

6242

U. S. COAST & GEODETIC SURVEY
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Form 504
Ed. June, 1928

DEPARTMENT OF COMMERCE

U. S. COAST AND GEODETIC SURVEY

R. S. PATTON, Director

State: S. W. ALASKA

DESCRIPTIVE REPORT

Topographic
~~Hydrographic~~

Sheet No. KD-34

LOCALITY
Aleutian Islands
Akutan Harbor

~~Aleutian Islands, Alaska~~

1934

CHIEF OF PARTY

A. M. SOBIERALSKI, H. & G. E.

6242

DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

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REG. NO.

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. KD-34

REGISTER NO. **6242**

State S. W. Alaska

General locality Aleutian Islands

Locality Akutan Harbor

Scale 1:20,000 Date of survey June - July, 19 34

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

Chief of Party A. M. Sobieralski

Surveyed by G. A. Nelson

Inked by G. A. Nelson

Heights in feet above M.H.W. to ground ~~to tops of rocks~~

~~Contours, Approximate contours~~, Form line interval 100 feet

Instructions dated April 13, 19 34

Remarks: _____

DATUM:

The topographic work in the vicinity of the Kronitzin group was started using the 1901 geographic positions, and the positions of supplemental stations were computed from the 1901 lines as a base. These preliminary positions were used to control the topography.

Later in the season, the whole scheme of triangulation was recomputed from a newly measured base resulting in changes which amounted to from 2 to 5 meters in the vicinity of Unalga Pass to a maximum of about 10 m. in the eastern limits of the work. As a result, the triangulation stations as plotted will not agree exactly with the 1934 field computations, as submitted to the office. That is, the recovered 1901 stations are plotted from the original geographic positions, but the 1934 stations are plotted from preliminary positions which are not in strict accordance with the positions resulting from the final field computations as submitted in the list of geographic positions. The difference will correspond approximately to the difference between the 1901 and 1934 positions of recovered stations in the vicinity.

To eliminate these discrepancies, a slight change in the projection is necessary, but it is difficult to show the small correction, so that it has been indicated only on the sheets where it exceeds 5 m. The correction to the projection brings the sheet to the Unalaska Datum as determined by the 1934 field computations.

DESCRIPTIVE REPORT

to accompany

TOPOGRAPHIC SHEET NO. KD-34 Akutan Harbor and vicinity.

U. S. G. & G. S. S. SURVEYOR, A. M. SOBIERALSKI, COMMANDING.

SEASON - 1934

AUTHORITY:

This survey was made under the Director's instructions dated April 13, 1934.

EXTENT:

This sheet covers Akutan Harbor and Akun Strait, Aleutian Islands.

GENERAL DESCRIPTION:

The area covered by this sheet is typical of the islands in this vicinity. They are mountainous and entirely grass and moss covered.

Cliffs are general along the shores, particularly those fronting the ocean. In the absence of cliffs the shores are steep except at the valleys. The beaches at the foot of the cliffs are rock strewn. Kelp is general.

AKUN STRAIT:

Akun Strait is the passage dividing Akutan and Akun Islands. It is roughly two miles long and one mile wide. A group of rocks, the highest of which is 15 feet, lies near its north end, 1/4 mile east of the western shore. The main channel is to the east of these rocks and is about 1/3 mile wide. 25 on T. 6242

The tidal currents attain an estimated velocity of 12 knots abreast of the rocks; the maximum flow being near the center. It sets northward with the flood and southward with the ebb.

A rock awash at 1/2 tide, lies 250 yards 17° T (N. Mag) from the highest of the rocks. Local vessels pass within 100 yards east of this rock awash to avoid the strength of the current when it is adverse. When covered, its position is readily discernible by the heavy overfall and swirls.

The narrower channel west of the rocks is often used by small local boats. The current is equal in strength to that in the main passage.

The shores throughout the Strait are heavily fringed with kelp.

AKUTAN HARBOR:

Akutan Harbor is the large arm indenting the eastern side of Akutan Island just north of Akun Strait. It is two miles wide at its mouth and extends westward for about 5 miles. It is free from dangers. A native village lies on the north shore 1-3/4 miles west of the point upon which a flashing light is located. There is an amateur radio station capable of reaching Portland.

A whaling station lies on the south side of the Harbor 1/2 mile from its head. Fresh water in unlimited amounts may be obtained when the plant is in operation.

GREEN BIGHT:

Green Bight lies at the southern extremity of Akun Strait on its western side. Its only importance is as a temporary anchorage for small craft while waiting to pass through Akun Strait at slack water.

The south side of Akutan Island from Green Bight to Vulcan Cove presents an unbroken cliff, varying in height from 300 to 1300 feet.

METHOD OF SURVEY:

The plane table and stadia was used exclusively. There was no deviation from standard methods.

Traverses run: Box 1901 to Slide 1934, distance: 3 1/2 statute miles, closing error 12 m., adjusted.

ELEVATIONS:

Elevations are expressed in feet above mean high water. Most of the elevations shown are the mean of several determinations. Elevations of well defined objects may be relied upon within 5 feet.

The elevation of Akutan Light was determined as 150 feet. The Light List, Pacific Coast, 1934 gives 165 feet. This is incorrect.

JUNCTIONS WITH PREVIOUS SURVEYS:

There were none.

