DESCRIPTIVE REPORT
Topographic Sheet No. B-35

State: Southeastern Alaska
Locality: Gastineau Channel
Juneau

1936
Chief of Party
H. Arnold Karo
T6519 & add Late 1937 Applied to drawing Chart 8235 - 10/6/38 - J.W.

Applied to reconstruction of Chart 8235 2.12.40. C.R.B.
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-36..

REGISTER NO. T-6519

State: Seward Peninsula, Alaska

General locality: Juneau, Gastineau Channel

Locality: Juneau

Scale: 1:5,000 Date of survey: May - August, 1936

Vessel: M.V. Westdahl

Chief of Party: H. Arnold Kars

Surveyed by: D. H. Konichek

Inked by: D. H. Konichek

Heights in feet above to ground, to tops of trees

Contour Approximate contour Form line interval feet

Instructions dated: March 5th, 1936

Remarks: No contour or form lines drawn.

P. S. Government Printing Office, 1939
DESCRIPTIVE REPORT TO ACCOMPANY

TOPOGRAPHIC SHEET

B - 56

GASTINEAU CHANNEL

JUNEAU WATERFRONT

Project HT - 209

Instructions dated March 5, 1936

H. Arnold Karo, Chief of Party
The land to the southwest of the channel rises gently for some distance from the beach before ascending to the mountain peaks. There are small plots of ground being tilled in the area between the beach and the steep slopes. The rock pile on the northeastern side of the waterway is of course man made, and is an uneven, irregular pile of tailings from the Alaska-Juneau Gold Mine averaging about twenty meters in elevation above HW line. The townsite of Juneau is on irregular ground, although the section of the city rodded in on the topographic sheet is on level ground.

The Douglas-Juneau bridge is a very prominent object, and this white steel structure can be seen the length of the channel in good weather. An orange and black radio mast, located on high ground in Juneau, is also a prominent object. Refer, *Landmarks for Charts, Dec. 29th., 1936, H. Arnold Karo, Chief of Party, and also, Coast Pilot Notes, Dec. 28th., 1936, H. Arnold Karo, Chief of Party.*

Triangulation stations located in 1921 were recovered and were plentiful enough to allow a great deal of plane table triangulation. Frequent rod reading were taken to HW line, and all houses, roads, power and telephone lines, piers, etc. were rodded in. The control was so plentiful that errors were negligible, and therefore no adjustments were necessary.

All geographic names were taken from USC&GS chart # 8235.

Objects outside of HW line have been described by notes or symbols on the sheet.

Lawson Creek Bar Beacon washed away during the field season, May, 1936, and was replaced shortly afterward near its old location. The new structure was located in Aug., 1936 by plane table triangulation. The description of the beacon as regards construction remains the same as given in Light List, Pacific Coast, 1936-37. Aug. 1936 position shown on H-4177, (1936).

The area included between latitudes 58°18'00" and 58°18'10", and longitudes 134°25'05" and 134°25'25", was not entirely accessible to the topographer.
An attempt has been made to clarify this section, where the HW line is not continuous, by using dotted and zigzag lines, as well as notes on the sheet.

The area consists, for the most part, of old pile foundations surmounted by shacks and walkways, and the HW line goes back under these.

Several points have been noted on the sheet with which to orient the accompanying townsite (blueprint) map of Juneau. (BP 20835).

The Juneau waterfront, from the government pier southeastward to the government float, is in good repair, and all piers and floats indicated are serviceable.

The configuration of the HW line around the rock dump will remain constant if no more dumping occurs in the area.

There are differences between the waterfront as shown on USCSGS chart # 8235 and the waterfront as shown on the topographic sheet. It is not possible to determine just how extensive these changes are, due to the small scale of the chart. No material concerning previous topographic surveys in the area was furnished, so no direct comparison with previous work can be made in this report. Comparison with prior surveys made by reviewer.

The MLW line was transferred from the hydrographic work, and was found to conform with rod readings on MLW line taken by the topographer. The MLW line around the rock dump was not transferred from the hydrographic sheet, because the change in scale required the use of instruments which were not at our disposal. The MLW line at this place is very important, and great care should be taken when it is transferred.

Juneau, as a city, is developing rapidly, and no doubt there will be many changes and additions to the waterfront in the reasonably near future. There is, however, no reason to make another survey in the immediate future.

