latitude 60°53' N., and longitude 150° W.; thence

- Northwesterly and westerly with meanders of the line of mean high tide of Chickaloon Bay to the point for the meander corner on the line between sections 17 and 18, T. 11 N., R. 8 W., on Point Possession;
- Thence with the lines of the rectangular systems of surveys as they presently exist, or as they will be when later surveyed, by approximate courses and distances as follows:
- South 2.1 miles to SE corner sec. 30, T. 11 N., R. 8 W.;
- West 2.0 miles to NW corner sec. 26, T. 11 N., R. 7 W.;
- South 2.0 miles to SE corner sec. 2, T. 10 N., R. 7 W.;
- West 2.0 miles to SW corner sec. 3, T. 10 N., R. 7 W.;
- South 1.0 mile to SE corner sec. 9, T. 10 N., R. 7 W.;
- West 1.0 mile to SW corner sec. 9, T. 10 N., R. 7 W.;
- South 1.0 mile to SE corner sec. 17, T. 10 N., R. 7 W.;
- West 2.0 miles to SW corner sec. 18, T. 10 N., R. 7 W.;
- South 1.0 mile to SE corner sec. 24, T. 10 N., R. 8 W.;
- West 2.0 miles to SW corner sec. 23, T. 10 N., R. 8 W.;
- South 1.0 mile to SE corner sec. 27, T. 10 N., R. 8 W.;
- West 1.0 mile to SW corner sec. 27, T. 10 N., R. 8 W.;
- South 1.0 mile to SE corner sec. 33, T. 10 N., R. 8 W.;
- West 2.0 miles to SW corner sec. 32, T. 10 N., R. 8 W.;
- South 1.0 mile to SE corner sec. 6, T. 9 N., R. 8 W.;
- West 1.0 mile to SW corner sec. 6, T. 9 N., R. 8 W.;
- South 1.0 mile to SE corner sec. 12, T. 9 N., R. 9 W.;

- West 1.0 mile to SW corner sec. 12, T. 9 N., R. 9 W.;
- South 1.0 mile to SE corner sec. 14, T. 9 N., R. 9 W.;
- West 1.0 mile to SW corner sec. 14, T. 9 N., R. 9 W.;
- South 1.0 mile to SE corner sec. 22, T. 9 N., R. 9 W.;
- West 1.0 mile to SW corner sec. 22, T. 9 N., R. 9 W.;
- South 1.0 mile to SE corner sec. 28, T. 9 N., R. 9 W.;
- West 2.5 miles to north $\frac{1}{4}$ -corner sec. 31, T. 9 N., R. 9 W.;
- South 1.0 mile to south $\frac{1}{4}$ -corner sec. 31, T. 9 N., R. 9 W.; on the Standard Parallel;
- West 0.9 mile to NW corner sec. 1, T. 8 N., R. 10 W.;
- South 2.0 miles to SE corner sec. 11, T. 8 N., R. 10 W.;
- West 1.75 miles to point for west $\frac{1}{4}$ -corner on north line of sec. 15, T. 8 N., R. 10 W.;
- South 1.0 mile to point for west $\frac{1}{4}$ -corner on south line of sec. 15, T. 8 N., R. 10 W.;
- West 2.25 miles to SW corner sec. 17, T. 8 N., R. 10 W.;
- South 4.0 miles to SE corner sec. 0, T. 7 N., R. 10 W.;
- West 1.0 mile to SW corner sec. 6, T. 7 N., R. 10 W.;
- South 2.0 miles to SE corner sec. 18, T. 7 N., R. 11 W.;
- West 2.0 miles to SW corner sec. 14, T. 7 N., R. 11 W.;
- South 6.0 miles to SW corner sec. 14, T. 6 N., R. 11 W.;
- East 2.0 miles to NE corner sec. 24, T. 6 N., R. 11 W.;
- South 1.0 mile to SE corner sec. 24, T. 6 N., R. 11 W.;
- East 0.5 mile to north $\frac{1}{4}$ -corner sec. 30, T. 6 N., R. 10 W.;
- South 1.0 mile to south $\frac{1}{4}$ -corner sec. 30, T. 6 N., R. 10 W.;
- East 0.5 mile to SE corner sec. 30, T. 6 N., R. 10 W.;
- South 1.0 mile to SE corner sec. 31, T. 6 N., R. 10 W.;
- East 17.0 miles to NE corner sec. 1, T. 5 N., R. 9 W.;
- South 6.0 miles to SE corner sec. 36, T. 5 N., R. 8 W.;
- West 17.8 miles to NE corner sec. 1, T. 4 N., R. 11 W.;
- South 4.0 miles to SE corner sec. 24, T. 4 N., R. 11 W.;
- West 1.0 mile to SW corner sec. 24, T. 4 N., R. 11 W.;
- South 4.0 miles to SE corner sec. 11, T. 3 N., R. 11 W.;
- West 2.0 miles to SE corner sec. 9, T. 3 N., R. 11 W.;
- South 4.0 miles to SE corner sec. 33, T. 3 N., R. 11 W.;
- West 1.0 mile to SW corner sec. 33, T. 3 N., R. 11 W.;
- South 12.0 miles to SW corner sec. 33, T. 1 N., R. 11 W.;
- East 3.5 miles to NE corner sec. 2, T. 1 S., R. 11 W.;
- South 13.0 miles to SE corner sec. 2, T. 3 S., R. 11 W.;
- East 8.0 miles to NE corner sec. 7, T. 3 S., R. 9 W.;
- South 8.0 miles to SE corner sec. 19, T. 3 S., R. 9 W.;

Thence by metes and bounds, on great circle courses with the following approximate forward bearings and distances, and with topographic references as shown on presently current editions of U.S. Geological Survey Quadrangles (scale 1:63,360): S. 45° E. 2.8 miles to the true point for the meander corner on the section-line between Sections 3 and 4, T. 4 S., R. 9 W., or between Sections 33 and 34, T. 3 S., R. 9 W., as the case may be when surveyed, where said section line intersects the line of mean high water on the left bank of Sheep Creek;

Thence upstream, southeasterly with the meanders of the line of mean high water on

the left bank of Sheep Creek for approximately 10.0 miles to the headwaters of Sheep Creek at the northwest end of a small unnamed lake at the foot of Dingestadt Glacier;

Thence southwesterly and southeasterly following the meanders of the line of mean high water along the shore of said small lake for approximately 0.7 mile to the extreme southeastern point of a narrow arm of said lake;

Thence S. 49 $\frac{1}{2}$ ° E., 10.9 miles up and across Dingestadt Glacier to an unnamed peak at elevation 5375, said peak being about 2 $\frac{1}{4}$ miles west of East Arm;

N. 4° E., 11.5 miles across Chernof Glacier to a ridge at elevation 5873;

N. 47° E., 12.8 miles over Harding Icefield to an isolated ridge in the icefield at elevation 5944;

N. 18 $\frac{1}{2}$ ° W., 9.2 miles over Harding Icefield to an isolated ridge in the icefield at elevation 5355;

N. 65° E., 15.3 miles over Harding Icefield to an unnamed peak near the north end of the icefield at elevation 5500;

N. 2° W., 4.9 miles to an unnamed peak at elevation 5107;

N. 17° W., 1.8 miles to triangulation station Menker;

N. 30° E., 1.7 miles to a point where an unnamed stream flows easterly into Resurrection River in approximate latitude 60°18'20" N., and approximate longitude 149°46'39" W., said confluence being on the boundary of Chugach National Forest as said boundary is exhibited on the diagram accompanying Presidential Proclamation No. 1307 on August 2, 1915, and said confluence being approximately 8 miles southeasterly from the head of Upper Russian Lake;

Thence northerly along the west boundary of Chugach National Forest as said boundary is defined by words and diagrams in Presidential Proclamations Nos. 1307 (Aug. 2, 1915) and 1741 (May 29, 1915), to the place of beginning.

The area described contains approximately 1,730,000 acres.

2. The purpose of this adjustment is to realign the boundaries of the Range to conform to existing surveyed lines where established, and to protracted diagram lines on certain unsurveyed lands to be surveyed in the near future. The realignment is necessary in order to facilitate administration of the Range and as a basis for the survey of adjoining selections by the State of Alaska. The effect will be to add to the Range about 40,115 acres, located primarily in the northern part of the Caribou Hills, which is heavily used during late fall and early winter as a moose feeding area. It excludes from the Range (1) a strip 6 miles in width along the shore of Cook Inlet and lands in T. 5 N., Ra. 8, 9, 10, and 11 W., Seward Meridian; (2) a strip of surveyed land lying along the shore of Cook Inlet from Bishop Creek to Point Possession, containing approximately 34,776 acres, and (3) that portion of the Range formerly lying in the Harding Ice Field.

3. Until 10:00 a.m. on August 21, 1964, subject to valid existing rights and the provisions of existing withdrawals, the State of Alaska shall have a preferred right to select the lands released from withdrawal by this order, in accordance with the Act of July 28, 1956 (70 Stat. 709; 48 U.S.C. 46-3b), and section 6g of the Alaska Statehood Act of July 7, 1958 (72 Stat. 338), and the regulations in 43 CFR 2222.9 (29 F.R. 4400), formerly 43 CFR Part 76.

7095

Friday, May 29, 1964

FEDERAL REGISTER

4. All lands released from withdrawal by this order which presently are open to settlement, location, sale, or entry, or other disposition under any of the public land laws applicable to Alaska, or to classification and lease under the provisions of the Act of July 3, 1928 (44 Stat. 821; 48 U.S.C., secs. 360-361), entitled "An Act to provide for the leasing of public lands in Alaska for fur farming, and for other purposes," or the Act of March 4, 1927 (44 Stat. 1452; 48 U.S.C., secs. 471-471(o)), entitled "An Act to provide for the protection, development, and utilization of the public lands in Alaska by establishing an adequate system for grazing livestock thereon," shall continue to remain open to such disposition.

5. The lands (other than those referred to in paragraph 4 herein), which are released from withdrawal by this order, and which are not selected by the State, shall not be subject to settlement, location, or any form of disposition or appropriation under the public land laws pending issuance by an authorized officer of the Bureau of Land Management of an order specifying the date and manner in which such disposition or appropriation may be made, provided, however, that nothing contained herein shall be construed as closing to mineral leasing those areas released from withdrawal by this order which presently are open to mineral leasing.

6. Subject to valid existing rights, the public lands which are brought within

the Range by this order are hereby withdrawn under jurisdiction of the Bureau of Sport Fisheries and Wildlife, from all forms of appropriation under the public land laws, including the mining but not the mineral leasing laws, and shall hereafter be subject to all laws and regulations applicable to the Kenai National Moose Range.

Inquiries concerning the lands shall be addressed to the Manager, Land Office, Bureau of Land Management, Anchorage, Alaska.

STEWART L. UDALL,
Secretary of the Interior.

MAY 22, 1964.

[P.R. Doc. 64-5378; Filed, May 28, 1964;
8:45 a.m.]

Appendix G

Federal Register Notice, Volume 48, Number 38. February 24, 1983.

KEDGH

Thursday
February 24, 1983

Federal Register

Part III

**Department of the
Interior**

Fish and Wildlife Service

**National Wildlife Refuges in Alaska;
Description of Boundaries**

DEPARTMENT OF THE INTERIOR

Fish and Wildlife Service

National Wildlife Refuges in Alaska;
Description of Boundaries

AGENCY: Fish and Wildlife Service,
Interior.

ACTION: Notice.

SUMMARY: This notice sets out the legal descriptions of the external boundaries of national wildlife refuges established in Alaska under sections 302 and 303 of the Alaska National Interest Lands Conservation Act (ANILCA). Also described are the external boundaries of units of the National Wilderness Preservation System established within these refuges under section 702 of the ANILCA. Limited descriptions are included for wild and scenic rivers established on refuges under sections 602 and 603 and rivers designated for study under section 604. Publication of these legal descriptions is required by section 103 of the ANILCA. Generalized location maps are included also.

DATE: Pursuant to section 103(b) of ANILCA these boundary descriptions are effective as of December 2, 1980.

FOR FURTHER INFORMATION CONTACT:

Regional Director, U.S. Fish and Wildlife Service (Attn: Bill Mattice), 1011 East Tudor Road, Anchorage, Alaska 99507 (Phone: 907-276-3800),

or

Director, U.S. Fish and Wildlife Service (Attn: Christine Enright), 18th and C Streets, NW., Washington, D.C. 20240 (Phone: 202-653-7650).

SUPPLEMENTARY INFORMATION: Under section 103(b) of the Alaska National Interest Lands Conservation Act (ANILCA), Pub. L. 96-487 (94 Stat. 2371) the Secretary of the Interior was directed to publish legal descriptions and boundary maps for the land status changes effected by ANILCA, including national wildlife refuges and their wilderness areas. The official legal descriptions for refuges, and wilderness areas therein, are included in this notice. While generalized location maps for these areas also are included in this notice, the 1:250,000 scale maps developed for public use under section 103(b), whose official names and dates are listed below, are incorporated by this notice and are available for inspection at the Department of the Interior Library (Room 1140, 18th and C Streets, NW., Washington, D.C. 20240), U.S. Geological Survey map reference libraries in Alaska, and at the Fish and Wildlife Service Regional Office in Anchorage, Alaska. The maps are also

available for sale from the U.S. Geological Survey. Limited descriptions of wild and scenic rivers and study rivers within refuges are included also, although they are not depicted on the 1:250,000 scale maps at this time.

The ANILCA established 16 national wildlife refuges in Alaska. All previously existing Alaska national wildlife refuges are included in these 16 units and are generally designated as units or subunits of the expanded refuges. The refuges established by ANILCA, with the date of their official maps noted in parentheses, are as follows:

- Alaska Maritime National Wildlife Refuge (October 1979) (including the previously existing Aleutian Islands, Bering Sea, Bogoslof, Chamisso, Forrester Island, Hazy Islands, Pribilof, Semidi, Simeonof, St. Lazaria and Tuxedni National Wildlife Refuges)
- Alaska Peninsula National Wildlife Refuge (October 1979)
- Arctic National Wildlife Refuge (August 1980) (including the previously existing William O. Douglas Arctic National Wildlife Range)
- Becharof National Wildlife Refuge (July 1980)
- Innoko National Wildlife Refuge (October 1978)
- Izembek National Wildlife Refuge (October 1978) (including the previously existing Izembek National Wildlife Range and a portion of the Aleutian Islands National Wildlife Refuge)
- Kanuti National Wildlife Refuge (July 1980)
- Kenai National Wildlife Refuge (October 1978) (including the previously existing Kenai National Moose Range)
- Kodiak National Wildlife Refuge (October 1978) (including the previously existing Kodiak National Wildlife Refuge)
- Koyukuk National Wildlife Refuge (July 1980)
- Nowitna National Wildlife Refuge (July 1980)
- Selawik National Wildlife Refuge (July 1980)
- Tetlin National Wildlife Refuge (July 1980)
- Togiak National Wildlife Refuge (April 1980) (including the previously existing Cape Newenham National Wildlife Refuge)
- Yukon Delta National Wildlife Refuge (April 1980) (including the previously existing Clarence Rhode National Wildlife Range and Hazen Bay and Nunivak National Wildlife Refuges)
- Yukon Flats National Wildlife Refuge (July 1980)

Use of Refuge Lands

The legal descriptions that follow are those of the external boundaries of the above-listed refuges. State, Native corporate, and private land holdings within these boundaries cannot be accurately described at this time and thus have not been identified on the available maps. Inclusion of these non-public lands within the described boundaries should not be interpreted as authorizing public use of such lands. Uses of the public lands within the described boundaries are controlled by the laws and regulations governing administration of units of the National Wildlife Refuge System and provisions of the ANILCA. Persons desiring information on land status or use of lands within the described refuges may contact the Alaska Regional Director of the U.S. Fish and Wildlife Service.

Many of the boundaries described for Alaska refuges follow natural features, such as lakes or rivers. Where such a water body forms a portion of the boundary, general riparian law shall apply to that boundary.

Note.—The term "public lands" as used throughout this Notice is defined by ANILCA as those lands, waters, and interests therein, the title to which is in the United States after December 2, 1980, except:

(A) Land selections of the State of Alaska which have been tentatively approved or validly selected under the Alaska Statehood Act and lands which have been confirmed to, validly selected by, or granted to the Territory of Alaska or the State under any other provision of Federal law;

(B) Land selections of a Native Corporation made under the Alaska Native Claims Settlement Act, Pub. L. 92-203 (85 Stat. 688), as amended, which have not been conveyed to a Native Corporation, unless any such selection is determined to be invalid or is relinquished; and

(C) Lands referred to in section 19(b) of the Alaska Native Claims Settlement Act.

Those lands selected by the State or a Native Corporation within the external boundaries of a national wildlife refuge are to be administered by the U.S. Fish and Wildlife Service under applicable refuge laws until conveyed or intermly conveyed. Those validly selected by, but not ultimately conveyed to, the State or a Native Corporation within the external boundaries of a national wildlife refuge become part of that refuge.

Within the coastal boundaries of areas added to the National Wildlife Refuge System, Federal ownership does not extend below mean high tide to include lands owned by the State of Alaska except where the State may agree to that extension. However, lands above mean high tide on islands, islets, rock, reefs or spires and Federal

KENAI NATIONAL WILDLIFE REFUGE

Section 303 (4):

"The Kenai National Wildlife Refuge shall consist of the existing Kenai National Moose Range, including lands, waters, interests, and whatever submerged lands, if any, were retained in Federal ownership at the time of statehood, which shall be redesignated as the Kenai National Wildlife Refuge, and an addition of approximately two hundred and forty thousand acres of public lands as generally depicted on the map entitled 'Kenai National Wildlife Refuge', dated October 1978, excluding lands described in P.L.O. 3953, March 21, 1966, and P.L.O. 4056, July 22, 1966, withdrawing lands for the Bradley Lake Hydroelectric Project."

The Kenai National Wildlife Refuge consists of the public lands, as defined by the ANILCA, within the following boundary:

Beginning at the standard corner of sections 33 and 34, T. 8 S., R. 10 W., Seward Meridian;

Thence westerly, on the Second Standard Parallel South, approximately 3 miles to the standard corner of T. 8 S., R. 10 and 11 W., Seward Meridian;

Thence northerly, between Rs. 10 and 11 W., approximately 18 miles to the corner of Tps. 5 and 6 S., R. 10 and 11 W., Seward Meridian;

Thence easterly, between Tps. 5 and 6 S., approximately 12 miles to the corner of Tps. 5 and 6 S., R. 8 and 9 W., Seward Meridian;

Thence northerly, between Rs. 8 and 9 W., approximately 6 miles to the closing corner of T. 3 S., R. 8 and 9 W., Seward Meridian;

Thence westerly, on the First Standard Parallel South, approximately 34 miles to the standard corner of sections 33 and 34, T. 4 S., R. 9 W., Seward Meridian;

Thence northerly, between sections 33 and 34, 27 and 28, 21 and 22, 15 and 16, 9 and 10, 3 and 4, 33 and 34, approximately 64 miles to the meander corner of sections 33 and 34, T. 3 S., R. 9 W., Seward Meridian;

Thence on an approximate bearing of N. 45° W., approximately 2.8 miles to the corner of sections 19, 20, 29 and 30, T. 3 S., R. 9 W., Seward Meridian;

Thence northerly, between sections 19 and 20, 17 and 18, 7 and 8, approximately 3 miles to the corner of sections 5, 6, 7 and 8, T. 3 S., R. 9 W., Seward Meridian;

Thence westerly, between sections 6 and 7, 1 and 12, 2 and 11, 3 and 10, 4 and 9, 5 and 8, 6 and 7, 1 and 12, approximately 8 miles to the corner of sections 1, 2, 11 and 12, T. 3 S., R. 11 W., Seward Meridian;

Thence northerly, between sections 1 and 2, 35 and 36, 25 and 26, 23 and 24, 13 and 14, 11 and 12, 1 and 2, approximately 13 miles to the closing corner of sections 1 and 2, T. 1 S., R. 11 W., Seward Meridian;

Thence westerly, on the Seward Baseline, approximately 3.8 miles to the standard corner of sections 32 and 33, T. 1 N., R. 11 W., Seward Meridian;

Thence northerly, between sections 32 and 33, 28 and 29, 20 and 21, 16 and 17, 8 and 9, 4 and 5, 32 and 33, 28 and 29, 20 and 21, 16 and 17, 8 and 9, 4 and 5, approximately 12 miles to the corner of sections 4, 5, 32 and 33, Tps. 2 and 3 N., R. 11 W., Seward Meridian;

Thence easterly, between Tps. 2 and 3 N., approximately 1 mile to the corner of sections 3, 4, 33 and 34, Tps. 2 and 3 N., R. 11 W., Seward Meridian;

Thence northerly, between sections 33 and 34, 27 and 28, 21 and 22, 15 and 16, T. 3 N., R. 11 W., Seward Meridian;

Thence easterly, between sections 10 and 15, 11 and 14, approximately 2 miles to the corner of sections 11, 12, 13 and 14, T. 3 N., R. 11 W., Seward Meridian;

Thence northerly, between sections 11 and 12, 1 and 2, 35 and 36, 25 and 26, approximately 4 miles, to the corner of sections 23, 24, 25 and 26, T. 4 N., R. 11 W., Seward Meridian;

Thence easterly, between sections 24 and 25, approximately 1 mile to the corner of sections 19, 24, 25 and 30, T. 4 N., R. 10 and 11 W., Seward Meridian;

Thence northerly, between Tps. 10 and 11 W., approximately 4 miles to the closing corner of T. 4 N., R. 10 and 11 W., Seward Meridian;

Thence easterly, between Tps. 4 and 5 N., approximately 17.3 miles to the standard corner of T. 5 N., R. 7 and 8 W., Seward Meridian;

Thence northerly, between Tps. 7 and 8 W., approximately 6 miles to the corner of Tps. 5 and 6 N., R. 7 and 8 W., Seward Meridian;

Thence westerly, between Tps. 5 and 6 N., approximately 17 miles to the corner of sections 5, 6, 31 and 32, Tps. 5 and 6 N., R. 10 W., Seward Meridian;

Thence northerly, between sections 31 and 32, approximately 1 mile to the corner of sections 29, 30, 31 and 32, T. 6 N., R. 10 W., Seward Meridian;

Thence westerly, between sections 30 and 31, approximately 1/4 mile to the k section corner of sections 30 and 31, T. 6 N., R. 10 W., Seward Meridian;

Thence northerly, on the north and south centerlines of section 30, approximately 1 mile to the k section corner of sections 19 and 30, T. 6 N., R. 10 W., Seward Meridian;

Thence westerly, between sections 19 and 30, approximately 1/4 mile to the corner of sections 19, 24, 25 and 30, T. 6 N., R. 10 and 11 W., Seward Meridian;

Thence northerly, between Tps. 10 and 11 W., approximately 1 mile to the corner of sections 13, 18, 19 and 24, T. 6 N., R. 10 and 11 W., Seward Meridian;

Thence westerly, between sections 13 and 24, 14 and 23, approximately 2 miles to the corner of sections 14, 15, 22 and 23, T. 6 N., R. 11 W., Seward Meridian;

Thence northerly, between sections 14 and 15, 10 and 11, 2 and 3, 34 and 35, 26 and 27, 22 and 23, approximately 6 miles to the corner of sections 14, 15, 22 and 23, T. 7 N., R. 11 W., Seward Meridian;

Thence easterly, between sections 14 and 23, 13 and 24, approximately 2 miles to the corner of sections 13, 18, 19 and 24, T. 7 N., R. 10 and 11 W., Seward Meridian;

Thence northerly, between Tps. 10 and 11 W., approximately 2 miles to the corner of sections 1, 6, 7 and 12, T. 7 N., R. 10 and 11 W., Seward Meridian;

Thence easterly, between sections 6 and 7, approximately 1 mile to the corner of sections 5, 6, 7 and 8 and T. 7 N., R. 10 W., Seward Meridian;

Thence northerly, between sections 5 and 6, 31 and 32, 29 and 30, 19 and 20, approximately 4 miles to the corner of sections 17, 18, 19 and 20, T. 8 N., R. 10 W., Seward Meridian;

Thence easterly, between sections 17 and 20, 16 and 21, 15 and 22, approximately 2 1/2 miles to the west 1/16 section corner of sections 15 and 22, T. 8 N., R. 10 W., Seward Meridian;

Thence northerly, on the north and south centerlines of the south west $\frac{1}{4}$ and the northwest $\frac{1}{4}$ of section 15, approximately 1 mile to the west $1\frac{1}{16}$ section corner of sections 10 and 15, T. 8 N., R. 10 W., Seward Meridian;

Thence easterly, between sections 10 and 15, 11 and 14, approximately 1 $\frac{3}{4}$ miles to the corner of sections 11, 12, 13 and 14, T. 8 N., R. 10 W., Seward Meridian;

Thence northerly, between sections 11 and 12, 1 and 2, approximately 2 miles to the closing corner of sections 1 and 2, T. 8 N., R. 10 W., Seward Meridian;

Thence easterly, on the Second Standard Parallel North, approximately 0.9 mile to the standard $\frac{1}{4}$ section corner of section 31, T. 9 N., R. 9 W., Seward Meridian;

Thence northerly, on the north and south centerline of section 31, approximately 1 mile, to the $\frac{1}{4}$ section corner of sections 30 and 31, T. 9 N., R. 9 W., Seward Meridian;

Thence easterly, between sections 30 and 31, 29 and 32, 28 and 33, approximately $\frac{1}{4}$ miles to the corner of sections 27, 28, 33 and 34, T. 9 N., R. 9 W., Seward Meridian;

Thence northerly, between sections 27 and 28, approximately 1 mile to the corner of sections 21, 22, 27 and 28, T. 9 N., R. 9 W., Seward Meridian;

Thence easterly, between sections 22 and 27, approximately 1 mile to the corner of sections 22, 23, 26 and 27, T. 9 N., R. 9 W., Seward Meridian;

Thence northerly, between sections 22 and 23, approximately 1 mile to the corner of sections 14, 15, 22 and 23, T. 9 N., R. 9 W., Seward Meridian;

Thence easterly, between sections 14 and 23, approximately 1 mile to the corner of sections 13, 14, 23 and 24, T. 9 N., R. 9 W., Seward Meridian;

Thence northerly, between sections 13 and 14, approximately 1 mile to the corner of sections 11, 12, 13 and 14, T. 9 N., R. 9 W., Seward Meridian;

Thence easterly, between sections 12 and 13, approximately 1 mile to the corner of sections 7, 12, 13 and 18, T. 9 N., R. 8 and 9 W., Seward Meridian;

Thence northerly, between Rs. 8 and 9 W., approximately 1 mile to the corner of sections 1, 6, 7 and 12, T. 9 N., R. 8 and 9 W., Seward Meridian;

Thence easterly, between sections 6 and 7, approximately 1 mile to the corner of sections 5, 6, 7 and 8, T. 9 N., R. 8 W., Seward Meridian;

Thence northerly, between sections 5 and 6, approximately 1 mile to the corner of sections 5, 6, 31 and 32, Tps. 9 and 10 N., R. 8 W., Seward Meridian;

Thence easterly, between Tps. 9 and 10 N., approximately 2 miles to the corner of sections 3, 4, 33 and 34, Tps. 9 and 10 N., R. 8 W., Seward Meridian;

Thence northerly, between sections 33 and 34, approximately 1 mile to the corner of sections 27, 28, 33 and 34, T. 10 N., R. 8 W., Seward Meridian;

Thence easterly, between sections 27 and 34, approximately 1 mile to the corner of sections 26, 27, 34 and 35, T. 10 N., R. 8 W., Seward Meridian;

Thence northerly, between sections 26 and 27, approximately 1 mile to the corner of sections 22, 23, 26 and 27, T. 10 N., R. 8 W., Seward Meridian;

Thence easterly, between sections 23 and 26, 24 and 25, approximately 2 miles to the corner of sections 19, 24, 25 and 30, T. 10 N., R. 7 and 8 W., Seward Meridian;

Thence northerly, between Rs. 7 and 8 W., approximately 1 mile to the corner of sections 13, 18, 19 and 24, T. 10 N., R. 7 and 8 W., Seward Meridian;

Thence easterly, between sections 18 and 19, 17 and 20, approximately 2 miles to the corner of sections 16, 17, 20 and 21, T. 10 N., R. 7 W., Seward Meridian;

Thence northerly, between sections 16 and 17, approximately 1 mile to the corner of sections 8, 9, 16 and 17, T. 10 N., R. 7 W., Seward Meridian;

Thence easterly, between sections 9 and 16, approximately 1 mile to the corner of sections 9, 10, 15 and 16, T. 10 N., R. 7 W., Seward Meridian;

Thence northerly, between sections 9 and 10, approximately 1 mile to the corner of sections 3, 4, 9 and 10, T. 10 N., R. 7 W., Seward Meridian;

Thence easterly, between sections 3 and 10, 2 and 11, approximately 2 miles to the corner of sections 1, 2, 11 and 12, T. 10 N., R. 7 W., Seward Meridian;

Thence northerly, between sections 1 and 2, 35 and 36, approximately 2 miles to the corner of sections 23, 26, 35 and 36, T. 11 N., R. 7 W., Seward Meridian;

Thence easterly, between sections 25 and 36, 30 and 31, approximately 2 miles to the corner of sections 29, 30, 31 and 32, T. 11 N., R. 6 W., Seward Meridian;

Thence northerly, between sections 29 and 30, 19 and 20, 17 and 18, approximately 2.1 miles to the meander corner of sections 17 and 18, T. 11 N., R. 6 W., Seward Meridian;

Thence easterly, southeasterly, northeasterly, along the line of mean high tide of Turnagain Arm and Chickaloon Bay, approximately 27 miles to the special meander corner on the north and south centerlines of section 14, T. 10 N., R. 3 W., Seward Meridian;

Thence on an approximate forward bearing of S. 30° E., approximately 1 mile to the northeasterly summit of a ridge, located in the northeasterly portion of section 24, T. 10 N., R. 3 W., Seward Meridian, approximate elevation 2,350 feet;

Thence on an approximate forward bearing of S. 82° E., approximately 4 miles to the summit of a ridge in the north central portion of section 24, T. 10 N., R. 3 W., Seward Meridian, approximate elevation 2,650 feet;

Thence on an approximate forward bearing of S. 40° E., approximately 3/4 mile to Vertical Angle Bench Mark "Hops" located in the southeasterly portion of section 24, T. 10 N., R. 3 W., Seward Meridian, approximate elevation 3,708 feet;

Thence on an approximate forward bearing of S. 48° W., approximately 1 mile to the crest of the divide between the Resurrection Creek and Indian Creek drainages, located in the westerly portion of section 23, T. 10 N., R. 3 W., Seward Meridian, approximate elevation 3,950 feet;

Thence southerly, along the crest of the divide between Resurrection Creek and Indian Creek drainages, and descending a spur ridge, approximately 26 miles to the confluence of Chickaloon River and an unnamed creek, located in the southeasterly portion of section 1, T. 6 N., R. 4 W., Seward Meridian;

Thence northeasterly, along the centerline of the Chickaloon River, approximately 4 miles to a point due north of the thread of the Russian River at its junction with the Kadiak River, in the westerly portion of section 33, T. 7 N., R. 4 W., Seward Meridian;

Thence due south, approximately 1 1/2 miles to the junction of the Russian River with the Kadiak River in section 33, T. 7 N., R. 4 W., Seward Meridian;

Thence on the Russian River, following the thread of the stream, approximately 2 1/2 miles to the head of Upper Russian Lake located in section 30, T. 9 N., R. 3 W., Seward Meridian;

Thence across the divide, on an approximate forward bearing of S. 83 1/2° E., approximately 1 1/2 miles to an intersection with Summit Creek in section 30, T. 9 N., R. 3 W., Seward Meridian;

Thence down Summit Creek and Resurrection River, following the thread of the streams, approximately 1 1/2 miles to a point where an unnamed stream flows easterly into Resurrection River, located in section 34, T. 9 N., R. 3 W., Seward Meridian;

Thence on an approximate forward bearing of S. 30° W., approximately 1.7 miles to Vertical Angle Bench Mark "Masher," located in section 9, T. 2 N., R. 3 W., Seward Meridian, approximate elevation 3,203 feet;

Thence on an approximate forward bearing of S. 17° E., approximately 1.6 miles to the summit of a mountain located in the southeasterly portion of section 15, T. 2 N., R. 3 W., Seward Meridian, approximate elevation 3,207 feet;

Thence on an approximate forward bearing of S. 2° E., approximately 4.9 miles to the summit of a mountain, located in the southeasterly portion of section 10, T. 1 N., R. 3 W., Seward Meridian, approximate elevation 3,400 feet;

Thence on an approximate forward bearing of S. 65° W., over Harding Ice Field, approximately 13.9 miles to the summit of a mountain located in section 9, T. 2 S., R. 5 W., Seward Meridian, approximate elevation 3,333 feet;

Thence on an approximate forward bearing of S. 18 1/2° E., over Harding Ice Field, approximately 9.8 miles to the summit of a mountain located in section 23, T. 2 S., R. 5 W., Seward Meridian, approximate elevation 3,244 feet;

Thence on an approximate forward bearing of S. 47° W., over Harding Ice Field, approximately 12.3 miles to the summit of a mountain located in section 4, T. 4 S., R. 6 W., Seward Meridian, approximate elevation 3,873 feet;

Thence on an approximate forward bearing of S. 4° W., across Chernoff Glacier, approximately 1 1/4 miles to the summit of a mountain located near the section corner of sections 5, 6, 31 and 32, Tps. 5 and 6 S., R. 6 W., Seward Meridian, approximate elevation 5,375 feet;

Thence on an approximate forward bearing of N. 49 1/2° W., approximately 300 feet to an intersection with the township line between Tps. 5 and 6 S., R. 6 W., Seward Meridian;

Thence westerly, between Tps. 5 and 6 S., approximately 1 1/2 miles to the corner of sections 4, 5, 31 and 33, Tps. 5 and 6 S., R. 6 W., Seward Meridian;

UNITS OF THE NATIONAL WILDERNESS PRESERVATION SYSTEM
WITHIN THE KENAI NATIONAL WILDLIFE REFUGE:

Section 702 (7):

"Kenai Wilderness of approximately one million three hundred and fifty thousand acres as generally depicted on a map entitled 'Kenai National Wildlife Refuge', dated October 1978."

The Kenai Wilderness consists of the public lands, as defined by the ANILCA, within the following boundaries:

Andy Simons Unit

Beginning at the standard corner of sections 33 and 34, T. 8 S., R. 10 W., Seward Meridian;

Thence westerly, on the Second Standard Parallel South, approximately 3 miles to the standard corner of T. 8 S., Rs. 10 and 11 W., Seward Meridian;

Thence northerly, between Rs. 10 and 11 W., approximately 18 miles to the corner of Tps. 5 and 6 S., Rs. 10 and 11 W., Seward Meridian;

Thence easterly, between Tps. 5 and 6 S., approximately 12 miles to the corner of Tps. 5 and 6 S., Rs. 8 and 9 W., Seward Meridian;

Thence northerly, between Rs. 8 and 9 W., approximately 6 miles to the closing corner of T. 5 S., Rs. 8 and 9 W., Seward Meridian;

Thence westerly, on the First Standard Parallel South, approximately 3 1/2 miles to the standard corner of sections 33 and 34, T. 4 S., R. 9 W., Seward Meridian;

Thence northerly, between sections 33 and 34, 27 and 28, 21 and 22, 15 and 16, 9 and 10, 3 and 4, 33 and 34, approximately 6 1/4 miles to the meander corner of sections 33 and 34 on the left bank of Sheep Creek, T. 3 S., R. 9 W., Seward Meridian;

Thence on an approximate forward bearing of N. 45° W., approximately 2.8 miles to the corner of sections 19, 20, 29 and 30, T. 3 S., R. 9 W., Seward Meridian;

Thence southerly, between sections 4 and 5, approximately 1 mile to the corner of sections 4, 5, 8 and 9, T. 6 S., R. 8 W., Seward Meridian;

Thence westerly, between sections 5 and 8, 6 and 7, approximately 2 miles to the corner of sections 1, 6, 7 and 12, T. 6 S., Rs. 8 and 9 W., Seward Meridian;

Thence southerly, between Rs. 8 and 9 W., approximately 3 miles to the corner of sections 19, 24, 25 and 30, T. 6 S., Rs. 8 and 9 W., Seward Meridian;

Thence westerly, between sections 24 and 25, 23 and 26, 22 and 27, approximately 3 miles to the corner of sections 21, 22, 27 and 28, T. 6 S., R. 9 W., Seward Meridian;

Thence southerly, between sections 27 and 28, 33 and 34, 3 and 4, 9 and 10, approximately 4 miles to the corner of sections 9, 10, 13 and 16, T. 7 S., R. 9 W., Seward Meridian;

Thence westerly, between sections 9 and 16, approximately 1 mile to the corner of sections 8, 9, 16 and 17, T. 7 S., R. 9 W., Seward Meridian;

Thence southerly, between sections 16 and 17, 20 and 21, 28 and 29, 32 and 33, 4 and 5, approximately 5 miles to the corner of sections 4, 5, 8 and 9, T. 8 S., R. 9 W., Seward Meridian;

Thence westerly, between sections 5 and 8, approximately 1 mile to the corner of sections 5, 6, 7 and 8, T. 8 S., R. 9 W., Seward Meridian;

Thence southerly, between sections 7 and 8, 17 and 18, approximately 2 miles to the corner of sections 17, 18, 19 and 20, T. 8 S., R. 9 W., Seward Meridian;

Thence westerly, between sections 18 and 19, 13 and 24, 14 and 23, 15 and 22, approximately 4 miles to the corner of sections 15, 16, 21 and 22, T. 8 S., R. 10 W., Seward Meridian;

Thence southerly, between sections 21 and 22, 27 and 28, 33 and 34, approximately 3 miles to the standard corner of sections 33 and 34, on the south boundary of T. 8 S., R. 10 W., Seward Meridian, the place of beginning.

Thence southerly, between sections 21 and 22, 27 and 28, 33 and 34, approximately 3 miles to the standard corner of sections 33 and 34, on the south boundary of T. 8 S., R. 10 W., Seward Meridian, the place of beginning.

