



3651

Form 504
DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

State: ALASKA

11-5013

DESCRIPTIVE REPORT.

Top Sheet No. 3651

LOCALITY:

ZAREMBO & MITKOFF

Islands

1916

CHIEF OF PARTY:

L.O. Colbert

DEPARTMENT OF COMMERCE
COAST AND GEODETIC SURVEY.

E. Lester Jones Superintendent.

DESCRIPTIVE REPORT

to accompany

TOPOGRAPHIC SHEET N. ____.

of

SOUTHEAST ALASKA,

portion of

ZAREMBO

and

MITKOFF ISLANDS.

SURVEYED by WIRE DRAG PARTY NO. 4

1916

L.O. Colbert,

Chief of Party.

Scale. 1:20,000.

DEPARTMENT OF COMMERCE

Page 1.
L.O.C. 1916.

COAST AND GEODETIC SURVEY

E. Lester Jones, Superintendent.

Descriptive Report to accompany Topographic Sheet No. ____
of
S.E. Alaska, Portion of Zarembo and Mitkoff Islands and the
Intermediate Small Islands.

Surveyed By Wire Drag Party No 4, under instructions from the
Superintendent dated February 26, 1916.

Limits, Scale, Method, Party:-

I have the honor to report on sheet No. __, as follows;

This sheet comprises 12 miles of the shoreline on the north side of Zarembo Island, from one mile west of Point Craig Beacon in Sumner Strait eastward to \triangle Rem on South Craig Point, Stikine Strait. Twenty-five and seven-eighths miles of the shoreline of Mitkoff Island from one and a half miles east of Point Howe, \triangle Slope, eastward to a point in Dry Strait north of Wilson Islands, one and a half miles east of \triangle Will. This is inclusive of seventeen and a half miles of shoreline in Blind Slough.

Inclusive also within the limits of the sheet are the shorelines of the following Islands;- Vank Island, ten miles; Sokolof Island, five and three-eighths miles; Wilson Island, one and a fourth miles for both; Station Island, seven-eighths of a mile; a small Island near the entrance to Blind Slough, one-half a mile; and Two Tree Island, a small island at the west end of the passage between Vank and Sokolof Islands.

The Geographic limits are;

Latitude $56^{\circ} - 21'$, $56^{\circ} - 35'$
Longitude $132^{\circ} - 34'$, $132^{\circ} - 48'$

The scale is 1:20,000.

A plane table was used throughout with the exception of measuring elevations on Zarembo Island at the junction of this sheet and the one joining it on the west; a sextant was used here. The work consisted of traverses ~~was~~ checked on triangulation stations with the exception of the shoreline on Mitkoff Island, exclusive of Blind Slough and the west side of Vank Island. Here the usual three point fixes were used.

Methods Party:- Continued,

The party consisted of an observer, boat engineer and rodsman. A clinker built skiff with outboard motor was used throughout. Smooth water favored the use of the motor, and made the handling of the boat by one man both possible and rapid. The party was in charge of Nathaniel P. White, Aid, C. & G. Survey.

Traverse Contours Height:-

The first traverse was started at Δ Dim, orienting on Δ Tree, and going eastward to Δ Inter. Inter was not at that time on the sheet, but when it was plotted later it was found that the line was correct in distance, but off to the north twenty-five meters in Azimuth. The line was adjusted throughout. Starting at Inter a second line was run which completed the shoreline to South Craig Point, Δ Rem. It was found too long by twenty meters and off to the east in Azimuth twenty meters.

The east and north shores of Vank Island were run in by two independent traverses. Starting at the light, a hundred meters east of Mud Bay, a traverse was run east and north to a point, Latitude $56^{\circ} 20'$, Longitude $132^{\circ} 35'$. Starting at a point three-quarters of a mile east of Δ Move, determined by a three point fix, a traverse was run eastward to connect with the former line. Station Slim was cut in on this traverse.

The two lines failed to meet by twenty-five meters in Azimuth, the latter being to the east of the former. The distances checked. This location of Δ Slim failed to coincide with a triangulation cut to the same signal from Δ Quartz. By swinging this traverse until Δ Slim fell on the triangulation cut the two ends of the traverse were brought into perfect adjustment. This adjustment was made.

Later in the season the errors in orientation were found to be due to the slipping of the table caused by loose clamps. It was found necessary to repair these frequently.

The south shore of Sokolof Island was run by a traverse starting from a three point fix on the southwest point of the Island, running eastward, and checking on topographic signal Len, just off the limits of this sheet.

Blind Slough was run by starting from a three point fix at a point on the north shore. Where it was too wide to permit of reading across, flags had been erected on the opposite shore the previous day and were cut in as the traverse progressed. On the return trip the shoreline was sketched in between the points. This traverse was not checked, but is probably within the allowable limits of accuracy.

