DESCRIPTIVE REPORT

Topographic Sheet No. B-37
Hydrographic

State

LOCALITY

ALEUTIAN ISLANDS

EAST SIDE OF UMNAK ISLAND -
WEST OF THE PILLARS

1937

CHIEF OF PARTY

A.M. Sobieralski

U.S. COAST & GEODIC SURVEY
LIBRARY AND ARCHIVES

APR 19 1938

DECLASSIFICATION BY NOAA
PURSUANT TO DOC SYSTEMATIC REVIEW
GUIDELINES AS DESCRIBED IN SECTION
3.3 (a), EXECUTIVE ORDER 12356
DEPARTMENT OF COMMERCE
U.S. COAST AND GEOGRAPHIC SURVEY

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 Letter: B-37-T-6596

REGISTER NO.

State: ALASKA

General locality: ALEUTIAN ISLANDS

Locality: EAST SIDE OF UMNAX ISLAND - WEST OF THE PILLARS

Scale: 1:20,000

Date of survey: Aug.-Sept., 1937

Vessel: U.S.C & G.S.S. SURVEYOR

Chief of Party: A.W. SOBERHALS

Surveyed by: JOHN C. ELLERBE

Inked by: JOHN C. ELLERBE

Heights in feet above: MHW to ground

Contour: Approximate contour

Form line interval: 100 feet

Instructions dated: April 13, 1934

Remarks:

[Blank space]
DESCRIPTIVE REPORT

to accompany

TOPOGRAPHIC SHEET FIELD LETTER B-37 72-4592

PROJECT HT-176

U.S.C.&G.S.S. SURVEYOR

A. M. SOBIERALSKI, Cmdg.

AUTHORITY

Director's instructions dated April 13, 1934.

CONTROL

Triangulation executed by party of A. M. SOBIERALSKI, in 1936.

EXTENT

This sheet covers that portion of the east side of Umnak Island directly inshore of the Pillars. It begins about 6 miles southwest of Kettle Cape and extends southwestward for about 5 miles from that point. Form lines were carried about 2 miles inshore along the entire length of the sheet.

It was intended for this sheet to extend to station CZAR, 1936, but time did not permit the work to be carried any further than station SCARP, 1936, where the last traverse was closed. Weather prevented obtaining sufficient elevations to govern form lines on the southern end of the sheet, therefore the general contour of the country was merely sketched in, using dashed lines, over this area. Approximate elevations were obtained by spotting points on single cuts to geographic features; only absolute elevations appear on the sheet. It is intended to complete the form lines in this area during the next season, when the sector between station SCARP and station CZAR is done.

GENERAL DESCRIPTION

The shoreline is generally rough, with rocks and reefs extending well off shore in many places. At rather widely spaced intervals are short stretches of sand beach, back of which are deep valleys extending well into the interior of the island. In general, however, the land rises rather abruptly to a long chain of ridges, from 1500 to 2000 feet high, running approximately in a NE-SW direction, along the axis of the island. The deep valleys mentioned above cut these ridges at intervals of from one to two miles. From well off shore, the island in this vicinity has the appearance of a tumbled mass of hills, with very deep gorges at frequent intervals.

PROMINENT FEATURES

The most prominent feature on the sheet is a pair of pinnacle rocks, the larger of which is 130 feet high, about three miles off shore. These rocks, known as the Pillars, stand out very prominently from all directions, and may be seen many miles on a clear day. It is
to be noted that from the north and south, they have the appearance of a single pinnacle, while from the east, both rocks are seen. A rock awash at high water lies about 140 meters east of the Pillars.

About 3 miles west of the Pillars is a long narrow point, called Thumb Point by the survey party, on the tip of which are three large pinnacles. Two of these, about 150 feet high, are on the beach, about 40 meters from the high water line, while the third, 121 feet high, lies about 150 meters offshore. These pinnacles make excellent landmarks, though they tend to blend into the bluff background when seen from any great distance. From distances up to five miles, however, they are very distinct. Though there are several other pinnacles of like size in this vicinity, these cannot be mistaken, since there are no other groups of three.

CHARACTER OF CONTROL

Adequate control was furnished by triangulation executed in 1936.

CLOSING ERRORS OF TRAVERSES RUN

A traverse was begun at station CREEK and carried to station THREE. Each setup was checked by orientation ahead and backward, and resection on station PILL. The traverse closed flat.

Another traverse was begun at station THREE and carried to station SCARP, each setup being checked by sights on all stations in sight. This traverse closed flat in azimuth, and 4 meters in distance.