Department of the Interior, Kenai National Wildlife Refuge, Alaska
This portion of the description is incorrect.

- Thence northerly, between sections 19 and 20, 17 and 18, 7 and 8, approximately 3 miles to the corner of sections 5, 6, 7 and 8, T. 3 S., R. 9 W., Seward Meridian;
- Thence westerly, between sections 6 and 7, 1 and 12, 2 and 11, 3 and 10, 4 and 9, 5 and 8, 6 and 7, 1 and 12, approximately 8 miles to the corner of sections 1, 2, 11 and 12, T. 3 S., R. 11 W., Seward Meridian;
- Thence northerly, between sections 1 and 2, 35 and 36, 25 and 26, 23 and 24, 13 and 14, 11 and 12, 1 and 2, 35 and 36, 25 and 26, 23 and 24, 13 and 14, 11 and 12, T. 1 S., R. 11 W., Seward Meridian;
- Thence easterly, along the Seward Base Line, approximately 2,000 feet to the standard corner of T. 1 N., R. 10 and 11 W., Seward Meridian;
- Thence northerly, between Rs. 10 and 11 W., approximately 1 mile to the corner of sections 25, 30, 31 and 36, T. 1 N., R. 10 and 11 W., Seward Meridian;
- Thence easterly, between sections 30 and 31, 29 and 32, 28 and 33, approximately 3 miles to the corner of sections 27, 28, 33 and 34, T. 1 N., R. 10 W., Seward Meridian;
- Thence northerly, between sections 27 and 28, 21 and 22, 15 and 16, approximately 3 1/2 miles to the 1/4 section corner of sections 15 and 16, T. 1 N., R. 10 W., Seward Meridian;
- Thence westerly, on the east and west centerlines of sections 16, 17 and 18, approximately 3 miles to the 1/4 section corner of sections 13 and 16, T. 1 N., R. 10 and 11 W., Seward Meridian;
- Thence northerly, between Rs. 10 and 11 W., approximately 3 miles to the meander corner of sections 31 and 36, T. 2 N., R. 10 and 11 W., Seward Meridian, at the line of mean high water on the Tustumena Lake;
- Thence westerly, northeasterly and southeasterly, along the line of mean high water of Tustumena Lake, approximately 12 miles to the meander corner of sections 2 and 3, T. 2 N., R. 10 W., Seward Meridian;
- Thence northerly, between sections 2 and 3, 34 and 35, approximately 1 3/4 miles to the corner of sections 26, 27, 34 and 35, T. 3 N., R. 10 W., Seward Meridian;
- Thence easterly, between sections 26 and 35, 25 and 36, 30 and 31, 29 and 32, 28 and 33, 27 and 34, 26 and 35, approximately 7 miles to the corner of sections 25, 26, 33 and 36, T. 3 N., R. 9 W., Seward Meridian;
- Thence northerly, between sections 25 and 26, 23 and 24, 13 and 14, 11 and 12, approximately 3 1/2 miles to the 1/4 section corner of sections 11 and 12, T. 3 N., R. 9 W., Seward Meridian;
- Thence westerly, on the east and west centerline of section 11, approximately 1 mile to the 1/4 section corner of sections 10 and 11, T. 3 N., R. 9 W., Seward Meridian;
- Thence northerly, between sections 10 and 11, 2 and 3, 34 and 35, 26 and 27, 23, 21, 4 N., R. 9 W., Seward Meridian;
- Thence easterly, between sections 14 and 23, approximately 1/2 mile to the 1/4 section corner of sections 14 and 23, T. 4 N., R. 9 W., Seward Meridian;
- Thence northerly, on the north and south centerlines of sections 14, 11 and 2, approximately 3 miles to the 1/4 section corner of section 2, T. 4 N., R. 9 W., Seward Meridian, on the Kenai National Wildlife Refuge boundary;
- Thence easterly, between Tps. 4 and 5 N., approximately 6 miles to the 1/4 section corner of section 2, T. 4 N., R. 8 W., Seward Meridian;
- Thence southerly, along the north and south centerline of section 2, approximately 1 mile to the 1/4 section corner of sections 2 and 11, T. 4 N., R. 8 W., Seward Meridian;
- Thence easterly, between sections 2 and 11, 1 and 12, approximately 1 1/4 miles to the left bank of the Kenai River on the section line between sections 1 and 12, T. 4 N., R. 8 W., Seward Meridian;
- Thence easterly, southeasterly, easterly, northeasterly, northwesterly and northwesterly, along the left bank of the Kenai River and the southerly and easterly shore of Skilak Lake, and again northeasterly, along the left bank of the Kenai River, approximately 36 1/2 miles to a point on the southerly right-of-way of a powerline, located in the northwesterly portion of section 37, T. 5 N., R. 4 W., Seward Meridian;
- Thence southeasterly and easterly, along the southerly right-of-way of a powerline, approximately 1 1/2 miles to a point on the Kenai National Wildlife Refuge boundary located on the thread of the Russian River in the easterly portion of section 35, T. 5 N., R. 4 W., Seward Meridian;
- Thence up the Russian River, following the thread of the stream, approximately 15 miles to the head of Upper Russian Lake located in section 30, T. 5 N., R. 3 W., Seward Meridian;

- Thence across the divide, on an approximate forward bearing of S. 83 1/2° E., approximately 1 1/2 miles to an intersection with Summit Creek in section 28, T. 3 N., R. 3 W., Seward Meridian;
- Thence down Summit Creek and Resurrection River, following the thread of the streams, approximately 1 1/2 miles to a point where an unnamed stream flows easterly into Resurrection River, located in section 30, T. 3 N., R. 3 W., Seward Meridian;
- Thence on an approximate forward bearing of S. 30° W., approximately 1.7 miles to Vertical Angle Bench Mark "Mermet," located in section 9, T. 2 N., R. 3 W., Seward Meridian, approximate elevation 3,203 feet;
- Thence on an approximate forward bearing of S. 17° E., approximately 1.8 miles to the summit of a mountain located in the southwesterly portion of section 15, T. 2 N., R. 3 W., Seward Meridian, approximate elevation 3,217 feet;
- Thence on an approximate forward bearing of S. 2° E., approximately 4.9 miles to the summit of a mountain located in the southwesterly portion of section 10, T. 1 N., R. 3 W., Seward Meridian, approximate elevation 3,300 feet;
- Thence on an approximate forward bearing of S. 63° W., over Harding Ice Field, approximately 13.9 miles to the summit of a mountain located in section 9, T. 1 S., R. 3 W., Seward Meridian, approximate elevation 3,353 feet;
- Thence on an approximate forward bearing of S. 18 1/2° E., over Harding Ice Field, approximately 9.2 miles to the summit of a mountain located in section 25, T. 2 S., R. 5 W., Seward Meridian, approximate elevation 3,284 feet;
- Thence on an approximate forward bearing of S. 47° W., over Harding Ice Field, approximately 12.3 miles to the summit of a mountain located in section 4, T. 4 S., R. 6 W., Seward Meridian, approximate elevation 3,873 feet;
- Thence on an approximate forward bearing of S. 4° W., across Overhoff Glacier, approximately 1 1/2 miles to the summit of a mountain located near the section corner of sections 5, 6, 31 and 32 Tps. 3 and 6 S., R. 6 W., Seward Meridian, approximate elevation 3,375 feet;
- Thence on an approximate forward bearing of N. 49 1/2° W., approximately 300 feet to an intersection with the township line between Tps. 5 and 6 S., R. 6 W., Seward Meridian;
- Thence westerly, following the township line between Tps. 5 and 6 S., R. 6 W., Seward Meridian; approximately 1 1/2 miles to the corner of sections 4, 5, 32 and 33, Tps. 5 and 6 S., R. 6 W., Seward Meridian;
- Thence southerly, between sections 4 and 5, approximately 1/2 mile to the corner of sections 4, 5, 6 and 9, T. 6 S., R. 6 W., Seward Meridian;
- Thence westerly, between sections 5 and 8, 6 and 7, approximately 2 miles to the corner of sections 1, 6, 7 and 12, T. 6 S., Rs. 8 and 9 W., Seward Meridian;
- Thence southerly, following the range line between Rs. 8 and 9 W., approximately 3 miles to the corner of sections 19, 24, 25 and 30, T. 6 S., Rs. 8 and 9 W., Seward Meridian;
- Thence westerly, between sections 24 and 25, 23 and 26, 22 and 27, approximately 3 miles to the corner of sections 21, 22, 27 and 28, T. 6 S., R. 9 W., Seward Meridian;
- Thence southerly, between sections 27 and 28, 33 and 34, 3 and 4, 9 and 10, approximately 4 miles to the corner of sections 9, 10, 15 and 16, T. 7 S., R. 9 W., Seward Meridian;
- Thence westerly, between sections 9 and 16, approximately 1 mile to the corner of sections 8, 9, 16 and 17, T. 7 S., R. 9 W., Seward Meridian;
- Thence southerly, between sections 16 and 17, 20 and 21, 28 and 29, 32 and 33, 4 and 5, approximately 3 miles to the corner of sections 4, 5, 6 and 9, T. 8 S., R. 9 W., Seward Meridian;
- Thence westerly, between sections 5 and 8, approximately 1 mile to the corner of sections 5, 6, 7 and 8, T. 8 S., R. 9 W., Seward Meridian;
- Thence southerly, between sections 7 and 8, 17 and 18, approximately 2 miles to the corner of sections 17, 18, 19 and 20, T. 8 S., R. 9 W., Seward Meridian;
- Thence westerly, between sections 18 and 19, 13 and 24, 14 and 23, 15 and 22, approximately 4 miles to the corner of sections 15, 16, 21 and 22, T. 8 S., R. 10 W., Seward Meridian;
- Thence southerly, between sections 21 and 22, 27 and 28, 33 and 34, approximately 3 miles to the standard corner of sections 33 and 34, on the south boundary of T. 8 S., R. 10 W., Seward Meridian, the place of the beginning.
- All of Lucas Island, located in sections 28 and 29, T. 4 N., R. 5 W., Seward Meridian, is included within the Kenai Wildness, Andy Simons Unit.

Caroo Lakes Unit

Beginning at the corner of sections 19, 24, 29 and 30, T. 7 W., Rs. 5 and 6 W., Seward Meridian;

Thence westerly, between sections 24 and 25, 23 and 26, 22 and 27, 21 and 28, 20 and 29, approximately 5 miles to the corner of sections 19, 20, 29 and 30, T. 7 N., R. 6 W., Seward Meridian;

Thence southerly, between sections 29 and 30, 31 and 32, 5 and 6, 7 and 8, 17 and 18, approximately 4 1/2 miles to the 1/4 section corner of sections 17 and 18, T. 6 N., R. 6 W., Seward Meridian;

Thence westerly, on the east and west centerlines of sections 18, 13 and 14, N., R. 7 W., Seward Meridian;

Thence southerly, between sections 14 and 15, approximately 1/2 mile to the corner of sections 14, 15, 22 and 23, T. 6 N., R. 7 W., Seward Meridian;

Thence westerly, between sections 15 and 22, 16 and 21, 17 and 20, 18 and 19, 13 and 24, approximately 4 3/4 miles to the centerline of Moose River, between sections 13 and 24, T. 6 N., R. 8 W., Seward Meridian;

Thence southwesterly, along the centerline of Moose River, approximately 2 3/4 miles to the confluence with the West Fork Moose River, located in the northwesterly portion of section 27, T. 6 N., R. 8 W., Seward Meridian;

Thence northeasterly, along the centerline of West Fork Moose River, approximately 1 1/2 miles to a point between sections 15 and 22, T. 6 N., R. 8 W., Seward Meridian;

Thence westerly, between sections 15 and 22, 16 and 21, 17 and 20, 18 and 19, approximately 3 3/4 miles to the corner of sections 13, 18, 19 and 24, T. 6 N., R. 8 and 9 W., Seward Meridian;

Thence northerly, between Rs. 8 and 9 W., approximately 8 3/4 miles to a point on the southerly right-of-way of the Swenson River Road, between sections 1 and 6, T. 7 N., Rs. 8 and 9 W., Seward Meridian;

Thence easterly, along the southerly right-of-way of the Swenson River Road, approximately 8 1/4 miles to a point between sections 5 and 32, Tps. 7 and 8 N., R. 7 W., Seward Meridian;

Thence easterly, between Tps. 7 and 8 N., approximately 100 feet to a point between sections 5 and 32, Tps. 7 and 8 N., R. 7 W., Seward Meridian, on the westerly shore of an unnamed lake;

Thence northeasterly and southeasterly, along the line of mean high water of the unnamed lake, approximately 1/4 mile to a point between sections 5 and 32, Tps. 7 and 8 N., R. 7 W., Seward Meridian, on the east shore of the unnamed lake;

Thence easterly, between Tps. 7 and 8 N., approximately 3/4 mile to the 1/4 section corner of sections 4 and 33, Tps. 7 and 8 N., R. 7 W., Seward Meridian;

Thence southerly, on the north and south centerline of section 4, approximately 1 mile to the 1/4 section corner of sections 4 and 9, T. 7 N., R. 7 W., Seward Meridian;

Thence easterly, between sections 4 and 9, approximately 1/2 mile to the corner of sections 3, 4, 9 and 10, T. 7 N., R. 7 W., Seward Meridian;

Thence southerly, between sections 9 and 10, approximately 1 mile to the corner of sections 9, 10, 15 and 16, T. 7 N., R. 7 W., Seward Meridian;

Thence easterly, between sections 10 and 15, approximately 1 mile to the corner of sections 10, 11, 14 and 15, T. 7 N., R. 7 W., Seward Meridian;

Thence southerly, between sections 14 and 15, approximately 1/2 mile to the 1/4 section corner of sections 14 and 15, T. 7 N., R. 7 W., Seward Meridian;

Thence easterly, on the east and west centerlines of sections 14, 13 and 18, approximately 3 miles to the 1/4 section corner of sections 17 and 18, T. 7 N., R. 6 W., Seward Meridian;

Thence northerly, between sections 17 and 18, 7 and 8, 5 and 6, 31 and 32, 29 and 30, approximately 4 miles to the meander corner of sections 29 and 30, T. 8 N., R. 6 W., Seward Meridian, on the easterly shore of Buteo Lake;

Thence northeasterly, northwesterly and southerly, along the line of mean high water of Buteo Lake, approximately 3/4 mile to the special meander corner on the east and west centerline of section 30, T. 8 N., R. 6 W., Seward Meridian;

Thence westerly, on the east and west centerlines of sections 30 and 25, approximately 1 1/4 miles to the 1/4 section corner of sections 25 and 26, T. 8 N., R. 7 W., Seward Meridian;

Thence northerly, between sections 25 and 26, approximately 1,500 feet to the meander corner of sections 25 and 26, T. 8 N., R. 7 W., Seward Meridian, on the westerly shore of Takukak Lake;

Thence northwesterly and northeasterly, along the line of mean high water of Takukak Lake, approximately 1/4 mile to the meander corner of sections 25 and 26, T. 8 N., R. 7 W., Seward Meridian, on the westerly shore of Takukak Lake (Takukak Lake appears on the 1:63,360 scale map, Kennel D-2, from which this description was derived.);

Thence northerly, between sections 25 and 26, approximately 1/4 mile to the corner of sections 23, 24, 25 and 26, T. 8 N., R. 7 W., Seward Meridian;

Thence westerly, between sections 23 and 26, approximately 1/4 mile to the meander corner of sections 23 and 26, T. 8 N., R. 7 W., Seward Meridian, on the easterly shore of Traus Lake;

Thence southerly and northwesterly, along the line of mean high water of Traus Lake, approximately 3/4 mile to the meander corner of sections 23 and 26, T. 8 N., R. 7 W., Seward Meridian, on the westerly shore of Traus Lake;

Thence easterly, between sections 2 and 11, approximately 1/8 mile to the

Thence easterly, between sections 2 and 11, approximately 1/8 mile to the corner of sections 1, 2, 11 and 12, T. 9 N., R. 7 W., Seward Meridian;

Thence northerly, between sections 1 and 2, 35 and 36, approximately 1 1/4 miles to the meander corner of sections 35 and 36, T. 10 N., R. 7 W., Seward Meridian, on the westerly shore of Taiga Lake;

Thence northwesterly and southeasterly, on the line of mean high water of Taiga Lake, approximately 1/2 mile to the meander corner of sections 35 and 36, T. 10 N., R. 7 W., Seward Meridian, on the northerly shore of Taiga Lake;

Thence northerly, between sections 23 and 24, T. 10 N., R. 7 W., Seward Meridian; approximately 1 3/4 miles to the centerline of Seven Egg Creek, located between sections 23 and 24, T. 10 N., R. 7 W., Seward Meridian;

Thence northwesterly and westerly, along the centerline of Seven Egg Creek and the westerly shore of Kraenberi Lake, approximately 4 miles to a point between sections 9 and 10, T. 10 N., R. 7 W., Seward Meridian, on the Kenai National Wildlife Refuge boundary;

Thence northerly, between sections 9 and 10, approximately 3/4 mile to the corner of sections 3, 4, 9 and 10, T. 10 N., R. 7 W., Seward Meridian;

Thence easterly, between sections 3 and 10, 2 and 11, approximately 2 miles to the corner of sections 1, 2, 11 and 12, T. 10 N., R. 7 W., Seward Meridian;

Thence northerly, between sections 1 and 2, 35 and 36, approximately 2 miles to the corner of section 25, 26, 35 and 36, T. 11 N., R. 7 W., Seward Meridian;

Thence easterly, between sections 25 and 36, 30 and 31, approximately 2 miles to the corner of sections 29, 30, 31 and 32, T. 11 N., R. 6 W., Seward Meridian;

Thence northerly, between sections 29 and 30, 19 and 20, 17 and 18, approximately 2.1 miles to the meander corner of sections 17 and 18, T. 11 N., R. 6 W., Seward Meridian;

Thence easterly, southeasterly, along the line of mean high tide of Inragin Arm and Chickaloon Bay, approximately 10 miles to the centerline of Bedlam Creek located in the northerly portion of section 30, T. 10 N., R. 5 W., Seward Meridian;

Thence westerly, along the centerline of Bedlam Creek, approximately 3 1/4 miles to a point between sections 26 and 27, T. 10 N., R. 6 W., Seward Meridian;

Thence southerly, between sections 26 and 27, 34 and 35, 2 and 3, 10 and 11, 14 and 15, 22 and 23, 26 and 27, 34 and 35, approximately 7 miles to the standard corner of sections 34 and 35, T. 9 N., R. 6 W., Seward Meridian;

Thence westerly, between sections 23 and 26, 22 and 27, 21 and 28, approximately 1 1/2 miles to the meander corner of sections 21 and 28, T. 8 N., R. 7 W., Seward Meridian, on the easterly shore of Paddle Lake;

Thence southeasterly, southeasterly and northwesterly, along the line of mean high water of Paddle Lake, approximately 1/2 mile to the meander corner of sections 21 and 28, T. 8 N., R. 7 W., Seward Meridian, on the westerly shore of Paddle Lake;

Thence westerly, between sections 21 and 28, approximately 1/4 mile to the 1/4 section corner of sections 21 and 28, T. 8 N., R. 7 W., Seward Meridian;

Thence northerly, on the north and south centerline of section 21, approximately 1/2 mile to the center 1/4 section corner of section 21, T. 8 N., R. 7 W., Seward Meridian;

Thence westerly, on the east and west centerlines of sections 21, 20 and 19, approximately 2 1/2 miles to the 1/4 section corner of sections 19 and 24, T. 8 N., R. 7 and 8 W., Seward Meridian;

Thence northerly, between Rs. 7 and 8 W., approximately 3 1/2 miles to the closing corner of T. 8 N., R. 7 and 8 W., Seward Meridian;

Thence easterly, on the Second Standard Parallel North, approximately 1/2 mile to the standard corner of sections 31 and 32, T. 9 N., R. 7 W., Seward Meridian;

Thence northerly, between sections 31 and 32, approximately 1/2 mile to a point between sections 31 and 32, T. 9 N., R. 7 W., Seward Meridian, on the southerly shore of an unnamed lake;

Thence northwesterly and northeasterly, on the line of mean high water of the Unnamed Lake, approximately 500 feet to a point between sections 31 and 32, T. 9 N., R. 7 W., Seward Meridian, on the northerly shore of the unnamed lake;

Thence northerly, between sections 31 and 32, T. 9 N., R. 7 W., Seward Meridian; corner of sections 29, 30, 31 and 32, T. 9 N., R. 7 W., Seward Meridian;

Thence easterly, between sections 29 and 32, approximately 1/2 mile to the 1/4 section corner of sections 29 and 32, T. 9 N., R. 7 W., Seward Meridian;

Thence northerly, on the north and south centerlines of sections 29, 20, 17 and 8, approximately 4 miles to the 1/4 section corner of sections 5 and 8, T. 9 N., R. 7 W., Seward Meridian;

Thence easterly, between sections 5 and 8, 4 and 9, 3 and 10, 2 and 11, approximately 3 miles to the meander corner of sections 2 and 11, T. 9 N., R. 7 W., Seward Meridian, on the westerly shore of an unnamed lake;

Thence northerly and southeasterly, on the line of mean high water of an unnamed lake, approximately 1/2 mile to the meander corner of sections 2 and 11, T. 9 N., R. 7 W., Seward Meridian; on the easterly shore of an unnamed lake;

Thence easterly, on the Second Standard Parallel North, approximately 1,600 feet to the closing corner of sections 2 and 3, T. 8 N., R. 6 W., Seward Meridian;

Thence southerly, between sections 2 and 3, approximately 1/2 mile to the 1/4 section corner of sections 2 and 3, T. 8 N., R. 6 W., Seward Meridian;

Thence easterly, on the east and west centerlines of sections 2 and 1, approximately 2 miles to the 1/4 section corner of sections 1 and 6, T. 8 N., R. 5 and 6 W., Seward Meridian;

Thence southerly, between Rs. 5 and 6 W., approximately 1/2 mile to the corner of sections 1, 6, 7 and 12, T. 8 N., Rs. 5 and 6 W., Seward Meridian;

Thence easterly, between sections 6 and 7, 5 and 8, 4 and 9, 3 and 10, approximately 4 miles to the corner of sections 2, 3, 10 and 11, T. 8 N., R. 5 W., Seward Meridian;

Thence southerly, between sections 10 and 11, 14 and 15, 22 and 23, 26 and 27, approximately 4 miles to the corner of sections 26, 27, 34 and 35, T. 8 N., R. 5 W., Seward Meridian;

Thence westerly, between sections 27 and 34, approximately 1 mile to the corner of sections 27, 28, 33 and 34, T. 8 N., R. 5 W., Seward Meridian;

Thence southerly, between sections 33 and 34, approximately 1 mile to the corner of sections 3, 4, 33 and 34, Tps. 7 and 8 N., R. 5 W., Seward Meridian;

Thence westerly, between Tps. 7 and 8 N., approximately 1 mile to the corner of sections 4, 5, 32 and 35, Tps. 7 and 8 N., R. 5 W., Seward Meridian;

Thence southerly, between sections 4 and 5, approximately 1 mile to the corner of sections 4, 5, 8 and 9, T. 7 N., R. 5 W., Seward Meridian;

Thence westerly, between sections 5 and 8, 6 and 7, approximately 2 miles to the corner of sections 1, 6, 7 and 12, T. 7 N., Rs. 5 and 6 W., Seward Meridian;

Thence southerly, between Rs. 5 and 6 W., approximately 3 miles to the corner of sections 19, 24, 25 and 30, T. 7 N., Rs. 5 and 6 W., Seward Meridian, the place of beginning.

Mystery Creek Unit

Beginning at a point on Kenai National Wildlife Refuge boundary, at the northerly right-of-way of the Sterling Highway, in section 28, T. 5 N., R. 4 W., Seward Meridian;

Thence westerly, along the northerly right-of-way of the Sterling Highway, approximately 4,800 feet to a point on the northerly right-of-way of a powerline, located in the southwesterly portion of section 29, T. 5 N., R. 4 W., Seward Meridian;

Thence westerly, along the northerly right-of-way of a powerline, approximately 2 3/4 miles to a point on the northerly right-of-way of the Sterling Highway, located in the northerly portion of section 35, T. 5 N., R. 5 W., Seward Meridian;

Thence northwesterly, along the northerly right-of-way of the Sterling Highway, approximately 1/4 mile to the centerline of Jean Creek, near the center of section 17, T. 5 N., R. 5 W., Seward Meridian;

Thence northwesterly, along the centerline of Jean Creek and the northerly shore of Upper Jean Lake, approximately 1 mile to a point on the north shore of an unnamed lake and the north and south centerline of section 18, T. 5 N., R. 5 W., Seward Meridian;

Thence northerly, on the north and south centerline of sections 18 and 7, approximately 1 1/8 miles to the 1/4 section corner of sections 6 and 7, T. 5 N., R. 5 W., Seward Meridian;

Thence easterly, between sections 6 and 7, approximately 1/4 mile to the corner of sections 5, 6, 7 and 8, T. 5 N., R. 5 W., Seward Meridian;

Thence northerly, between sections 5 and 6, approximately 1/4 mile to the 1/4 section corner of sections 5 and 6, T. 5 N., R. 5 W., Seward Meridian;

Thence easterly, on the east and west centerlines of sections 4 and 5, approximately 2 miles to the 1/4 section corner of sections 3 and 4, T. 5 N., R. 5 W., Seward Meridian;

Thence northerly, between sections 3 and 4, 33 and 34, 27 and 28, 21 and 22, 15 and 16, 9 and 10, 3 and 4, 33 and 34, 27 and 28, approximately 8 1/2 miles to the corner of sections 21, 22, 27 and 28, T. 7 N., R. 5 W., Seward Meridian;

Thence easterly, between sections 22 and 27, 23 and 26, 24 and 25, approximately 3 miles to the corner of sections 24 and 25, T. 7 N., R. 5 W., Seward Meridian;

Thence southerly, between Rs. 4 and 5 W., approximately 200 feet to the corner of sections 19 and 30, T. 7 N., R. 4 W., Seward Meridian;

Thence easterly, between sections 19 and 30, 20 and 29, 21 and 28, approximately 2 1/8 miles to Seward Meridian;

Thence due South, approximately 13 miles to the place of beginning on Kenai National Wildlife Refuge boundary at the northerly right-of-way of the Sterling Highway, in section 28, T. 5 N., R. 4 W., Seward Meridian.

KENAI NATIONAL WILDLIFE REFUGE

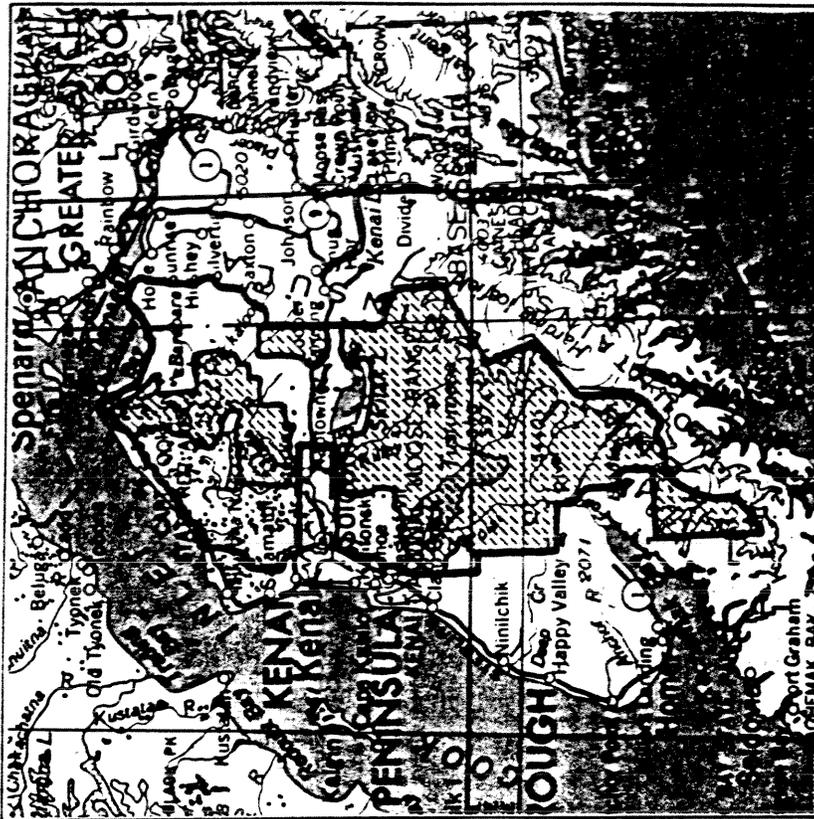
PUBLIC LAW 96-487

The following USGS quadrangle maps were used to prepare the legal description for the Kenai National Wildlife Refuge:

nr - minor revision

* - Quad depicts Wilderness boundary

Scale of Map	Name and Date
1:63,360*	Kenai (A-1) 1951 nr 1971; (A-3) 1951 nr 1969; (A-4) 1951 nr 1972; (B-1), (B-2) 1950 nr 1975; (B-3) 1950 nr 1965; (B-4) 1951 nr 1966; (C-1) 1951 nr 1978; (C-2) 1951 nr 1968; (C-3) 1951 nr 1970; (C-4) 1951 nr 1972; (D-1) 1951 nr 1967, (D-2) 1951 nr 1963; (D-3) 1951 nr 1965.
1:63,360	Tyonek (A-1) 1951 nr 1970; (A-2) 1951 nr 1973.
1:63,360*	Seward (A-6) 1951 nr 1973; (B-8) 1951 nr 1968; (C-8) 1951 nr 1976; (D-8) 1951 nr 1973.
1:63,360*	Seidovia (B-3) 1951 nr 1973; (C-1), (C-2) 1953; (C-3) 1951 nr 1973; (D-1) 1953; (D-2) 1950 nr 1963; (D-3) 1951 nr 1970.



LEGEND
REFUGE
WILDERNESS

0 25 MILES



Appendix H

Federal Master Title Plats:

T. 5 N., R. 4 W., S.M.

T. 5 N., R. 4 W., S.M. (Supplements 1 & 2, Sections 33-36)

T. 4 N., R. 4 W., S.M.

T. 3 N., R. 4 W., S.M.

T. 3 N., R. 3 W., S.M.

Appendix I

Historical Index Reports:

T. 5 N., R. 4 W., S.M.

T. 4 N., R. 4 W., S.M.

T. 3 N., R. 4 W., S.M.

T. 3 N., R. 3 W., S.M.

Historical Index Report
for
5N 4W SEWARD MER

Sec.	Aliquot Parts	Lots	Other Desc.	Acres	Kind of Entry	Doc. I.D.	Date	Remarks
M&B			Proc Wdl Chugach NF				02/23/1909	Part Blim Proc 8/2/1915, PLO 895 6/1/1953, PLO 1099 3/18/1955 & PLO 1262 12/21/1955
M&B			Proc Part Blim Proc 2/23/1909 Wdl Chugach NF				08/02/1915	OE
See Rmks			Wdl Pwr Proj	119			12/09/1920	All Lds W/I 1/4 MI of Kenal River between upper Kenal Lake & Skilak Lake; Other Tps: 3N 1E SM; Part Rev 5/10/1934; Rest BLM O 4 3/28/1954; OE PLO 2203 9/15/1960; Removed PERC 10/31/1985
HES 180		120.870	HE Apln		A 05502		01/11/1923	Canc 1/16/1936
See Rmks			Part Rev Pwr Proj 119 12/9/1920				05/10/1934	All except Lds along Kenal River to the mouth of Russian River between mean low wa stage & an elevation 6 ft above mean low wa stage; Other Tps: 3N 1E SM
M&B: 1N 3W SM			EO Wdl Kenal N Moose Range	8979			12/16/1941	See SO 7/24/1958; Adjusted PLO 3400 5/22/1964
See Rmks			Wdl Pwr Site CI	409			06/29/1950	All Lds W/I 1/4 MI of Kenal River from mouth of Russian River up stream to present bridge across Kenal River at Coopers Landing; Other Tps: 5N 3W SM; Rest BLM O 4. 3/26/1954
M&B: 3N 1W SM			PLO Wdl Adm S & Rec Area	829			05/16/1952	
See Rmks		4.300	PLO Part Blim Proc 2/23/1909 Wdl Chugach NF	895			06/01/1953	For USG 3017 Homestead 125; Other Tps: 3N 1E SM; See Pat 1148593 12/23/1954
M&B: 3N 1E SM			BLM O Rest Pwr Proj 119 12/9/1920 & Pwr S CI 409 6/29/1950	4			03/26/1954	OE Subj to Sec 24 FPA

SN 4W SEWARD MER

Sec.	Allotment Parts	Lots	Other Desc.	Acres	Kind of Entry	Doc. I.D.	Date	Remarks
			USS 3037	4.300	Homestead Pat	1148593	12/23/1954	See A 024544
			M&B	2.520	PLO Part Elim Proc 2/23/1909 Wdl Chugach NF	1099	03/18/1955	See Pat 1179674 2/19/1958
			See Rmks	10.530	PLO Part Elim Proc 2/23/1909 Wdl Chugach NF	1262	12/21/1955	Homesteads & T&M S; USS 3392; Other Tp: 4N 1W SM; See Pat 1186403 9/19/1958; See Pat 1206919 3/18/1960
			M&B		Pwr Proj Wdl	2170	05/27/1957	Eff 5/1/1957; Exp 5/1/2007; See AA 39417
			USS 3388	2.500	Homestead Pat	1179674	02/19/1958	See A 030487
			See Rmks		50 Kenai N Moose R closed to OG Use		07/24/1958	That portion in Moose Range S of relocated Sterling Hwy; Other Tp: 1N 3W SM
			USS 3393	5.070	Homestead Pat	1186403	09/19/1958	See A 033074
			M&B	1.280.000	OG Use	A 045369	11/01/1959	Term 10/31/1963; 5m List
			USS 3392	5.730	T&M Pat	1206919	03/18/1960	See A 033136
			M&B		PLO Opening Wdl Pwr Proj 119 12/9/1920 to entry	2203	09/15/1960	Subj to Sec 24 FPA & Chugach NF Stipulations Amend PLO 2311 3/24/1961
			M&B		PLO Adjustm EO 8979 12/16/1941 Wdl Kenai N Moose R	3400	05/22/1964	Mod PL 96.487 12/2/1980
13	SESW, SWSB				Wdl ApIn FS	AA 3060	07/24/1968	
24	W2NE, E2NW, N2SW, NWSE		R2		Wdl ApIn FS	AA 3060	07/24/1968	
33					Wdl ApIn FS	AA 3060	07/24/1968	Frac N2 between Kenai River on North & Russian River on South; NESE lying East of Russian River
34			3N 3W SM		Wdl ApIn FS	AA 3060	07/24/1968	Part of SWNE, NW, N2SWNWSE lying South of Kenai River & East of Russian River; See Wdl PLO 6884 10/2/1991; See Wdl PLO 6888 10/8/1991

Aliquot Parts	Lots	Other Desc.	Acres	Kind of Entry	Doc. I. D.	Date	Remarks
		M&B; 7N1E SM		Wdl Apln Dept Agri	AA 5934	06/24/1970	See Wdl PLO 6884 10/2/1991
		M&B; 5N 3W SM		R/W 44 LD 513 FS	AA 8359	04/20/1973	Closed 6/3/1983
		M&B		SS CG Apln (NF 52)	AA 17584	07/03/1978	Amdt Desc 9/5/1980; Amdt Desc 10/7/1980
		M&B; See Rmks		Wdl Apln USFS	AA 23139	11/28/1978	Other Tps; Term 12/2/1980
		M&B; See Rmks		PL Enlgmt PLO 3400	96-487	12/02/1980	Other Tps; See PL 96-487
				5/22/1964 Wdl Kenai N Moose Range; Des Kenai NMR & Wdms			
		M&B		Wdl Pwr Proj	8756	12/03/1984	See AA 54967
		M&B	952.000	SS Apln (NFCG 256)	AA 69987	02/07/1989	
		M&B; See Rmks	1.270.000	SS CG Apln (NF 275)	AA 71615	09/20/1989	Other Tp; 5N 3W SM
33		See Rmks		Wdl NF System Lds for 6884 Kenai River Rec Area, Russian River Cpg Area, Lower Russian Lake Rec Area		10/02/1991	Frac part of N2 between Kenai River N & Russian River S. NESE lying E of Russian River. Frac parts of SESE lying E of Russian River
34		See Rmks; 4N 4W SM	1.855.000	Wdl NF System Lds for 6884 Kenai River Rec Area, Russian River Cpg Area, Lower Russian Lake Rec Area		10/02/1991	That part of SWNE, NW, N2SW, NWSE lying S of Kenai River & E of Russian River. S2S2 & Frac parts of NESE & SENE lying S of Kenai River; Exp 10/2/2011; See AA 5964, AA 5934 & AA 3060
13	SESW, SWSE			Wdl NF System Ld for 6888 Juneau Falls Rec Area		10/02/1991	
24	W2NE, E2NW, NESW, NWSE		320.000	Wdl NF System Ld for 6888 Juneau Falls Rec Area		10/02/1991	Exp 10/8/2011; See AA 3060

