

4142

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

State: Alaska

11-5813

DESCRIPTIVE REPORT.

Top Sheet No. 4142

LOCALITY:

Aleutian Is.

Adak Island

Bay of Islands

1925
1921

CHIEF OF PARTY:

G.C. Jones

4142

DESCRIPTIVE REPORT TO ACCOMPANY TOPOGRAPHIC AND
HYDROGRAPHIC SHEET, FIELD NO. A.

Instructions dated February 13, 1925.

G. C. Jones, Chief of Party.

The coast line in this region is high. The shore has a forbidding appearance on this sheet in particular, but in general is abrupt and apparently clear. Due to the absence of trees, nothing is visible to the navigator but snow, grass and rocks. The mountain tops are usually, except in winter, hidden by clouds and for that reason dependence for landmarks must be placed almost entirely on unusually shaped rocks near the shoreline. The large, high waterfall on the south shore of the Bay of Islands should be noted particularly and placed on the published plan.

Little is known of outlying dangers, limit of tide rips, etc. Cascade Rock is always bare or breaking. In any case it is well located and can readily be avoided. In general no very strong currents were noticed; not even in the narrow passages through the islands.

A copy of the Coast Pilot notes for this harbor accompanies this report so that landmarks, channels, anchorages, etc., will be treated in that report.

The initial control for this sheet was furnished by a scheme of triangulation, with a 4" theodolite using six or three repetitions direct and reverse, expanded from a base, 181 meters in length, measured three times with an ordinary steel tape. No corrections made for leveling, temperature, sea level, etc. The partially sheltered area between North Island and the Entrance Islands was covered by this control, it being though at first that this was the Bay of Islands. That area was surveyed by sextant topography and checks fairly well with the existing sketch.

The Bay of Islands proper was done by a rough plane table, triangulation and sketching. The shoreline actually surveyed by sextant or plane table topography is shown in full lines; that by rough plane table triangulation in short dashed lines, and that sketched by eye or from outside information, in long dashed lines. All the area north of Latitude $51^{\circ}51'$ is eye sketching except that one point just off the north edge of the sheet was cut in by plane table. Inside the two long spits the sketch is probably not equal to existing information.

West of longitude $176^{\circ}51'$ the two points encircled in pencil were cut in by theodolite. The balance of that section is very rough sketching.

The few soundings made are shown on this sheet. It was noted, while anchoring with the Coast Guard cutter, that the few existing soundings are dependable.

Several names were assigned to assist in descriptions and coast pilot notes. All are descriptive.

1. Cliff Point is a straight cliff over 200 feet high. This name should be placed both on the harbor chart and the general chart in order to obviate any doubt as to the location of the harbor. The officers of the Unalga encountered this difficulty in entering the bay.
2. North Island is 275 feet at its highest point and has the same rough appearance as the rest of the country except for a distinctive rock on its north end described as a landmark in the coast pilot notes.
3. North Rock is a group of rocks, about 30 feet at the highest point, lying just south of North Island.
4. South Island is a rather high island, probably over 200 feet, lying south of the entrance to the portion of the bay now shown on published plan.
5. Entrance Islands is a group of islands of various sizes lying on the north side of the principal entrance. They are rough, as is the surrounding country, and some elevations undoubtedly reach 300 feet; certainly in excess of 200 feet.
6. Cascade Rock in latitude $51^{\circ} 49.7'$, longitude $176^{\circ} 49.3'$ is only a few feet above high water. The sea is usually breaking over it and cascading down its sides, hence the name.
7. Green Island, so named because of a marked green color as opposed to the browner color of the surrounding country, is useful for describing the entrance, also a reported anchorage behind this island.
8. Long Island is a long narrow island lying on the starboard hand when entering the bay. Anchorage for smaller vessels is reported behind this island.

COAST PILOT NOTES.

BAY OF ISLANDS. ADAK ISLAND. ALUTIAN ISLANDS. ALASKA.

Reconnaissance of June, 1925.