No adjustment of traverses was necessary.

COMPARISON WITH PREVIOUS SURVEYS

No previous surveys of this area were available for comparison.

JUNCTION WITH OTHER SURVEYS

On the northern end of the sheet, a satisfactory junction was made with sheet K-37, T44 R.

No junction was made at the southern end of the sheet; work incomplete.

NEW GEOGRAPHIC NAMES

Thumb Point - This is the first prominent point south of Kettle Cape and was called Thumb Point by the survey party because of its likeness to the thumb on the human hand. On the tip of this point there are three tall pinnacles, which make excellent landmarks.

Thumb Cove - This is a small cove just north of Thumb Point. Excellent shelter will be found in this cove from weather in any of the westerly quadrants, though it is wide open to the eastward. It is the only available anchorage between Kettle Cape and Vsevidof Island, and should have some designation. It was called Thumb Cove by the survey party because of its proximity to Thumb Point.
ANCHORAGES

Thumb Cove, just west of the Pillars, offers good protection to large or small vessels in southerly or westerly weather. There is no protection in this area from weather from any of the eastern quadrants.

DATUM

The datum used on this survey is Unalaska, 1901.

MAGNETICS

Magnetic observations with the declinatoire were made according to instructions in Special Publication #144.

STATISTICS

Statute miles of shoreline .................. 13.5
Area in square statute miles ............... 20.0
Number of elevations obtained ............. .57

Respectfully submitted

[Signature]

John C. Ellerbe
Jr. H.&G.E.

Forwarded, approved:

[Signature]

A. M. Sobieralski, H.&G.E.
Commanding Officer
U.S.C.&G.S.S. SURVEYOR
<table>
<thead>
<tr>
<th>Remarks</th>
<th>Decisions</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>USGS decision</td>
</tr>
<tr>
<td></td>
<td>see H-6266</td>
</tr>
<tr>
<td></td>
<td>submitted to USGS</td>
</tr>
<tr>
<td></td>
<td>USGS decision</td>
</tr>
<tr>
<td></td>
<td>see H-6265</td>
</tr>
<tr>
<td>Name on Survey</td>
<td>A</td>
</tr>
<tr>
<td>----------------------</td>
<td>---</td>
</tr>
<tr>
<td>Umnak Island</td>
<td>✓</td>
</tr>
<tr>
<td>Thumb Cave</td>
<td></td>
</tr>
<tr>
<td>Thumb Point</td>
<td></td>
</tr>
<tr>
<td>The Pillars</td>
<td></td>
</tr>
<tr>
<td>Pacific Ocean</td>
<td></td>
</tr>
</tbody>
</table>

Names underlined in red approved by [Signature] on 4/13/28.
MEMORANDUM
IMMEDIATE ATTENTION

SURVEY DESCRIPTIVE REPORT
PHOTOGRAPHER
No. T-6596

received April 19, 1938
registered May 24, 1938
verified
reviewed
approved

This is forwarded in order that your attention may be directed to the matters as indicated below. Please initial in column 3 as an acknowledgement that your attention has been thus directed. The complete original records are available if desired. If you cannot give this your immediate attention, please initial, note, and forward to the next section marked, calling for the records at your convenience.

<table>
<thead>
<tr>
<th>ROUTE</th>
<th>Initial</th>
<th>Attention called to</th>
</tr>
</thead>
<tbody>
<tr>
<td>20</td>
<td></td>
<td></td>
</tr>
<tr>
<td>22</td>
<td></td>
<td></td>
</tr>
<tr>
<td>24</td>
<td></td>
<td></td>
</tr>
<tr>
<td>25</td>
<td>V</td>
<td>Pages 1 &amp; 2</td>
</tr>
<tr>
<td>26</td>
<td></td>
<td></td>
</tr>
<tr>
<td>30</td>
<td></td>
<td></td>
</tr>
<tr>
<td>40</td>
<td></td>
<td></td>
</tr>
<tr>
<td>62</td>
<td></td>
<td></td>
</tr>
<tr>
<td>63</td>
<td></td>
<td></td>
</tr>
<tr>
<td>82</td>
<td></td>
<td></td>
</tr>
<tr>
<td>83</td>
<td></td>
<td></td>
</tr>
<tr>
<td>88</td>
<td></td>
<td></td>
</tr>
<tr>
<td>90</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

RETURN TO

✓ 82 T. B. Reed
✓ ADR
Section of Field Records

REVIEW OF TOPOGRAPHIC SURVEY NO. 6596 (1937) FIELD NO. B-37

West of The Pillars, East Side of Umnak Island, Aleutian Islands
Surveyed in August-September 1937, Scale 1:20,000
Instructions dated April 13, 1934 (SURVEYOR)

Plane Table Survey. Aluminum mounted.