Historical Index Report
for
4N 4W BEWARD MEP

Sec.	Aliquot Parts	Lots	Other Desc.	Acres	Kind of Entry	Doc. I.D.	Date	Remarks
			M&B		Proc Wdl Chugach NF		02/23/1909	Part Elim Proc 8/2/1915
			M&B		Proc Part Elim Proc 2/23/1909 Wdl Chugach NF		08/02/1915	OE
			M&B; 1N 1W SM		EO Wdl Kenai Natl Moose R	8979	12/16/1941	See SO 7/24/1958; Adjust PLO 3400 5/22/1964
			M&B		Wdl Pwr Proj	2170	05/27/1957	Eff 5/1/1957; Exp 5/1/2007; See AA 39417
			M&B; 1N 1W SM		SO closes EO 8979 12/16/1941 Wdl Kenai Natl Moose R to OG Leasing		07/24/1958	
			M&B		PLO Adjust EO 8979 12/16/1941 Wdl Kenai Natl Moose R	3400	05/22/1964	Mod PL 96-487 12/2/1980
			M&B; 5N 4W SM	1.165.000	Wdl Apln Dept of AgrIAA	5934	04/15/1970	See Wdl PLC 6884 10/2/1991
			M&B; See Rmks		Wdl Apln USFS	AA 23139	11/28/1978	Other Tps: See AA 21139; Term 12/2/1980
			M&B; See Rmks		PL Enight PLO 3400 5/22/1964 Wdl Kenai Natl Moose R, Des Kenai NWR & Wdms	96-487	12/02/1980	Other Tps: See PL 96-487
3	W2W2				Wdl NF System Lds Kenai River Rec Area, Russian River Cpg Area, Lower Russian Lake Rec Area	6884	10/02/1991	
4	E2E2, SWSSE		See Rmks		Wdl NF System Lds Kenai River Rec Area, Russian River Cpg Area, Lower Russian Lake Rec Area	6884	10/02/1991	Frac parts of W2NE, NWSE, & E2SW lying E of Russian River
9	NENE, W2NE, NWSE		See Rmks		Wdl NF System Lds Kenai River Rec Area, Russian River Cpg Area, Lower Russian Lake Rec Area	6884	10/02/1991	Frac parts of E2NW & N2SW lying E of Russian River & Frac parts of SWSSE, S2SW lying E of Lower Russian Lake

Sec.	Alliquot Parts	Acres	Other Desc.	Kind of Entry	Doc.I.D.	Date	Remarks
10	NWNW			Wd1 NF System Lds Kenai River Rec Area, Russian River Cpg Area, Lower Russian Lake Rec Area	6884	10/02/1991	
16	SESW		See Rmks	Wd1 NF System Lds Kenai River Rec Area, Russian River Cpg Area, Lower Russian Lake Rec Area	6884	10/02/1991	Frac parts of NESW, W2NW, SESW & W2SW lying E of Lower Russian Lake
21	NENW	5N 4W 1,855,000	See Rmks; SM	Wd1 NF System Lds Kenai River Rec Area, Russian River Cpg Area, Lower Russian Lake Rec Area	6884	10/02/1991	Frac part of NWNW lying E of Lower Russian Lake & Russian River; Exp 10/2/2011; See AA 5964, AA 5934 & AA 3060

4N 4W SEWARD MER

Historical Index Report

JW 4W SEWARD MER

Sec.	Aliquot Parts	Lots	Other Desc.	Acres	Kind of Entry	Doc.	I.D.	Date	Remarks
	ENTIRE TOWNSHIP				Proc Wdl Chugach NF	852		02/23/1909	Part Elim Proc 13078/2/1915
	ENTIRE TOWNSHIP				EO Part Elim Proc 8521307 NF			08/02/1915	OE
			M&B: 1N JW SH		EO Wdl Kenai Natl Moose R	8979		12/16/1941	See SO 7/24/1958 Adjusts Wdl PLU 3400 5/22/1980
			USS 2631	6.370	HE Pat	1125928		05/20/1949	See A 010292
			M&B: 1N JW SH		SO Closed EO 8979 12/16/1941 Wdl Kenai Natl Moose R to GC Leasing			07/24/1958	
			M&B		PLU Adjusts EO 8979 12/16/1941 Wdl Kenai Natl Moose R	3400		05/22/1964	Enight PL 96-487 12/2/1980
			M&B: Apln USFS		Wdl Apln USFS	AA 23139		11/28/1978	Other Tps: See AA 23139; Term 12/2/1980
			M&B: See Rmks		PL Enight PLU 3400 5/22/1980 Wdl Kenai Natl Moose R; Eath Kenai NNR; Des Kenai Wdha	96 487		12/02/1980	Other Tps: See PL 96-487

Historical Index Report
for
3N 3W SEWARD MER

Sec.	Aliquot Parts	Lots	Other Desc.	Acres	Kind of Entry	Doc. I.D.	Date	Remarks
			M&B		Proc Wdl Chugach NF		02/23/1909	Part Elim Proc 8/2/1915
			M&B		Proc Part Elim Proc 2/23/1909 Wdl Chugach NF		08/02/1915	OE
			M&B		EO Wdl Kenai Natl Moose R	8979	12/16/1941	See SO 7/24/1958; Adjusted PLO 3400 5/22/1964
			See Rmks		Wdl Pwr S Cl	403	03/29/1950	All Ld adjacent to Resurrection River and tributaries below 500' elevation
			M&B		Wdl Pwr Proj	2170	05/27/1957	Bff 5/1/1957 Exp 5/1/2007 See AA 39417
			M&B; IN 3W SM		SO Closing Kenai Natl Moose R to OG Leasing		07/24/1958	
			M&B		PLO Admst- IO 8979 12/16/1941 Wdl Kenai Natl Moose R	3400	05/22/1964	Mod PL 96-487 12/2/1980
01			Frac: Excl E2E2		Wdl Apln USFS	AA 3060	07/24/1968	
12	MWNB, N2NW		Frac: See Rmks		Wdl Apln USFS	AA 3060	07/24/1968	Other Tps: 4N 3W, 5N 4W SM; Term Lds W/I SS AA 71617 per Ltr 12/27/1991; Wdl PLO 7075 8/4/1994
			M&B; See Rmks		PLO Wdl Public Purp	5653	11/16/1978	Other Tps: See PLO 5653 (Kenai Fjords); Amdt PLO 5654 11/17/1978; Resc by PL 96-487 12/1/1980
			M&B; See Rmks		PLO Amdt PLO 5653 11/16/1978 Wdl Public Purp	5654	11/17/1978	Other Tps: See PLO 5654; Resc by PL 96-487 12/2/1980
			M&B; See Rmks		Wdl Apln (USFS)	AA 23139	11/28/1978	Other Tps: See AA 23139; Term 12/2/1980
			M&B; See Rmks		Proc Wdl Kenai Fjords N Mon	4620	12/01/1978	Other Tps: See Proc 4620; Resc by PL 96-487 12/2/1980
			M&B; See Rmks		PL Resc PLO 5653 11/16/1978, PLO 5654	96-487	12/02/1980	

JN 3W SEWARD MER

Sec.	Aliquot Parts	Lots	Other Desc.	Acres	Kind of Entry	Doc.I.D.	Date	Remarks
1	N2, N2S2			3,980.000	SS C3 Apln (NF 277)	AA 71617	09/20/1989	Other Tps; 3,4N 2W, 4N 3W SM; See SS TA 12/4/1992
1	S2SW, SWSE			262.000	SS CG TA (NF 277)	AA 71617	12/04/1992	Other Tps; 3,4N 2W, 4N 3W SM; See SS Pat 50-96-0050 11/7/1995
12	NMNE, N2NW			175.000	Wdl NP System Id. Protect Cooper Lake Rec Area	7075	08/04/1994	See AA 3060
1	E2NE, NE9E	1 4		249.710	SS Pat	50 96-0050	11/07/1995	Other Tps; 3,4N 2W, 4N 3W SM; See AA 71617
					11/17/1978 Wdl Public Purp, Proc 4620 12/1/1978 Wdl Kenai Fjords N Mon; Estb Kenai Fjord NP; PL Enlgmt PLO 1400 5/22/1964			
					Wdl Kenai Natl Moose R; Estb Kenai NMR; Des Kenai Wdms	96-487	12/02/1980	Other Tps; See PL 96-487

Appendix J

U.S. Survey No. 3037, Alaska. Field Notes (1951) and Plat (1952).

ORIGINAL

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT



206

FIELD NOTES

OF

U. S. SURVEY NO. 3037

AND

THE SURVEY OF A PORTION OF THE CHUGACH NATIONAL FOREST BOUNDARY

AT KENAI RIVER

IN

Latitude 60° 22' 42" N.
(observed)

Longitude 150° 00' 00" W.
(approx)

at Address Number Cor. No. 1, Chugach National Forest Boundary

Of the _____ Meridian.

In the ~~STATE~~ TERRITORY OF ALASKA

EXECUTED BY

HAROLD RADCLIFFE, CADASTRAL ENGINEER

Under special instructions dated August 11, 1950, which provided
for the surveys included under ^{Survey} ~~Contract~~ No. 3037, approved August 23, 1950,
and assignment instructions dated July 25, 1950.

Survey commenced September 6, 1951.

Survey completed September 10, 1951.

U. S. SURVEY NO. 3037

Survey commenced September 6, 1951 and executed with a W. and L. E. Orley transit No. 262641. The horizontal plates read by double opposite verniers to single minutes of arc, which is also the least count of the vernier of the vertical circle. After satisfactory tests, the instrument was found free from appreciable error. Prior to beginning the survey I examine all the adjustments of the transit and find them correct.

All measurements are made with a 5 chain steel tape, graduated to single links throughout. The tape was tested on a base laid out with a 60-foot standard steel tape and found correct. All measurements are made on the slope and the vertical angle for each interval determined with the transit circle; the horizontal equivalents are entered in the field note record.

On September 11, 1951 near witness meander cor. No. 1, Chugach National Forest Boundary, I take a series of altitude observations upon the sun for azimuth, each with the telescope in direct and reverse positions, observing opposite limbs of the sun and deflecting horizontal angles right to the sun in latitude $60^{\circ}29'41''$ N., longitude $150^{\circ}00'00''$ W. (approx)

Observation	Inst.	Vertical Angle	Horizontal Angle	Time 150° Mer
1	D	$24^{\circ}26'00''$	$129^{\circ}16'00''$	8:54 a.m.
3	R	$24^{\circ}27'00''$	$130^{\circ}07'00''$	8:59 a.m.
	Mean	$24^{\circ}26'30''$	$129^{\circ}41'30''$	8:56:30 a.m.
2	D	$24^{\circ}30'00''$	$129^{\circ}26'00''$	
7	R	$24^{\circ}23'00''$	$129^{\circ}46'00''$	
	Mean	$24^{\circ}26'30''$	$129^{\circ}41'00''$	
3	D	$24^{\circ}33'00''$	$129^{\circ}39'00''$	
6	R	$24^{\circ}20'00''$	$129^{\circ}47'00''$	
	Mean	$24^{\circ}26'30''$	$129^{\circ}43'00''$	
4	D	$24^{\circ}38'00''$	$129^{\circ}50'00''$	
5	R	$24^{\circ}24'00''$	$129^{\circ}32'00''$	
	Mean	$24^{\circ}26'00''$	$129^{\circ}41'00''$	

Course to mark 1st observation N. $1918^{\circ}51''$ W.
 Course to mark 2nd observation N. $1918^{\circ}21''$ W.
 Course to mark 3rd observation N. $1920^{\circ}21''$ W.
 Course to mark 4th observation N. $1917^{\circ}00''$ W.

Mean of 4 observations N. $1918^{\circ}38''$ W.
 Mean of 4 observations of p.m. observations, J. $1917^{\circ}00''$ W.
 Mean of 4 observations of a.m. and p.m., N. $1917^{\circ}49''$ W.

All lines are deflected from the true meridian and carried by fore and back sights.

The magnetic declination is 26° E.

SURVEY OF A PORTION OF THE CHUGACH NATIONAL FOREST BOUNDARY AT KENAI RIVER

Begin at true point for meander cor. No. 1, at line of mean high water on the north bank of the Kenai River, about 3.00 chs. due north of the confluence of the thread of the Russian and Kenai Rivers.

U. S. SURVEY NO. 3037

Chains

0.25

Intersect a spruce post, 6 ins. diam., 6 ft. above the ground, with East side biased and mtd. 4 P.S.S. which has been previously set by the U. S. Forest Service to mark the west boundary of the Chugach National Forest. I remove original spruce post and set an iron post 28 ins. long, 2 1/2 ins. diam., flush with ground with brass cap mtd.

W C

C 2 F

C 1

M C

From which

A spruce, 8 ins. diam., bears N. 33° E., 0.22 chs. dist., mtd.
WC C2 F C1 MC BT

A spruce, 6 ins. diam., bears N. 80° W., 0.53 chs. dist., mtd.
WC C2 F C1 MC BT

Deposit 1 pint brown whiskey bottle and 1 quart green whiskey bottle broken beneath post as a memorial.

Over nearly level ground through cottonwoods, birch and spruce timber.

2.10

Truck trail, bears N. 33° E. and S. 33° W.

10.866

Center line of Starling Highway Survey Relocation

13.750

Base of steep South slope

Ascend over S. slope through small birch, aspen and willow second growth

16.451

Center line of existing road curving from S.W. to N. 85° E.

17.503

Point selected for a witness point

Set an iron post, 28 ins. long, 2 1/2 ins. diam., flush with the ground, with brass cap mtd.

W P

C 2 F

1951

From which

A spruce, 8 ins. diam., bears S. 20° E., 0.16 chs. dist., mtd.
WP C2 F BT

A spruce, 10 ins. diam., bears N. 29° E., 0.145 chs. dist., mtd.
WP C2 F BT

A mound of stone, 3 ft. base, 18 ins. high, bears WEST 6 ft. dist.

Deposit 1 pint clear glass whiskey bottle and 1 pint brown glass beer bottle broken beneath post as a memorial.

U. S. SURVEY NO. 3037

Begin at point for cor. No. 1, on the southerly side of the Starling Highway and offset 0.738 chs. from the survey relocation center line

U. S. SURVEY NO. 3037

Chains

Set an iron post, 28 ins. long, 2 1/2 ins. diam., flush with the ground with brass cap mtd.

S 3037
C 1

1951

From which

A spruce, 12 ins. diam., bears S. 7°30' W., 0.37 chs. dist., mtd.
S 3037 C1 BT

A spruce, 6 ins. diam., bears S. 17°15' E., 0.31 chs. dist., mtd.
S 3037 C1 BT

U. S. Location Monument No. 180. A large boulder in the Kenai River, exposed about 4 ins. above water and 50 ft. from shore at the time of this survey, definite markings are visible, but not legible, bears S. 75°22'38" E., 152.97 chs. dist.

Deposit 2 pint brown glass bottles, broken, beneath post as a memorial.

S. 1° 16' E.

Over nearly level ground through alder and willow undergrowth

0.438

Point selected for witness meander cor. No. 2

Set an iron post, 28 ins. long, 2 1/2 ins. diam., flush with the ground, with brass cap mtd.

W C
S 3037
C 2

M C

1951

From which

A spruce, 12 ins. diam., bears N. 35°45' W., 0.085 chs. dist., mtd.
WC S3037 C2 MC BT

A spruce, 10 ins. diam., bears N. 60°30' E., 0.28 chs. dist., mtd.
WC S3037 C2 MC BT

Deposit 2 pint brown bottles broken beneath post as a memorial.

0.538

Point for meander cor. No. 2, unsafe place for monument due to liability to destruction by ice.

Thence with bearers along the right bank of the Kenai River at line of mean high water.

S. 71° 42' W., 3.379 chs. To meander point No. 1

S. 78° 17' W., 1.887 chs. To meander point No. 2

S. 81° 20' W., 4.369 chs. To meander cor. No. 3, unsafe place for monument due to liability to destruction by ice.

S. 88° 42' W.

0.10

Point selected for witness meander Cor. No. 3

Set an iron post, 23 ins. long, 2 1/2 ins. diam., flush with the ground, with brass cap mkd.

U C
 S 3037
 C 3

 A C
 1951

From which

A cottonwood, 24 ins. diam., bears N. 58°30' E., 0.17 chs. dist. mkd. MC 53037 C3 MC ET

A birch, 10 ins. diam., bears N. 60°25' W., 1.03 chs. dist. mkd. MC 53037 C3 MC ET

Deposit 2 pint brown glass bottles, broken, beneath post as a memorial.

Over nearly level ground, through scattered birch, spruce and cottonwood timber.

4.878 Point for Cor. No. 4, 1.00 ch. EAST of Chugach National Forest Boundary

Set an iron post, 23 ins. long, 2 1/2 ins. diam., flush with the ground, with brass cap mkd.

S 3037
 C 4
 1951

From which

A birch, 6 ins. diam., bears N. 5° W., 0.33 chs. dist., mkd. S 3037 C4 ET

A spruce, 10 ins. diam., bears N. 51° E., 0.31 chs. dist., mkd. S 3037 C4 ET

Deposit 2 quart brown glass bottles, broken, beneath post as a memorial

NORTH

Over nearly level ground through scattered spruce, birch and cottonwood timber

3.920 Point for Cor. No. 5, 1.00 ch. EAST of Chugach National Forest Boundary and offset 0.758 chs. from the survey relocation center line, on the southerly side of the Sterling Highway

Set an iron post, 23 ins. long, 2 1/2 ins. diam., flush with the ground, with brass cap mkd.

S 3037
 C 5
 1951

Chains

from which

A spruce, 4 ins. diam., bears S. 11° E., 0.53 chs. dist., mkd. S 3037 C5 ET

A spruce, 3 ins. diam., bears S. 16° W., 0.55 chs. dist. mkd. S 3037 C5 ET

Deposit 2 pint brown glass bottles, broken, beneath post as a memorial.

S. 89° 34' E.

Over nearly level ground through spruce and scattered birch timber along southerly side of Sterling Highway relocation R.O.W.

4.450 Point for Cor. No. 6, offset 0.758 from highway survey relocation center line

Set an iron post, 23 ins. long, 2 1/2 ins. diam., flush with the ground, with brass cap mkd.

S 3037
 C 6
 1951

from which

A spruce, 8 ins. diam., bears N. 89°30' W., 0.55 chs. dist. mkd. S 3037 C6 ET

An aspen, 10 ins. diam., bears S. 29°30' W., 0.455 chs. dist., mkd. S 3037 C6 ET

Deposit 2 clear glass coca cola bottles, broken, beneath post as a memorial.

S. 83° 23' E.

Over nearly level cleared ground, along southerly side of highway survey relocation center line R.O.W.

9.859 Cor. No. 1, place of beginning, containing 4.30 acres.

ADDITIONAL MEANDERS

From meander Cor. No. 2

N. 85° -E. 10.00 chs.

From meander Cor. No. 3

S. 43°03' W., 8.668 chs. At end of course, true point for meander Cor. No. 1, WEST Boundary of Chugach National Forest

IMPROVEMENTS

From meander point No. 2

3/4 cor. cabin, 12 x 14 ft., bears N. 21° E., 0.31 chs. dist. long side extend N.

314
CERTIFICATE OF CADASTRAL ENGINEER

I, Harold Radcliffe, HEREBY CERTIFY upon honor that, in
pursuance of special instructions bearing date of the 11th day of August, 1950,
I have surveyed U. S. Survey No. 3037 and the survey of a portion of the Chugach
National Forest Boundary at Kenai River

of the _____ Meridian, in the State of Alaska, which are
represented in the foregoing field notes as having been executed by me and under my direction; and that
said survey has been made in strict conformity with said instructions, the Manual of Instructions for the
Survey of the Public Lands of the United States, and in the specific manner described in the foregoing
field notes.

Jensen, Alaska

April 3, 1952

Harold Radcliffe
Harold Radcliffe
Cadastral Engineer

CERTIFICATE OF APPROVAL

BUREAU OF LAND MANAGEMENT,

Washington, D. C., JUL 15 1952, 1952

The foregoing field notes of the survey of U. S. Survey No. 3037 and the survey of a
portion of the Chugach National Forest Boundary at Kenai River

executed by Harold Radcliffe, Cadastral Engineer

having been critically examined and found correct, are hereby approved.

William F. Roberts
William F. Roberts
Chief, Division of Cadastral Engineering

CERTIFICATE OF TRANSCRIPT

I CERTIFY that the foregoing transcript of the field notes of the above-described surveys in Alaska
is a true copy of the original field notes.

Chief, Division of Cadastral Engineering

ORIGINAL

U. S. SURVEY
No. 3037, ALASKA

And

The survey of a portion of
the west boundary of the
Chugach National Forest at
Kenai River

Area: 4.30 Acres

Latitude 60°29'41" N., Longitude 150°00'00" W.,
(Observed) (Approximate)

At Witness Meander Corner
No. 1 Chugach National Forest



Surveyed By
Harold Madcliffe, Cadastral Engineer
September 6 to 10, 1951

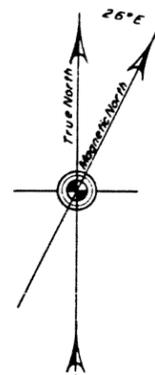
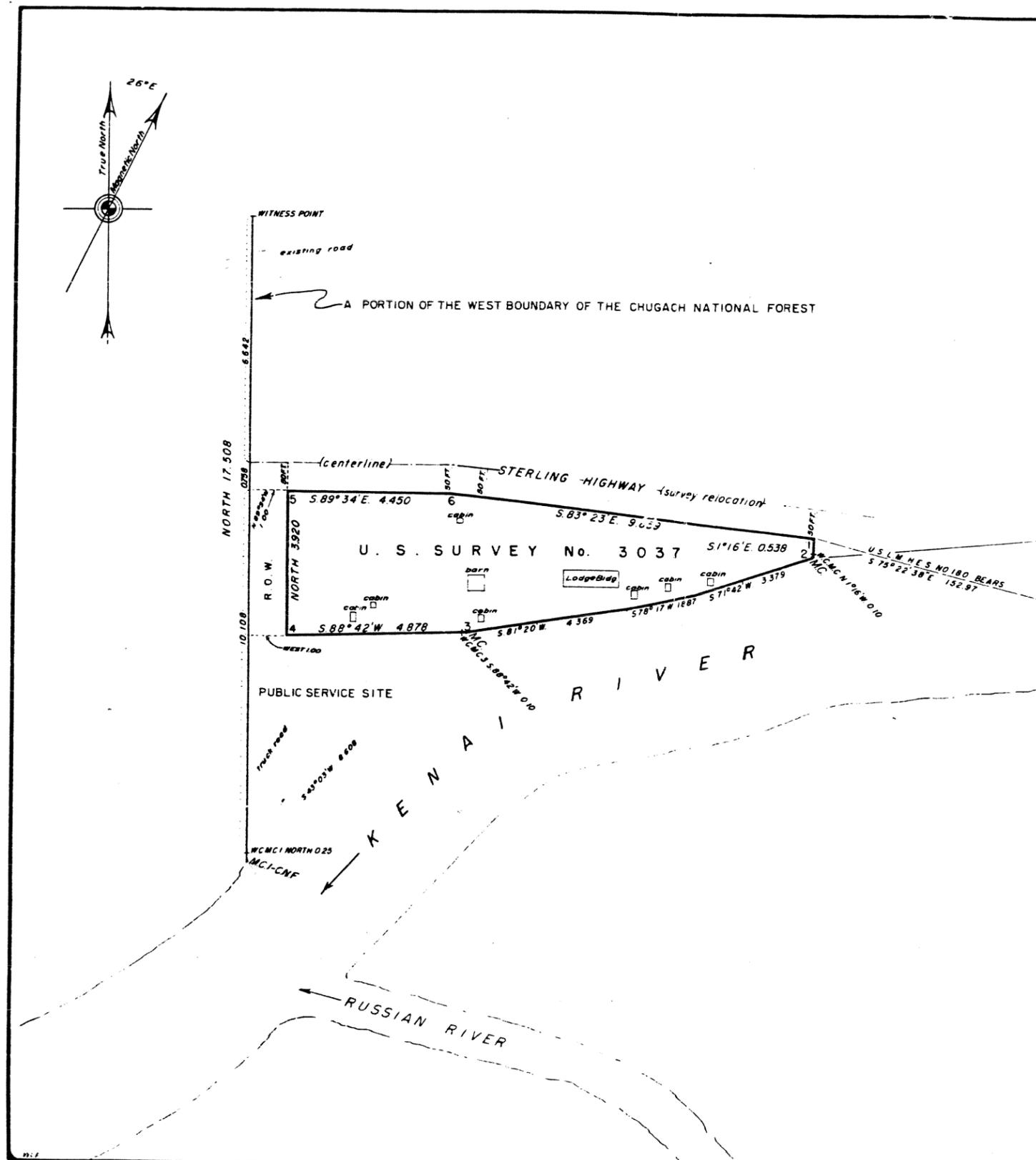
Under Special Instructions Dated
August 11, 1950 and Approved
August 23, 1950.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
Washington, D. C., July 16, 1952

This plat is strictly conformable to the approved
field notes, and the survey, having been correctly
executed in accordance with the requirements of law
and the regulations of this Bureau, is hereby
accepted.

For the Director

Chief, Branch of Surveys



Appendix K

Alaska Statutes, Title 9. Code of Civil Procedure.

Sec. 09.25.040 Rules for construing real estate descriptions.

Sec. 09.45.020 Action to establish boundaries.

Sec. 09.45.030 Marking of boundaries.

Alaska Statutes

Title 9. Code of Civil Procedure.

- Chapter**
- Jurisdiction (§§ 09.05.010 — 09.05.050)
 - Limitations of Actions (§§ 09.10.010 — 09.10.240)
 - Parties (§§ 09.15.010 — 09.15.040)
 - Civil Damages and Apportionment of Fault (§§ 09.17.010 — 09.17.900)
 - Trial (§§ 09.20.010 — 09.20.180)
 - Evidence, Presumptions, Public Records, and Privileges (§§ 09.25.010 — 09.25.400)
 - Judgments (§§ 09.30.010 — 09.30.310)
 - Execution (§§ 09.35.010 — 09.35.330)
 - Alaska Exemptions Act (§§ 09.38.010 — 09.38.510)
 - Provisional Remedies (§§ 09.40.010 — 09.40.310)
 - Arbitration (§§ 09.43.010 — 09.43.220)
 - Actions Relating to Real Property (§§ 09.45.010 — 09.45.940)
 - Actions Where State a Party (§§ 09.50.010 — 09.50.390)
 - Special Actions and Proceedings (§§ 09.55.010 — 09.55.650)
 - Costs and Attorney Fees (§§ 09.60.010 — 09.60.070)
 - Oath, Acknowledgment, and Other Proof (§§ 09.63.010 — 09.63.130)
 - Actions, Immunities, Defenses, and Duties (§§ 09.65.070 — 09.65.230)
 - Miscellaneous Provisions (§§ 09.68.020 — 09.68.120)
 - General Provisions (§§ 09.70.010, 09.70.020)

Revisor's notes. — The provisions of this title were redrafted in 1983 to remove personal pronouns pursuant to § 4, ch. 58, SLA 1982 and in 1983 and 1994 to make other minor word changes under AS 09.031.

Editor's notes. — For a review of the sources of some of Alaska law, see Brown, *The Sources of the Alaska and Oregon Codes* (pts. 1 and 2), 2 UCLA-Alaska L. Rev. 15, 87 (1972-1973).

NOTES TO DECISIONS

Cited in *Flores v. Flores*, 598 P.2d 893 (Alaska 1979).

ment that an agent's authority is terminated where an interest in land is conveyed. Paragraph (4) of this section applies to bodies an admission. *Fleckenstein v. Faccio*, 619 P.2d 1016 (Alaska 1980).

A wife's judicial admission that her husband had authority to sell real property constituted an exception to the statutory requirement that an admission be in writing where an interest in land is being conveyed. *Fleckenstein v. Faccio*, 619 P.2d 1016 (Alaska 1980).

Applied in *Pavek v. Curran*, 1125 (Alaska 1988).

Quoted in *Gray v. Field*, 3 Alaska 1968; *Howarth v. Bank*, 540 P.2d 486 (Alaska 1976); *v. Jefferson*, 550 P.2d 813 (Alaska 1977); *Carter v. Hoblit*, 755 P.2d 1125 (Alaska 1988).

Stated in *Schachle v. Ray*, 3 Alaska 165 (Alaska 1968).

Cited in *Mertz v. J.M. Coville*, 70 P.2d 532 (Alaska 1970); *Morey*, 541 P.2d 740 (Alaska 1977); *Valkama v. Harris*, 575 P.2d 788 (Alaska 1978).

regards terms and conditions. ALR2d 621.

What constitutes part performance sufficient to take agreement in contemplation of marriage out of statute of frauds. ALR2d 1419.

Promissory estoppel, 48 ALR2d 1125.

Novation through creditor's release of obligation of third person as to contract or law, 61 ALR2d 755.

Exceptions to rule that oral contracts are unenforceable under statute of frauds. ALR3d 1294.

as to credit, skill, or character of party.

admissible to charge party with knowledge of skill, or character of party.

some memorandum of agreement, or the handwriting of the party.

2)

§ 09.25.040

Reviser's notes. — In 1994, "Evidence is" to conform the section to the current style of the Alaska Statutes.

Sec. 09.25.040. Rules for construing real estate descriptions.

The following are the rules for construing the descriptive part of a conveyance of real property when the construction is doubtful and there are no other sufficient circumstances to determine it:

(1) where there are certain definite and ascertained particulars in the description, the addition of others which are indefinite, unknown, or false does not frustrate the conveyance, but it is to be construed by those particulars if they constitute a sufficient description to ascertain its application;

(2) when permanent and visible or ascertained boundaries or monuments are inconsistent with the measurement, either of lines, angles, or surfaces, the boundaries or monuments are paramount;

(3) between different measurements which are inconsistent with each other, that of angles is paramount to that of surfaces, and that of lines paramount to both;

(4) when a road or stream of water not navigable is the boundary, the rights of the grantor to the middle of the road or the thread of the stream are included in the conveyance, except where the road or bed of the stream is held under another title;

(5) when tidewater is the boundary, the rights of the grantor to low-water mark are included in the conveyance;

(6) when the description refers to a map and that reference is inconsistent with other particulars, it controls them if it appears that the parties acted with reference to the map; otherwise the map is subordinate to other definite and ascertained particulars. (§ 3.14 ch 101 SLA 1962)

NOTES TO DECISIONS

Construction generally. — A deed must be construed according to its legal construction, effect, and operation apparent on its face, or with the aid of any such evidence as is admissible by the rules of law to explain it. *Valdez Bank v. Von Gunther*, 3 Alaska 657 (1909).

Surrounding circumstances. — For the sole purpose of finding and executing the real intention of the parties, the court will place itself, as nearly as possible, in the position of the parties when the deed was executed, and consider all the surrounding circumstances, the situation of the parties and the property, and in fact, all sources of information naturally suggested by the description of the property in the conveyance, or which may have acted upon the minds of the parties.

Valdez Bank v. Von Gunther, 3 Alaska 657 (1909).

The object in construing a deed is to ascertain the intention of the parties, and especially that of the grantor. *Valdez Bank v. Von Gunther*, 3 Alaska 657 (1909).

Intent must be effectuated if possible. — Deeds must be so construed as to effectuate, if possible, the intention of the parties, unless such intention be inconsistent with settled rules of law regarding the subject matter in the case, or unless the terms of the deed itself — the expressions used therein — positively forbid or make it impossible to effectuate the real intentions of the parties. *Valdez Bank v. Von Gunther*, 3 Alaska 657 (1909).

Description most favorable to

grantee prevails. — In construing a deed where two descriptions appear, the one most favorable to the grantee will prevail. Valdez Bank v. Von Gunther, 3 Alaska 657 (1909).

Metes and bounds prevail over erroneous statement of acreage. — When a deed describes the land by metes and bounds and makes an erroneous statement as to the acreage involved, the deed conveys the land as described by metes and bounds and in disregard of the alleged acreage. Seltenreich v. Fairbanks, 13 Alaska 582, 103 F. Supp. 319 (D. Alaska 1952), aff'd, 14 Alaska 568, 211 F.2d 83 (9th Cir.), cert. denied, 15 Alaska 272, 348 U.S. 887, 75 S. Ct. 206, 99 L. Ed. 697 (1954).

Stakes and monuments prevail over courses and distances in location notice. — A placer location will not be void for a discrepancy between the courses and distances mentioned in the notice and the stakes and monuments set by the locator to mark the boundaries of his claim; where there is such a conflict, the stakes and monuments must prevail, if they are sufficient to identify the claim. Price v. McIntosh, 1 Alaska 286 (9th Cir. 1903), aff'd, 121 F. 716 (9th Cir. 1903).

Section applies to location notices. — While a location notice is not a conveyance in the strict sense, yet it is the foundation of a conveyance from the government, and the rules contained in subsections (1) and (2) of this section may be adopted in construing it. Steen v. Wild Goose Mining Co., 1 Alaska 255 (1901).

Courts of law have no power to reform a deed. Valdez Bank v. Von Gunther, 3 Alaska 657 (1909).

Deeds may be reformed in equity. — Courts of equity will reform deeds made to carry into effect contracts and agreements, according to their original intentions, notwithstanding any defect in the execution of the instrument adopted. Valdez Bank v. Von Gunther, 3 Alaska 657 (1909). See also Straight v. Hill, 622 P.2d 425 (Alaska 1981).

Deeds may not be reformed to correct mutual mistakes of law. — When a deed has been deliberately executed by the parties under a mistaken opinion of both as to its legal effect, a court of equity will not reform it, though it fails to effectuate their intention. Valdez Bank v. Von Gunther, 3 Alaska 657 (1909).

Stated in Bentley Family Trust v. Lynn Enters., Inc., 658 P.2d 761 (Alaska 1983).

Sec. 09.25.050. [Renumbered as AS 09.45.052.]

Sec. 09.25.060. Fraud presumed from retention of possession. Every sale or assignment of personal property unless accompanied by the immediate delivery and the actual and continued change of possession of the thing sold or assigned is presumed prima facie to be a fraud against the creditors of the vendor or assignor, and subsequent purchasers in good faith and for a valuable consideration during the time the property remains in the possession of the vendor or assignor, except that retention of possession in good faith and current course of trade by a merchant seller for a commercially reasonable time after a sale or identification is not fraudulent, and nothing contained in this section shall supersede the provisions of AS 45.01 — AS 45.09, AS 45.12, and AS 45.14 (Uniform Commercial Code). (§ 3.16 ch 101 SLA 1962)

Revisor's notes. — In 1993, under SLA 1993 the citation to the Uniform Commercial Code was revised. § 13, ch. 34. SLA 1993 and § 128, ch. 35,

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GENERAL CONSID

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Blumenstein v. Pl
P.2d 1213 (Alas
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Blumenstein v

Title 8
Business and Professions

Title 9
Code of Civil Procedure

sion." as that term is understood when used in reference to mining claims, where they discovered gold, duly staked, duly recorded, and duly kept up assessment work, and it was not necessary to live on the claims, fence them, or work a mine. *Toby v. Portlock Highway Mining Co.*, 6 Alaska 51 (1917).

Sec. 09.45.015. Land adjoining highway reservation. A conveyance of land after April 7, 1958, that, at the time the conveyance was made, adjoined a highway reservation listed in section 1613 of Public Land Order 1613 of the Secretary of the Interior (April 7, 1958), is presumed to have conveyed land up to the center-line of the highway subject to any highway reservation created by Public Land Order 601 and any highway easement created by Public Land Order 1613.

(b) The burden of proof in litigation involving land adjoining a highway reservation created by Public Land Order 601 or a highway easement created by Public Land Order 1613 is on the person asserting claims that the conveyance did not convey an interest in land up to the center-line of the highway. (§ 2 ch 141 SLA 1986)

Sec. 09.45.020. Action to establish boundaries. When a dispute exists between two or more owners of adjacent or contiguous lands concerning the boundary lines of their lands, an owner may bring an action for the purpose of having the dispute determined and the boundary lines ascertained and marked. (§ 6.02 ch 101 SLA 1962)

Sec. 09.45.030. Marking of boundaries. In an action to establish boundaries, the court shall appoint three disinterested referees, one of whom is a surveyor, to establish and mark the boundary lines ascertained and determined by the court. (§ 6.03 ch 101 SLA 1962)

Cross references. — For court rule on appointment of masters, and procedures, see Civ. R. 53.

Sec. 09.45.040. Oaths and report of referees. Before and upon the discharge of their duties, the referees shall file an affidavit or oath to faithfully and impartially perform their duties. After marking the boundary lines by proper marks, they shall file with the court a report describing the location of the marks. (§ 6.04 ch 101 SLA 1962)

Sec. 09.45.050. Exceptions to the report. The report may be confirmed unless a party excepts to the report. Upon the hearing the court may confirm, modify, or set aside the report, and, in the latter case, may appoint new referees or refer the matter to the referees with appropriate instructions. (§ 6.05 ch 101 SLA 1962)

Appendix L

Photographs, ordered chronologically:

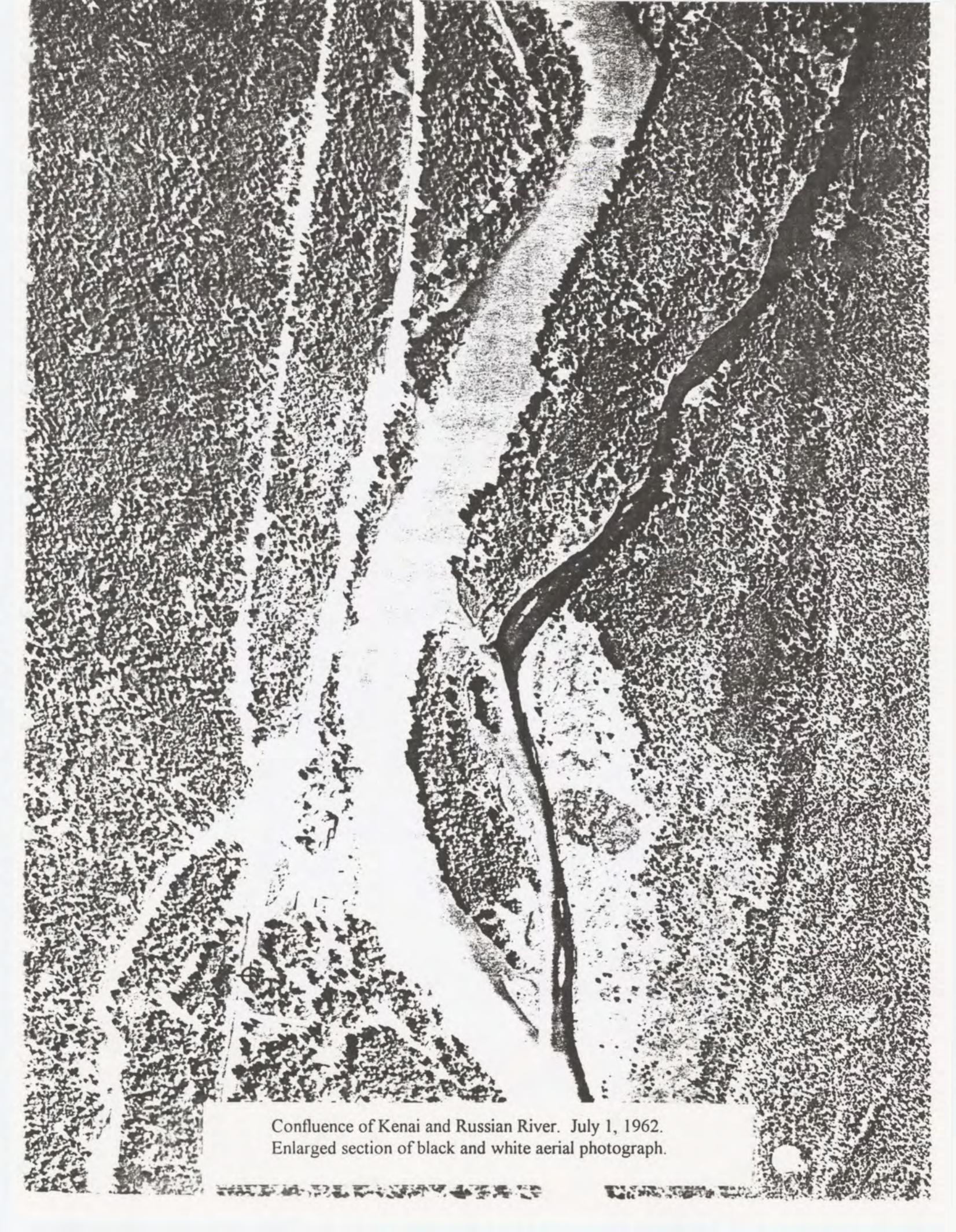
Black & white aerial photograph; vicinity Russian and Kenai Rivers, June 25, 1951.
Section of black & white aerial photograph (enlarged), July 1, 1962.
Ferry crossing Kenai River (enlarged), June 1963.
Aerial photo of Kenai River at ferry crossing, looking north, July 1969.
Aerial photo of Kenai River at ferry crossing, looking southeast, (n.d.; 1969?) .
Section of color aerial photo, Aeromap #I-7, August 3, 1983.
Color infra-red aerial photograph, mouth of Russian River, CFL208.26, June 2, 1988.
Color aerial photograph vicinity mouth of Russian River; Aeromap #176, May 13, 1991.
Color aerial photograph vicinity mouth of Russian River, Aeromap #177, May 13, 1991.
Color aerial photograph vicinity mouth of Russian River, Aeromap #154, May 13, 1991.