Approved and forwarded

Respectfully submitted

H. Arnold Karch, Chief of Party

D. H. Konichek, Topographer
The following details regarding the Duncan - Douglas bridge are taken from List of Bridges, Ed. Jan 1, 1935 (latest edition):

Total bridge: 3 spans:

<table>
<thead>
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<th>Clear width of channel spans</th>
<th>Left</th>
<th>Center</th>
<th>Right</th>
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<tr>
<td>301 ft</td>
<td>576 ft</td>
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Clearance above M. L. W. 66 ft (applies only to central 200 ft 1-23-37 7-10-37).

May 21, 1937

S.O. Rodick
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<tr>
<th>Remarks</th>
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<td>Gastineau Channel</td>
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<td>Douglas Island</td>
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<td>Rock Dump</td>
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<tr>
<td>Gold Creek</td>
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Names underlined in red approved by SDE on 3/13/31
**MEMORANDUM**

**IMMEDIATE ATTENTION**

SURVEY DESCRIPITIVE REPORT  
PHOTOGRAPH  
No. T -6519

received Mar. 19, 1937  
registered April 13, 1937  
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.

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RETURN TO  
82 | C. K. Green

/
REVIEW OF TOPOGRAPHIC SURVEY No.6519(1936) Field No. B-36

Title (Par. 56) Juneau, Gastineau Channel, Alaska

Chief of Party H.A. Karo Surveyed by D.H. Konikow Inked by D.H. Konikow

Ship WESTDAHL Instructions dated May 5, 1936 Surveyed in May-Aug. 1936 (WESTDAHL)

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.

3. The control and closures of traverses were adequate. (Par. 12, 29.)

4. The amount of vertical control that the Manual specifies for is eonrour eormelines- was accomplished. (Par. 18, 19, 20, 21, 22, 23.)
   No elevations shown.

5. The delineation of is satisfactory. (Par. 49, 50.) No formelines shown.

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.) Yes (Sp. 083838)

7. High water line on marsh and mangrove coast is clear and adequate for chart compilation. (Par. 16a, 45, 44.) The zigzag line discussed in the D.R. (page 2, par. 1) was changed to a dashed line in the office.

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.) Most of the low water line, however, was transferred from #41712 (1936) and checked with frequent rod readings. (See D.R. page 2.)

9. Rocks and other important details shown on previous surveys and on the chart were verified. (Par. 25, 26, 27.)

10. The span, draw and clearance of bridges are shown. (Par. 16c.) However, a memo dated May 21, 1927 attached to the D.R. gives the values in the list of Bridges as of Jan. 1935.

11. Locations and elevations of summits are given. (Par. 19, 61.)

12. The tree line was shown on mountains. (Par. 16g.)

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.
Par. 24. Remarks (continued).

1. All explanatory notes were in pencil, the more importantly these were inked in the office.

2. The difference of $3^\circ 41'$ between the charted magnetic variation of $3^\circ 11'$ and the present survey determination of $2^\circ 30'$ may possibly indicate local attraction here.

This reading was re-determined and the original found to be in error.
It has therefore been removed from the survey sheet. (see letter dated Nov. 29, 1937 attached to OR.) H.W.M., 1/22/37

The company has agreed to proceed with the work. No further notice is necessary.

The wrecks of the military concert at the harbor are objectionable to the presenters of the draft board as examples their objection to the destruction of property, (letter dated Nov. 22, 1937.)
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 DNs and DPs, 68.) None established due to frequency of triangulation stations.

16. A list of landmarks for charts was furnished on Form 567 and plotting checked. (Par. 164, c, 60.) Chart Letter A 66 (1937).

17. The magnetic meridian was shown and declination was checked. (Par. 17, 52.) See remarks, Par. 24 on opposite page for 3'41" difference with latest charted information on chart 8235. See note opposite page.

18. The geographic datum of the sheet is North American 1927 and the reference station is correctly noted. (Par. 34.)

19. Junctions with contemporary surveys are adequate.

20. Geographic names are shown on the sheet and are covered by the Descriptive report. (Par. 64, 66a.) The D.R. (page 1) states that the names were transferred from the Chart 8235. There is no evidence, however, that these names had been verified in the field.

21. The quality of the drafting is very good. (Par. 31, 32, 33, 35, 36, 37, 38, 39, 40, 41, 42, 45, 46, 47, 48, 49, 50.) It is better practice to avoid filling the larger buildings with.

22. No additional surveying is recommended. Then end then sold "K.C."

23. The Chief of Party inspected and approved the sheet and the descriptive report after review by

(Add 1 remarks on opposite page).

Reviewed in office by

Harold W. Murray

July 23, 1937.

Examined and approved:

C. H. Green
Chief, Section of Field Records

Fred L. Peacock
Chief, Section of Field Work

L. D. Rollins
Chief, Division of Charts

Chief, Division of Hyd. and Top.
Memorandum to Chief, Division of Charts.