Traverse, Contours, Height:- Continued,

The contour interval is one hundred feet.

All contours were drawn while on the ground, and from elevations measured by the Alidade, with the exception of a few elevation measured on Zarembo Island at the junction of this sheet and the one to the west. These were made by a sextant from a boat anchored in mid-channel, no correction being made for the dip, which makes the elevation slightly in error. The shoreline was at no time more than two miles from the boat.

The highest point measured was twenty-six (2600) feet. Location, $56^{\circ} - 35\frac{1}{2}'$, $132^{\circ} - 40'$. The summit is slightly beyond the limits of the sheet. One or more miles off the northwest corner of this sheet are mountains of probably three thousand feet elevation. These were most all cut in by triangulation. Time did not permit the drawing in of these contours. On Zarembo Island at the head of the valley south of \triangle Inter, there are two small, abrupt, bare, green Knolls, appearing something like the humps of a camel; they are of nearly the same elevation. It is impossible to get the remainder of the contours of Zarembo Island without climbing some of the mountains or going to the south through Stikine Straits farther than the limits of this sheet.

To obtain all elevations the mean of three or more cuts was taken. The greatest discrepancy between cuts was forty feet, but an average of five to ten feet however, was more usual.

General Remarks:-

Mountains, Character of Shoreline, Vegetation, Animal Life.

Zarembo Island:-

The mountains shown are a portion of a ridge that runs parallel to the shore from South Craig Point to St John Harbor, (off the limits of the sheet by four miles). The highest portion of this ridge is back of South Craig Point, where it rises to twenty-four hundred feet. The elevations gradually decrease as you go west. An average height would be nineteen hundred feet (1900). The ridge is deeply eroded by a stream. At the foot of the spurs the ground rises rapidly from the shoreline. In the Stikine Strait the shoreline is marked by rocky cliffs from ten to fifteen feet high.

Zarembo Island:- Continued.

From station Dim to Station Off, at Craig Point, there are low rocky cliffs. The remainder of the shoreline is low and marked by low rocky cliffs.

Just north of South Craig Point there are two deep indentations that serve very well for harbors for fishing boats. Deep Bay, the more northerly one, extends one statute mile inland, and is too narrow to deep to afford good anchorage unless followed well into its head. Roosevelt Harbor, so named by W.G. Party, no. 3, just south of Deep Bay affords a better anchorage. It extends inland a half mile, is (250) meters in width and is clear of obstructions having a depth of eleven fathoms with soft mud bottom at its head. The entrance is marked by a large (80 x 20) meters rock overgrown by grass and low bushes. To the north the entrance is clear; to the south a passage is ~~impossible~~ impossible even to small boats. Kelp lines the entrance to the south. Kelp is noted in small patches all along the Zarembo shore.

Mitkoff Island:-

The island is indented by a blind slough three or four miles deep and a mile wide at the entrance. One large island lies at the entrance and another two and a half miles inside. Back of the second island the slough divides into two arms, one running west and the other north. The northern arm again divides into two, one mile north of the island, the two branches running parallel to the north. At the head of the eastern fork a large stream enters; the ground is low and wet. This is an old favorite indian portage stream in going from Wrangell to Petersburg. The low valley continues to Wrangell Narrows.

One must go inland four or five miles to reach the highest mountains some three thousand feet in height. With the exception of the entrance to the slough the ground rises rapidly from the shore to an elevation of (2600) feet. West of the entrance to the slough the shore is lined with rocky cliffs ten feet high; while to the east the shoreline is low and marked by sand stretches and small broken rock, usually rocky between high and low water.

Sokolof Island;

Sokolof Island is square in plan with a hill at each corner. the average elevation is five or six hundred ~~ft~~ feet. The center of the island is low, and is drained by a stream running west and empties into a bay a half mile deep and two hundred meters wide. This bay is a good anchorage for small boats in all except westerly winds.

Vank Island:

On Vank Island there are two prominent hills (800) to (900) feet high, but from some views as many as five or six hills can be distinguished. The land fall is steepest on the south-west side; all the highest elevations of the island lie within five or six hundred meters of this shoreline, which is marked by smooth steep cliffs, at some places forty feet high. The shoreline on the north side is generally low and strewn with rock. Mud Bay is near the most southerly point of the island. It is very deep at the entrance, but shoals up rapidly inside. There is a small patch of cultivated ground at the head of the bay.

Wilson Islands:-

There are two small island in Dry Strait due east of Δ Will. They are low and rocky and of a combined area of not more than one sixteenth of a square mile. They are thickly wooded with spruce.

Sue Island:

This is a small island east of the entrance to Blind Slough. Δ Sue is located thereon. It is heavily wooded.

Station Island:-

Station Island is a small island two miles east of Howe Point, about (250) feet in height, and bound on all sides by high cliffs of from fifteen to thirty feet in height. It is about (500) by (300) meters in it's other dimensions, and is heavily wooded. Δ Tree is a banner located on the top of the highest tree.