[Note: Original photographs obtained from office files of Kenai NWR, Soldotna; USFWS Region 7 Engineering Office, Anchorage; and Chugach National Forest Office, Anchorage. Photographs included in this appendix may not be to scale due to enlargement or reduction of photocopies or reprints.]

0200 W 55RTS M-509 338SRS 25JUNES 1951 AM-1



Confluence of Kenai and Russian Rivers (lower right corner).
Black and white, vertical aerial photograph. June 25, 1951.

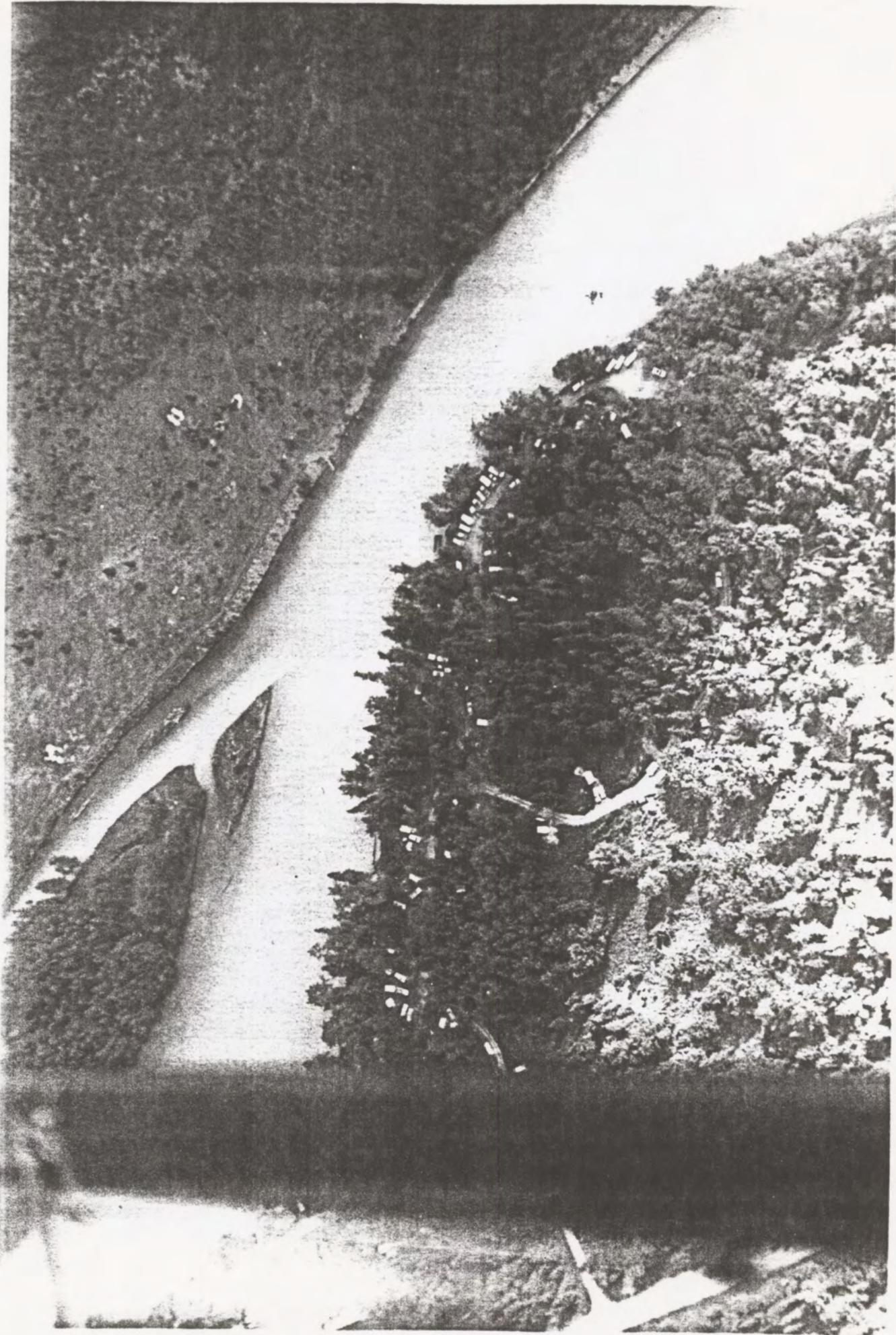
An aerial photograph showing the confluence of the Kenai and Russian Rivers. The Kenai River flows from the top left towards the center, where it meets the Russian River flowing from the top right. The surrounding landscape is a dense, textured forest. The image is in black and white and has been enlarged.

Confluence of Kenai and Russian River. July 1, 1962.
Enlarged section of black and white aerial photograph.

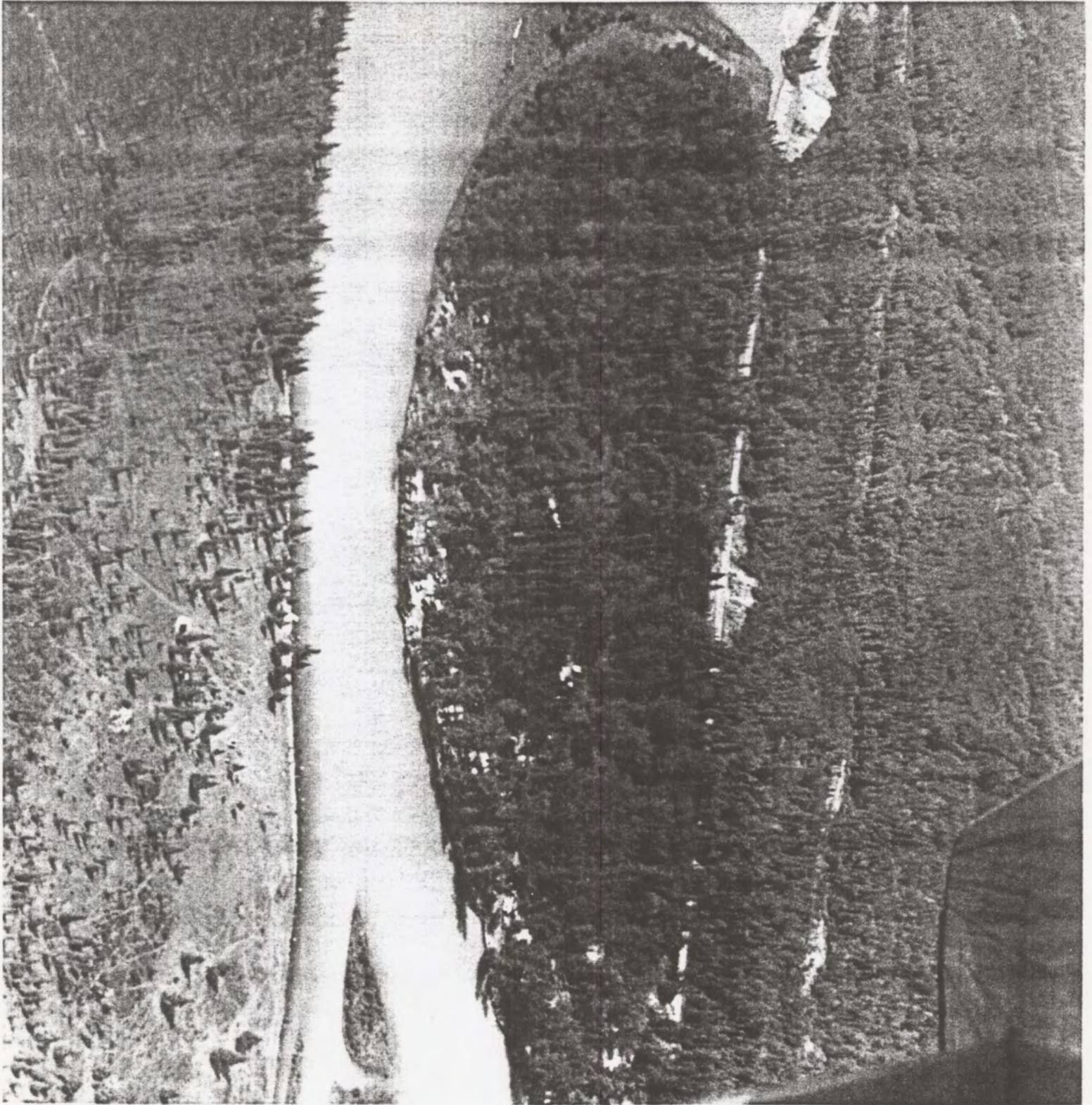


Ferry crossing Kenai River, downstream from Russian River.
Enlarged black and white photograph. June 1963.

6-1963



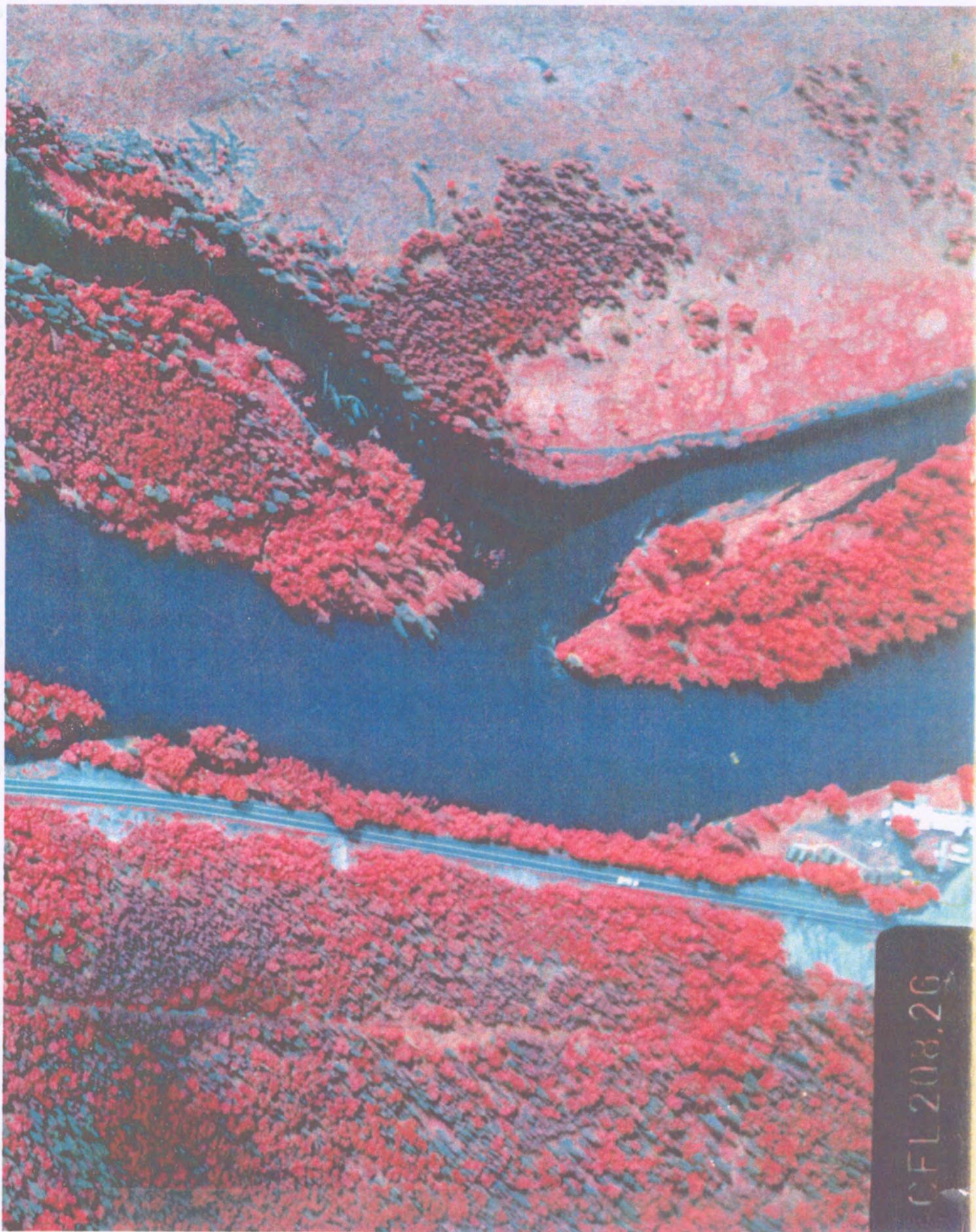
Vicinity of Kenai River ferry crossing. July 1969.
Black and white, oblique aerial photograph.



Vicinity of Kenai River ferry crossing. No date. (1969?)
Black and white, oblique aerial photograph.



Confluence of Kenai and Russian Rivers. August 3, 1983.
Section of color aerial photograph: Aeroman #I-7



Confluence of Kenai and Russian Rivers. June 2, 1988.
Color infra-red aerial photograph; CFL208.26.



Vicinity confluence of Kenai and Russian Rivers. May 13, 1991.
Reduced, color aerial photograph; Aeromap #154.



Vicinity confluence of Kenai and Russian Rivers. May 13, 1991.
Reduced, color aerial photograph; Aeromap #177.



Vicinity confluence of Kenai and Russian Rivers. May 13, 1991.
Reduced, color aerial photograph; Aeromap #176.

Appendix M

USGS Stream Gage Data:

Russian River near Cooper Landing; 1951-1954.

Kenai River at Cooper Landing; 1951-1960, 1962, 1963, 1969, 1983, 1988, 1991, 1996.

Yearly discharge, in cubic feet per second, of Cooper Creek at mouth, near Cooper Landing

Year	WSF	Water year ending Sept. 30				Calendar year		
		Momentary maximum		Minimum day	Mean	Acro-feet	Mean	Acro-feet
		Discharge	Date					
1956	1570	508	June 22, 1956	-	174	116,200	140	101,600
1959	1840	455	June 20, 1959	23	99.0	71,670	85.8	62,150
1960	1720	258	May 23, 1960	-	10.4	27,850	-	-

Location.--Lat 61°
Bridge at Hope
and 2.0 miles

Drainage area.--

Records available

Gage.--Staff gage

Extremes.--1949:
2.80 ft), from
not determined

2640. Russian River near Cooper Landing

Location.--Lat 60°27'10", long 149°59'05", on right bank 50 ft upstream from small un-named tributary, 0.3 mile downstream from Lower Russian Lake, 3.2 miles upstream from mouth, and 6 miles southwest of Cooper Landing.

Drainage area.--51.8 sq mi.

Records available.--May 1947 to September 1954.

Gage.--Water-stage recorder. Altitude of gage is 600 ft (from topographic map). Prior to June 12, 1949, staff gage at same site and datum.

Average discharge.--7 years (1947-54), 124 cfs (89,770 acro-ft per year).

Extremes.--1947-54: Maximum discharge, 1,280 cfs Nov. 14, 1952 (gage height, 4.75 ft). From rating curve extended above 850 cfs by logarithmic plotting; minimum not determined.

Water year	Oct.	Nov.
1954	112	79.1

Water year	Oct.	Nov.
1953	4,910	4,750

Year	WSF	Dis
1950	-	-
1951	1468	-

Monthly and yearly mean discharge, in cubic feet per second

Water year	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	The year
1951	33.9	40.1	27.0	25.4	21.1	18.0	40.3	153	174	112	82.8	170	78.5
1952	34.6	98.5	26.3	24.0	23.0	21.8	20.5	82.2	214	188	98.7	59.8	78.4
1953	349	465	231	128	84.7	54.7	81.8	258	543	347	259	188	254
1954	238	79.8	49.1	37.5	28.6	25	32.9	240	267	155	150	96.1	125

Location.--Lat 6
a quarter of
2.0 miles ups
east of Anch

Drainage area.--

Records available

Gage.--Water-sta
to Aug. 20, 1
1952, to July
datum.

Average discharge

Extremes.--1947-
and datum the
plotting; max
flow part of

Remarks.--Record
published in

Monthly and yearly discharge, in acre-feet

Water year	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	The year
1951	8,160	2,590	1,660	1,580	1,170	1,110	2,400	9,420	18,390	7,510	3,860	10,090	58,630
1952	8,900	8,868	2,230	1,470	1,520	1,340	1,290	3,880	13,720	11,590	5,940	4,150	58,860
1953	21,470	27,450	14,200	7,540	4,700	2,340	4,870	22,000	22,500	23,120	14,880	9,970	184,100
1954	24,500	4,750	3,020	2,810	2,140	1,600	1,960	20,800	18,810	9,560	9,250	5,110	91,210

Yearly discharge, in cubic feet per second

Year	WSF	Water year ending Sept. 30				Calendar year				
		Momentary maximum		Minimum day	Mean	Runoff		Mean	Runoff	
		Discharge	Date			Acro-feet	Inches		Acro-feet	Acro-feet
1950	-	-	-	-	-	-	-	81.3	89.03	84,300
1951	1468	-	271	Sept. 20, 1951	-	78.3	1.27	17.19	56,870	60,750
1952	1468	281	June 21, 1952	-	78.4	1.27	17.24	56,860	147	106,800
1953	1468	1,280	Nov. 24, 1952	-	254	4.11	59.45	184,100	198	143,000
1954	1468	533	May 14, 1954	-	125	2.64	27.61	91,010	-	-

Water year	Oct.	Nov.
1951	19	11
1952	82.7	27
1953	73.7	56
1954	48.8	27
1955	38.4	38
1956	30.7	28
1957	24.2	18
1958	52.3	24
1959	40.1	23
1960	40.3	23

1580. Kenai River at Cooper Landing

Seward-Kenai
ding.

Location.--Lat 60°29'35", long 149°48'25", near center of span on downstream side of
Bridges on Sterling Highway, 0.9 mile east of Cooper Landing, 0.9 mile upstream from
Bean Creek, and 1.2 miles downstream from Snug Harbor.

Drainage area.--634 sq mi.

Records available.--May 1947 to September 1960.

Gage.--wire-weight gage. Datum of gage is 429.37 ft above mean sea level (river-profile
survey). May 11, 1947, to Mar. 10, 1949, staff gage and Mar. 11, 1949, to Apr. 15,
1950, wire-weight gage, at bridge 0.9 mile downstream at different datum.

Average discharge.--13 years (1947-60). 2,898 cfs (1,953,000 acre-ft per year).

Extremes.--1947-60: Maximum discharge, 20,600 cfs June 29, 1953 (gage height, 12.36 ft,
from graph based on gage readings), from rating curve extended above 10,000 cfs by
logarithmic plotting; minimum daily, 190 cfs Mar. 15-24, 1951.

Remarks.--Records of chemical analyses for the periods July to September 1950, April to
September 1952, October 1957 to August 1958; and suspended sediment loads July to Sep-
tember 1959 (periodic), are published in reports of the Geological Survey.

c map). Prior

ge height
e observed,
ice jam upstream.
r 1958, October
7.

Sept.	The year
11.0	57.1
64.7	50.3
97.9	123
38.2	50.6
26.9	82.1
76.3	63.9
64.1	64.1
84.4	87.4
68.4	71.8
119	81.2

Monthly and yearly mean discharge, in cubic feet per second

Water year	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	The year
1951	1,879	654	564	510	258	278	280	1,239	3,226	6,894	9,092	6,852	2,509
1952	1,783	2,623	781	247	311	291	282	658	3,399	8,616	8,476	3,045	2,157
1953	6,164	3,199	1,481	886	547	480	509	2,882	10,070	8,653	7,223	4,670	3,824
1954	3,542	1,192	1,943	749	389	318	298	1,873	4,711	5,611	6,098	3,287	2,514
1955	2,143	2,205	226	612	439	312	284	802	3,454	6,178	3,955	4,253	2,472
1956	1,284	690	374	337	295	249	288	1,300	3,479	8,074	8,314	3,853	2,102
1957	7,341	1,663	992	420	503	304	364	1,649	5,231	5,575	5,782	2,100	2,864
1958	3,786	4,877	1,149	703	313	284	621	1,938	6,600	7,140	7,310	2,997	3,188
1959	3,636	1,147	681	460	371	501	410	1,198	7,001	6,125	5,387	2,780	2,548
1960	1,437	1,548	768	481	441	324	318	3,318	5,748	7,038	8,399	3,720	2,683

Sept.	The year
7,000	37,780
3,850	35,890
3,620	89,150
3,480	43,880
5,170	58,420
4,480	45,750
6,040	46,640
5,820	63,290
5,350	61,820
1,070	59,870

Monthly and yearly discharge, in acre-feet

Water year	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	The year
1951	114,500	38,490	22,350	18,080	14,220	12,790	16,590	76,180	211,800	421,900	513,100	407,700	1,672,000
1952	128,600	154,100	48,010	21,350	17,900	17,870	15,590	40,480	202,800	600,800	549,000	181,200	1,556,000
1953	328,000	190,400	89,820	54,480	50,400	28,280	30,280	143,500	598,800	800,800	800,800	300,720	2,788,000
1954	211,800	70,820	129,400	45,600	21,820	19,620	17,750	112,100	282,900	343,000	374,800	134,400	1,920,000
1955	131,800	151,100	50,800	37,410	24,320	17,160	16,900	49,320	203,800	462,800	364,200	253,600	1,788,000
1956	77,700	41,040	24,250	23,790	17,000	15,290	17,030	79,980	201,900	373,800	425,100	129,400	1,528,000
1957	348,900	89,970	60,980	25,950	18,810	15,840	21,660	101,400	347,800	842,900	853,700	341,500	2,073,000
1958	232,800	293,100	70,640	45,250	29,580	23,800	27,540	112,900	372,700	433,000	448,500	178,500	2,309,000
1959	221,100	69,240	40,630	28,270	19,700	18,550	24,370	135,100	418,600	378,600	331,500	145,400	1,845,000
1960	118,100	123,110	47,190	29,570	23,340	19,900	18,920	205,700	342,000	432,800	383,500	221,500	1,947,000

Calendar year	
Runoff	
Inches	Acre-feet
4.8	39,690
4.3	39,220
3.8	32,330
5.1	79,740
5.1	67,140
4.4	51,720
5.0	47,190
6.7	58,950
5.1	64,420
0.5	51,020
30.18	-

Yearly discharge, in cubic feet per second

Year	MSF	Water year ending Sept. 30				Calendar year					
		Maximum		Minimum	Area	Runoff					
		Discharge	Date			Inches	Acre-feet				
1950	-	-	-	-	-	-	2,372	50.79	1,716,000		
1951	1466	8,960	Sept. 8, 1951	190	2,309	5.64	48.48	1,872,000	2,499	53.50	1,809,000
1952	1466	7,980	July 26, 1952	258	2,157	3.40	46.32	1,556,000	1,789	52.80	1,788,000
1953	1466	20,600	June 29, 1953	323	3,824	6.03	81.87	2,788,000	3,647	78.08	2,640,000
1954	1466	8,000	Aug. 3, 1954	283	2,814	5.97	55.82	1,820,000	2,283	51.03	1,723,000
1955	1466	10,600	July 12, 1955	260	2,672	3.90	52.92	1,788,000	2,236	47.87	1,618,000
1956	1466	8,000	Aug. 20, 1956	214	2,102	3.22	48.19	1,528,000	2,324	49.86	1,687,000
1957	1500	16,500	Sept. 4, 1957	280	2,864	4.52	67.32	2,073,000	3,214	69.89	2,363,000
1958	1570	12,420	Nov. 4, 1957	352	3,189	4.28	64.29	2,309,000	3,623	80.43	2,043,000
1959	1640	8,980	June 24, 1959	255	2,548	4.02	54.56	1,845,000	2,649	52.44	1,773,000
1960	1720	9,300	July 29, 1960	280	2,683	4.23	57.69	1,947,000	-	-	-

ALASKA WEST OF LONGITUDE 141°

20-2580, Kenai River at Cooper Landing

Location.--Lat 60°29'35", Long 149°48'25", near center of span on downstream side of bridge on Sterling Highway, 0.9 mile east of Cooper Landing, 0.9 mile upstream from Swan Creek, and 1.2 miles downstream from Snug Harbor.

Drainage area.--634 sq mi.

Records available.--Discharge: May 1947 to September 1962.
Chemical analyses: July to November 1950, April to September 1952 (monthly), January 1953 to August 1958 (periodic).
Sediment records: July to September 1959 (monthly).

Gage.--Wire-weight gage read once daily. Datum of gage is 42y.27 ft above mean sea level (river profile survey). May 11, 1947, to Mar. 10, 1949, staff gage and Mar. 11, 1949, to Apr. 13, 1950, wire-weight gage, at bridge 0.9 mile downstream at different datum.

Average discharge.--15 years, 2,702 cfs (1,956,000 acre-ft per year).

Extremes.--Maximum discharge during year, 14,000 cfs Oct. 6 (gage height, 10.5 ft, from floodmark); minimum daily, 320 cfs Mar. 22-26, 1947-62; Maximum discharge, 20,600 cfs June 29, 1953 (gage height, 12.36 ft, from graph based on gage readings), from rating curve extended above 10,000 cfs by logarithmic plotting; minimum daily, 190 cfs Mar. 15-24, 1951.

Remarks.--Records good except those for period of ice effect, which are fair. An average of about +2 cfs was diverted from Cooper Lake to Kenai Lake above gage, through the Cooper Lake powerplant.

Discharge, in cubic feet per second, water year October 1961 to September 1962

Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	4,110	1,390	1,020	470	430	380	350	597	2,210	6,320	5,640	4,680
2	5,040	1,340	1,000	470	440	380	350	601	2,330	6,400	5,500	4,510
3	5,260	1,320	1,000	460	450	380	360	608	2,390	6,240	5,400	4,320
4	7,340	1,280	965	490	460	380	370	624	2,540	6,420	5,190	4,140
5	8,680	1,260	945	490	470	380	380	639	2,500	6,620	4,990	4,030
6	10,400	1,280	910	500	480	380	391	659	2,610	6,860	4,990	3,870
7	12,900	1,260	860	510	460	370	410	670	2,630	7,450	4,900	3,560
8	13,000	1,240	814	520	460	360	414	709	2,670	7,630	4,810	3,320
9	9,690	1,220	925	530	460	360	417	733	2,690	7,760	4,770	3,010
10	7,740	1,220	878	540	450	350	434	796	2,750	7,980	4,920	2,940
11	6,380	1,180	878	540	440	350	424	860	2,980	8,140	4,970	2,780
12	5,330	1,150	925	540	440	350	430	935	3,220	8,050	4,970	2,600
13	4,490	1,130	868	530	450	350	441	980	3,600	7,740	4,920	2,410
14	3,980	1,400	770	520	440	340	448	1,000	4,270	7,630	4,940	2,290
15	3,540	1,310	720	540	430	340	452	1,100	4,560	7,010	4,920	2,170
16	3,220	1,380	670	550	440	360	462	1,150	4,920	6,620	4,900	2,020
17	2,930	1,430	630	560	430	360	462	1,210	5,440	6,380	4,720	1,950
18	2,690	1,390	500	550	440	350	455	1,240	5,900	6,200	4,610	1,800
19	2,560	1,340	580	530	440	340	460	1,270	6,790	6,180	4,630	1,750
20	2,340	1,400	560	510	440	340	480	1,300	7,300	6,140	4,580	1,770
21	2,130	1,300	550	500	420	330	483	1,350	7,700	6,220	4,580	1,800
22	2,020	1,300	540	480	420	320	494	1,400	8,120	6,160	4,520	1,850
23	1,890	1,250	530	460	410	320	501	1,490	8,170	6,040	4,520	2,440
24	1,810	1,200	530	450	400	320	512	1,560	8,000	5,880	4,460	2,990
25	1,740	1,190	520	440	410	320	523	1,640	7,610	5,740	4,440	3,290
26	1,660	1,170	510	430	410	320	534	1,720	7,260	5,560	4,380	3,400
27	1,610	1,130	510	430	400	330	541	1,830	7,020	5,460	4,080	3,290
28	1,630	1,100	500	430	390	340	564	1,890	6,770	5,440	4,220	3,160
29	1,560	1,020	490	420	390	330	578	1,950	6,440	5,300	4,540	2,940
30	1,480	1,040	460	420	390	330	590	2,000	6,340	5,600	4,520	2,760
31	1,420	-----	470	420	-----	340	-----	2,100	-----	5,600	4,610	-----
Total	41,580	37,620	22,148	15,250	12,210	10,800	13,730	36,611	147,790	202,970	148,040	87,830
Mean	1,341	1,214	714	492	396	348	442	1,181	4,767	6,547	4,775	2,828
Cfs/m	7.20	1.98	1.13	0.776	0.688	0.549	0.722	1.86	7.77	10.3	7.53	0.68
In.	8.30	2.21	1.30	0.89	0.72	0.63	0.81	2.15	8.67	11.91	8.68	5.15
Ac-ft	280,800	74,620	43,930	30,450	24,220	21,420	27,430	72,620	293,100	402,600	293,600	174,200
Calendar year 1961:	max 13,000	min 470	Mean 3,212	Cfs/m 5.07	In. 68.79	Ac-ft 2,326,000						
Water year 1961-62:	max 13,000	min 320	Mean 2,402	Cfs/m 3.19	In. 51.42	Ac-ft 1,739,000						

* Discharge measurements made on this day.
Note.--Stage-discharge relation affected by ice Dec. 15 to Apr. 5.

ALASKA WEST OF LONGITUDE 141°

10-2500. Kennel River at Cooper Landing

Location.--Lat 60°29'35", long 149°43'25", near center of span on downstream side of bridge on Sterling Highway, 0.9 mile east of Cooper Landing, 0.9 mile upstream from Bean Creek, and 1.2 miles downstream from Saug Harbor.

Drainage area.--634 sq. mi.

Records available.--May 1947 to September 1963.

Gage.--Wire-weight gage read once daily. Datum of gage is +29.27 ft above mean sea level (river profile survey). May 11, 1947, to Mar. 10, 1949, staff gage and Mar. 11, 1949, to Apr. 13, 1950, wire-weight gage, at bridge 0.9 mile downstream at different datum.

Average discharge.--16 years, 2,681 cfs (1,941,000 acre-ft per year) adjusted to exclude diversion from Cooper Lake.

Extremes.--Maximum discharge during year, 3,800 cfs July 17 (gage height, 8.74 ft); minimum observed 516 cfs Apr. 16, 17, 19. (gage height, 2.15 ft).

1947-53: Maximum discharge, 20,600 cfs June 29, 1953 (gage height, 12.36 ft, from graph based on gage readings), from rating curve extended above 10,000 cfs by logarithmic plotting; minimum daily, 190 cfs Mar. 15-24, 1951.

Remarks.--Records good except those for periods of no gage-height record, which are fair. An average of about 123 cfs was diverted from Cooper Lake to Kennel Lake above gage, through the Cooper Lake powerplant.

Discharge, in cubic feet per second, water year October 1962 to September 1963

Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Avg.	Sept.
1	*2600	1550	1260	1060	682	706	597	608	3390	4830	6280	5240
2	*2400	1610	1230	1000	674	709	604	647	3540	5300	6300	5540
3	*2300	2100	1180	980	674	713	575	674	3670	5440	6120	5860
4	*2200	2860	1140	960	663	713	567	713	3840	5820	6060	6360
5	*2100	3210	1120	945	663	713	552	737	4030	5800	5980	6400
6	2040	3570	1060	900	655	*725	549	810	1900	6560	5880	6540
7	2000	3660	1060	850	635	725	556	824	3770	6880	5480	6750
8	1960	3570	1040	842	647	717	*570	878	3740	7100	5260	6860
9	1870	3350	1040	837	647	737	567	935	3590	7340	4850	6750
10	1700	3160	1040	886	643	774	578	980	3530	7480	4540	6520
11	1570	3010	1040	900	639	765	567	985	3540	7520	4540	6180
12	1520	2830	1080	896	631	774	578	1040	3590	*7630	4610	5760
13	1490	2690	1080	886	628	783	560	1070	3540	7700	4760	5210
14	*1430	2500	1070	824	628	765	549	1120	3500	7980	4790	4830
15	1410	2370	1100	801	643	745	538	1200	3470	8000	4790	4560
16	1390	2210	1110	796	647	737	516	1270	3450	8390	4850	4440
17	1360	2140	1120	*796	635	725	516	1310	3380	8800	4830	4110
18	1350	2040	1120	778	639	733	538	1380	3350	8580	4970	4040
19	1310	2040	1120	792	628	745	516	1440	3520	8530	*5130	3840
20	1270	1940	1100	792	612	753	538	1530	3530	7960	5080	3680
21	1240	1850	1110	792	601	749	552	1590	3700	7520	5150	3460
22	1220	1770	1130	792	593	737	552	*1730	4010	7320	5190	3330
23	1290	1680	1080	792	586	733	527	2020	4210	7100	5400	3150
24	1300	1580	1140	792	639	733	538	2220	4480	7040	5740	2940
25	1350	1520	1130	774	666	720	556	2370	4480	7040	6710	2830
26	1320	1420	1120	761	686	*710	567	2460	4520	6840	7080	2770
27	1320	1390	1080	753	706	680	578	2630	4540	6280	6840	2810
28	1440	*1350	1070	749	713	647	586	2760	4580	6360	6500	3190
29	1470	1320	1060	745	-----	628	589	2900	4700	6240	6240	3290
30	1480	1270	1040	721	-----	604	597	3100	4700	6120	5540	3160
31	1520	-----	1030	721	-----	601	-----	3330	-----	5980	5210	-----
Total	50220	67560	34100	25913	18103	22299	16773	47261	115790	217580	170700	140400
Mean	1.620	2.252	1.100	836	547	719	559	1,525	3,660	7,019	5,506	4,680
Cfm	2.56	3.55	1.74	1.32	1.02	1.13	0.882	2.41	6.09	11.1	8.68	7.38
In.	2.95	3.96	2.00	1.52	1.06	1.31	0.98	2.77	6.79	12.76	10.01	8.24
Ac-ft	99,510	138,000	67,640	51,400	35,910	44,230	33,270	93,790	229,700	431,600	338,600	278,500

Calendar year 1962: Max 8,340 Min 320 Mean 2,266 Cfm 3.57 In. 48.52 Ac-ft 1,040,000
 Water year 1962-63: Max 8,800 Min 516 Mean 2,533 Cfm 4.00 In. 54.35 Ac-ft 1,830,000

* Discharge measurement made on this day.
 a No gage-height record.

2

ALASKA WEST OF LONGITUDE 141°

15-2500. Kenai River at Cooper Landing

LOCATION.--Lat 60°29'34", Long 149°48'25". Near center of span on downstream side of bridge on Sterling Highway, 0.9 mile east of Cooper Landing, 0.9 mile upstream from Bear Creek, and 1.2 miles downstream from Snug Harbor.

DRAINAGE AREA.--634 sq mi.

PERIOD OF RECORD.--May 1947 to current year.

GAGE.--Nonrecording gage read once daily. Altitude of gage is 430 ft (from topographic map). Prior to Apr. 13, 1950, at site 0.8 mile downstream at different datum. Apr. 14, 1950 to Apr. 6, 1964, at site about 50 ft upstream of present location at datum about 2.3 ft lower. Apr. 7, 1964 to Aug. 27, 1966, at site about 100 ft downstream at present datum.

AVERAGE DISCHARGE.--22 years, 2,684 cfs (1,945,000 acre-ft per year), adjusted to exclude diversion from Cooper Lake. 21 years, 2,715 cfs (1,957,000 acre-ft per year); figure published in Water Resources Data for Alaska, 1968, in error.

EXTREMES.--Current year: Maximum discharge, 5,950 cfs June 19 (gage height, 12.04 ft); minimum 360 cfs Mar. 28, 29 (gage height, 4.80 ft).
Period of record: Maximum discharge, 21,500 cfs Sept. 1, 1967; no flow Mar. 27, 28, 1964 (caused by earthquake).