H. C. James. Chief of Party.

A reconnaissance of this bay was made by the Coast Survey in 1925. Few soundings could be secured with the means at hand and the time available. Such information as could be secured and reports from men with local knowledge indicate an excellent harbor for vessels of any size and easy access to fresh water supply at the falls on the south shore of the bay.

To enter the Bay of Islands follow the middle of Adak Straits until north Cape bears 301° true ($W \times N \frac{3}{4} N$ mag.) then steer 121° true ($E \times S \frac{3}{4} S$ Mag.) keeping the high pinnacle rock, which will then have opened up at the foot of the bluff, on the above bearing until cliff Point (a cliff over 200 feet high which will then be about 2-1/2 miles distant) bears west true ($W \frac{7}{8} N$ Mag.) then steer 149° true ($SW \frac{3}{4} S$ Mag.) to pass midway between Green Island and the rocks (about 40 feet high) 1/3 mile east of Green Island. The above course will clear cascade Rock by 3/8 mile (nearly). After making Green Island steer midchannel into the harbor. Deep draft vessels should enter with caution as no soundings are available, although the passage and harbor are reported clear except for visible dangers.

Good anchorages are reported in the various bights of the harbor. Good anchorage is reported behind Green Island and for smaller vessels behind Long Island.

The anchorage south of North Island has been used by Coast Guard vessels. To enter proceed on the above course (121° true) until opposite the entrance between North Rocks and South Island. Then steer midchannel until clear and anchor near the south shore of North Island in 17 fathoms. Mud bottom may be found although the bottom in that anchorage is largely rock. Entrance from this anchorage to the lagoon bay may be made through a channel 40 meters wide, along the east side of the largest of the Entrance Islands. There is 3 fathoms or less just north of this channel and 5 fathoms or less in the south end. Both spots are marked with kelp and can be avoided, although the one in the south end should not be given too wide a berth on account of rocks on the east shore. There is also a kelp covered spot some 300 meters south of the south end of this passage. Otherwise 8 fathoms can apparently be carried through.

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The following notes are from information furnished by William Gardner, and associates, owners of the fox-farming lease on Adak Island, whose Schooner draws about 6 feet.

Kuluk Bay is good harbor, no sunken rocks, and nearly landlocked, slightly exposed to northeast weather.

There are good harbors all along the coast of Adak Island from Kuluk Bay around the south side and on the west side up to Bay of Islands. One of the above not indicated on the chart is on the east side of the pass between Adak and Kagalaski Islands.

The arms of Three-Arm Bay, especially the north and south arms, extend much farther into the island than indicated. The north arm nearly meets the south shore of Bay of Islands.



1. Northwest point of Adak Island, Cape Adagdak in the distance, bearing 94° true, distant $11\frac{1}{2}$ miles (naut.)

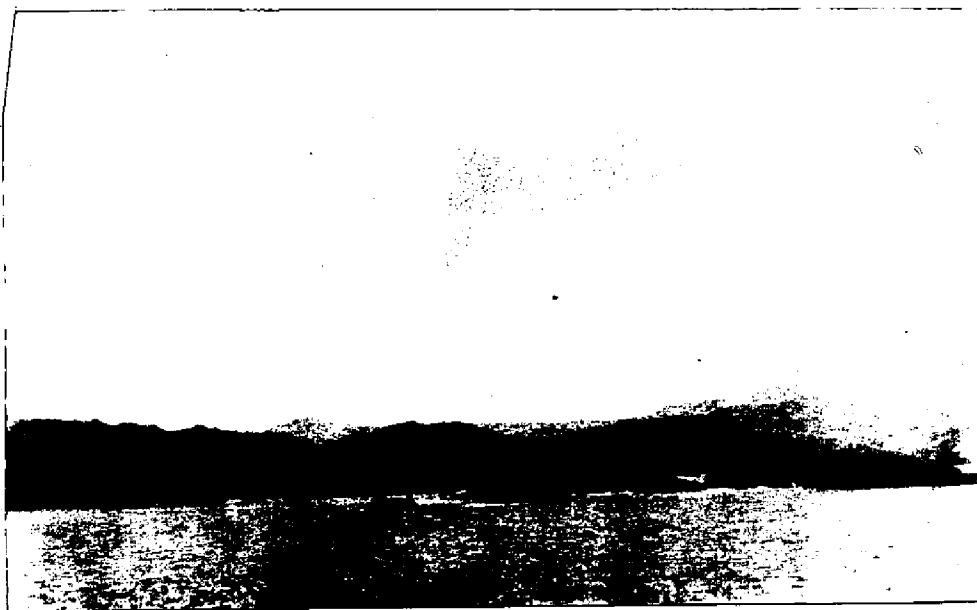
2. North Cape, Kanaga Island, bearing 246° true, distant 7 miles.