*Reported to
Mr. Passmore
March 1947*

SUGGESTED NAMES:

Race Rocks is suggested as a name for the group of rocks lying in Akun Strait near its north end. Station Current 1934 is located upon these rocks.

Akutan Point is suggested for the north point of Akutan Harbor. Akutan Harbor Light is located upon this point.

The aforementioned features have no local names.

STATISTICS:

Statute miles shoreline.....29.0

Area in square statute miles.....35.

Respectfully submitted,

George A. Nelson
George A Nelson,
Jr. H. & G. Engr.

Approved & Forwarded:

A. M. Sobieralski
A. M. Sobieralski,
Comdg., Str. SURVEYOR

S. W. ALASKA

Survey No. T6242

Chart No. 8860

Diagram No. 8860

Referred to the Division of Geographic Names, Department of Interior. R

Under investigation. Q

[illegible]

REVIEW OF TOPOGRAPHIC SURVEY No. 6242

Title (Par. 56) *Akutani Harbor, S.W. Alaska*Chief of Party *A.M. Sobieralski* Surveyed by *G.A. Nelson* Inked by *G.A. Nelson*Ship *Surveyor* Instructions dated *April 13-1934* Surveyed in *June-July 1934*

1. The survey and preparation for it conform to the requirements of the Topographic Manual. (Par. 7, 8, 9, 13, 16.) ✓
2. The character and scope of the survey satisfy the instructions.
*Only 1 declination taken with declinator
Not sufficient recoverable stations for a resurvey*
3. The control and closures of traverses were adequate. (Par. 12, 29.) ✓
4. The amount of vertical control that the Manual specifies for ~~contours~~-~~formlines~~- was accomplished. (Par. 18, 19, 20, 21, 22, 23.) ✓
5. The delineation of ~~contours~~-~~formlines~~- is satisfactory. (Par. 49, 50.) ✓
6. There is sufficient control on maps from other sources that were transmitted by the field party to enable their application to the charts. (Par. 28.) *None submitted*
7. High water line ~~on marshy and mangrove coast~~ is clear and adequate for chart compilation. (Par. 16a, 43, 44.) ✓
8. The representation of low water lines, reefs, ~~coral reefs~~ and rocks, and legends pertaining to them is satisfactory. (Par. 36, 37, 38, 39, 40, 41.) ✓
9. Rocks and other important details shown on previous surveys and on the chart were verified. (Par. 25, 26, 27.)

See Reverse Side

10. ~~The span, draw and clearance of bridges are shown.~~ (Par. 16c.)
11. Locations and elevations of summits are given. (Par. 19, 51.) ✓
12. The tree line was shown on mountains. (Par. 16g.)

No trees indicated on this survey

NOTE: Strike out paragraphs, words or phrases not applicable and modify those requiring it. Paragraph numbers refer to those in the Topographic Manual. Use reverse side for extending remarks.

T2546 (1901)

The present survey is in good agreement with T2546 in general. There is much more detail on the present survey than on T2546 being on twice as large a scale. Race rocks are more clearly defined on the present survey.

T2545 (1901)

The same may be said of T2545 as of T2546 above. In general the topography of the present survey agrees with that of T2545 but the rocks, small islets and points are much more in detail on T6242.

T6242 supersedes T2545 and T2546 in part.

Chart 8860

The latest edition of Chart 8860 incorporates the present survey and is in good agreement.

13. The descriptive report covers all details listed in the Manual, in so far as they apply to this survey. (Par. 64, 65, 66, 67.) ✓
14. ~~The descriptive report also contains additional information required in aero-topography relative to type of photographs, method of compilation and type of ground control.~~
15. The descriptions of recoverable stations and references to shore line were accomplished on Form 524. (Par. 29, 30, 57, 67 except scaling of DMS and DPs, 68.) *2 Cards submitted*
16. A list of landmarks for charts was furnished on Form 567 and plotting checked. (Par. 16d, e, 60.) ✓
17. The magnetic meridian was shown and declination was checked. (Par. 17, 52.) *No note of having checked declination
Declination at A Church 1° West of that shown on Chart 8860*
18. The geographic datum of the sheet is *Unalaska (Unadjusted)* and the reference station is correctly noted. (Par. 34.) ✓
See note in Descriptive Report concerning datum.
19. Junctions with contemporary surveys are adequate.
*Joins T 4930 (1935) & T 6241 (1934) on the East and North
Joins T 4919 (1934) on the South and West.*
20. Geographic names are shown on the sheet and are covered by the Descriptive report. (Par. 64, 66k.) ✓
21. The quality of the drafting is good. (Par. 31, 32, 33, 35, 36, 37, 38, 39, 40, 41, 42, 45, 46, 47, 48, 49, 50.) *There is a tendency to make rock symbols too small.*
22. No additional surveying is recommended. ✓
23. The Chief of Party inspected and approved the sheet and the descriptive report ~~after review by~~ ✓
24. Remarks:

Reviewed in office by *Chas. R. Bush Jr.* June 3, 1936

Examined and approved:

E. F. Green
Chief, Section of Field Records
L. O. Lobbert
Chief, Division of Charts

J. L. Peacock
Chief, Section of Field Work
W. H. Hude
Chief, Division of Hyd. and Top.