REMARKS.--Records fair. An average of about 66.4 cfs was diverted from Cooper Lake to Kenai Lake above gage, through the Cooper Lake power plant. Records of chemical analyses and suspended-sediment loads for the water year 1969 are published in Part 2 of this report.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1968 TO SEPTEMBER 1969

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	
1	2,160	940	716	500	381	408	375	632	4,680	7,500	5,090	2,710	
2	2,160	940	688	488	381	402	372	640	4,510	7,700	5,070	2,680	
3	2,160	960	668	500	381	399	372	645	4,400	7,700	5,160	2,670	
4	2,160	960	648	488	381	402	372	648	4,400	7,460	5,180	2,650	
5	2,110	965	648	470	390	411	369	656	4,350	7,340	5,220	2,620	
6	2,060	965	648	462	387	411	366	656	4,300	7,200	5,200	2,520	
7	1,990	950	648	456	387	405	366	684	4,300	7,000	5,220	2,400	
8	1,900	940	620	444	387	402	363	708	4,270	6,960	5,020	2,370	
9	1,850	960	612	440	387	396	366	724	4,860	6,700	4,910	2,310	
10	1,690	980	600	440	396	387	369	736	5,220	6,500	4,620	2,460	
11	1,700	975	588	430	402	399	369	768	5,300	6,400	4,240	2,880	
12	1,650	980	600	430	399	396	375	800	5,490	6,400	4,000	3,080	
13	1,600	990	568	420	399	396	381	808	5,590	6,270	3,730	3,150	
14	1,530	980	570	420	399	396	390	848	5,970	6,120	3,560	3,150	
15	1,490	965	580	410	402	393	405	868	6,840	6,020	3,390	3,120	
16	1,420	950	576	400	402	390	420	940	7,500	5,780	3,150	3,100	
17	1,370	940	576	400	399	387	432	990	8,540	5,630	2,980	3,140	
18	1,330	900	588	400	402	381	447	1,000	8,940	5,440	2,850	2,840	
19	1,270	905	560	400	411	381	453	1,100	8,980	5,250	2,780	2,800	
20	1,240	890	548	400	402	381	465	1,160	8,640	5,130	2,720	2,700	
21	1,220	880	548	400	411	372	477	1,260	8,540	5,000	2,660	2,600	
22	1,170	868	548	400	411	381	500	1,530	7,980	5,050	2,700	2,440	
23	1,130	856	544	400	417	381	516	1,960	7,640	4,950	2,670	2,390	
24	1,110	848	540	400	420	381	536	2,660	7,500	5,050	2,620	2,390	
25	1,100	836	540	400	411	372	548	3,180	7,560	5,180	2,670	2,340	
26	1,010	816	536	396	411	372	572	3,520	7,600	5,180	2,600	2,260	
27	1,010	788	532	390	426	369	588	4,190	7,640	5,070	2,620	2,190	
28	1,010	768	520	387	414	360	600	4,430	7,700	5,090	2,600	2,140	
29	1,000	748	520	381	-----	360	616	4,500	7,760	5,050	2,560	2,310	
30	985	736	512	381	-----	366	640	4,500	7,900	5,070	2,600	2,460	
31	965	-----	508	390	-----	381	-----	4,600	-----	5,090	-----	-----	
TOTAL	46,550	27,179	18,098	13,123	11,196	12,018	13,420	52,341	194,900	186,280	113,190	78,870	
MEAN	1,502	906	584	423	400	388	447	1,688	6,497	6,009	3,651	2,629	
MAX	2,160	990	716	500	426	411	640	4,600	8,980	7,700	5,220	3,150	
MIN	965	736	508	381	381	360	363	632	4,270	4,950	2,560	2,140	
CFSM	2.37	1.43	.92	.67	.63	.61	.71	2.66	10.2	9.48	5.76	4.15	
IN.	2.73	1.59	1.06	.77	.66	.70	.79	3.07	11.4	10.9	6.64	4.63	
AC-FT	92,330	53,910	35,900	26,030	22,210	23,840	26,620	103,800	386,600	369,500	224,500	156,400	
CAL YR 1968	TOTAL 868,990		MEAN 2,374		MAX 7,260		MIN 500		CFSM 3.74		IN 50.97		AC-FT 1,724,000
WTR YR 1969	TOTAL 767,165		MEAN 2,102		MAX 8,980		MIN 360		CFSM 3.32		IN 45.00		AC-FT 1,522,000

LOCATION.--Lat 60° of Soldotna.

DRAINAGE AREA.--

PERIOD OF RECORD--

GAGE.--Nonrecording

EXTREMES.--Current (backwater from Period of record Jan. 18, 1964)

REMARKS.--Records sediment loads

DAY OCT

1	4,100
2	3,920
3	3,880
4	3,800
5	3,700
6	3,700
7	3,680
8	3,550
9	3,550
10	3,400
11	3,300
12	3,200
13	3,100
14	3,000
15	2,900
16	2,900
17	2,760
18	2,560
19	2,400
20	2,370
21	2,360
22	2,250
23	2,200
24	2,180
25	2,100
26	2,080
27	2,060
28	2,020
29	1,950
30	1,880
31	1,830
TOTAL	88,680
MEAN	2,861
MAX	4,100
MIN	1,830
CFSM	1.42
IN.	1.64
AC-FT	175,900

CAL YR 1968 TO WTR YR 1969 TO

NOTE.--No gage

15258000 KENAI RIVER AT COOPER LANDING

LOCATION.--Lat 60°29'34", long 149°48'28", in SE¼ sec.28, T.5 N., R.3 W., Kenai Peninsula Borough, Hydrologic Unit 19050002, Chugach National Forest, on right bank 10 ft downstream of bridge on Sterling Highway, 0.9 mi east (upstream) of Cooper Landing, Bean Creek, and at Kenai Lake outlet.

DRAINAGE AREA.--634 mi².

PERIOD OF RECORD.--May 1947 to current year.

REVISED RECORDS.--WSP 2136: 1984 (M).

GAGE.--Water-stage recorder. Datum of gage is 419.92 ft above National Geodetic Vertical Datum of 1929, (levels by Alaska Department of Transportation). See WSP 2136 for history of changes prior to Aug. 28, 1965. Aug. 28, 1965 to Jan. 21, 1974 at site 10 ft upstream at present datum. Jan. 21, 1974 to Sept. 30, 1981, non-recording gage at site 40 ft upstream at present datum.

REMARKS.--Estimated daily discharges: Feb. 7 to Mar. 3. Records good except for period of no gage-height record, Feb. 7 to Mar. 3, which is fair. Diversion from Cooper Lake to Kenai Lake above gage through Cooper Lake powerplant began May 1961. Satellite telemetry installed Feb. 15, 1983.

COOPERATION.--Records of diversion provided by Chugach Electric Association.

AVERAGE DISCHARGE.--41 years, 2,829 ft³/s, 60.60 in/yr, 2,050,000 acre-ft/yr, adjusted to exclude diversion from Cooper Lake.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 23,100 ft³/s, Sept. 21, 1974, gage height, 17.18 ft, result of release of stored water from glacier-dammed lake at head of unnamed glacier in the Snow River basin; no flow Mar. 27, 28, 1964, caused by earthquake.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 9,380 ft³/s, July 19, gage height, 12.24 ft; minimum, 397 ft³/s, Apr. 9.

DISCHARGE, CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1987 TO SEPTEMBER 1988
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	4120	3180	1240	860	641	600	475	816	4750	6940	7090	8690
2	4080	2980	1220	834	628	600	464	853	4750	7150	7260	8350
3	4170	2820	1210	817	627	600	449	890	4800	7390	7220	7800
4	4070	2660	1200	800	628	579	449	943	4970	7770	7290	7280
5	3910	2510	1160	799	609	569	436	961	5250	8030	7310	6800
6	3740	2370	1120	805	637	570	428	1000	5550	8120	7310	6330
7	3610	2250	1100	824	640	554	423	1050	6030	8140	7360	5860
8	3640	2130	1130	823	640	538	417	1130	6450	8090	7510	5420
9	4590	2020	1090	811	640	562	409	1220	6740	8030	7590	5040
10	5550	1940	1080	784	640	648	419	1390	7000	8110	7520	4850
11	5600	1870	1060	777	640	646	438	1610	7220	8260	7530	4770
12	5370	1800	1040	771	620	677	456	1870	7440	8350	7570	4770
13	5020	1770	1000	766	620	674	468	2150	7550	8440	7520	4870
14	4720	1740	964	770	620	661	487	2450	7750	8500	7300	4850
15	4360	1700	979	762	620	669	491	2700	7850	8690	7020	4730
16	4090	1690	961	761	620	663	522	2930	7920	8910	6800	4570
17	3800	1600	927	753	620	642	537	3100	7950	9100	6630	4400
18	3540	1630	949	740	620	638	550	3230	8040	9250	6640	4270
19	3400	1580	971	727	620	623	563	3340	8110	9290	6820	4380
20	3310	1560	963	740	620	608	571	3460	8090	9230	6950	4710
21	3370	1530	942	739	620	598	570	3540	7950	9120	7190	4870
22	4200	1510	953	745	620	585	579	3660	7770	8900	7620	4930
23	5020	1470	964	737	600	573	601	3770	7550	8530	7810	4950
24	5270	1450	967	722	600	561	619	3910	7350	8120	7700	4910
25	5180	1430	964	708	600	543	637	4040	7150	7800	7560	4790
26	4860	1400	938	686	600	533	658	4170	7140	7580	8100	4630
27	4560	1370	932	664	600	522	680	4290	7130	7310	8510	4440
28	4240	1360	918	655	600	502	711	4420	7120	7180	8740	4190
29	3910	1320	924	656	600	502	746	4550	7070	7130	8740	3970
30	3600	1290	905	666	---	492	786	4630	6950	7020	8780	3770
31	3360	---	880	662	---	482	---	4720	---	6970	8780	---
TOTAL	132260	55930	31651	23364	17988	18214	16039	82793	207650	251450	233770	158190
MEAN	4266	1864	1021	754	620	588	535	2671	6920	8111	7541	5273
MAX	5600	3180	1240	860	641	677	786	4720	8110	9290	8780	8690
MIN	3310	1290	880	655	600	482	409	816	4780	6940	6630	3770
AC-FT	262300	110900	62780	46340	35680	36130	31810	164200	411200	498800	463700	313800

CAL YR 1987 TOTAL 1128317 MEAN 3091 MAX 9110 MIN 585 AC-FT 2238000
WTR YR 1988 TOTAL 1229299 MEAN 3359 MAX 9290 MIN 409 AC-FT 2438000

ADJUSTED TO EXCLUDE DIVERSION FROM COOPER LAKE

	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
MEAN	4141	1680	820	584	481	568	535	2671	6910	7874	7344	5134
CFSM	6.53	2.65	1.29	0.92	0.78	0.90	0.84	4.21	10.93	12.42	11.58	8.10
IN	7.53	2.96	1.49	1.06	0.78	1.03	0.94	4.66	12.16	14.32	13.35	9.04
AC-FT	254600	99970	50400	35930	28540	34940	31810	164200	411200	484100	451600	305500
CAL YR 1987	MEAN 2934		CFSM 4.63		IN 62.83		AC-FT 2124000					
WTR YR 1988	MEAN 3238		CFSM 5.11		IN 69.50		AC-FT 2351000					

15258000 KENAI RIVER AT COOPER LANDING

LOCATION.--Lat 60°29'34", long 149°48'28", in SE¼ sec.28, T.5 N., R.3 W., Kenai Peninsula Borough, Hydrologic Unit 19050002, Chugach National Forest, on right bank 10 ft downstream of bridge on Sterling Highway, 0.9 mi east (upstream) of Cooper Landing, Bean Creek, and at Kenai Lake outlet.

DRAINAGE AREA.--634 mi².

PERIOD OF RECORD.--May 1947 to current year.

REVISED RECORDS.--WSP 2136: 1964 (M).

GAGE.--Water-stage recorder. Datum of gage is 419.92 ft above National Geodetic Vertical Datum of 1929. (levels by Alaska Department of Transportation). See WSP 2136 for history of changes prior to Aug. 28, 1965. Aug. 28, 1965 to Jan. 21, 1974 at site 10 ft upstream at present datum. Jan. 22, 1974 to Sept. 30, 1981, non-recording gage at site 40 ft upstream at present datum.

REMARKS.--Records good. Diversion from Cooper Lake to Kenai Lake above gage through Cooper Lake powerplant began May 1961. Satellite telemetry installed Feb. 15, 1983.

COOPERATION.--Records of diversion provided by Chugach Electric Association.

DISCHARGE, CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1990 TO SEPTEMBER 1991
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	4110	1950	954	618	e550	e500	422	686	3340	7160	5930	3800
2	3820	2120	926	614	e550	e500	416	727	3300	7240	6860	3640
3	3530	2440	897	605	e550	e500	408	769	3290	7370	7120	3540
4	3300	3060	884	588	e500	e500	404	806	3280	7340	7100	3520
5	3120	4220	902	581	e500	e500	401	844	3250	7220	6410	3830
6	2910	5790	882	575	e500	e500	398	894	3260	7100	6000	4270
7	2720	7860	859	568	e500	e500	395	967	3270	6970	5570	4600
8	2590	8850	841	565	e500	483	390	1040	3300	6860	5270	4860
9	2520	7520	830	563	e500	489	388	1130	3280	6810	5140	5270
10	2460	6070	833	561	e500	480	386	1200	3300	6710	5050	5760
11	2400	4950	804	558	e500	471	380	1260	3320	6570	5080	6030
12	2360	4100	805	555	e500	469	381	1300	3370	6490	5280	5900
13	2310	3500	783	546	e500	458	388	1320	3510	6330	5460	5650
14	2230	3060	771	545	e500	462	400	1340	3680	6100	5860	5480
15	2110	2670	764	542	e500	449	398	1340	3930	5950	6090	6090
16	2050	2410	741	556	e500	457	407	1370	4220	5870	6130	6930
17	1960	2210	733	558	e500	455	413	1420	4410	5810	6490	7940
18	1920	1990	737	551	e500	445	404	1460	4630	5790	6890	8070
19	1920	1860	751	552	e500	446	405	1480	4890	5650	6820	7610
20	1850	1720	744	e550	e500	445	412	1510	5180	5490	6510	6950
21	1800	1600	726	e550	e500	442	425	1580	5550	5330	6200	6300
22	1760	1490	727	e550	e500	438	459	1670	6000	5270	5840	5770
23	1750	1390	711	e550	e500	439	462	1800	6440	5330	5510	5770
24	1750	1300	709	e550	e500	433	478	1990	6700	5540	5280	6190
25	1760	1270	701	e550	e500	434	484	2230	6810	5670	5090	6150
26	1730	1190	670	e550	e500	440	501	2450	6810	5690	5000	6060
27	1720	1130	675	e550	e500	440	541	2600	6770	5600	4870	6170
28	1730	1070	674	e550	e500	438	564	2710	6770	5570	4690	6000
29	1760	996	643	e550	---	439	590	2920	6870	5510	4430	5830
30	1780	947	631	e550	---	437	640	3160	7060	5440	4170	5970
31	1830	---	622	e550	---	430	---	3300	---	5410	3960	---
TOTAL	71560	90733	23930	17401	14150	14329	13140	48273	139790	191190	176120	169950
MEAN	2308	3024	772	561	505	462	438	1589	4660	6167	5681	5665
MAX	4110	8850	954	618	550	500	640	3300	7060	7370	7120	8070
MIN	1720	947	622	542	500	430	380	686	3250	5270	3960	3520
AC-FT	141900	180000	47470	34510	28070	28420	25060	97730	277300	379200	349300	337100

e Estimated

ADJUSTED TO EXCLUDE DIVERSION FROM COOPER LAKE

	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
MEAN	2298	2998	638	416	343	315	430	1589	4602	6134	5631	5645
CFSM	3.62	4.73	1.01	0.66	0.54	0.50	0.68	2.51	7.26	9.68	8.88	8.90
IN	4.18	5.27	1.16	0.76	0.56	0.57	0.76	2.89	8.10	11.15	10.24	9.93
AC-FT	141300	178400	39210	25590	19040	19400	25580	97730	273900	377200	346200	335900

SOUTH-CENTRAL ALASKA

15258000 KENAI RIVER AT COOPER LANDING—Continued

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1947 - 1994, BY WATER YEAR (WY)#

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
MEAN	3344	1871	1166	810	655	512	533	1873	5337	6942	6436	5214
MAX (WY)	8955 1980	4877 1958	3469 1986	2807 1981	2066 1981	1122 1977	1071 1980	3508 1990	10010 1953	10460 1980	11430 1977	11490 1967
MIN (WY)	1264 1956	654 1951	364 1951	310 1951	251 1949	208 1951	262 1952	658 1952	3268 1972	5158 1965	3651 1969	2629 1969

SUMMARY STATISTICS

FOR 1993 CALENDAR YEAR

FOR 1994 WATER YEAR

WATER YEARS 1947 - 1994#

ANNUAL TOTAL	1220829		1121902	
ANNUAL MEAN	3345		3074	
ANNUAL MEAN	*3218		*2955	2910
HIGHEST ANNUAL MEAN				*2839
LOWEST ANNUAL MEAN				4499
				2102
				1977
HIGHEST DAILY MEAN	16300	Sep 20	8370	Jun 25
LOWEST DAILY MEAN	503	Feb 14	574	Mar 21
				22500
				100
				Mar 28 1964
ANNUAL SEVEN-DAY MINIMUM	523	Feb 8	586	Mar 19
				190
				Mar 15 1951
INSTANTANEOUS PEAK FLOW			8370	Jun 25
INSTANTANEOUS PEAK STAGE			11.53	Jun 25
INSTANTANEOUS LOW FLOW			408	Mar 14
				a 23100
				17.18
				b .00
				Mar 27 1964
ANNUAL RUNOFF (AC-FT)	2422000		2225000	
ANNUAL RUNOFF (AC-FT)	* 2329800		* 2139080	2108000
ANNUAL RUNOFF (CFSM)	* 5.08		* 4.68	* 2057000
ANNUAL RUNOFF (INCHES)	* 68.88		* 63.25	* 4.48
				* 60.81
10 PERCENT EXCEEDS	6940		7280	6950
50 PERCENT EXCEEDS	2060		1850	1670
90 PERCENT EXCEEDS	621		641	400

See Remarks. Values shown on this page are unadjusted for inflow from diversion, unless otherwise noted.

* Adjusted.

a Result of release of stored water from glacier-dammed lake at head of unnamed glacier in the Snow River basin.

b No flow, Mar. 27 and 28, 1964, caused by earthquake.

07/31/96

UNITED STATES DEPARTMENT OF THE INTERIOR - GEOLOGICAL SURVEY - ALASKA DISTRICT

STATION NUMBER 15258000 KENAI R AT COOPER LANDING AK STREAM SOURCE AGENCY USGS
LATITUDE 602934 LONGITUDE 1494828 DRAINAGE AREA 634.00 DATUM 419.92 STATE 02 COUNTY 120
PROVISIONAL DATA FROM THE DCP SUBJECT TO REVISION
DISCHARGE, CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1995 TO SEPTEMBER 1996
DAILY MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	9190	2060	845	662	447	438	6360	726	2390	4550		
2	8540	2030	805	657	442	436	6360	739	2560	4440		
3	7830	1950	809	654	434	437	341	757	2710	4470		
4	7120	1840	789	645	433	433	345	778	2990	4510		
5	6430	1840	707	639	439	433	---	820	3270	4520		
6	5870	1780	764	627	448	430	366	862	3390	4510		
7	5320	1730	753	616	456	424	309	906	3480	4480		
8	4920	1650	737	608	459	416	368	972	3510	4460		
9	4540	1590	727	609	458	413	365	1050	3480	4450		
10	4110	1520	734	603	480	410	363	1130	3450	4500		
11	3750	1480	703	592	---	411	364	1220	3460	4560		
12	3530	1430	694	585	---	413	367	1330	3400	4720		
13	3300	1380	687	578	494	407	388	1460	3150	4830		
14	3130	1340	683	569	489	401	372	1610	3320	4820		
15	2950	1290	683	561	487	400	373	1840	3240	4720		
16	2780	1260	680	557	477	390	381	1990	3200	4680		
17	2670	1240	675	548	471	388	391	2070	3180	4720		
18	2540	1220	679	539	466	383	405	2100	3190	4780		
19	2440	1190	684	530	466	376	425	2150	3210	4930		
20	2400	1180	691	522	530	379	445	2190	3250	5000		
21	2350	1140	685	517	536	379	466	2190	3250	4990		
22	2300	1130	684	508	475	374	4500	2170	3240	4950		
23	2300	1100	686	504	467	366	4520	2160	3460	4940		
24	2300	1070	689	496	478	362	4560	2120	3770	5020		
25	2260	1040	687	494	464	364	605	2330	4130	5070		
26	2240	1010	682	488	453	363	633	2110	4390	5060		
27	2200	981	686	482	459	361	657	2120	4610	5060		
28	2180	948	682	478	455	365	676	2120	4720	5100		
29	2160	913	679	468	444	363	692	2140	4680	5240		
30	2100	869	678	460	---	362	711	2210	4600	5460		
31	2060	---	675	448	---	358	---	2270	---	5730		
TOTAL	117750	41176	22102	17244	---	12235	---	50420	104920	149230		
MEAN	3798	1373	713	556	---	395	---	1626	3497	4814		
MAX	9190	2060	845	662	---	438	---	2270	4720	5730		
MIN	2060	864	675	448	---	358	---	726	2390	4430		
AC-FT	233600	81670	43840	34200	---	24270	---	100000	208100	296000		

PROVISIONAL RECORDS
SUBJECT TO REVISION

PROVISIONAL RECORDS
SUBJECT TO REVISION

PROVISIONAL RECORDS
SUBJECT TO REVISION

• Estimated

Appendix N

Alaska Status Plats:

T. 5 N., R. 4 W., S.M.
Section 33, T. 5 N., R. 4 W., S.M.
Section 32, T. 5 N., R. 4 W., S.M.
Section 28, T. 5 N., R. 4 W., S.M.

TOWNSHIP 5N RANGE 4W OF THE SEWARD MERIDIAN, ALASKA

STATUS PLAT

GRAPHIC ILLUSTRATION ONLY, SOURCE DOCUMENTS REMAIN THE OFFICIAL RECORD

LEGEND

BASE INFORMATION

- STREAM
- WATERBODY
- SURVEY
- SECTION LINE
- MAJOR ROAD
- SECONDARY ROAD
- TRAIL
- BOUNDARY
- RAILROAD
- ELECT PWR LINE
- TELEPHONE LINE
- PIPELINE
- HORIZ CONTROL
- LIMITS OF ACTION
- AIRPORTS OR LANDING STRIPS

STATUS INFORMATION

- TITLE
- CLASSIFICATION
- DISPOSAL
- MUNICIPAL
- RESTRICTIONS
- FEDERAL ACTIONS
- REMOTE CABIN PERMIT
- TRAPPING CABIN PERMIT
- C PER FROM TRESPASS
- TRESPASS
- GROUND, APLN
- GROUND, PER
- GROUND, CERT
- DIV SURFACE, APLN
- DIV SURFACE, PER
- DIV SURFACE, CERT
- RESERVED, APLN
- RESERVED, CERT
- DIV INSTALLATION, APLN
- DIV INSTALLATION, PER
- DIV INSTALLATION, CERT

SECTION NUMBERING GRID

6	5	4	3	2	1
7	8	9	10	11	12
18	17	16	15	14	13
19	20	21	22	23	24
30	29	28	27	26	25
31	32	33	34	35	36



BASED ON

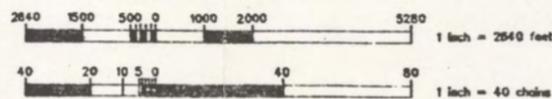
COORDINATES:
ALASKA STATE PLANE ZONE 4
SE CORNER OF TOWNSHIP:
X 23094.059
Y 2385043.058
LAT 60 28 24.912 N
LONG 149 53 02.07 W

HYDROGRAPHY:
USGS KENAI (B) & (C) AND SEWARD (B) & (C) BLM PHOTO
REVISED FROM AERIAL HIGH ALTITUDE PHOTOGRAPHY 1978-1985

LAND NET:
BLM PROTRACTOR DIAGRAM S18-B, APPROVED 10/27/1959
USS 658, APPROVED 12/08/1954
USS 3071, ACCEPTED 07/01/1959
USS 3398, ACCEPTED 05/02/1957
USS 3392, ACCEPTED 04/24/1958
USS 3393, ACCEPTED 04/24/1958
USS 7206, ACCEPTED 01/17/1982

OTHER ACTIONS AFFECTING DISPOSAL OR USE OF STATE LANDS:
ENTIRELY W/IN KENAI PENINSULA BOROUGH
LAS 12876: RESERVATION OF INSTREAM FLOW AFFECTS ENTIRE LENGTH OF RIVER WITHIN THIS TOWNSHIP
AS 4124500: KENAI RIVER SPECIAL MANAGEMENT AREA INCLUDES ENTIRE LENGTH OF KENAI RIVER IN THIS TOWNSHIP; CLOSED TO MINERAL ENTRY UNDER AS 38.05.017-38.05.200 AS 18.24.030(a); THE KENAI NATIONAL MOOSE RANGE; THE STATE GAME REFUGE INCLUDES THOSE LAND AREAS WITHIN THE KENAI NATIONAL MOOSE RANGE AS IT EXISTED IN 1960

SCALE



A PRODUCT OF THE
STATE OF ALASKA
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF MANAGEMENT
AUTOMATED DRAFTING SYSTEM

BY: D-L DATE: 8/22/86

SP
TWP 5N
RNG 4W
SM

GRAPHIC ILLUSTRATION ONLY, SOURCE DOCUMENTS REMAIN THE OFFICIAL RECORD

LEGEND

BASE INFORMATION

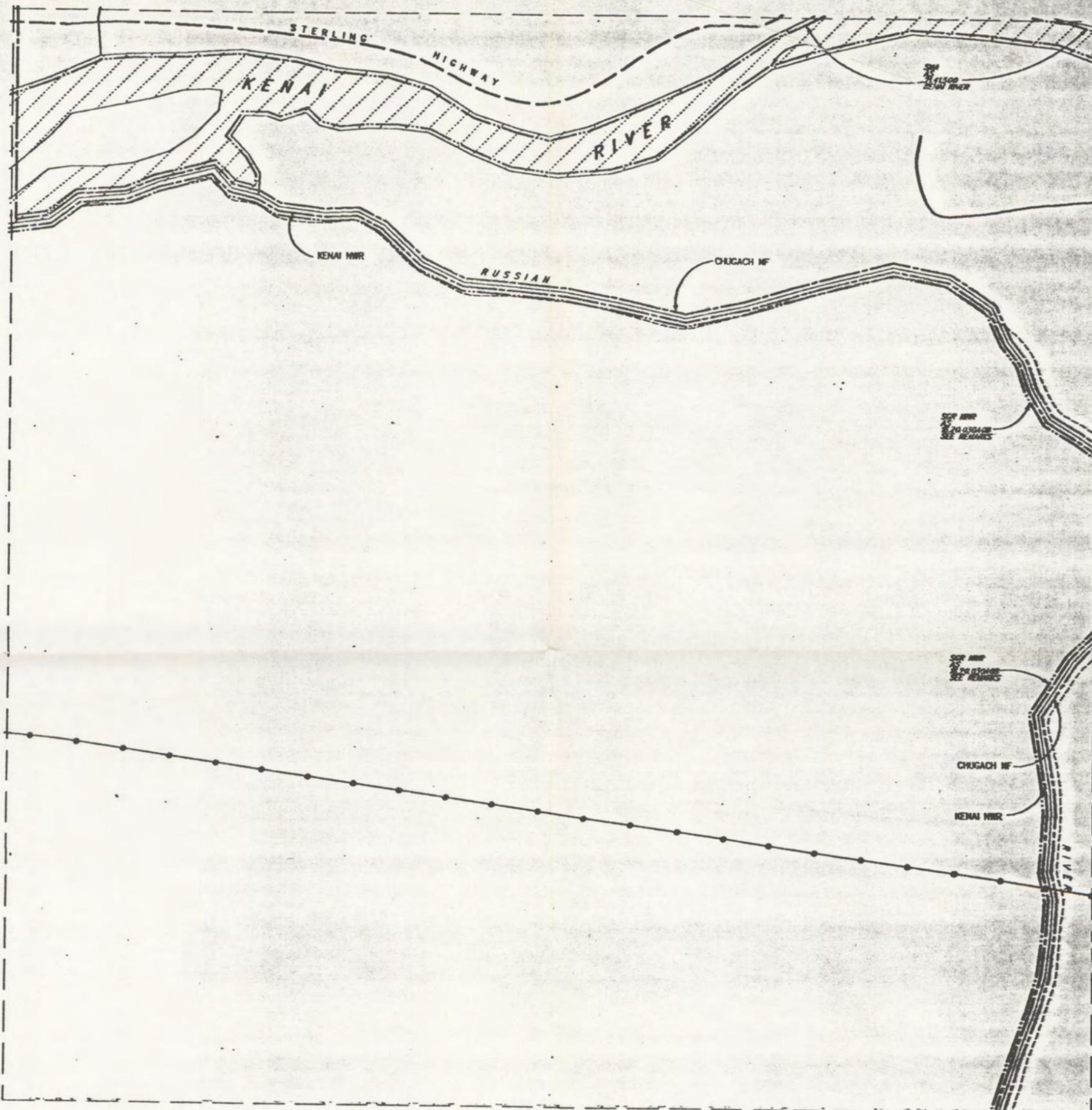
- STREAM
- WATER BODY
- SURVEY
- SECTION LINE
- MAJOR ROAD
- SECONDARY ROAD
- TRAIL
- BOUNDARY
- RAILROAD
- ELECT PWR LINE
- TELEPHONE LINE
- PIPELINE
- HORIZ CONTROL
- LIMITS OF ACTION
- AIRPORTS OR LANDING STRIPS

STATUS INFORMATION

- TITLE
- CLASSIFICATION
- DISPOSAL
- MUNICIPAL
- RESTRICTIONS
- FEDERAL ACTIONS
- REMOTE CABIN PERMIT
- TRAPPING CABIN PERMIT
- C PER FROM TRESPASS
- TRESPASS
- GROUND, APLN
- GROUND, PER
- GROUND, CERT
- DIV SURFACE, APLN
- DIV SURFACE, PER
- DIV SURFACE, CERT
- RESERVED, APLN
- RESERVED, CERT
- DIV INSTALLATION APLN
- DIV INSTALLATION PER
- DIV INSTALLATION CERT

SECTION NUMBERING GRID

6	5	4	3	2	1
7	8	9	10	11	12
16	17	16	15	14	13
19	20	21	22	23	24
30	29	28	27	26	25
31	32	33	34	35	36



BASED ON

COORDINATES:
ALASKA STATE PLANE ZONE 4
SE CORNER OF TOWNSHIP:
X 570913.968
Y 3105043.058
LAT 60 29 24.922 N
LONG 149 53 02.967 W

HYDROGRAPHY:
USGS NEMA (99 & 10) AND SEWARD (99 & 10) BLM PHOTO
REVISED FROM AERIAL HIGH ALTITUDE PHOTOGRAPHY 1978-1985

LAND USE:
BLM PROTRACTOR DIAGRAM S18-8 APPROVED 10/27/1959
BSS 1858: APPROVED 12/05/1954
BSS 3037: ACCEPTED 07/16/1957
BSS 3398: ACCEPTED 04/02/1957
BSS 3398: ACCEPTED 04/24/1958
BSS 3398: ACCEPTED 01/24/1958
BSS 3286: ACCEPTED 04/17/1952

OTHER ACTIONS AFFECTING DISPOSAL OR USE OF STATE LANDS:
ENTIRELY KEENI RIVER PERMITS A BROADWAY
LAW 1976: RESERVATION OF INSTANT FLOW AFFECTS ENTIRE LENGTH OF RIVER WITHIN THIS TOWNSHIP
AS 4121500: KEENI RIVER SPECIAL MANAGEMENT AREA
INCLUDES ENTIRE LENGTH OF KEENI RIVER IN THIS TOWNSHIP
CLOSED TO ANNUAL EXCESS UNDER AS 38 05 01-38 05 200
AS 38 05 01 000: THE KEENI NATIONAL MOOSE RANGE; THE STATE GAME REFUGE INCLUDES THOSE LAND AREAS WITHIN THE KEENI NATIONAL MOOSE RANGE AS IT EXISTED IN 1940

SCALE



A PRODUCT OF THE
STATE OF ALASKA
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF MANAGEMENT
AUTOMATED DRAFTING SYSTEM

SEC 33
SP
TWP 5N
RNG 4W
SM

QUALITY CONTROL CHECKED
BY: DAL DATE: 2/22/94

SEC 32 TOWNSHIP 5N RANGE 4W OF THE SEWARD MERIDIAN, ALASKA

STATUS PLAT

GRAPHIC ILLUSTRATION ONLY, SOURCE DOCUMENTS REMAIN THE OFFICIAL RECORD

LEGEND

BASE INFORMATION

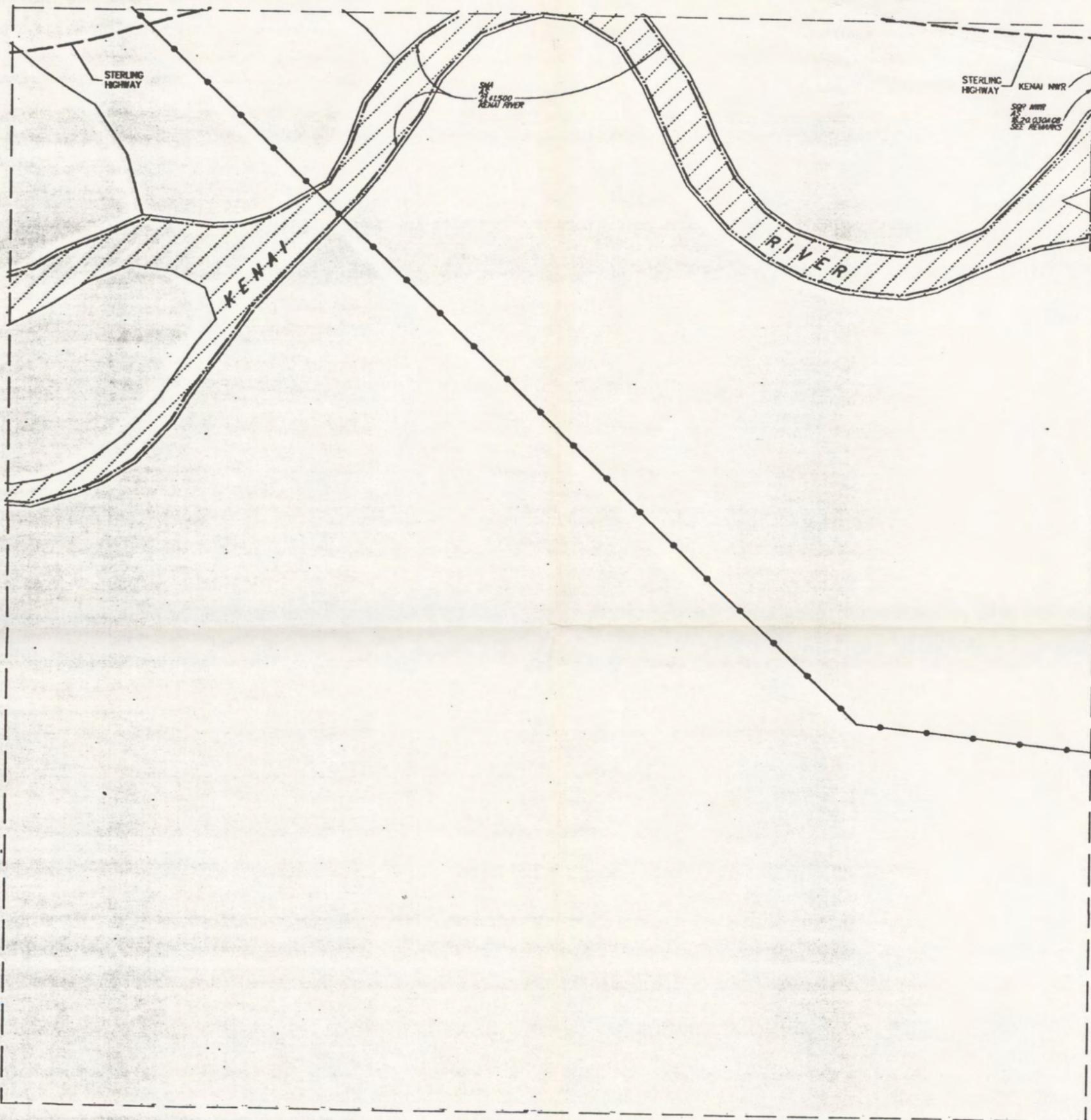
- STREAM
- WATER BODY
- SURVEY
- SECTION LINE
- MAJOR ROAD
- SECONDARY ROAD
- TRAIL
- BOUNDARY
- RAILROAD
- ELECT PWR LINE
- TELEPHONE LINE
- PIPELINE
- HORIZ CONTROL
- LIMITS OF ACTION
- AIRPORTS OR LANDING STRIPS

STATUS INFORMATION

- TITLE
- CLASSIFICATION
- DISPOSAL
- MUNICIPAL
- RESTRICTIONS
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- REMOTE CABIN PERMIT
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- DIV SURFACE, PER
- DIV SURFACE, CERT
- RESERVED, APLN
- RESERVED, CERT
- DIV INSTALLATION APLN
- DIV INSTALLATION PER
- DIV INSTALLATION CERT

SECTION NUMBERING GRID

6	5	4	3	2	1
7	8	9	10	11	12
18	17	16	15	14	13
19	20	21	22	23	24
30	29	28	27	26	25
31	32	33	34	35	36



BASED ON

COORDINATES:
ALASKA STATE PLANE ZONE 4
SE CORNER OF TOWNSHIP:
X 520949.800
Y 2385043.058
LAT 60 28 24.512 N
LONG W9 53 02.007 W

HYDROGRAPHY:
USGS KENAI (D) & (C) AND SEWARD (D) & (C) 6L4 PHOTO
REVISED FROM AERIAL HIGH ALTITUDE PHOTOGRAPHY 878-8825

LAND USE:
BLM PROTRACTION DIAGRAM S16-6; APPROVED 10/27/1988
USS 8552; APPROVED 12/06/2024
USS 3037; ACCEPTED 07/16/2022
USS 3396; ACCEPTED 05/02/2022
USS 3382; ACCEPTED 04/24/2022
USS 3384; ACCEPTED 01/24/2022
USS 7288; ACCEPTED 01/17/2022