3. Entrance to North Island anchorage is to right of lowland (North Island) in center.



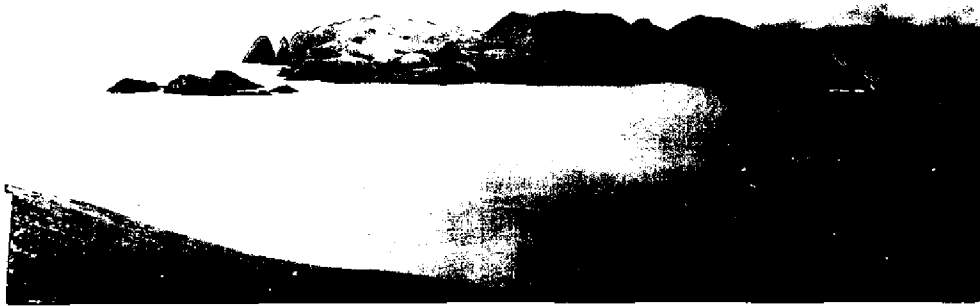
4. Rocks on starboard hand entering North Island anchorage.



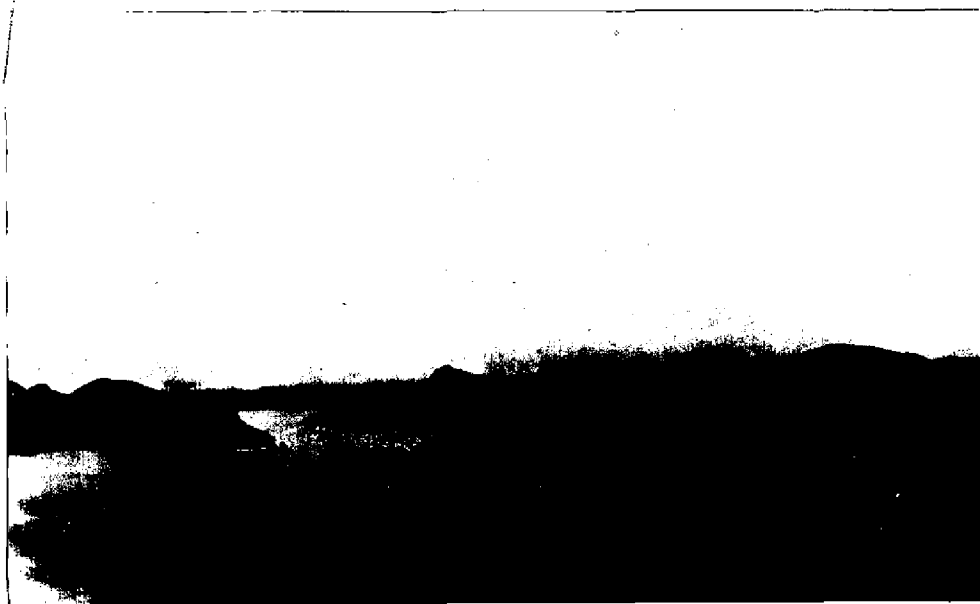
5. North Rocks, left to port on entering North Island anchorage.