Vegetation and Animal Life:-

The timber is principally spruce, pine, hemlock, and cedar. Near the shore they are of small diameter and very dense. The underbrush is very dense and profusely crowded with devils clubs and windfalls, which make travelling for hunting or otherwise very difficult until well up the mountainside.

The animal life consists principally of ; - for the land, deer, wolves, mink, porcupines and black bears; for the water, salmon, porpoise, hair seals (plentiful), mud sharks and herring, and trout in the streams; for the air, crows, ravens, ducks, geese, sandhill cranes, gulls, oystercrackers, blackbirds, snipe and eagles; ducks and geese are especially plentiful. In the fall of the year sandhill cranes fly over this area by thousands on their way south.

Detailed description of shoreline and prominent Points:-

Starting at Station Rem at the southern extremity of the sheet we find the point fringed with kelp. From here to the point at the entrance to Roosevelt Harbor, the shoreline is rocky, the cliffs overhanging ten feet. At the mouth of the harbor is a large rock described earlier in this report.

The remainder of the shoreline of the sheet has been sufficiently described above so as to need no further elaboration here.

STATISTICS

| | |
|---|------------------|
| Area surveyed in square statute miles..... | 54 $\frac{1}{4}$ |
| Length of general coast line in statute miles | 38 $\frac{3}{8}$ |
| Length of shoreline of rivers in statute miles..... | 00 |
| Length of shoreline of creeks in statute miles. | 2 |
| Length of shoreline of sloughs in statute miles. | 17 $\frac{1}{2}$ |
| Length of shoreline of ponds in statute miles. | 00 |
| Length of of roads in statute miles. | 00 |
| Topographic sheets finished, number of, | 1 |
| Topographic sheets, scales of, | 1 : 20,000. |
| Topographic sheets, limits and localities of; | |

S.E. Alaska, Portion of Zarembo Island and Mitkoff Island.

Latitude 56 - 21, 56 - 35.

Longitude 132- 34, 132 - 48.

Respectfully Submitted,

Approved

Signed

Nathaniel P. White.

Aid, C. & G. Survey.

L. O. Collett

Assistant, C. & G. Survey.

LIST OF POSITIONS.

| <u>Name</u> | <u>Latitude</u> | <u>D. M.</u> | <u>Longitude</u> | <u>D. P.</u> | <u>Description</u> | <u>Elevation.</u> |
|--------------------------|-----------------|--------------|------------------|--------------|--------------------|-------------------|
| Light | 56 24' | 1584 | 132 36' | 155 M | Acetyline Lt. | |
| Sam | 27' | 329 | 34' | 179 | Tripod Signal | 2' abv. H.W. |
| Brad | 26' | 35 | 34' | 983 | W. W. Rock | 8' diam. |
| Kruk | 29' | 542 | 37' | 555 | W. W. Tripod | 4' abv. H. W. |
| Fix | 29' | 32 | 38' | 572 | White Rock | 2' diam. |
| Lump | 28' | 1610 | 39' | 357 | Boulder | 8' diam. |
| Two Tree Id. | 29' | 1026 | 38' | 30 | Central Tree | |
| Con | 27' | 730 | 44' | 50 | W.W. Beacon | 10' abv. H.W. |
| Sti | 29' | 1050 | 45' | 778 | W. W. Mark | 5' abv. H.W. |
| Center of Station Id. | 29' | 1060 | 46' | 000 | | 170 Ft. |
| Sue | 31' | 1376 | 40' | 106 | Tripod Signal | |
| Po | 29' | 1022 | 36' | 710 | White Rock | |
| La | 30' | 1350 | 35' | 534 | Pole Signal | |
| Co | 30' | 1326 | 34' | 926 | Pole Signal | |
| Slim | 29' | 546 | 36' | 22 | Pole Signal | |

DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

TOPOGRAPHIC TITLE SHEET

The finished Topographic Sheet is to be accompanied by the following title sheet, filled in as completely as possible, when the sheet is forwarded to the Office.

U. S. Coast and Geodetic Survey.

Register No. 3651

State South East Alaska.
General locality Summer Strait, Eastern ^{Part.} End.
Locality Zarembo Island, N.E. coast + Mitchell Is. - S.E. coast.
Chief of party L. O. Colbert, Assistant.
Surveyed by N. P. White, Aid.
Date of survey July 1916
Scale 1 - 20,000
Heights in feet above Mean High Water
Contour interval 100 feet.
Inked by N.P.White. Lettered by N.P.White.
Records accompanying sheet (check those forwarded): Photographs,
Descriptive report, Horizontal angle books, Field computations,
Data from other sources affecting sheet

Remarks: Descriptive report to be forwarded
on a later date