OTHER ACTIONS AFFECTING DISPOSAL OR USE OF STATE LANDS:
ENTIRELY W/IN KENAI PENINSULA BOROUGH
LAS STATE RESERVATION OF INSTREAM FLOW AFFECTS ENTIRE LENGTH OF RIVER WITHIN THIS TOWNSHIP
AS 4121500; KENAI RIVER SPECIAL MANAGEMENT AREA INCLUDES ENTIRE LENGTH OF KENAI RIVER IN THIS TOWNSHIP
CLOSED TO ANIMAL ENTRY UNDER AS 38.05.01-38.05.020
AS 38.20.020-025; THE KENAI NATIONAL MOOSE RANGE; THE STATE GAME REFUGE INCLUDES THOSE LAND AREAS WITHIN THE KENAI NATIONAL MOOSE RANGE AS IT EXISTED IN 1960

SCALE



A PRODUCT OF THE
STATE OF ALASKA
DEPARTMENT OF NATURAL RESOURCES
DIVISION OF MANAGEMENT
AUTOMATED DRAFTING SYSTEM

SEC 32
SP
TWP 5N
RNG 4W

RDY-4

GRAPHIC ILLUSTRATION ONLY, SOURCE DOCUMENTS REMAIN THE OFFICIAL RECORD

LEGEND

BASE INFORMATION

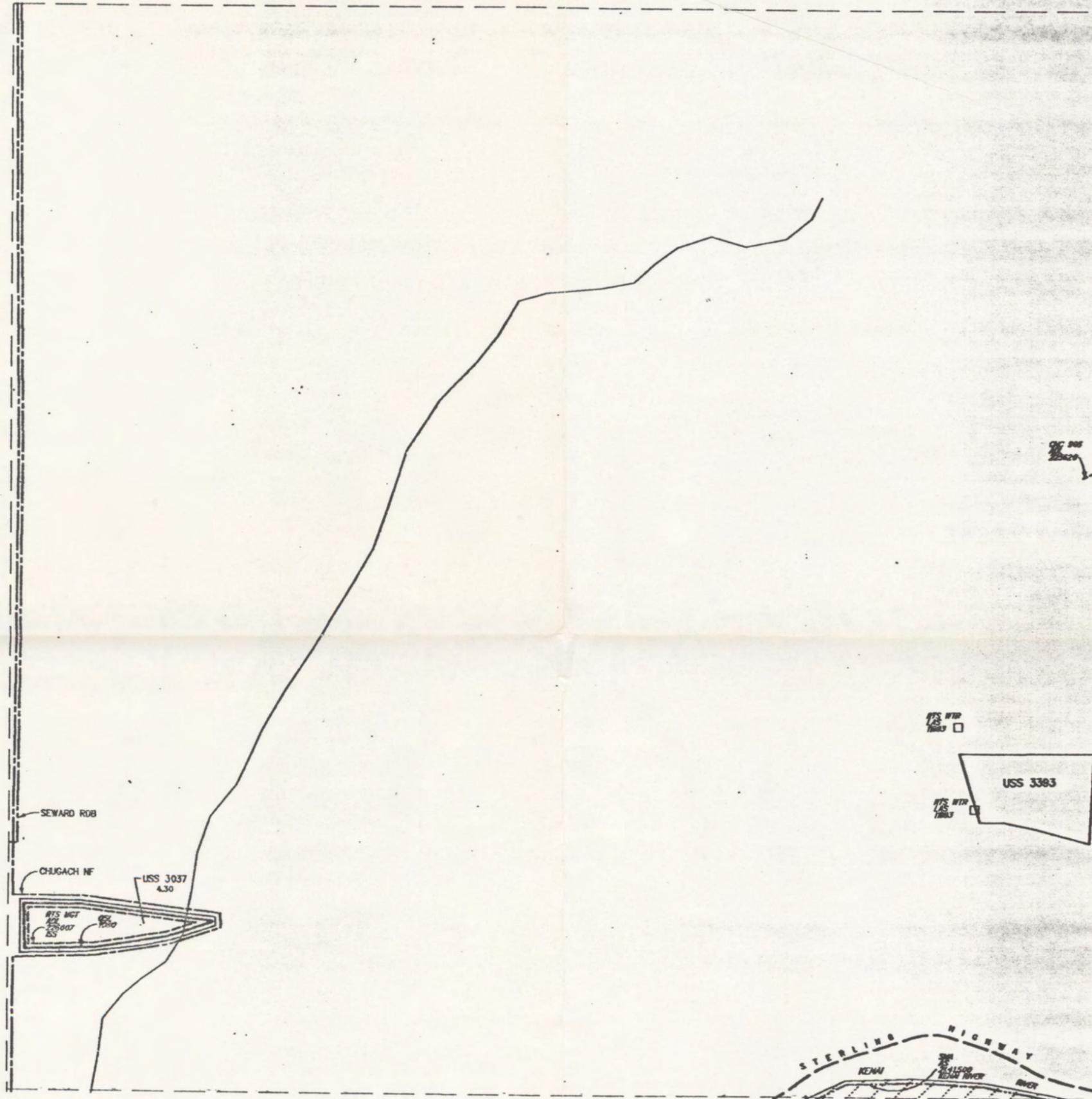
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- WATER BODY
- SURVEY
- SECTION LINE
- MAJOR ROAD
- SECONDARY ROAD
- TRAIL
- BOUNDARY
- RAILROAD
- ELECT PWR LINE
- TELEPHONE LINE
- PIPELINE
- HORIZ CONTROL
- LIMITS OF ACTION
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STATUS INFORMATION

- TITLE
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- REMOTE CABIN PERMIT
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- GROUND, PER
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- DIV SURFACE, APLN
- DIV SURFACE, PER
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- RESERVED, APLN
- RESERVED, CERT
- DIV INSTALLATION APLN
- DIV INSTALLATION PER
- DIV INSTALLATION CERT

SECTION NUMBERING GRID

6	5	4	3	2	1
7	8	9	10	11	12
13	17	16	15	14	13
19	20	21	22	23	24
30	29	28	27	26	25
31	32	33	34	35	36



BASED ON

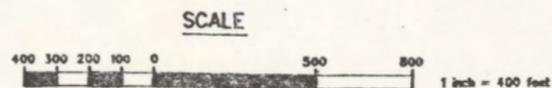
COORDINATES:
ALASKA STATE PLANE ZONE 4
SE CORNER OF TOWNSHIP:
X 520548.068
Y 2385043.068
LAT 63 28 24.922 N
LONG 148 53 02.07 W

PHOTOGRAPHY:
365 KENAI (P) & (C) AND SEWARD (P) & (C) BLM PHOTO
REVISED FROM AERIAL HIGH ALTITUDE PHOTOGRAPHY 1978-1985

LAND NET:
BLM PHOTOGRAPHY DIAGRAM 528-6 APPROVED 10/27/1989
USS 3383 APPROVED 12/16/1924
USS 3037 ACCEPTED 07/18/1952
USS 3308 ACCEPTED 04/02/1957
USS 3309 ACCEPTED 04/24/1958
USS 3393 ACCEPTED 01/21/1959
USS 7285 ACCEPTED 01/17/1982

OTHER ACTIONS AFFECTING DISPOSAL OR USE OF STATE LANDS:

ENTIRELY WITHIN KENAI PENINSULA BOROUGH
LAS 1986; RESERVATION OF INSTANT FLOW AFFECTS ENTIRE LENGTH OF RIVER WITHIN THIS TOWNSHIP
AS 427,500; KENAI RIVER SPECIAL MANAGEMENT AREA
INCLUDES ENTIRE LENGTH OF KENAI RIVER IN THIS TOWNSHIP
CLOSED TO IMMEDIATE ENTRY UNDER AS 38.05.100-38.05.200
AS 86.20.05.010; THE KENAI NATIONAL MOOSE RANGE; THE STATE GAME REFUGE INCLUDES THOSE LAND AREAS WITHIN THE KENAI NATIONAL MOOSE RANGE AS IT EXISTED IN 1990



A PRODUCT OF THE
 STATE OF ALASKA
 DEPARTMENT OF NATURAL RESOURCES
 DIVISION OF MANAGEMENT
 AUTOMATED DRAFTING SYSTEM

SEC 28
 SP
 TWP 5N
 RNG 4W
 SM

QUALITY CONTROL CHECKED
 BY DJL DATE: 2/22/94

Appendix O

Historic hand drawn maps:

USFS - Section of "Russian River Recreation Area" topographic map, (1929?).

BIA - Site Map, Russian River / Kenai River Site AA 11100, April 1980, revised.

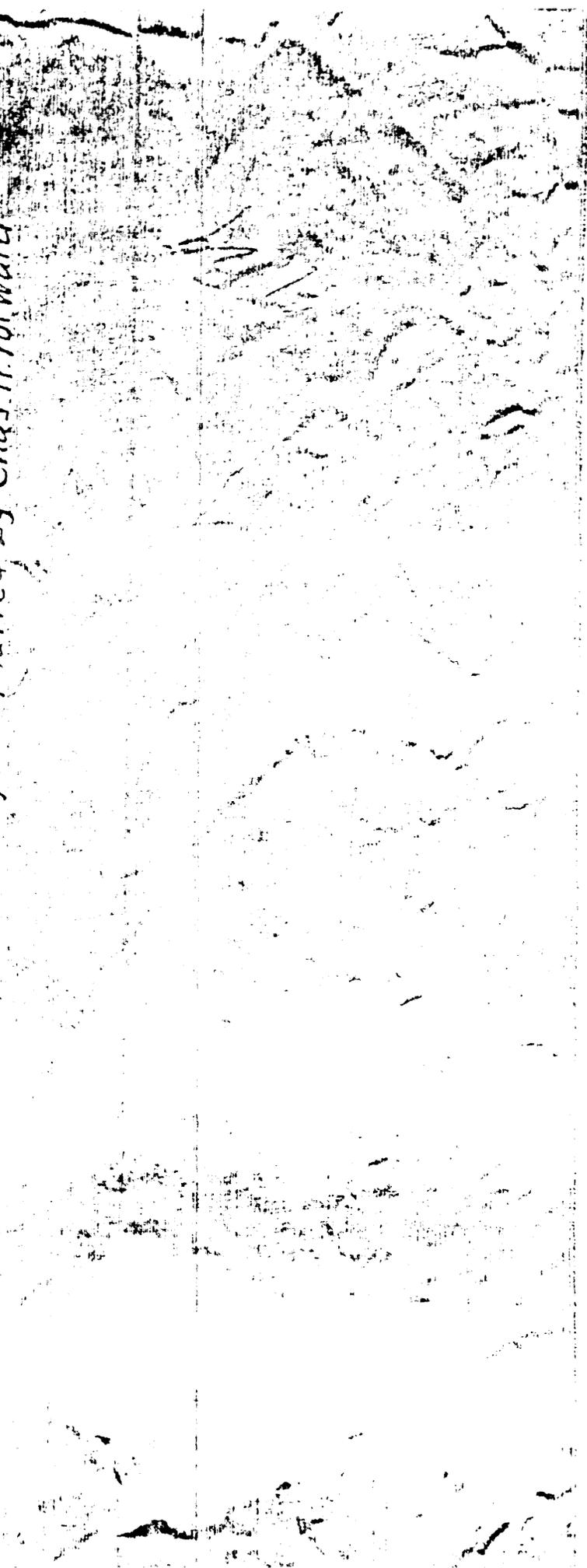
L - USES CHUGACH

RUSSIAN RIVER RECREATION AREA

Scale 1 inch = 200 feet $\frac{1}{200}$ Contour interval 10 ft.

Topography with plane table and stadia.

Field work by Chas. H. Forward, Forest Ranger Plotted by Chas. H. Forward



Site Map

Russian River and Khenk River Site NA111100

1000/1

S27°30'N
G2

FERRY

S52°30'E
K2
G2

NA111100
(911 A.)

TRUE NORTH
MAGNETIC North

Scale in Feet

0 250 500'

distance for the P.P.B./C-1:

WATER OF THE KHENK RIVER

IN STAKE

FOR READING "FERRY CROSSING, LOW FLOW" NOTED

UPSTREAM FROM THE STAKE

A TREE (COP) 3 OR 4 FT DISTANCE S30°W AT

LENGTH OF 56'

RUSSIAN RIVER FERRY CROSSING IS 1008 FEET

AWAY FROM THE P.P.B./C-1

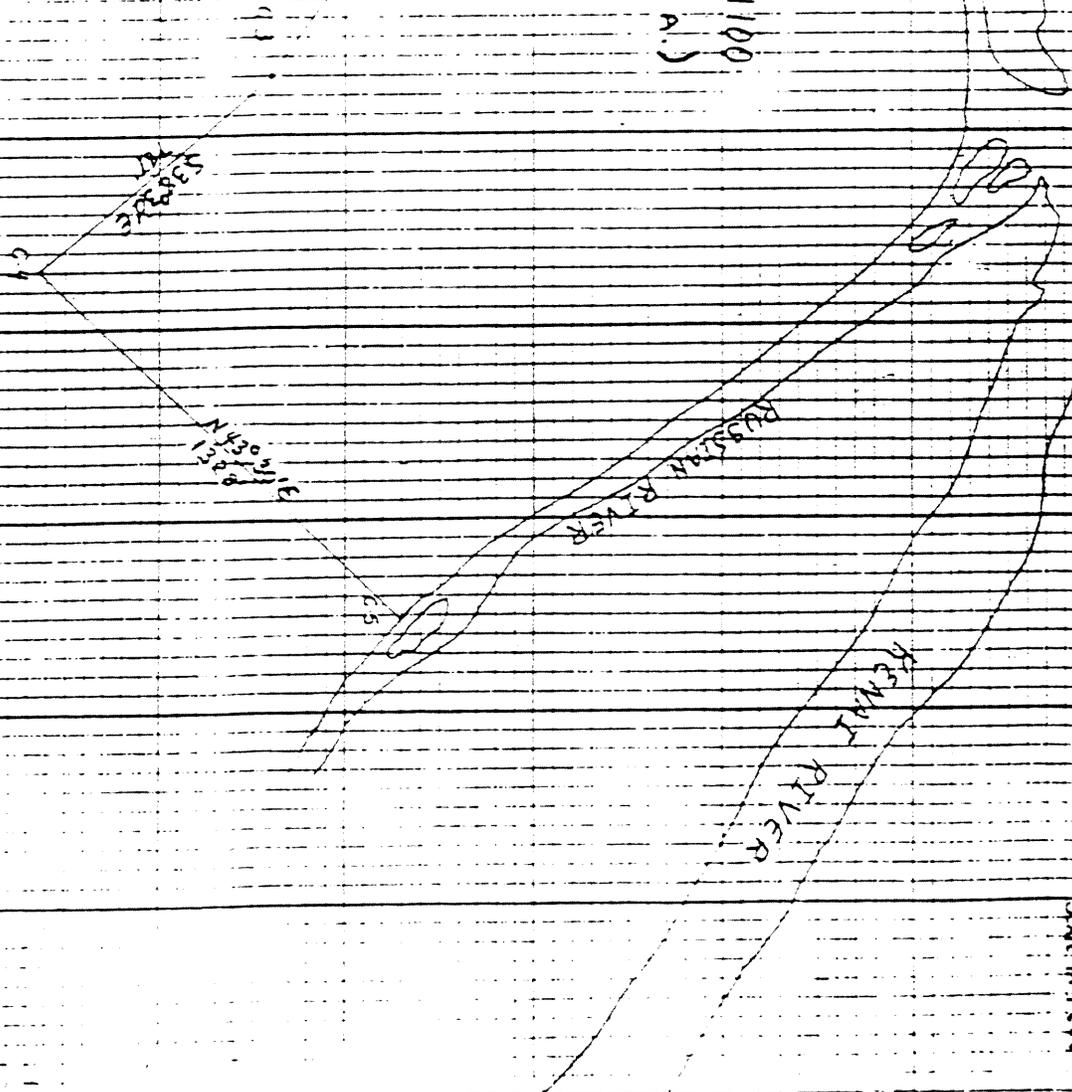
TOTAL ACRES:

91 ACRES

SEE C.P.S.U. FEATURE MAP ENTITLED

"ARCHAEOLOGICAL DISTRICT (MAP B)"

DETAIL



Field Notes: 1980 (1981/82)

Appendix P

BLM Case Abstracts:

AKAA 011096	Regional selection, 14(h)(1) application.
AKAA 011097	Regional selection, 14(h)(1) application.

Case Serial Num: Akaa 011096 FCR Site Code: SEA
 Case Type: 265301 Cemetery-Hist Site -Ak Accession Num:
 Case Status: Pending Box Num: of
 Case Status Actn: Application Received Disp Date:
 Case Status Date: 17-DEC-1975 Location Code:

 Customer Data

Custid: 000004225 Int Rel: Applicant Pct Int: .00000
 Cust Name: COOK INLET REGION INC
 Cust Address: ATTN LAND DEPARTMENT
 PO BOX 93330
 ANCHORAGE AK 99509

Administrative/Status Action Data

Date	Code/Description	Remarks	Doc Id	Ofc	Emp
17-DEC-1975	001 Application Received	APPLICATION RECEIVED		AJA	LH
16-APR-1976	004 Amend/Corr Apln Recd			AJA	EB
02-JUN-1977	004 Amend/Corr Apln Recd			AJA	LH
12-JAN-1979	152 Report Requested	BIA Other Agency: BIA		DAO	SDZ
11-AUG-1980	004 Amend/Corr Apln Recd			DAO	PGC
23-AUG-1983	153 Report Received	BIA Other Agency: BIA		DAO	LKB
17-MAY-1984	153 Report Received	BIA Other Agency: BIA		DAO	LKB
30-MAY-1984	004 Amend/Corr Apln Recd			DAO	MTH
11-SEP-1984	004 Amend/Corr Apln Recd			DAO	MTH
29-MAR-1985	004 Amend/Corr Apln Recd			DAO	LKB
12-SEP-1985	004 Amend/Corr Apln Recd			DAO	LKB
17-SEP-1985	152 Report Requested	BIA Other Agency: BIAA		DAO	LKB
24-JUN-1986	974 Automated Record Veri			DAO	LKB
03-JUL-1986	938 Esmt 17(B) Id/Amd Rqs			DAO	EHG
24-SEP-1986	145 Nav Report Requested			DAO	EHG
01-NOV-1988	153 Report Received	BIA Other Agency: BIA		DAO	EHG
01-NOV-1988	196 Certified Eligible			DAO	HAC
09-DEC-1988	004 Amend/Corr Apln Recd			DAO	EHG
04-JAN-1989	974 Automated Record Veri			DAO	SGF
19-JAN-1989	938 Esmt 17(B) Id/Amd Rqs			DAO	EHG
27-AUG-1992	996 Converted To Prime			940	BKM

 No Financial Actions Found

General Remarks

THIS FILE CONTAINS AA-11818
 AA-11100 & AA-11098
 LAND DESCRIPTION DESCRIBED
 IN CIRI LTR OF 6-12-85
 AMENDED 9-12-85) STANDS
 AS WRITTEN

No Geographic Names Found

Land Description													
Mr	Twp	Rng	Sec	Aliquot	Survey Id	Tr	Blk	Lot	Di	Bor	NR	LS	Acres
28	5N	4W	27	S2S2SW					04	122	07	FR	40.0000
28	5N	4W	28	S2					04	122	07	FR	306.0000
28	5N	4W	29	SE					04	122	07	FR	160.0000
28	5N	4W	32	E2NW					04	122	07	FR	70.0000
28	5N	4W	32	NE					04	122	07	FR	135.0000
28	5N	4W	33	N2					04	122	07	FR	285.0000
28	5N	4W	33	N2S2					04	122	07	FR	160.0000
28	5N	4W	33	N2SESW					04	122	07	FR	20.0000
28	5N	4W	33	N2SWSE					04	122	07	FR	20.0000
28	5N	4W	33	NESWSW					04	122	07	FR	10.0000
28	5N	4W	33	SESE					04	122	07	FR	40.0000
28	5N	4W	34						04	122	07	FR	565.0000
28	5N	4W	35	W2W2NW					04	122	07	FR	40.0000
Filing Received:					1851.0000	Pending Total:					1851.0000		

Total Case Acres: 1851.0000

End of Case: Akaa 011096

Case Serial Num: AKAA 011097 FCR Site Code: SEA
 Case Type: 265301 Cemetery-Hist Site -Ak Accession Num:
 Case Status: Pending Box Num: of
 Case Status Actn: Application Received Disp Date:
 Case Status Date: 17-DEC-1975 Location Code:

 Customer Data

Custid: 000004225 Int Rel: Applicant Pct Int: .00000
 Cust Name: COOK INLET REGION INC
 Cust Address: ATTN LAND DEPARTMENT
 PO BOX 93330
 ANCHORAGE AK 99509

Administrative/Status Action Data

Date	Code/Description	Remarks	Doc Id	Ofc	Emp
17-DEC-1975	001 Application Received	APPLICATION RECEIVED		PSA	BJW
02-JUN-1977	113 Addtl Info Recd			PSA	JLM
28-FEB-1979	152 Report Requested	BIA Other Agency: BIA		DAO	SDZ
20-AUG-1981	153 Report Received	BIA Other Agency: BIA		DAO	SKM
20-AUG-1981	196 Certified Eligible			DAO	LKB
26-FEB-1992	158 Survey Requested			AJA	SGE
27-AUG-1992	996 Converted To Prime			940	BKM

 No Financial Actions Found

General Remarks

SEE CASE AA-51227 (2655).
 RELINQUISHED PER ST MATTHEW
 ISLAND AGREEMENT;
 ST MATTHEW AGRMNT INVALID;
 (A-83-425 CIV) 1-4-85
 RELINQUISHMENT OF NO EFFECT

No Geographic Names Found

Land Description

Mr	Twp	Rng	Sec	Aliquot	Survey Id	Tr	Blk	Lot	Di	Bor	NR	LS	Acres
28	3N	4W	10	SENE					04	122	07	FR	16.8000
				Filing Received:	16.8000								Pending Total: 16.8000
												Total Case Acres: 16.8000	

 End of Case: AKAA 011097

Appendix Q

BLM Case Abstract and Hydro-power documents:

AKAA 011716, Withdrawal, power site classification.

Power Project No. 119, Reservation by Federal Power Commission (1921).

Partial vacation of Power Project No. 119 (1934).

Geological Survey Order affecting Power Site Classification No. 409 (1950).

PLO No. 2203 opening lands under Sec 24 FPA; PP 119; PSC 409 (1960).

PLO No. 2311 amending PLO 2203 (1961).

BLM Land Report recommending revocation of PP 119 and PSC 409 withdrawals (1983).

BLM request for revocation for Power Project 119 and others (1985).

FERC vacation of PP 119 and other power project withdrawals (1985).

Case Serial Num: Akaa 011716 FCR Site Code: SEA
Case Type: 231110 Wdl-Power Site Classific Accession Num:
Case Status: Pending Box Num: of
Case Status Actn: Petition For Restoration Disp Date:
Case Status Date: 15-JUN-1976 Location Code:

Customer Data

Custid: 000053899 Int Rel: Applicant Pct Int:
Cust Name: DEPARTMENT OF THE INTERIOR
Cust Address: 18TH AND C STREET NW
WASHINGTON DC 20240
Custid: 000005139 Int Rel: Int Party Of Rec Pct Int:
Cust Name: HEYMAN DUANE ET AL
Cust Address: 6035 TANAINA DR
ANCHORAGE AK 99502
Custid: 000000593 Int Rel: Holding Agency Pct Int:
Cust Name: BUREAU OF LAND MANAGEMENT
ALASKA STATE OFFICE
Cust Address: 222 WEST 7TH AVENUE #13
ANCHORAGE AK 99513

Administrative/Status Action Data

Date	Code/Description	Remarks	Doc Id	Ofc	Emp
09-DEC-1920	001 Apln Recd/Case Establ	APPLICATION	FA00000119	AJA	RH
09-DEC-1920	806 Land Segregated			AJA	RH
09-DEC-1920	830 Withdrawn			AJA	RH
29-JUN-1950	240 Published	IN FED REG REF #1011	NT19500629	932	SM
29-JUN-1950	806 Land Segregated			AJA	RH
29-JUN-1950	830 Withdrawn		PC00000409	AJA	RH
15-SEP-1960	990 Fpa Section 24			AJA	RH
15-SEP-1960	372 Segregation Terminate			AJA	RH
15-SEP-1960	816 Open To Entry	STATE SELECTION		932	SM
24-MAR-1961	317 Order Issued	REF #1924	PO00002311	AJA	RH
24-MAR-1961	990 Fpa Section 24			AJA	RH
24-MAR-1961	372 Segregation Terminate			AJA	RH
30-MAR-1961	240 Published	IN FED REG		AJA	RH
15-JUN-1976	820 Petition For Restorat			AJA	SJL
07-OCT-1982	130 Field Report Requeste			AJA	SJL
23-JUN-1983	521 Field Report Received			AJA	SJL
20-DEC-1985	130 Field Report Requeste	SUPPLEMENTAL		AJA	SJL
27-AUG-1992	996 Converted To Prime			940	BKM

No Financial Actions Found

General Remarks

ORIG WDN ACR 1,760
DATE EXPIRES INDEFINITE
SURFACE SEG FPA
SUBSURFACE SEG OTH
PLO 2203 OPENED PSC 409 SUBJECT TO SEC 24 OF FPA.
PENDING PETITION IS FOR FULL REVOCATION/RESTORATION

CASE240R
Adm-State: AK

Bureau of Land Management - Interim LIS
Case Abstract

03-Jul
Page 4

Mr	Twp	Rng	Sec	Aliquot	Land Description Survey Id	Tr	Blk	Lot	Di	Bcr	NR	LS	Acres
28	5N	4W	33	N2					04	122	07	WN	200.0
	Doc ID:	PC00000409											
28	5N	4W	34						04	122	07	WN	315.0
	Doc ID:	PC00000409											
28	5N	4W	35						04	122	07	WN	325.0
	Doc ID:	PC00000409											
28	5N	4W	36						04	122	07	WN	270.0
	Doc ID:	PC00000409											
Withdrawn (Lands):					1760.0200	Adjudicated Total:							1760.0

Total Case Acres:												1760.0	

End of Case: Akaa 011716

FERC ORDER
Part Affected: PP No. 119
Date Application Filed: 12/09/20
Date Signed: 2/15/21

SECRETARY OF WAR, CHAIRMAN
SECRETARY OF THE INTERIOR
SECRETARY OF AGRICULTURE

O. C. MERRILL, EXECUTIVE SECRETARY

FEDERAL POWER COMMISSION
WASHINGTON

ADDRESS REPLY TO
EXECUTIVE SECRETARY
AND REFER TO

E
Projects, Alaska (#119)
Ballaine, Frank L.

February 15, 1921.

COPY

Dear Mr. Tallman:

In accordance with the provisions of Section 24 of the Act of June 10, 1920 (41 Stat., 1063) notice is hereby given that the following described lands of the United States are included in a power project for which application has been filed by Mr. Frank L. Ballaine, 424 Alaska Building, Seattle, Washington. The date of filing of the application is December 9, 1920. Under the said Section 24 these lands are, from the said date of filing, reserved from entry, location or other disposal under the laws of the United States until otherwise directed by the Commission or by Congress. The area of this reserve is 12,320 acres.

Kenai Peninsula
Chugach National Forest
Alaska.

All lands within one-quarter of a mile of
Upper Kenai Lake.

All lands within one-quarter of a mile of
that portion of Kenai River between Upper Kenai
Lake and Skilak Lake.

Very truly yours,

(SIGNED) O.C. MERRILL

Executive Secretary.

The Commissioner,
General Land Office.

FEDERAL POWER COMMISSION

Frank R. McNinch, Chairman
Basil Manly, Vice Chairman
Herbert J. Drane
Claude L. Draper

Commissioners

Partial vacation of power withdrawal
(Project No. 119)

The following order was adopted:

Whereas on February 15, 1921, under authority of section 24 of the Federal Water Power Act and pursuant to an application filed December 7, 1920, by Frank L. Ballaine for a preliminary permit for project No. 119, there were reserved from entry, location, or other disposal under the laws of the United States, all lands within a quarter of a mile of Kenai Lake, and all lands within a quarter of a mile of that portion of Kenai River between Kenai Lake and Skilak Lake, partly in the Chugach National Forest, Third Judicial Division, Alaska, aggregating about 12,320 acres; and Whereas the Forest Service has requested that the said reservation be amended so as to reduce the area included therein; and it appearing:

- (1) That a preliminary permit for said project was issued on May 22, 1922, and expired on May 29, 1925, and that no application for license was filed;
- (2) That the area reserved includes lands having no value for power purposes; and
- (3) That, according to surveys and engineering investigations made during the life of the preliminary permit, it is possible to partially regulate the outflow from Kenai Lake by raising the water surface of said lake about 5 feet above ordinary low-water stage, and to develop power by the construction of a dam about 120 feet high at a site about 3 miles upstream from Skilak Lake.

Therefore, the Commission having considered said power withdrawal and all matters pertinent thereto, including a report from the Forest Service:

That certain parts of the reserved lands have little or no power value and, in so far as the purposes of the act are concerned, are no longer required to be reserved from entry, location, or other disposal; and

It is ordered:

That the project No. 119 be and it is hereby vacated in part and the power withdrawal shall include only the lands described in the following area of about 2,000 acres:

All lands along Kenai River to the mouth of said lake, and a mean low-water stage in said lake 5 feet above said mean low-water stage.

Handwritten signature

2

all lands within one fourth mile of the center line of that section of Kenai River between the mouth of Russian River and a proposed dam site located about 3 miles above Skilak Lake, as shown on a map entitled "Map Accompanying Application of Frank L. Ballaine for Preliminary Permit for Water Power Project on Kenai River and Kenai Lake" (F.P.C. No. 12-1).

I, LEON M. FUQUAY, Acting Secretary of the Federal Power Commission, hereby certify that the foregoing is a true and correct copy of a portion of the minutes of a meeting of the Federal Power Commission in the City of Washington, District of Columbia, on the 24th day of April, 1957.

In testimony whereof, I have hereunto set my hand and seal of the Federal Power Commission to be affixed at the City of Washington, District of Columbia, this 10th day of May, 1957.

Leon M. Fuquay
Acting Secretary

Federal Register Data

Published: 7/11/50
No. : 132

Volume: 15
Page: 4380

GEOLOGICAL SURVEY ORDER
Part Affected: PSC No. 409
Filed Date: 7/10/50

Geological Survey

KENAI RIVER, ALASKA

POWER SITE CLASSIFICATION NO. 409

Pursuant to authority vested in me by the act of March 3, 1879 (20 Stat. 394; 43 U. S. C. 31), and by Departmental Order No. 2333 of June 10, 1947 (43 CFR 4.623; 12 F. R. 4025), the following described land is hereby classified as power sites insofar as title thereto remains in the United States and subject to valid existing rights; and this classification shall have full force and effect under the provisions of sec. 24 of the act of June 10, 1920, as amended by sec. 211 of the act of August 26, 1935 (16 U. S. C. 818):

All lands within $\frac{1}{4}$ mile of Kenai River from the mouth of Russian River upstream to the present bridge across Kenai River at Coopers landing. This bridge is located at latitude 60°29' N., longitude 149°50' W., approximately.

The area described aggregates about 1,760 acres.

JULIAN D. SEARS,
Acting Director.

[F. R. Doc. 50-5933; Filed, July 10, 1950;
8:45 a. m.]

Federal Register Data

Published: 9/21/60
No. : 184

Volume: 25
Page: 9050 & 9051

PLO No. 2203

PP No. 119,
Part Affected: PSC No. 409
Date Signed: 9/15/60

[Public Land Order 2203]

[06604]

ALASKA

**Order Opening Lands Under Section
24 of the Federal Power Act; Project
No. 119; Power Site Classification
No. 409**

1. In DA-60, DA-61, and DA-62, Alaska, the Federal Power Commission determined that the value of the following-described lands, withdrawn in Project No. 119 and Power Site Classification No. 409, would not be injured or destroyed for power development purposes by entry, location or selection under the public land laws subject to the provisions of section 24 of the Federal Power Act, as amended, and as to those lands lying between mean low-water stage in Kenai Lake and an elevation 6 feet above said mean low-water stage, to the further stipulation that the United States, its permittees or licensees shall not be liable for any damages to improvements or structures placed thereon resulting from the construction, operation or maintenance of any power project works authorized by the United States:

KENAI PENINSULA**CHUGACH NATIONAL FOREST****a. Project No. 119:**

All lands around Kenai Lake and along Kenai River to the mouth of Russian River, between mean low-water stage in said lake and river and an elevation 6 feet above said mean low-water stage:

All lands within one fourth mile of the center line of that section of Kenai River between the mouth of Russian River and a proposed dam site located about 3 miles above Skilak Lake, as shown on a map entitled "Map Accompanying Application of Frank L. Ballaine for Preliminary Permit for Water Power Project on Kenai River and Kenai Lake" (F.P.C. No. 119-1).

Containing approximately 2,000 acres.

b. Power Site Classification No. 409:**KENAI RIVER****CHUGACH NATIONAL FOREST**

All lands within ¼ mile of Kenai River from the mouth of Russian River upstream to the present bridge across Kenai River at Coopers Landing. This bridge is located at latitude 60°20' N., longitude 149°50' W., approximately.

Containing 1,760 acres.

2. On April 24, 1934, Project No. 119 affecting the following-described lands:

KENAI PENINSULA**CHUGACH NATIONAL FOREST**

All lands within ¼ mile of Upper Kenai Lake and

All lands within ¼ mile of that portion of Kenai River between Upper Kenai Lake and Skilak Lake.

was vacated by the Federal Power Commission, excepting, however, the lands described in paragraph 1a hereof.

3. By virtue of the authority vested in the Secretary of the Interior by section 24 of the Act of June 10, 1920 (41 Stat. 1075; 16 U.S.C. 818), as amended, the lands are hereby opened, subject to valid existing rights and the requirements of applicable law, to such applications, selections, and locations as are permitted on national forest lands, effective at 10:00 a.m. on December 16, 1960, subject to the provisions of section 24 of the Act of June 10, 1920, supra, and the stipulation recited in paragraph 1 of this order. Applications presented prior to the time specified will be considered as simultaneously filed at that hour. Applications filed thereafter will be considered in the order of filing.

4. Until 10:00 a.m. on December 16, 1960, the State of Alaska shall have a preferred right of application for the reservation to the State or any political subdivision thereof, under any statute or regulation applicable thereto, of any lands required as a right-of-way for a public highway or as a source of materials for the construction and maintenance of such highways, pursuant to section 24 of the Federal Power Act of June 10, 1920, supra.

5. Inquiries concerning the lands should be addressed to the Manager, Land Office, Bureau of Land Management, Anchorage, Alaska.

FRED G. AANDAHL,

Assistant Secretary of the Interior.

SEPTEMBER 15, 1960.

[F.R. Doc. 60-8763; Filed, Sept. 20, 1960;
8:46 a.m.]

Federal Register Data

Published: 3/30/61
No. : 60

Volume: 26
Page: 2687

PLO No. 2311
Date Signed: 3/24/61
Filed Date: 3/29/61

[Public Land Order 2311]

[00004]

ALASKA

**Amending Public Land Order No.
2203 of September 15, 1960**

Public Land Order No. 2203 of September 15, 1960, opening lands under section 24 of the Federal Power Act, is hereby amended to the extent necessary to make clear that the land in paragraph 1(a) of the order described as all lands within one-fourth mile of the center line of that section of Kennai River between the mouth of Russian River and a proposed dam site about 3 miles above Skilak Lake, are chiefly if not entirely within the Kenai National Moose Range rather than the Chugach National Forest, and to that extent will not be subject to the opening provisions of the order.

JOHN A. CARVER, Jr.,
Assistant Secretary of the Interior.

MARCH 24, 1961.

[P.L. Doc. 61-2787; Filed, Mar. 20, 1961;
8:40 a.m.]

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

LAND REPORT TITLE PAGE

State Alaska	District Anchorage
County	Resource area Peninsula
Type of Action Revocation/Restoration (2370)	Serial Number AA-11716
Applicant's name Duane Heyman, et al.	Address (include zip code) 6035 Tanaina Drive Anchorage, Alaska 99502

Date(s) of examination

LANDS INVOLVED

TOWNSHIP	RANGE	MERIDIAN	SECTION	SUBDIVISION	ACRES
PP 119	All lands around Kenai Lake and along Kenai River to the mouth of Russian River, between mean low-water stage in said lake and river and an elevation 6 feet above said mean low-water stage: All lands within 1/4 mile of the center line of that section of Kenai River between the mouth of Russian River and a proposed dam site located about 3 miles above Skilak Lake.				2,000
PSC 409	All lands within 1/4 mile of Kenai River from the mouth of Russian River upstream to the present bridge across Kenai River at Coopers landing. This bridge is located at latitude 60°29' N., longitude 149° 50' W., approximately				1,760

Purpose of report

Recommendations concerning the revocation of the Power Site Classification 409 and Power Project 119 Withdrawals.

Prepared by Michael Kasterin	Title Realty Specialist	Date of report 6/21/83
---------------------------------	----------------------------	---------------------------

I. Proposed Action

A Petition for Restoration of Lands Withdrawn Pursuant to Section 24 of the Federal Power Act filed on June 15, 1976 by a group of eleven (11) petitioners. These parties each hold U.S. Forest Service Permits for the use of lands in the Cooper Landing area.

The petitioners submitted that the withdrawal classifications were no longer needed since it had been determined by the Alaska Power Administration that power development would not be feasible.

Revocation of the withdrawals would enable the subject lands to be conveyed to both the State of Alaska (AA-2610) and the petitioners without reservations under Section 24 of the Federal Power Act.

II. Land Use Plans

The subject lands were originally classified under Power Project 119 on February 15, 1921 by the Federal Power Commission pursuant to an application for a preliminary permit filed by Frank L. Ballaine on December 9, 1920. This withdrawal was partially vacated in 1934 reducing the acreage of the Power Project Area. The U.S. Geological Survey classified a portion of the subject lands as a Power Site on July 10, 1950.