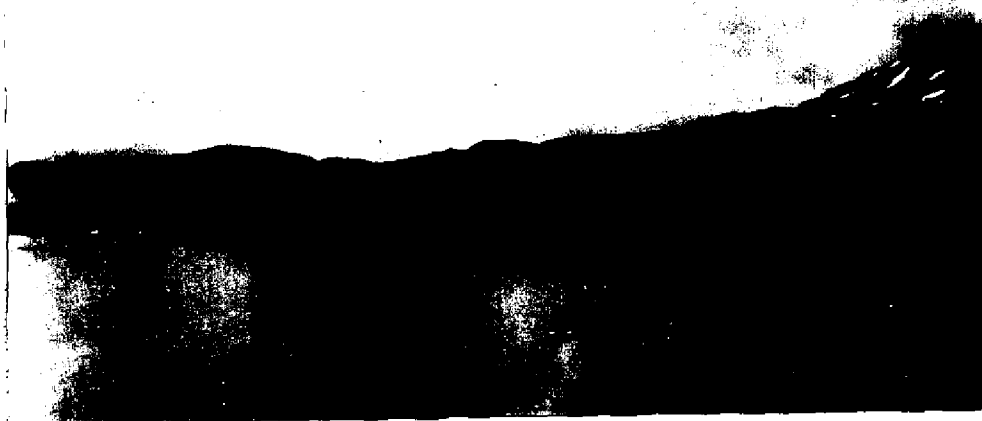
6. Looking about south from station Old showing broken nature of country.



7. North Island and North Rocks from Station Mound. Nos. 7 to 11 inclusive from a continuous panorama from Station Mound including from about north to about southwest.



8. The high point left center is at the top of Cliff Point.



9. Panorama continued.



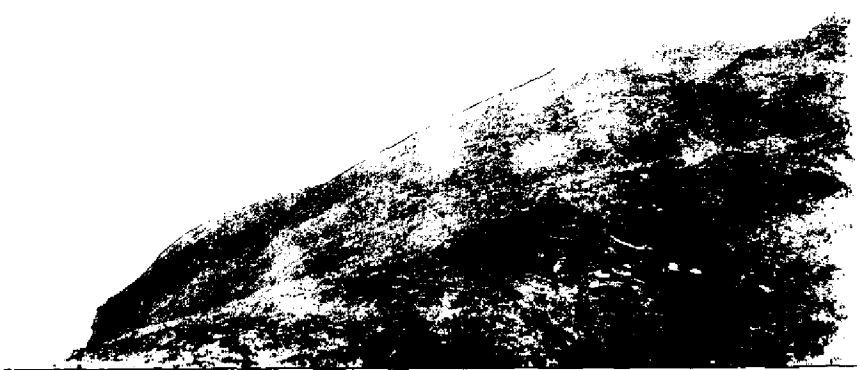
10. 2,000 foot mountain overlooking North Island anchorage.
Shown also in No. 3.



11. Panorama concluded. Station Old in center of picture.



12. Birdseye from 300 foot ridge of camp and canyon just north of Stations Mag. Astro. and S. E. Base. Tide gauge may be seen under cliff on opposite side of cove.



13. & 14. Two views from Signal Mound of rocks, islands, etc.,
in main entrance to Bay of Islands. Entrance is just
beyond rocks in center of No. 14.



SUPPLEMENT TO DESCRIPTIVE REPORT TO ACCOMPANY
TOPOGRAPHIC SHEET FIELD NO. 4142.

As shown on the sheet, the name, Bay of Islands is made to apply to the entire bay between Cliff point and the point west of ^(Lathmus Pt) Green Island. This is in keeping with local practice, with particular regard to the inner bay. The small area now charted as Bay of Islands is not that commonly so known, but a small portion thereof. That portion is referred to in the Coast Pilot notes as the North Island anchorage.