Chief of Party - A. M. Sobiersalski.
Surveyed by - John C. Ellerbe.
Inked by - John C. Ellerbe.

1. Condition of Survey.

The survey is neat and legible and conforms to the requirements of the Topographic Manual except as follows:

a. Several names were inked on the smooth sheet by the field party. These should have been left in pencil in accordance with Field Memorandum No. 4 of 1935.

b. Form 567, Landmarks, was not forwarded as directed by paragraph 60, Topographic Manual.

The Descriptive Report is clear and satisfactorily covers all items of importance except that on page 3, paragraph 3, the statement is made that magnetic observations were made in accordance with the instructions in the Topographic Manual. This should have been expanded to include a specific statement as to whether or not the declinometer was checked at a station of known value.

On page 2, paragraph 1, mention is made of three large pinnacle rocks in lat. 53° 12', long. 168° 19' which make excellent landmarks. "Two of these, about 150 feet high, are on the beach, about 40 meters from the high water line, while the third, 121 feet high, lies about 150 meters offshore." The third rock is evidently signal RAT since an elevation of 121 feet is appended to it. This was confirmed by the field party. (See letter dated Oct. 24, 1938 attached to D.R. of T-6596.) The elevations of 150 feet were not inked on the sheet by the field party but have been added in the office. A photograph of this area has been sent to the topographer for confirmation.

2. Compliance with Instructions for the Project.

The plan, character and extent of the survey satisfy the instructions for the project except that between triangulation stations CREEK and THREE, and between THREE and SCARP, distances of about 2 3/4 miles, no recoverable stations were established. Paragraph 10 b of the instructions specify establishment of recoverable stations approximately 1 mile apart.
3. **Junctions with Contemporary Surveys.**
   
a. The junction on the northeast with T-4942 (1937) will be considered in the review of that survey.

b. The junction on the southwest will be considered when that work is received from the field. (See paragraph 7, this review.)

c. In lat. $53^\circ 09', \text{ long. } 166^\circ 24', \text{ three elevations on the present survey coincide with elevations on T-6598 (1937). One of these agrees exactly in height. The other two, } 1770 \text{ and } 1690 \text{ feet, conflict in that they fall on elevations of } 1710 \text{ and } 1600 \text{ feet respectively on T-6598. This matter was referred to the field party and the answering letter dated Oct. 24, 1938 (attached to D.R. of T-6595) states that the field inspection verifies the elevations of } 1710 \text{ and } 1600 \text{ on T-6598. The incorrect elevations of } 1770 \text{ and } 1690 \text{ on the present survey have been removed.**

4. **Comparison with Prior Surveys.**

No prior surveys have been made by this Bureau in this area.

5. **Comparison with Chart 8802 (New Print dated Dec. 13, 1937).**

a. **Topography.**

Topography shown on the chart originates with miscellaneous sources. The authority cannot be readily ascertained but it is noted that the topography in its present form is shown on chart 8802, edition of 1908. No adequate comparison can be made with the present survey because of the small scale. It is noted, however, that the two islets known as The Pillars are shown 1 1/2 miles northeast of the present survey location. The present survey should supersede this information in future charting.

b. **Magnetic Declination.**

The magnetic observation agrees closely with the charted value.

6. **Field Drafting.**

The inking of topographic features is satisfactory. The numbers designating land elevations and elevations of bare rocks are slightly large. An acceptable size for such numbers is 1 1/2 mm. It is also preferable that the foot symbol (') be omitted on elevations.
7. **Additional Field Work Recommended.**

The D. R., page 1, paragraph 2, "Extent", states that it is intended to extend the southwest limits of the present survey to triangulation station CZAR during the following season. Completion of this work will then complete the gap existing between the present survey and T-6598 (1937). Aside from this, no additional field work is required.

8. **Superseded Prior Surveys.**

There are no prior surveys made by this Bureau in this area.

9. **Reviewed by Harold W. Murray, August 12, 1938.**

Inspected by - E. P. Ellis

Examined and approved:

[Signatures]

Thos. B. Reed
Chief, Section of Field Records

K. T. Adams
Chief, Division of Charts

Fred. L. Peacock
Chief, Section of Field Work

[Signature]
Chief, Division of Hydrography and Topography