PLO 2203 of September 15, 1960 opened the lands in the two reserves to entry, location, and selection under the public land laws subject to the provisions of Section 24 of the Federal Power Act.

In the letter of June 15, 1976, the Alaska Power Administration indicated that there was no current public or private interest in power project development at this site. It was also stated that power development at the site was unlikely since the power potential was small, and since its value was greatly outweighed by potential environmental and land use impacts.

The Bureau of Land Management records indicate that no development or plans for development of the site were made.

Since the creation of the Alaska Power Authority (State) in 1978, no plans or development of the subject site have been made.

III. NEPA Requirements

Revocation of withdrawals meets the Categorical Exclusion criteria contained in 516 DM 6 Appendix 5.4B(4) and (11)(g). It does not meet the criteria for exception contained in 516 DM 2.3A(3). Accordingly, it has been determined that an Environmental Assessment is not required.

IV. Recommendation/Rationale

Recommendation

It is recommended that PP 119 (2/15/21) and PSC 409 (7/10/50) be revoked in their entirety and that the lands may be conveyed without a reservation under Section 24 of the Federal Power Act.

Rationale

1. The withdrawals were recommended for revocation by the Alaska Power Administration in 1975.
2. No development or planned development of the subject lands has been made, or is currently contemplated. No improvements relating to the subject withdrawals exist or were ever installed on the lands.

V.

Decision Record
Categorical Exclusion and Decision on the Proposed Action

This action is excluded from the environmental assessment and environmental statement requirements of the National Environmental Policy Act of 1969 by section 1085.4 of Title 40 CFR.

Further, the recommendations contained in the Land Report area proved as the decision of the Bureau of Land Management on the Proposed Action.

Donald L. Hinrichsen *Donald L. Hinrichsen* 6/23/83 Area Manager
Date Peninsula Resource Area

Wayne Boden *Wayne Boden* 6-23-83 ^{ACTG} District Manager
Date Anchorage District Office

Addendum:

Area Maps; USGS Quadrangle

2370 (965)

OCT 02 1985

Fred E. Springer
Director, Division of Project Management
Fred E. Springer
Director, Division of Project Management
Office of Hydropower Licensing
Room 203 RB
825 North Capitol Street N.E.
Washington, D.C. 20426

Dear Mr. Springer: It is our understanding that the proceedings for Power Projects 119, 136, 758, 2026, 2262, 2405, 2432, 2656 and 7633, have ended without issuance of license. Please revoke the above Power Projects as soon as possible. Thank you for your assistance.

Sincerely yours,

/s/ Mary Jane Clawson

Mary Jane Clawson
Chief, Branch of Lands

cc:

T&LS (943)

965*PBower*da*10/02/85*1312y

FEDERAL ENERGY REGULATORY COMMISSION

WASHINGTON, D.C. 20426

OHL-DPM-HBPS

Vacation of Land Withdrawals
Project Nos. 119, 136, 758,
2026, 2262, 2405, 2432, 2656,
and 2760

State Director
Bureau of Land Management
Department of the Interior
701 C Street, Box 13
Anchorage, AK 99513

OCT 31 1985

Dear Sir:

This is in reply to the October 2, 1985 request (BLM reference 2370 (965)) from your office for vacation of the land withdrawals for Project Nos. 119, 136, 758, 2026, 2262, 2405, 2432, 2656, and 7633. This letter also covers the withdrawal for Project No. 2760 which overlaps the withdrawal for Project No. 2656.

The application for license for Project No. 7633 is pending before the Commission, consequently, the withdrawal for this project is being retained at this time.

Proceedings for Project Nos. 119, 136, 758, 2262, 2405, 2432, 2656, and 2760 ended without issuance of a license, and the license for Project No. 2026 expired December 31, 1969. The withdrawals for these projects are not essential.

The land withdrawals for Project Nos. 119, 136, 758, 2026, 2262, 2405, 2432, 2656, and 2760 are hereby vacated in their entirety.

Some of the lands involved will remain withdrawn for licensed Project Nos. 1922 and 2911. A copy of the license and microfilm copies of the boundary maps of Project No. 1922 are enclosed. Revised boundary maps required by ordering Paragraph (D) of Amendment No. 4 (Instrument No. 14) of the license for Project No. 1922 have not been filed. Microfilm copies of Project No. 2911 boundary maps (FERC Nos. 2911-4 through -10) were previously sent to your office.

RECEIVED
D.V. 1/10/1986
1-17-86

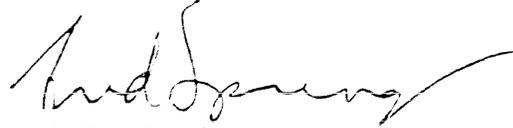
NOV 23 12 54 PM '85

Vacation of Land Withdrawals
Project Nos. 119, 136, 758,
2026, 2262, 2405, 2432, 2656,
and 2760

-2-

Authority to act on this matter is delegated to the Director,
Division of Project Management, Office of Hydropower Licensing,
under 18 C.F.R. §375.314 (1985).

Sincerely,



Fred E. Springer
Director, Division of
Project Management

Enclosure:

1. Project No. 1922 license
2. Project No. 1922 boundary maps
(FERC Nos. 1922-14, -15, -16, -17, -18, -19, -23, -27,
-28, -29, -30, -36, -37, -38, -41, and -42)

Appendix R

State of Alaska correspondence to BLM:

Ron Swanson to Robert Arndorfer, January 5, 1988.
Carol Shobe to Wayne Bowden, January 15, 1991.

File Copy

STEVE COWPER, GOVERNOR

DEPARTMENT OF NATURAL RESOURCES

DIVISION OF LAND AND WATER MANAGEMENT

3601 C STREET
P.O. BOX 107005
ANCHORAGE, ALASKA 99510-7005
PHONE: (907) 561-2020

JAN 7 10 21 AM '88

January 5, 1988

Robert W. Arndorfer
Deputy State Director for
Conveyance Management
Bureau of Land Management
701 C Street, Box 13
Anchorage, AK 99513-0099

Dear Mr. Arndorfer:

We received your Oct. 6, 1987 decision regarding navigable waters within Survey Window 1551 (north Kenai). In your decision you state that BLM is not required to make navigability determinations for water bodies in the former Kenai National Moose Range because title to the beds of navigable water bodies located in the National Moose Range did not pass to the state at the time of Statehood. We know you have taken a similar position for navigable waters in the Chugach National Forest.

As you know, we strongly disagree with this position based on the U.S. Supreme Courts decision involving Utah Lake. We request that you reconsider your position and make navigability determinations in these withdrawn areas pursuant to the criteria in Utah Lake. Attached is information on the susceptibility of the Russian River to navigation. We request that a navigability determination be made prior to issuing a decision to Cook Inlet Region, Inc. or the Russian River be excluded pending resolution of this issue as was done with the Snow River.

Sincerely,



Ron Swanson, Manager
State Interest Determinations

See Copy

FYI

WALTER J. HICKEL, GOVERNOR

DEPARTMENT OF NATURAL RESOURCES

DIVISION OF LAND AND WATER MANAGEMENT

TITLE ADMINISTRATION
3601 C STREET, SUITE 960
ANCHORAGE, ALASKA 99503
PHONE: (907) 762-2324

Wayne A. Boden
Deputy State Director for
Conveyance Management
Bureau of Land Management
Alaska State Office
222 West Seventh Avenue, #13
Anchorage, Alaska 99513

JAN 15 1991

File: 93511
Subject: Decision of July 13, 1990
State Selection Application A-060527
(GS-1264)

Dear Mr. Boden:

On July 17, 1990, the State received a decision dated July 13, 1990 and a draft patent for certain lands in T. 4 N., R. 11 W., Seward Meridian under state selection application A-060527.

The fourth paragraph on Page 2 of the decision states that the United States Court of Appeals, on March 20, 1979, decided a case involving Tustumena Lake. It also stated that the navigable waterbodies within the Kenai National Moose Range do not belong to the State under the Submerged Lands Act and therefore, BLM will not determine navigability for the subject lands.

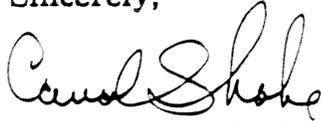
The State disagrees with your conclusions for the following reasons:

1. The Tustumena Lake decision only involved Tustumena Lake, not all submerged lands within the Kenai National Moose Range.
2. The U.S. Supreme Court decision involving Utah Lake held that congressional intent to defeat a state's title could not be inferred from the mere act of the reservation itself. The United States has to show that the submerged lands were included in the withdrawn land, and that the State's title is to be defeated.

Since it appears there are no navigable waterbodies in T. 4 N., R. 11 W., S.M., an appeal to this decision was not necessary. However, we wish to document the record that we disagree with your determination, and continue to request that

BLM make navigability determinations in these withdrawn areas pursuant to the criteria in Utah Lake.

Sincerely,

A handwritten signature in cursive script, appearing to read "Carol Shobe".

Carol Shobe, Chief
Title and Contracts

CS:DG:eg

Appendix S

Kenai NWR correspondence to author, with attachments:

Memorandum from Rick Johnston, Kenai NWR Ranger, November 6, 1996.

MOU between Chugach National Forest and Kenai National Moose Range,
February 19, 1971.

Sportsman's Lodge site land lease and miscellaneous related items.

Alaska Fish and Game regulation 5 AAC 56.050.

Russian River sport fishing pamphlets published by the State of Alaska.



United States Department of the Interior

KENAI NATIONAL WILDLIFE REFUGE
P.O. BOX 2139
SOLDOTNA, ALASKA 99669-2139
(907) 262-7021

IN REPLY REFER TO:

96152.rkj

November 6, 1996

MEMORANDUM

TO: Warren Keogh, Water Resources Branch
through Chief, Division of Realty, Anchorage, Alaska

FROM: Rick Johnston, Ranger\Pilot
through Refuge Manager, Kenai National Wildlife Refuge

SUBJECT: Draft Russian River Boundary Report

Thank you for the opportunity to review the Russian River Boundary Report, Kenai National Wildlife Refuge, Legal History and Location. The report appeared to be very thorough and informative. The questions it raises regarding the accurate location of the "junction of the Kenai and Russian River" are significant and have very important implications for a portion of the Kenai National Wildlife Refuge and Chugach National Forest Boundary. It also appears that the 1951 BLM survey may be subject to accuracy questions for apparently assuming that the "junction" of the rivers begins downstream of the island located at the confluence. At the very least, even assuming that the BLM survey and the line running north along the Meridian line would not be moved, the ownership of the large confluence island may be affected. Perhaps your suggestion that others with water boundary expertise should be further consulted regarding these rather technical issues.

Related to the above issue the reference on page 13 paragraph two, second sentence is perhaps misleading and should be changed. Delete " Current Kenai NWR Refuge Manager Robin West (personal communication 1996) indicated the Refuge and Chugach National Forest have an understanding that Chugach has the large island for management purposes." In recent conversation with Robin, we agree that this was a misunderstood communication between he and I that you were referencing. In fact, the Refuge and it's employees contact the public and manage the large island with no formal agreement in place between the Refuge and the Forest. No Forest personnel or management actions have been observed on the island in recent or long term memory. However, a formal administrative agreement has been in place since 2/19/71 for approximately 2.25 acres just north of the Kenai River and the large island (copy enclosed), and east of the 1951 survey marker, sandwiched in between the former Sportsmans Lodge inholding. The agreement makes general reference to adjacent lands but does not specifically address the island. When the Sportsmans Lodge was purchased by the State of Alaska in 1994, the

*Alan
10/12/96
Sentinel
in...*

Refuge assumed management of that land and access facility by cooperative agreement with the State (copy enclosed) Together, with the Chugach NF 2.25 acres, these parcels take in all of the Kenai Riverside lands due north of the large island. The Refuge is currently in the process of promulgating regulations that will formalize regulations for management of the these lands.

The report should also note in an appropriate section, the State of Alaska's field location of the confluence of the Kenai-Russian rivers. On several occasions (most recently 10/96) the Alaska Department of Fish and Game's Soldotna supervisory management fisheries biologist Dave Nelson has affirmed that the Department considers the confluence to be upstream of the large island irrespective of the water level. Fisheries management decisions associated with the Russian River fishery including a regulatory "sanctuary" below and above the confluence are made based on the upper confluence assumption. (see 5AAC 56.050 (14)&(15) and accompanying information. Nelson reported that the confluence was located by he and former Russian River fisheries biologist Sid Logan approximately 30 years ago and remains posted annually by his division. He noted that at low water the clear waters of the Russian River partially flow into the Kenai River above the large island. He further noted that the channel south of the Island is a Kenai River channel, that at other than low water is filled with Kenai River water and the gradually mixing Russian River water. The Alaska Fish and Wildlife Protection Division, Division of Parks, and Refuge Officers base law enforcement actions on the above island confluence determination.

Thank you for the opportunity to comment on the draft report and for your thorough work on the subject matter. If you have any questions regarding these comments please call.

Kenai

MEMORANDUM OF UNDERSTANDING
BETWEEN THE
UNITED STATES FOREST SERVICE
DEPARTMENT OF AGRICULTURE
AND THE
DIVISION OF WILDLIFE REFUGES
UNITED STATES BUREAU OF SPORT FISHERIES & WILDLIFE
DEPARTMENT OF THE INTERIOR



WHEREAS, the Kenai National Moose Range, United States Bureau of Sport Fisheries and Wildlife desires to occupy the Western Boundary Administration Site within the Chugach National Forest, for the purpose of expanding the Kenai-Russian River Campground, and,

WHEREAS, the Forest Service is desirous of making available to the Kenai Moose Range, the use of National Forest Lands for this purpose,

NOW, THEREFORE, the United States Forest Service, herein referred to as the Forest Service, acting by and through the Regional Forester, Region Ten, Juneau, Alaska, and the Kenai National Moose Range, Division of Wildlife Refuges, United States Bureau of Sport Fisheries and Wildlife, through the Refuge Supervisor, Division of Wildlife Refuges, Anchorage, Alaska, hereafter referred to as the Kenai National Moose Range, agree as follows.

A. THE FOREST SERVICE WILL:

1. Grant permission to the Kenai National Moose Range to use and occupy for recreation purposes a tract of land on the Chugach National Forest, containing 2.25 acres, more or less. Said location is shown on a map, dated 12/11/70, which is attached hereto and made a part hereof.
2. The Regional Forester hereby authorizes the Forest Supervisor, Chugach National Forest, to represent the Regional Forester in all matters pertaining to the administration of the National Forest Lands covered by this Memorandum of Understanding, hereinafter referred to as Memorandum.

B. THE KENAI NATIONAL MOOSE RANGE WILL:

1. Establish liason with the Forest Supervisor, Chugach National Forest, designating in writing its representative who is authorized to handle, directly with the Forest Supervisor, all matters concerning this Memorandum.
2. Submit site plans or revisions thereof to show the location of all buildings, service areas, roads, and improvements on the site for approval by the Forest Supervisor.
3. Protect the scenic aesthetic values of the area under this Memorandum, and the adjacent land, as far as possible with the authorized use, during construction, operation, and maintenance of the improvements.

4. Take necessary precautions to prevent pollution of or deterioration of lands or waters which may result from the exercise of privileges extended by this Memorandum.

C. THE FOREST SERVICE AND THE KENAI NATIONAL MOOSE RANGE MUTUALLY AGREE:

1. This Memorandum may be terminated upon receipt of written notice from the Kenai National Moose Range that the uses authorized are no longer needed, or, upon a determination by the Forest Service that the area is needed for a higher use. Such determination will be made only after both parties have discussed any proposed higher use and will be followed by a written notice from the Forest Service sufficiently in advance to permit the Kenai National Moose Range to make such arrangements for a new facility as may be necessary.

2. This agreement may be terminated upon breach of any of the conditions herein, and at the discretion of the Regional Forester upon 90 days advance notice.

3. No charge will be made for this use, under authority of the Department of Agriculture, Forest Service, Regulation U-11A.

U. S. DEPARTMENT OF AGRICULTURE
FOREST SERVICE

Date

2/19/71

By

George J. Beckis
Acting Regional Forester

KENAI NATIONAL MOOSE RANGE

Date

Feb 4, 1971

By

Calvin A. Lenzink
Acting Refuge Supervisor

NORTH 17.5

6642

Kenai Nat'l Moose 10108^e

Bdry Chugach Nat'l Forest

R.O.W

50 FT

MCNCI NORTH 025

truck road

P. RILEY SERVICE SITE
2.25 Acres

NORTH 3920

(centerline)

5 589°34'E 4450

6 cabin

5.83°23'E 9859

51°16'E 0538

1 50 FT

U.S.L.M.H.E.S. NO. 180
575°22'38"E 152.3

U. S. SURVEY NO. 3037

50 FT

50 FT

STERLING HIGHWAY (survey relocation)

4 588°42'W 4878

cabin

cabin

Lodge Bldg

cabin

cabin

cabin

3.379

WEST 100

3 581°20'W 4369

5.78°17'W 1887

571°04'W 3379

MCNCI 588°42'W 010

K E N A I
R I V E R

Boundary P.S. Site

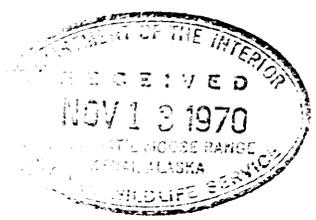
A PORTION OF THE WEST BOUNDARY OF THE CHUGACH NATIONAL FOREST

12/11/70

24mm

*Range Manager
Kenai*

November 9, 1970



Mr. Barney Coster
Supervisor, Chugach National Forest
U.S. Forest Service
555 Cordova Street
Anchorage, Alaska 99501

Dear Barney:

Discussions over some years between Chugach Forest and Moose Range people indicate that the Forest Service would be favorable to the transfer of administrative jurisdiction of land adjoining our Kenai-Russian River campground. This is the tract known as the "Western Boundary Administrative Site." It is located between U.S. Survey #3037 (Sportsman's Lodge) and the Moose Range boundary. It is probably about 4 acres. I do not have a legal description, however, it is shown on attached sketch.

The tract is crossed by the access road to our Kenai-Russian River campground. We have funds this year to proceed with an improvement and enlargement of this campground. We regard this tract of your land as rather essential to proper development of this campground, and accordingly would like to assume custody.

If you are agreeable to a change in jurisdiction, would you please advise the preferred method of documentation. We assume a memo of understanding and perhaps eventual transfer of the land may be satisfactory.

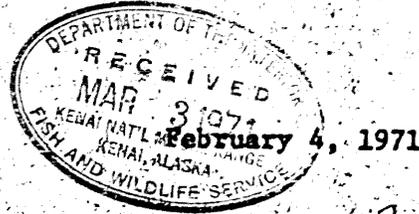
Sincerely,

David L. Spencer
Refuge Supervisor

Encl:
Sketch

DLS:ro

cc: Area Director
✓Refuge Manager, Kenai

Kenai*AMZ (d)*

Mr. John M. Johnson
Staff Forester, Recreation & Lands
Chugach National Forest
555 Cordova, Room 504
Anchorage, Alaska 99501

Re: 2740 Memorandum of Understanding

Dear Mr. Johnson:

The subject Memorandum of Understanding is satisfactory, and is herewith returned with signatures per your request.

Sincerely,

Calvin J. Lensink
Acting Refuge Supervisor

Enclosure

CJL:ro

LAND LEASE

STATE OF ALASKA
DEPARTMENT OF FISH AND GAME
DIVISION OF SPORT FISH

UNITED STATES DEPARTMENT OF THE INTERIOR
UNITED STATES FISH AND WILDLIFE SERVICE

This Lease is made and entered into between the State of Alaska, Department of Fish and Game, Division of Sport Fish (hereinafter referred to as "the Lessor"), and the United States Department of the Interior, United States Fish and Wildlife Service (hereinafter referred to as "the Lessee").

This Lease is made pursuant to the authorities contained in:

Lessee:

Fish and Wildlife Coordination Act (16 U.S.C.A. 661-667)
Alaska National Interest Lands Conservation Act
Section 303 (4)(b), (94 Stat. 2391)
National Wildlife Refuge System Administrative Act of 1966
(16 U.S.C. 663dd-668ee)
Refuge Recreation Act (16 U.S.C. 460k-460k-4)

Lessor:

Federal Aid in Sport Fish Restoration Act
(16 U.S.C. 777-777k)
Alaska Statutes Title 16.05.050
Fish and Game: Powers and Duties of the Commissioner.

The parties agree as follows:

1. Premises Leased:

The Lessor and the Lessee enter into this land lease for the terms and conditions set out herein. The Lessor does lease to Lessee, and Lessee does lease from Lessor, the land parcel described as:

Sportsman's Lodge Access Site: U.S. Survey No. 3037 dated July 16, 1952, (within Township 5 North, Range 4 West, Seward Meridian), Seward Recording District, Third Judicial District, State of Alaska, containing 4.3 acres more or less.

Providing however, a site at the east end of the parcel, not exceeding 0.3 acres, shall be reserved for the Lessor to set up a field camp for seasonal employees assigned to the area.

2. Lessor's Representations:

Lessor represents and warrants that the Lessor, alone, has the right, power, and authority to make and enter into this Lease. Lessor represents and warrants that, at the date of this lease, there are no restrictions, covenants, easements, rights-of-way, or uses which would prevent the Lessee from managing the Sportsman's Lodge Access Site.

3. Rent and Term:

a. This lease shall remain in effect until December 31, 2004, and may be terminated in writing as provided for hereinafter.

b. In addition to the Lessee's operation, maintenance and minor improvement (i.e. management) of the site as herein stated, the Lessee will offer the Lessor compensation in the amount of \$1.00 (one dollar), which will be paid upon demand at the Division of Reality, U.S. Fish and Wildlife Service, Room 2230, 1011 East Tudor Road, Anchorage, Alaska 99503.

c. Except as provided in paragraph 4.b. below, either Lessor or Lessee may terminate this Lease by written notice to the other at least 90 days in advance of the date on which termination is to be effective. In the event of termination of this lease for any reason, the Lessor shall assume management responsibility for the site and ownership of all improvements made by the Lessee shall revert to the Lessor.

4. Terms and Conditions:

a. The purpose of this lease is to provide enhanced opportunities for recreational boating, and sport fishing access to the upper Kenai River, the Russian River, and their confluence; to provide over flow parking for recreational users and to improve vehicle access from the Sterling Highway. Safety is a large factor. During peak times of salmon runs, vehicles are parked along the Sterling Highway, creating numerous hazardous situations. It is estimated that 30,000 people use the area each season, with peak boat launching at 20 per day and up to 100 vehicles being parked per day. Development of this area will help to alleviate highway parking and provide an overall safer recreational experience.

b. The Lessee shall manage the Sportsman's Lodge Access Site as an adjunct facility of the Kenai National Wildlife Refuge and shall have administrative control of the site. The Lessee agrees to manage the site for public use concentrated from mid-May to mid-September. Management activities from mid-September to mid-May may be reduced to a level commensurate with off-season recreational use. In the event the Lessee finds it necessary to deny the public use of the site, the Lessee shall give the Lessor 2 days written notice and the Lessor shall have the option to immediately terminate this Lease and assume management of the site.

c. The Lessor and Lessee shall cooperatively solicit public opinion on capital improvement and management of the site. People using the area will be given a questionnaire to express their views and provide comments.

d. The site shall be managed to provide service to the public to include public contact, site cleanliness, sense of order and minor maintenance as required. The Lessee and the Lessor agree to jointly prepare a site management plan outlining the services to be provided, staffing requirements, fee schedule, estimated costs, and proposed minor improvements, if any. The management plan shall be reviewed and revised as necessary by mutual written agreement of the Lessor and Lessee.

e. The Lessee is authorized to sublease the Sportsman's Lodge Access Site to a concessionaire. The concessionaire is authorized to occupy the site. The Lessee shall continue to be responsible for compliance with all conditions of this lease.

f. The Lessee may charge the public fees for use of the site to recover the cost of management and a reasonable concessionaires profit. The Lessee shall provide the Lessor an annual accounting of fees collected and costs incurred. Fees collected shall be handled in accordance with applicable federal regulations and procedures. Fees collected in excess of costs are program income and must be credited back to the Federal Aid in Sport Fish Restoration program through the Lessor or must be used to make approved site improvements.

g. The Lessor shall allow employees of the Department of Fish and Game and the Department of Public Safety, Division of Fish and Wildlife Protection to use the boat launch and parking area without charge to perform their official duties.

h. The Lessee will:

- 1) Use and occupy the parcel in a lawful and proper manner;
- 2) Not be responsible for or pay any local property taxes attributed to the parcel of land;
- 3) Have law enforcement authority to facilitate the management and protection of the area in accordance with the goals and objectives of the National Wildlife Refuge System as well as local and state rules and regulations.
- 4) Pay all costs of managing the site including utility bills.

i. The Lessee, during the term of this Lease, shall not encumber or cloud the Lessor's title to the parcel, or any portion thereof, nor enter into any lease, easement, or other obligation of the Lessor's title without the prior written consent of the Lessor; and any such act or omission, without the prior written consent of the Lessor, shall be void against the Lessor.

j. The Lessor and the Lessee agree and recognize that each of the covenants and conditions in this Lease and any attachments thereto are merged and incorporated into this agreement and shall be binding upon themselves and upon their respective assigns. The Lessor and the Lessee further agree and recognize that this lease shall be conditioned upon satisfactory performance by the Lessor and the Lessee of all covenants contained herein.

k. The Lessor shall have reasonable access to the parcel for purposes of inspection regarding the faithful performance of the covenants and conditions of this lease and for the performance of other lawful requirements.

5. Improvements and Fixtures:

a. The Lessee shall provide design services to prepare a site development plan that includes rehabilitation of the existing boat ramp, site grading, construction of gravel parking areas, construction of restrooms, barriers to control access off the Sterling Highway and site cleanup. The Lessee shall make a good faith effort to complete the site development plan by October 1, 1994.

b. The Lessor will provide capital improvements, including signage, as shown on the site development plan. The amount of funding provided for capital improvements shall be at the sole discretion of the Lessor and shall be contingent on the availability of funds. The Lessor will administer the construction contracts for the capital improvements. The Lessor shall make a good faith effort to have all work completed by June 1, 1996.

c. The Lessor and Lessee shall coordinate work on capital improvements with concern for public use of the site but it is understood by both the Lessor and Lessee that some disruptions of public use may occur. The Lessee shall make all necessary modifications to the concessionaire's contract to allow construction access to the site at no cost to the Lessor.

d. The Lessee may make minor improvements on the site provided such improvements are compatible with the primary purpose of the site. All improvements shall be approved in writing by the Lessor prior to construction.

All construction must be neat, presentable, compatible with its surroundings and in compliance with federal, state and local laws, and regulations. The Lessee shall submit to the Lessor a description (or drawings if appropriate) of all proposed improvements. If requested by the Lessor, the Lessee shall submit comprehensive architectural drawings showing elevations, floor plans, dimensions and materials for proposed buildings, and the location of all utility lines. The Lessor shall review and approve or disapprove proposed construction. Approval will not be withheld except when proposed construction does not comply with valid engineering principles, fire and building codes, or the proposed construction is inconsistent with the purpose of the site.

The Lessee, within thirty (30) days after completion of construction or placement of improvements shall deliver to the Lessor three (3) copies of as-built drawings showing the location and dimensions of the improvements, giving bearings and distances to an established survey point. Furthermore, if the Lessee constructs underground improvements, the Lessee shall appropriately mark the surface of the land with adequate surface markers. The type, quantity, and distance between such markers will be subject to the approval of the Lessor.

e. All fixtures and equipment of whatever nature that have been installed on the premises by the Lessee, whether permanently affixed or otherwise, shall revert to the Lessor on termination of this lease.

6. Holding Over:

All conditions and covenants of this Lease shall remain in effect during any extension of this Lease.

7. Right of Refusal:

The Lessor agrees that at the termination of this Lease or any subsequent extensions, he or his designees will not lease the parcel to any other party without first giving the Lessee the opportunity to renew this land lease on terms, conditions and rental no less favorable to the Lessee than those offered any other party.

8. Right to Occupy:

The Lessee shall have the right to possession of the premises from and after the date of approval of the lease subject to the herein described terms.

9. Liability:

a. The Lessor and the Lessee shall each be responsible for its own acts or omissions and those of its officers, agents, and employees.

b. The parties agree to notify each other of any claim, demand, or lawsuit arising out of or affecting the Lessee's occupation or use of the premises.

10. Hazardous Materials:

a. Hazardous materials means any substance which is or becomes defined as a "hazardous substance," "oil," "pollutant," or "contaminant" under any federal, state or local law. For the purposes of this lease, the primary concern is fuel and lubricants of the type commonly used in boats and vehicles.

b. If the Lessee handles hazardous materials on the site, the Lessee shall employ adequate procedures for safely storing, dispensing, and otherwise handling the hazardous materials in accordance with applicable federal, state, and local laws.

c. In the event of a hazardous materials spill by the Lessee or a member of the public using the site, the Lessee shall immediately notify the Lessor and act promptly, at its own expense, to contain the spill, repair any damage, absorb and clean up the spill area, and restore the site to a condition satisfactory to the Lessor and in accordance with applicable federal, state, and local laws.

d. If contamination of the site or other properties occurs as a result of Lessee's management of the site, the Lessee shall indemnify, defend, and hold harmless the Lessor from any and all claims, judgments, damages, penalties, fines, costs, liabilities, or losses.

e. The Lessee will not be responsible for or pay for any clean-up of contaminants existing on the parcel of land, on the effective date of this lease. This includes the known contaminated areas caused by leaking aboveground fuel storage tanks that have been identified and are of record.

11. Notices:

Notices required by this lease must be hand delivered or sent by registered or certified mail to the appropriate party at the addresses listed below. Either party must notify the other in writing of any change in address:

Lessor: Alaska Department of Fish and Game
Division of Sport Fish
P.O. Box 25526
Juneau, AK 99802-5526
ATTN: Access Coordinator

Lessee: Refuge Manager
Kenai National Wildlife Refuge
P.O. Box 2139
Soldotna, Alaska 99669-2139

12. Effect on Successors:

All covenants, provisions, and conditions in this lease extend to and bind the legal representatives, concessionaires, successors, subleases, and assigns of the parties.

13. Time is of the Essence:

Time, whenever expressed herein, shall be deemed to be of the essence in this lease.

14. Partial Invalidity:

If any provision or covenant of this lease is declared to be invalid by a court of competent jurisdiction, the remaining provisions and covenants will continue in full force.

15. Amendment:

No amendment or extension of this lease shall be effective unless expressed in writing executed by both parties.

16. Entire Lease:

This lease contains all the terms, conditions, and agreements of the parties and supersedes any previous understanding or agreements, regarding the premises whether oral or written. This writing constitutes the total lease agreement between the Lessor and the Lessee.

17. Governing Law:

This lease is governed by the laws of the State of Alaska. All actions concerning this lease shall be brought in the Superior Court of the State of Alaska.

18. Signatures:

In witness thereof, the parties have executed this lease on the dates set forth below:

LESSEE

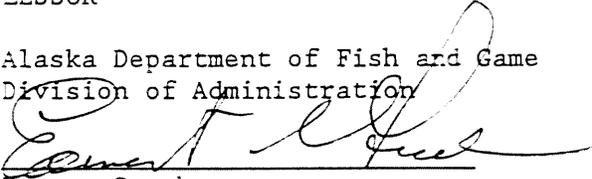
U.S. Department of the Interior
U.S. Fish and Wildlife Service


Walter Stieglitz
Regional Director

5/31/94
Date

LESSOR

Alaska Department of Fish and Game
Division of Administration


Ernest Greek
Procurement Officer

5/24/94
Date

ACKNOWLEDGMENTS

U.S. FISH AND WILDLIFE SERVICE

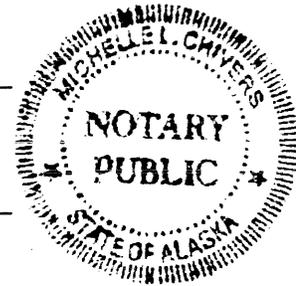
STATE OF ALASKA)
City of Anchorage) ss.
3rd JUDICIAL DISTRICT)

THIS IS TO CERTIFY that on the 31st day of May, 1994,
before me, a notary public in and for the State of Alaska, personally appeared
Walter Stieglitz, the Regional Director of the U.S. Fish and Wildlife Service,
Anchorage, Alaska, known to me to be the person who executed the above
instrument and who acknowledged that said instrument was voluntarily signed.

WITNESS my hand and official seal.

Michelle L. Chivers
NOTARY PUBLIC in and for the State of Alaska

My Commission expires: 12/2/95



STATE OF ALASKA DEPARTMENT OF FISH AND GAME
Division of Administration

STATE OF ALASKA)
City of Juneau) ss.
1st JUDICIAL DISTRICT)

THIS IS TO CERTIFY that on the 24th day of May, 1994,
before me, a notary public in and for the State of Alaska, personally appeared
Earnest Greek, the Procurement Officer of the Alaska Department of Fish and
Game, known to me to be the person who executed the above instrument and
acknowledged voluntarily signing the same.

WITNESS my hand and official seal.

Monica Wellard
NOTARY PUBLIC in and for the State of Alaska

My Commission expires: 5/13/97



through July 31. (In effect before 1984; am 4/28/84, Register

AS 16.05.251

5 AAC 56.050. WATERS CLOSED TO SPORT FISHING. (a) In

locations specified in this section as closed to salmon fishing, the
applies only to salmon 16 inches or more in length. Except as
in 5 AAC 56.010(c), all waters of the Kenai Peninsula Area
closed to fishing for king salmon 16 inches or more in length.
Closed waters are as follows:

1) Anchor River and its tributaries

(A) the drainage upstream from the junction of the North and
South Forks is closed to salmon fishing, and is closed to all fishing
from January 1 through June 30;

(B) the waters downstream from the junction of the North and
South Forks are closed to fishing from January 1 through June 30
except during the weekends set forth in 5 AAC 56.010(c)(6);

(C) Bishop Creek drainage, excluding lakes and ponds, is closed to
salmon fishing year round and is closed to all fishing from April 15
through June 14;

(D) Crooked Creek is closed to fishing upstream from Johnson
Lake Road from January 1 through July 31, and is closed to fishing
downstream from Johnson Lake Road from June 1 through July 31;

(E) Crescent Creek drainage, including Crescent Lake, is closed
to fishing from April 15 through June 30;

(F) Deep Creek and its tributaries

(A) the drainage upstream from a department marker placed
two miles upstream from the mouth is closed to salmon fishing
and closed to all fishing from January 1 through June 30;

(B) the waters downstream from a department marker placed
two miles upstream from the mouth are closed to fishing from
January 1 through June 30 except during the weekends set forth
in 5 AAC 56.010(c)(5);

(C) English Bay River drainage is closed to salmon fishing
upstream from the outlet of Lower English Bay Lake;

(D) Hidden Lake Creek is closed to salmon fishing year around
and is closed to all fishing from April 15 through June 14;

(E) Jean Lake Creek is closed to salmon fishing year around and
is closed to all fishing from April 15 through June 14;

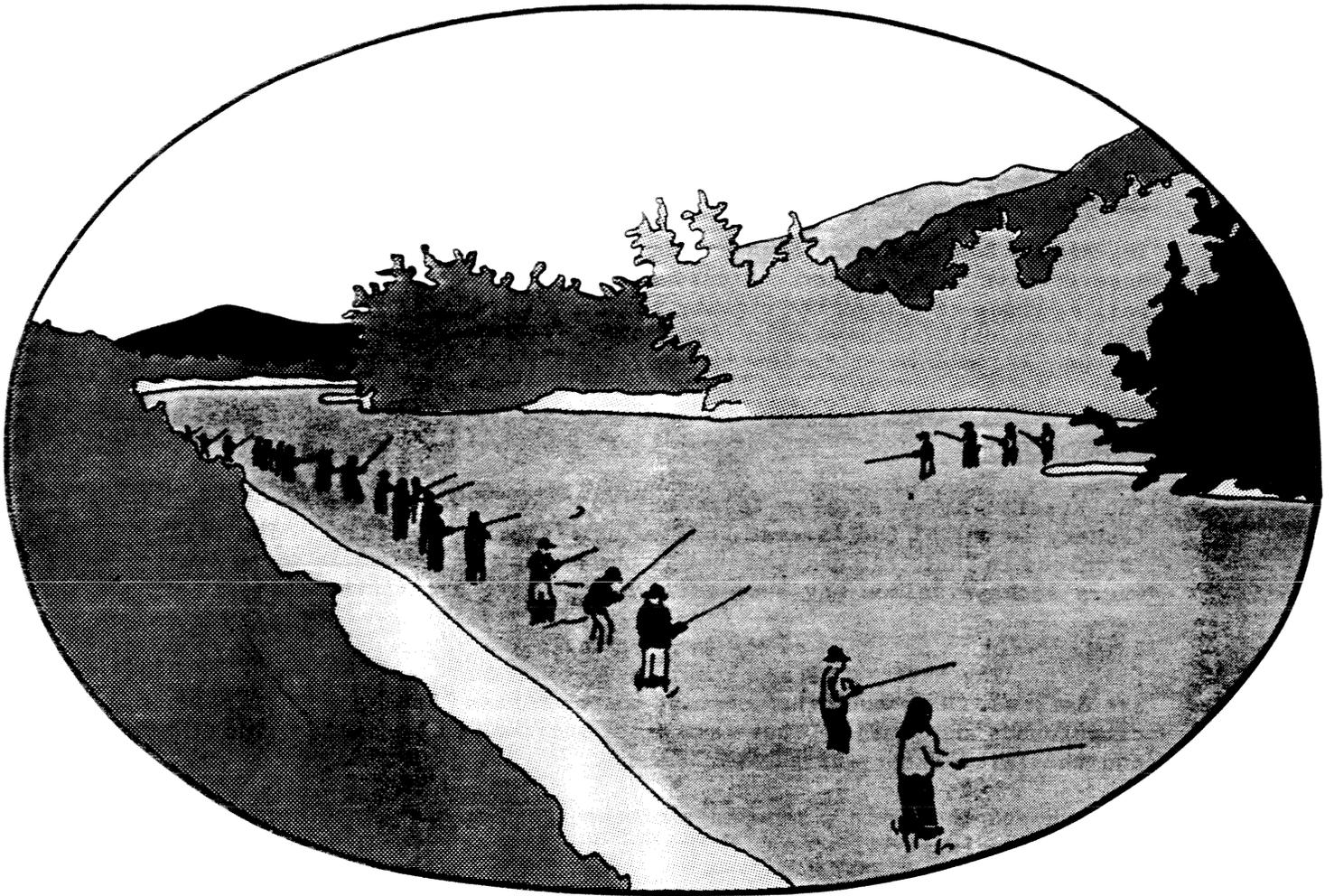
(F) repealed 5/17/81;

(G) Kenai River and its tributaries

(A) Kenai Lake and its tributaries including Tern and Trail
Lakes and their tributaries are closed to salmon fishing;

(B), (C) repealed 4/28/84;

(D) repealed 5/11/85;



RUSSIAN RIVER SOCKEYE SALMON

Prepared by:

The Alaska Department of Fish and Game
Sport Fish Division

revised
1991



RUSSIAN RIVER SOCKEYE SALMON

TO THE ANGLER

The Alaska Department of Fish and Game hopes you'll enjoy your stay at the Russian River this season. Please comply with the fishery regulations as well as those governing the camping areas. Your consideration for this area and its valuable sockeye salmon resource will help insure its perpetuation for use and enjoyment in the future. Good luck and good fishing.