The hydrography on this sheet consists of an examination of the channel along the east side of the largest of the Entrance Islands.

A depth of $3\frac{1}{2}$ was found just north of the channel and also a depth of 3 fathoms in the south end.

The record for the hydrography on this sheet is in the sounding volumes filed with Hyd. 4501.

R. L. Johnston

Names of signals, located by the plane table, should have been inked in red instead of black.

DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

WASHINGTON

February 12, 1926.

SECTION OF FIELD RECORDS

Report on Topographic Sheet No. 4142 (Reconnaissance)

Aleutian Islands, Alaska

Surveyed in 1925

Instructions dated February 13, 1925

Chief of Party, G. C. Jones.

Surveyed and inked by G. C. J.

Soundings plotted by G. C. J.

Soundings verified and inked by R. L. Johnston.

1. This sheet is principally a topographic reconnaissance with some few soundings in the Bay of Islands.
2. The survey conforms to the requirements of the specific instructions.
3. The shoreline shown on this sheet in full black lines was run in by sextant ^{and} planetable; that shown in short dashed lines by rough plane table triangulation and that shown in long dashed lines was sketched by eye.
4. The survey of the narrow channel on the east side of the largest of the Entrance Islands would seem to indicate that with proper precaution deep draft vessels can enter through here into the large bay at the head of the Bay of Islands.

The 3 1/6 fathom sounding at the north end of this channel was not developed, and there may therefore be less water on it.

5. Isthmus Point and the north point of the island about 1 1/2 miles W x N of Isthmus Point were cut in by theodolite and can therefore be used in adjusting the work to the present chart.
6. The topography of this sheet was done on celluloid in accordance with the specific instructions and transferred to the smooth sheet afterwards. The transferring and inking was done by the field party.

S.P.S. /4

7. Attention is called to the note on the sheet that Three Arm Bay is separated from Bay of Islands by only a few hundred yards. The present chart shows the distance across here to be approximately 3 nautical miles.
8. The high waterfall on the south shore and at the head of the Bay of Islands should be shown on the charts as it is a prominent landmark for entering the bay.
9. There are no adjoining surveys.
10. This sheet being no more than a reconnaissance survey, further work will be necessary.
11. The field surveying is adequate for the purpose. The drafting is fair.
12. Reviewed by A. L. Shalowitz, February, 1926.

Bay of Islands, Adak Island¹⁶
 ϕ & λ determined by sun obsns.

ϕ Jan 19	51° 49' 25"
28	51 49 33
mean	51 49 29

λ June 18 pm	11° 47' 16"
18 pm	47 11
21 am	47 07
"	47 03
"	47 08
"	47 06
21 pm	47 05
"	47 03
"	47 04
"	47 06

11 47 05.3 = 176° 46' 3".

Radio signals from Annapolis at

9 pm on June 20 and 4 pm June 21
 and the results for June 21 are to be
 preferred for that reason.

4 inch Berger theodolite used.

I am confident the uncertainty of the
 determination of latitude does not exceed

15" and of the longitude 30" D.L.H.

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MA
1924
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U. S. SURVEY
I & A
SEE I. 30
Acc. No. 84337

Tucson Magnetic Observatory

Magnetograph Record

July 1924

DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

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REG. NO. 4142

TOPOGRAPHIC TITLE SHEET

The Topographic Sheet should be accompanied by this form, filled in as completely as possible, when the sheet is forwarded to the Office.

Field No. 7

REGISTER NO. 4142

State Alaska

General locality Aleutian ^{Is.} ~~Is.~~

Locality Adak I. - Bay of Islands

Scale 1-20,000 Date of survey June, 1925

Vessel Reconnaissance Party

Chief of Party G.C. Jones

Surveyed by G.C. J.

Inked by G.C. J.

Heights in feet above MTL to ground to tops of trees

Contour, Approximate contour, Form line interval 100 feet

Instructions dated Feb 13, 1925

Remarks: Reconnaissance sketch with
sdgs as per descriptive report.