INTRODUCTION

The Russian River sockeye (also called "red" or "blueback") salmon fishery is one of the largest freshwater fisheries in Alaska. The fishery is unique in that the Russian River is one of the few streams in North America where sockeye salmon may be readily caught with artificial flies.

This booklet is designed to familiarize anglers with the many facets of this fishery. The Russian River system is described and areas open to fishing are defined. Maps show the location of the Russian River falls, fish weir, campgrounds and trails. There are brief sections on fly fishing techniques and the life history of sockeye salmon.

It is hoped that with a knowledge of the area and an understanding of the fishery, anglers will more fully enjoy the Russian River area while fishing for this river's sockeye salmon.

THE RUSSIAN RIVER SYSTEM

The Russian River is a clear stream on the Kenai Peninsula adjacent to the Sterling Highway at Mile 55. Here, at the confluence of the Russian and the glacial Kenai River, a privately-operated ferry transports anglers to the south bank; more than 50 percent of the anglers fish this area. Access to the stream is also available via the U.S. Forest Service Russian River Campground at Mile 52.5.

FLY FISHING TECHNIQUE

Fly fishing on the Russian River is not difficult and with a little practice may be mastered by anglers of all ages. A relatively light-to-medium-action rod and reel with 20-pound-test line is preferred by many as a sensitive rod aids the angler in feeling the fish take the fly. Either a spinning or fly rod is satisfactory, and any streamer fly with a gap between point and shank no greater than 3/8-inch is permitted. Sockeye salmon do not appear to prefer one color to another, but red, green, and yellow flies are most commonly used. The use of weights depends on the depth of the water and speed of the current. Add just enough weight so the fly "bounces" along the bottom.

Cast the fly upstream and allow it to make an arc as it drifts by you. Keep a tight line at all times. Sockeye salmon do not strike the fly but "mouth" it, and if the gentle tug is not detected immediately, you won't know that a fish is on. Long casts are not necessary as the salmon follow the shoreline during their upstream migration.

REGULATIONS

Some of the more important regulations governing this area are:

1. The area open to sockeye salmon fly-fishing-only is from a marker 600 yards below the Russian River falls to a marker approximately 1,800 yards below the confluence of the Kenai and Russian Rivers, a distance of about three miles. From June 1 through August 20, artificial flies are the only terminal tackle permitted in this area.
2. One section of the above area is closed to all sport fishing from June 1 through July 14. This is the area immediately below the ferry crossing to a marker 700 yards upstream on the Russian River (see map). This area is a resting area for early-run sockeye salmon, and the closure has been implemented to provide additional protection for these fish. Angler participation has become so intense in recent years that, without this "sanctuary area," anglers are capable of harvesting a very high percentage of the early-run fish to reach Russian River.
3. The daily bag and possession limit is three sockeye salmon 16 inches or more in length.
4. Fishing is permitted only with an unweighted, single-hook fly from the first of June through August 20. The gap between point and shank may not exceed 3/8-inch. The most commonly used is a streamer, or coho fly.
5. Weights must be at least 18 inches ahead of the fly.
6. Any fish hooked elsewhere than in the mouth must be released immediately. This regulation, coupled with (4) and (5) above, is designed to eliminate snagging, a practice which is opposed on aesthetic grounds by the vast majority of the fishery participants. It is unlawful to snag or attempt to snag fish in the fresh waters of Alaska.
7. The area upstream from a marker 600 yards below the Russian River falls is closed to all salmon fishing.
8. King salmon fishing is prohibited in the Russian River and in the Kenai River above the outlet of Skilak Lake. Molestation of these fish is unlawful. The king (chinook) is the largest of Pacific salmon and may exceed 50 pounds in the Russian River. However, it is the least abundant salmon, and the Russian River currently supports a run of only 200 to 300 of these large fish. These salmon spawn between Upper and Lower

Russian Lakes as well as below Russian River falls. Feel free to photograph and observe these fish. Do not attempt to hook and play them for "sport." These are spawning fish, and any additional stress reduces their chance to complete their life cycle. Molestation of spawning fish is unlawful in Alaska.

9. Silver (cono) salmon and a small number of pink salmon also spawn in the Russian River drainage. These fish generally arrive at the confluence of the Kenai and Russian Rivers by late July or early August. Fishing for these species is permitted, and areas open are identical to those in which sockeye salmon fishing is permitted. The bag and possession limit is a total of three salmon over 16 inches; i.e., any combination of sockeye, silver, and pink salmon which totals three.
10. Fishing is permitted below the "Fly-Fishing-Only" marker on the Kenai River using any legal terminal tackle. Remember that legal terminal tackle downstream from the Sterling Highway Bridge at the outlet of Kenai Lake to Skilak Lake, including Skilak Lake within a half mile radius of the Kenai River inlet, is restricted to single-hook artificial lures only.
11. Trout fishing is permitted in all areas of the Russian River drainage. However, special restrictive regulations apply. The season is from June 15 through April 14. Downstream from Lower Russian Lake, trout may not be retained at any time, i.e. catch-and-release only. In all waters of the Russian River drainage only single-hook artificial lures may be used. Bait, treble and/or multiple hooks are prohibited at all times. This restriction applies to all flowing waters in addition to Upper and Lower Russian Lakes. The trout limit in the waters of Russian River drainage which are open to this species is two trout daily, one of which may be over 20 inches. In the Kenai River upstream from Skilak Lake to include the fly-fishing-only area at the confluence of the Kenai and Russian Rivers, the bag limit is one trout daily over 24 inches. Trout smaller than 24 inches must be immediately released.

NOTE: The above regulations are only a partial listing of regulations which apply to the Russian River area. Please consult a current "Sport Fishing Regulations Summary" available at license vendors and Fish and Game offices prior to fishing Alaska's lakes, streams, and marine waters.

EMERGENCY CLOSURES

Despite the stringent, current annual regulations, demands made on Russian River sockeye salmon are at times greater than the resource can provide. At such times the Department of Fish and Game closes all or part of the fishery by emergency order. During closed periods, the stocks are closely monitored by Department biologists. As soon as escapement levels permit, the fishery is reopened. The public is notified by newspaper and radio as well as by signs on the stream of openings, closings, and other adjustments to Alaska's sport fishing regulations.

IF YOU SNAG OR FOUL-HOOK A SALMON

During your stay at the Russian River you may accidentally foul-hook or 'snag' a salmon. This fish must be released immediately. If released correctly, the fish will suffer little permanent injury and will spawn successfully. If released incorrectly, the chances of recovery decrease appreciably. Please do your part to perpetuate the Russian River sockeye salmon runs by properly releasing foul-hooked fish:

1. Land the fish as quickly as possible. Playing the fish to complete exhaustion depletes the energy reserve it needs for spawning.
2. Never place your hands under the fish's gill covers. This injures fragile gill arches and causes bleeding and almost certain death.
3. Hold the fish by the body to remove the hook. A long-nosed pliers is excellent here. Don't wet your hands as this makes the fish more difficult to handle.
4. If the hook cannot be removed readily, clip the leader and leave the fly in the fish. Removing the hook will cause more damage than leaving it in.
5. Immediately return the fish to the water and point it upstream. Gently hold it in this position until it swims on its own.

SOCKEYE SALMON LIFE HISTORY

The Russian River has two distinct sockeye salmon runs. The early run generally arrives by June 15 and averages 42,000 fish. Anglers generally harvest about one-half of this stock. These salmon spend two years rearing in Upper Russian Lake and three years at sea before returning to their parent stream, in their sixth year of life, to spawn and die.

Early-run sockeye salmon spawn in mid-August in streams tributary to Upper Russian Lake. Each female salmon deposits between 3,000 and 4,500 eggs which hatch in late winter. The fry emerge from the gravel in early spring and immediately enter Upper Russian Lake. Here they rear for two years before migrating to salt water. On returning three years later, the average adult salmon weighs approximately six pounds but may occasionally exceed ten.

The second, or late, run usually arrives in mid-July and is the larger of the two runs. It averages about 65,000 fish. These salmon return to the Russian River in their fifth year of life after spending two years in fresh water and two years in the marine environment. The average size of late-run fish is therefore somewhat smaller than the early run salmon as they have one less year of ocean growth.

Although many thousands of fish return each year to the Russian River, the runs display considerable annual variation. These fluctuations may be due to variable egg survival during winter months, fluctuating rearing conditions at Upper Russian Lake, differential ocean survival, and the size of the commercial harvest in Cook Inlet.

RUSSIAN RIVER FALLS AND WEIR

Those anglers who come in midsummer to the Russian River in hope of "catching" a sockeye salmon on film are rarely disappointed. The Russian River falls provides a rare opportunity to observe sockeye, king, and silver salmon as they make their way to the spawning grounds at Upper Russian Lake. The falls slow the salmon's migration, and, at times, many thousands of fish may be readily observed and photographed.

Approximately a half mile above the falls is the Russian River weir, built and maintained by the Sport Fish Division of the Alaska Department of Fish and Game. The weir permits an exact count of all salmon that have passed through Cook Inlet commercial and Russian River sport fisheries. The weir is also used to conduct life history studies which provide valuable knowledge regarding the sockeye salmon's complex life cycle. Anglers are reminded that, although trout fishing is permitted in and above Russian River falls, all fishing is prohibited within 300 feet of either side of the weir.

Both the Russian River falls and weir are easily reached by a U.S. Forest Service trail. It is approximately two miles to the falls, and walking time is about 50 minutes (see map). This trail also connects the Russian River campground with Upper Russian Lake, a distance of about 12 miles. The U.S. Forest Service maintains cabins at Lower Russian Lake, between Upper and Lower Russian Lakes, and at Upper Russian Lake, which are available by reservation.

CAMPGROUND AND RELATED FACILITIES

The Russian River angler will find a variety of services, facilities, and camping areas available. The U.S. Forest Service Russian River Campground at Mile 52.5 has 86 units and provides water, picnic tables, fireplaces, and sanitary facilities.

The U.S. Fish and Wildlife Service provides a camping and parking area adjacent to the confluence of the Kenai and Russian Rivers as well as more extensive facilities in the Skilak Recreation Area on Skilak Loop. This road intersects the Sterling Highway at Mile 59, four miles west of Russian River.

Lodges, motels, laundromats, grocery stores, and tackle shops are located in the immediate area as well as in the nearby community of Cooper Landing.

RUSSIAN RIVER FISH PASS

The volume of water in Russian River is directly related to the amount of snow in the surrounding mountains in addition to spring and summer rainfall. When high water occurs, salmon are delayed or totally blocked by a velocity barrier from ascending Russian River falls. This can have disastrous consequences for the well-being of the sockeye salmon runs. If these fish cannot ascend the falls, they will perish without spawning, subsequently reducing returns to sport and commercial fishermen five or six years later.

During the winter of 1978-79, a fish pass was built by the Alaska Department of Fish and Game to alleviate migrational problems caused by high water. The fish pass is actually a tunnel 240 feet long, 9 feet high, and 8 feet wide. In the tunnel are baffles which reduce the current and enable salmon to readily circumvent the falls. In 1980, which was an exceptionally high water year, more than 91,000 sockeye salmon reached the spawning grounds of Upper Russian Lake via this structure.

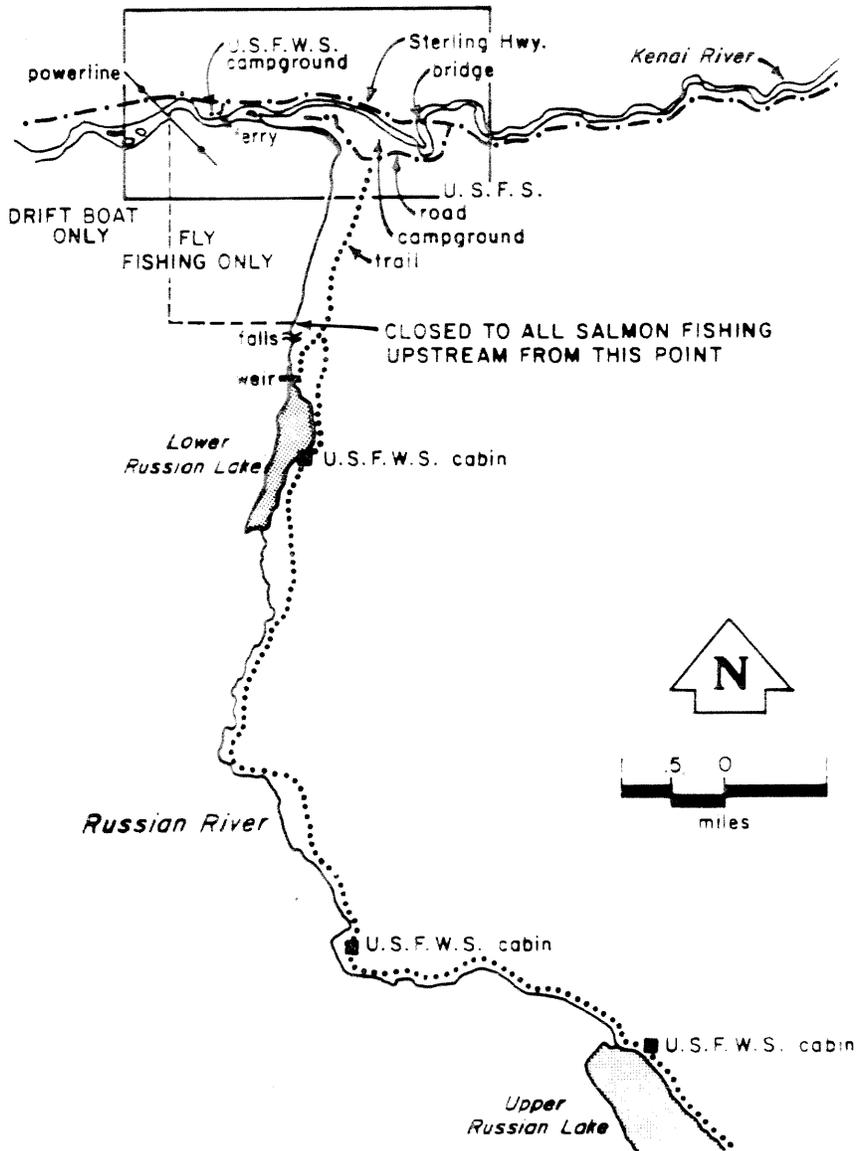
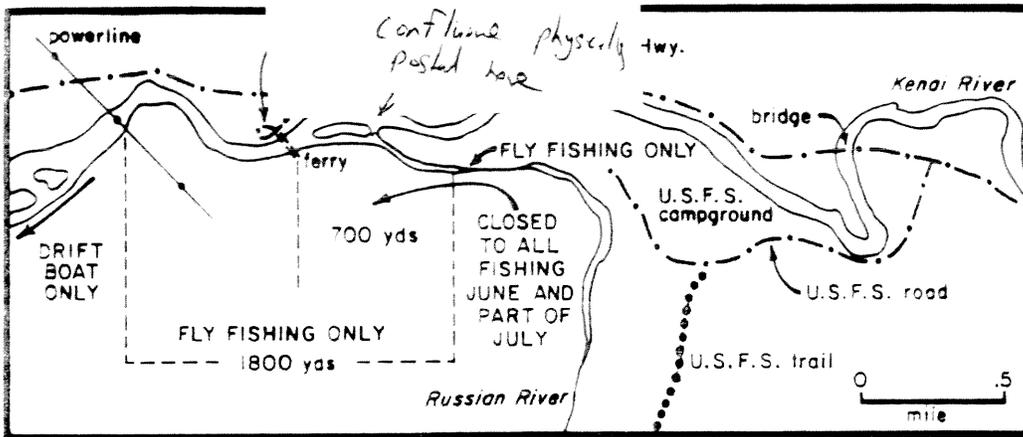
For your own safety, please do not climb or hike on or in proximity to this structure.

The Alaska Department of Fish and Game operates all of its public programs and activities free from discrimination on the basis of race, religion, color, national origin, age, sex, or handicap. Because the department receives federal funding, any person who believes he or she has been discriminated against should write to:

O.E.O.
U.S. Department of the Interior
Washington, D.C. 20240

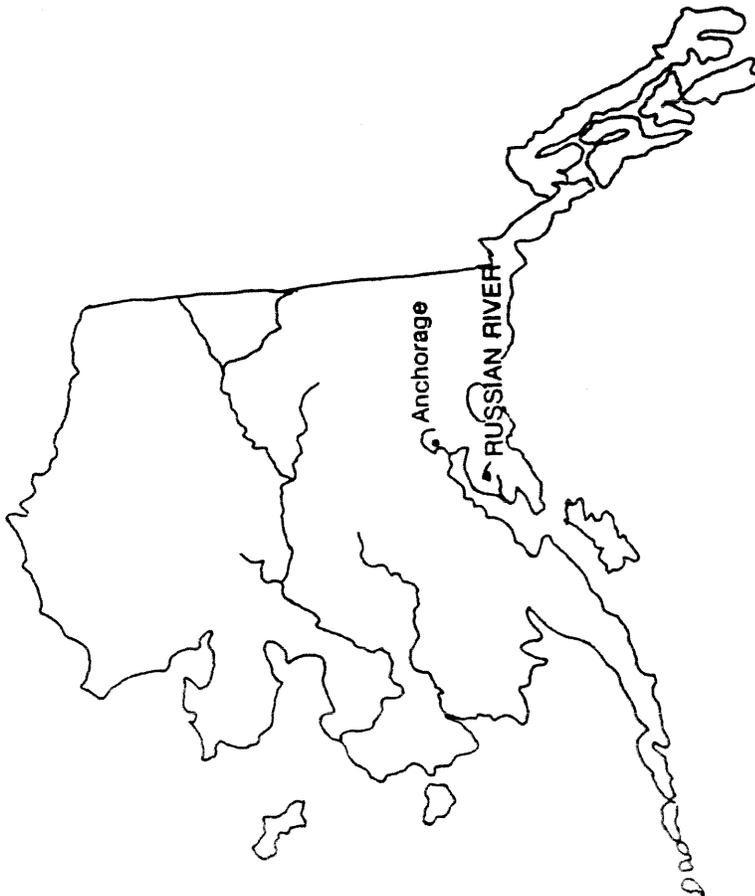
CONFLUE

RUSSIAN RIVERS



A FISHERMAN'S
GUIDE TO:

RUSSIAN RIVER RED SALMON



STATE OF ALASKA
Jay S. Hammond, Governor

ALASKA DEPARTMENT OF FISH AND GAME
Ronald O. Skoog, Commissioner

DIVISION OF SPORT FISH
Rupert E. Andrews, Director



a fisherman's guide: RUSSIAN RIVER RED SALMON

TO THE ANGLER

The Alaska Department of Fish and Game wishes a pleasant stay to the thousands of anglers fishing the Russian River this season. Please comply with the fishery regulations as well as those governing the camping area where you may be staying. Your consideration for this valuable red salmon resource will help insure its perpetuation for the use and enjoyment of future generations. Good luck and good fishing.

INTRODUCTION

The Russian River red (sockeye or blueback) salmon fishery is the largest freshwater fishery in Alaska. The fishery is unique in that the Russian River is one of the few streams in North America where red salmon may be readily caught with artificial flies.

This booklet is designed to familiarize anglers with the many facets of this fishery. The Russian River system is described and areas open to fishing are defined. Maps show the location of the Russian River falls, fish weir, campgrounds and trails. There are brief sections on fly fishing techniques and the life history of red salmon.

It is hoped that with a knowledge of the area and an understanding of the fishery, anglers will more fully enjoy fishing for Russian River red salmon.



THE RUSSIAN RIVER SYSTEM

The Russian River is a clear stream on the Kenai Peninsula adjacent to the Sterling Highway at Mile 55. Here, at the confluence of the Russian and the glacial Kenai River, a privately operated ferry transports anglers to the south bank. Over 50 percent of the anglers fish this area. Access to the stream is also available via the U.S. Forest Service Russian River Campground at Mile 52.5.

FLY FISHING TECHNIQUE

Fly fishing on the Russian River is not difficult and with a little practice may be mastered by fishermen of all ages. A relatively light-to-medium-action rod and reel with 20-pound-test line is



preferred by many fishermen as a sensitive rod aids the angler in feeling the fish take the fly. Either a spinning or fly rod is satisfactory and any streamer fly with a gap between point and shank no greater than 3/8 inch is permitted. Red salmon do not appear to prefer one color to another, but red, green and yellow flies are most commonly used. The use of weights depends on the depth of the water and speed of the current. Add just enough weight so the fly "bounces" along the bottom.

Cast the fly upstream and allow it to make an arc as it drifts by you. Keep a tight line at all times. Red salmon do not strike the fly, but "mouth" it and if the gentle tug is not detected immediately, you won't know that a fish is on. Long casts are not necessary as the salmon follow the shoreline during their upstream migration.

REGULATIONS

Fishing regulations covering this area:

1. The area open to red salmon **fly-fishing-only** is from a marker 600 yards below the Russian River falls to a marker approximately 1,800 yards below the confluence of the Kenai and Russian rivers, a distance of about three miles. From the first of June through the middle of August,* artificial flies are the only lure or bait permitted in this area.
2. One section of the above area is closed to all sport fishing from the first of June through the middle of July.* This is the area from a marker 100 feet below the ferry crossing to a marker 700 yards upstream on the Russian River (see map). This area is an historic resting area for early run red salmon and the closure has been implemented to provide additional protection for these stocks. Effort has become so intense in recent years that without this "sanctuary area" anglers are capable of harvesting the majority of the early run fish to reach Russian River.
3. The daily bag and possession limit from June 1 through July 14 is one red salmon over 16 inches in length. After that time, the daily bag and possession limit is three red salmon 16 inches or more in length. Bag and possession limit during the early run has been reduced to compensate for increased angler effort directed toward these stocks. The second or late run is larger than the first and anglers harvest proportionately fewer red salmon. A reduction in bag limit is therefore not presently needed on this segment of the population.
4. Fishing is permitted only with an unweighted single-hook streamer or coho fly from the first of June through the middle of August.* The gap between point and shank may not exceed 3/8 inch.
5. Weights must be at least 18 inches ahead of the fly.
6. Any fish hooked elsewhere than in the mouth must be released immediately. This regulation, coupled with (4) and (5) above is designed to eliminate snagging, a practice which is opposed on aesthetic grounds by the vast majority of the fishery participants. It is **unlawful to snag or attempt to snag fish in the fresh waters of Alaska.**

*See this year's Alaska Sport Fishing Seasons and Bag Limits for the exact dates.

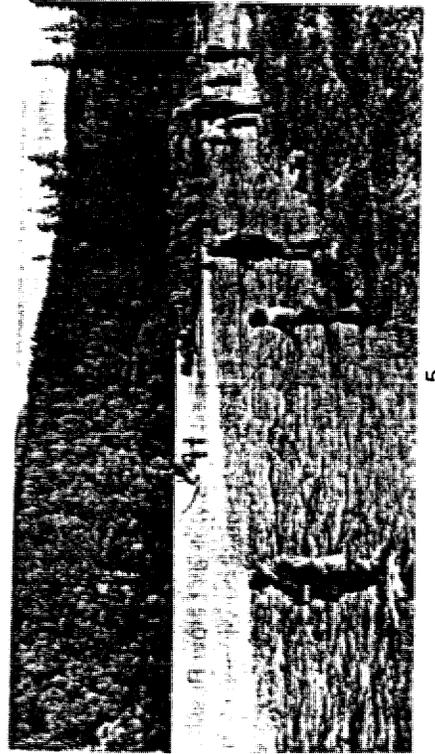


7. The area upstream from a marker 600 yards below the Russian River falls is closed to all salmon fishing. Trout fishing, however, is permitted in and above the falls except within an area 300 feet on either side of the Russian River weir.
8. King salmon fishing is prohibited in the Russian River and in the Kenai River above the outlet of Skilak Lake. Molestation of these fish is unlawful. The king (chinook) is the largest of Pacific salmon and may exceed 50 pounds in the Russian River. However, it is the least abundant salmon and the Russian River currently supports a run of only 200 to 300 of these large fish. These salmon spawn between Upper and Lower Russian lakes as well as below Russian River falls. Feel free to photograph and observe these fish. Do not attempt to hook and play them for "sport." These are spawning fish and any additional stress reduces their chance to complete their life cycle.

9. Silver (coho) salmon also spawn in the Russian River drainage. These fish generally arrive at the confluence of the Kenai and Russian river by late July or early August. Fishing for this species is permitted and areas open are areas identical to those in which red salmon fishing is permitted. The bag and possession limit is a total of three salmon over 16 inches, i.e.; any combination of red and silver salmon (two red and one silver salmon). (Note: Only one red salmon may be taken prior to July 15.)
10. Fishing is permitted below the marker on the Kenai River using any legal sport fishing gear. However, the glacial (turbid) nature of the river renders sport fishing difficult and few anglers fish this area.
11. Trout fishing is permitted in all areas open to salmon fishing as well as in and above Russian River falls. Popular areas include Lower Russian Lake and the stream between Upper and Lower Russian lakes. Any legal sport fishing tackle may be used in these areas. When fishing trout in the area open to red salmon fishing, only flies may be used.

EMERGENCY CLOSURES

Despite the stringent current annual regulations, demands made upon Russian River red salmon are at times greater than the resource can provide. At such times the Department of Fish and Game closes all or part of the fishery by emergency regulation. During closed periods, the stocks are closely monitored by department biologists. As soon as escapement levels permit, the fishery is reopened. The public is notified by newspaper and radio as well as by signs on the stream.



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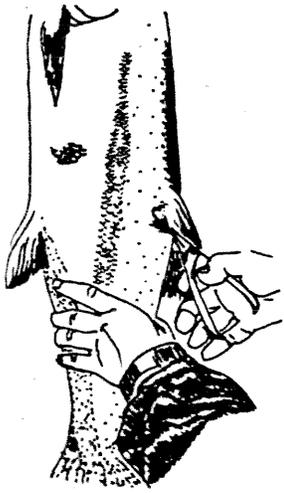
IF YOU SNAG OR FOUL-HOOK A SALMON

During your stay at the Russian River you may accidentally foul-hook or "snag" a salmon. This fish must be released immediately. If released-correctly the fish will suffer little permanent injury and probably will spawn successfully. If released incorrectly, the chances of recovery decrease appreciably. Please do your part to perpetuate the Russian River red salmon runs by properly releasing foul-hooked fish:

1. Land the fish as quickly as possible. Playing the fish to complete exhaustion depletes the energy reserve it needs for spawning.
2. Never place your hands under the fish's gill covers. This injures fragile gill arches and causes bleeding and almost certain death.
3. Hold the fish by the tail or body to remove the hook. A long-nosed pliers is excellent here. Don't wet your hands as this makes the fish more difficult to handle.
4. If the hook cannot be removed readily, clip the leader and leave the fly in the fish. Removing the hook will cause more damage than leaving it in.
5. Immediately return the fish to the water and point it upstream. Gently hold it in this position until it swims on its own.



6



RED SALMON LIFE HISTORY

The Russian River has two distinct red salmon runs. The early run generally arrives by June 15 and averages 19,000 fish. Anglers generally harvest about one-third of this stock. These salmon spend two years rearing in Upper Russian Lake and three years at sea before returning to their parent stream in their sixth year of life to spawn and die.

Early run red salmon spawn in mid-August. Each female salmon deposits between 3,000 and 4,500 eggs which hatch in late winter. The fry emerge from the gravel in early spring and immediately enter Upper Russian Lake. Here they rear for two years before migrating to salt water. On returning three years later, the average adult salmon weights approximately six pounds but may occasionally exceed ten.

The second or late run usually arrives in mid-July and is the larger of the two runs. It averages about 45,000 fish. These salmon

return to the Russian River in their fifth year of life after spending two years in fresh water and two years in the marine environment. The average size of late run fish is therefore somewhat smaller than the early run salmon as they have one less year of ocean growth.

Although many thousands of fish return each year to the Russian River, the runs display considerable annual variation. These fluctuations may be due to variable egg survival during winter months, fluctuating rearing conditions at Upper Russian Lake, differential ocean survival and the size of the commercial harvest in Cook Inlet



RUSSIAN RIVER FALLS AND WEIR

Those anglers who come in midsummer to the Russian River in hope of "catching" a red salmon on film are rarely disappointed. The Russian River falls provides a rare opportunity to observe red, king and silver salmon as they make their way to the spawning grounds at Upper Russian Lake. The falls slow the salmon's migration and, at times, many thousands of fish may be readily observed and photographed.

Approximately a half mile above the falls is the Russian River weir, built and maintained by the Sport Fish Division of the Alaska Department of Fish and Game. The weir permits an exact count of

all salmon that have passed through Cook Inlet commercial and Russian River sport fisheries. The weir is also used to conduct life history studies which provide valuable knowledge regarding the red salmon's complex life cycle. Anglers are reminded that although trout fishing is permitted in and above Russian River falls, all fishing is prohibited within 300 feet on either side of the weir.

Both the Russian River falls and weir are easily reached by a U.S. Forest Service trail. It is approximately two miles to the falls and walking time is about 50 minutes (see map, page 10). This trail also connects the Russian River campground with Upper Russian Lake, a distance of about 12 miles. The U.S. Forest Service maintains a cabin at Upper Russian Lake which is available by reservation.

CAMPGROUND AND RELATED FACILITIES

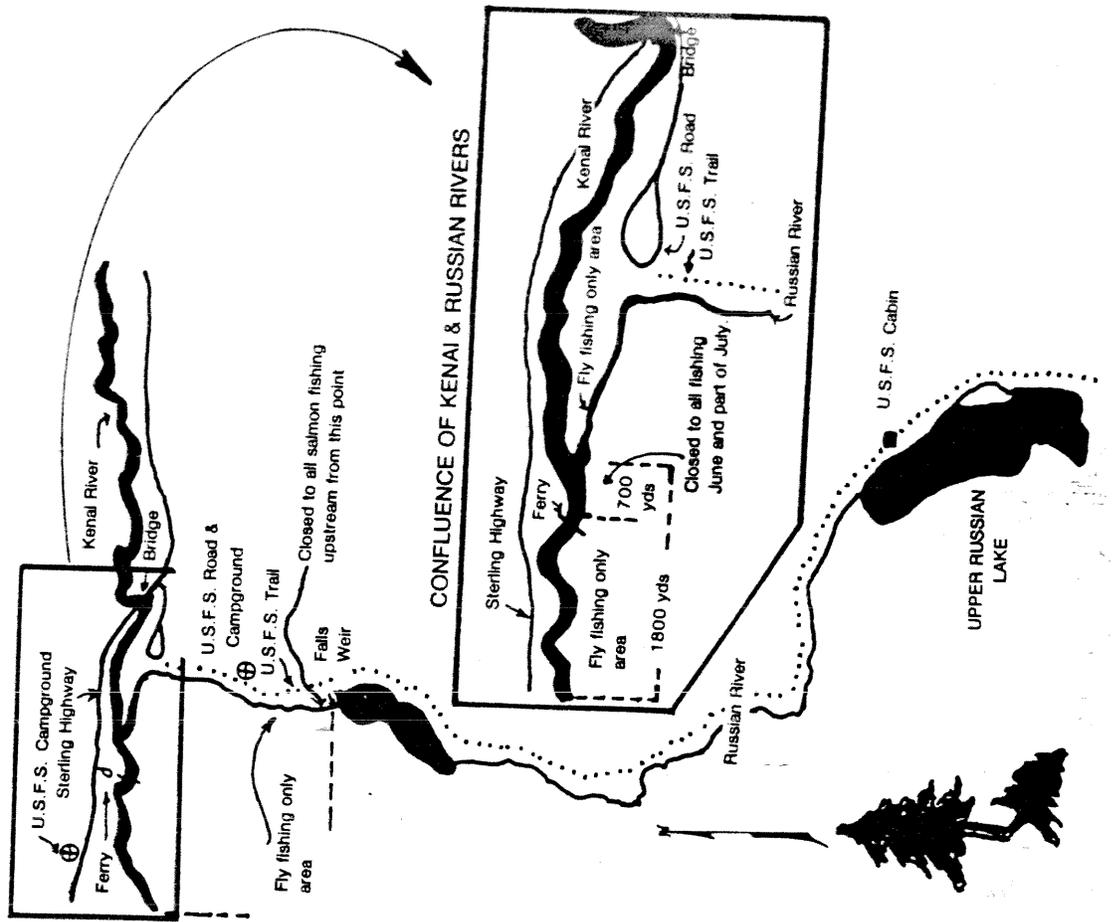
The Russian River angler will find a variety of services, facilities and camping areas available. The U.S. Forest Service Russian River Campground at Mile 52.5 has 86 units and provides water, picnic tables, fireplaces and sanitary facilities.

The Bureau of Sport Fisheries and Wildlife provides a small camping and parking area adjacent to the confluence of the Kenai and Russian rivers as well as more extensive facilities in the Skilak Recreation Area on Skilak Loop. This road intersects the Sterling Highway at Mile 59, four miles west of Russian River.

Lodges, motels, laundromats, grocery stores and tackle shops are located in the immediate area as well as in the nearby community of Cooper Landing.

RUSSIAN RIVER RED SALMON FISHERY

See Alaska Sport Fishing Seasons and Bag Limits for closure and fly-fishing only dates.





WELCOME



KENAI-RUSSIAN RIVER FERRY

Welcome to the Kenai-Russian River Ferry. This facility is within the Kenai National Wildlife Refuge and operated by Tawah Trading Company under contract with the U.S. Fish and Wildlife Service. All rules and regulations of the Refuge and the State of Alaska sportfishing regulations apply. Enjoy your stay and let us know if there are ways we can better serve you.

Public Use of Kenai-Russian River Facilities:

- * Campers may not spend more than two consecutive days at the Kenai-Russian River Ferry access area.
- * Camping is permitted only in designated areas, and open fires are permitted only in permanent fire grates provided in the campground or portable, self-contained metal fire grills. Users must clean-up and pack out litter and charcoal generated from use of portable grills.
- * Campers may collect only dead and down wood for campfire use.
- * Pets are permitted only on leashes nine feet or less in length. Pets must not be left outside vehicles, tents, or recreational vehicles unless the owner is present and attending animal at all times. Owners are responsible for removing pet wastes within camping and parking areas.
- * Leaving personal property unattended is not authorized.
- * Put litter in containers provided. When fishing, bring litter back to the parking lot trash receptacles.
- * Vehicles parked in "NO PARKING", "HANDICAPPED", and "OFFICIAL VEHICLES" parking zones, or blocking roadways or other parked vehicles, are subject to towing and/or impoundment.
- * Waste water from recreational vehicles must be collected in a closed container and properly disposed of at an authorized dump station.
- * Recommended quiet hours are from 11pm to 8am; playing of audio equipment and running generators is discouraged. Please be considerate of neighbors and not cause for Refuge Officers to pay a late hours law enforcement visit.
- * Open fires are not authorized on the south side of the Kenai River. The south shore of the Kenai River is a designated day use area. Camping is prohibited within 1/4mile of the river.
- * Help keep toilets clean. Do not throw cans, bottles, diapers, etc., into toilets, as these items block pumping equipment.
- * A designated HANDICAPPED FISHING AREA is available for *mobility challenged* users. All fishing in this area must be from the bank only, not in the water. This designation is in effect 24 hours/day.

Fishing Regulations for Kenai-Russian River Ferry Access Area:

- * An area approximately 100 feet downstream from the ferry is closed by the Refuge Manager for the safety of ferry passengers.
- * Fishing limit for sockeye salmon is 3 per day and 3 in possession. (Salmon in refrigerators, coolers or otherwise *not* preserved by freezing, smoking, heavy salting, or canning are considered part of the angler's daily limit.) King salmon caught in the upper Kenai and/or Russian Rivers must be released unharmed immediately.
- * The Kenai River from its confluence with the Russian River to an Alaska Dept. Of Fish & Game marker 1800 yards downstream are fly-fishing-only from June 11 to August 20.
- * Authorized fly-fishing gear includes:
 - a. Not more than one unweighted, single-hook fly with gap measuring 3/8 inch or less between point and shank.
 - b. Weights may be used 18 inches or more from the head of the fly.
- * Waters from an Alaska Dept. of Fish & Game marker placed below the ferry crossing on the Kenai River upstream to an ADF&G marker located about 100 yards upstream of the public boat launch on the Kenai River and 700 yards upstream on the Russian River is closed to fishing from April 15 through July 14.
- * Rainbow trout may not be possessed or retained from the Russian River.
- * Kenai River rainbow trout less than 30 inches in length may not be possessed or retained. All rainbow trout less than 30 inches in length must be released immediately. Daily bag and possession limit is one rainbow trout over 30 inches in length. Rainbow trout caught in the Kenai River must be recorded on the back of your fishing license.
- * It is unlawful to intentionally snag or attempt to snag any fish in fresh water. Fish unintentionally hooked elsewhere than in the mouth must be released immediately.