Subject: Declinature reading.

In connection with declinature reading at triangulation station Son topographic sheets T-6518 and T-6519, Gastineau Channel, southeastern Alaska, H. A. Karo, Chief of Party, observations were made at triangulation station Son with a compass declinometer and show that the declinature reading was erroneous. The compass declinometer determination was made during the past field season as a result of your having called this apparent disagreement to the attention of this Division.

N. H. Heck, Chief,
Division of T. M. and S.

This information applied to sound.
shc. Sc Rev. 124, 17547.
from.
11/21/37
This drawing is to be used in connection with 1927 additional work on N. 6519.

Drawn and signed by H. A. Kase with

Information applied to N. 6519.
H. W. M. 17/17

G. W. M. CHANNEL

NOT TO BE USED FOR CHARTING

See original photo/stat.

Reference Letters dated Dec. 7 and 13, 1927 attached to D.R.
Revision Survey 1:1250 scale.
Union Oil Co., Wharf, Juneau.
Sept. 1937

Information applied to T6519
Ketch. 1/1/37.
Revision Survey - 1:1250 scale
Report on T 6519
Additional Work

The revision on this survey was made on a photostat and accompanied by scale drawings of 1:1250. It was transferred to the original sheet in red and actual measurement was used as given on the detail drawings.

These detail drawings are now in the Description Report for any future reference.

Respectfully submitted,

[Signature]

C. M. McElhose
December 7, 1937.

To: The Commanding Officer,
    U.S.C. & G.S. Launch WESTDAHL,
    601 Federal Office Building,
    Seattle, Washington.

Through: The Inspector, Seattle Field Station.

From: The Acting Director,
      U. S. Coast and Geodetic Survey.

Subject: Revision of topography T-6619.

There is returned herewith a section of the photostat of topographic survey T-6619 on which you have indicated in red the changes in the vicinity of the Union Oil Company's wharf. The indicated changes in the bluff and shore line are not clear. Your revision shows that the main or southern bluff line is south of its original location, and also shows by hachures what is apparently a detached bluff along the high-water line. The revision does not indicate the nature of the area between the bluffs.

Please furnish a tracing of the section between signals Why and Hi, on which the high-water line, bluff line, and roadway are definitely described.

[Signature]

Acting Director.

Enclosure.

TELEGRAPH ADDRESS:

EXPRESS ADDRESS:

DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY M.V. WESTDAHL

To: The Director,
U.S. Coast and Geodetic Survey,
Washington, D.C.

Through: The Inspector, Seattle Field Station.

From: The Commanding Officer,
U.S.C. & G.S.M.V. WESTDAHL.

Subject: Revision of Topography T-6519

Reference: 80-AB 12-7-37.

There is respectfully forwarded herewith, tracing as requested in above reference and section of photostat of topographic survey T-6519.

[Signature]  
H. Arnold Earo
Comdg M.V. WESTDAHL.

[Signature]
Inspector Seattle Field Station.
MEMORANDUM
IMMEDIATE ATTENTION

SURVEY DESCRIPTIVE REPORT
[further text]

No. T-6519(Addl. work 1937)

received Nov. 24, 1937
registered Dec. 23, 1937
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.

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RETURN TO
82  C. K. Green
Section of Field Records

REVIEW OF TOPOGRAPHIC SURVEY NO. 6519 (1936) AD. WK. FIELD NO. B-36

Juneau, Gastineau Channel, Alaska
Surveyed in Sept. 1937, Scale, 1:5,000

Surveyed by - H. A. Karo
Plotted by - C. C. McGlasson.
Verified by - H. W. Murray.

1. The purpose of this additional work was to show improvements along the waterfront made subsequent to the original survey. This information was submitted to the office on drawings and photostats and was applied in red to the topographic sheet in the office and the transfer checked. The photostats and drawings representing the actual field work have been attached to the Descriptive Report.


Inspected by - A. L. Shalowitz.

Examined and approved:

K. T. Adams
K. T. Adams,
Asst. Chief, Division of Charts.

Fred. R. Peacock
Chief, Section of Field Work.

L. O. Roberts
Chief, Div. of Charts.

Chief, Div. of H. & T.
DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY M.V. WESTDAHL,

To: The Director,
U. S. Coast and Geodetic Survey,
Washington, D.C.

From: The Commanding Officer,
U.S.C.& G.S.M.V. WESTDAHL.

Subject: Chart Information - Location of Radio Tower at Juneau Alaska.

There is respectfully forwarded herewith, information for the charting of the new radio tower recently erected on the rock dump at Juneau, Alaska. The planetable was set up at the radio tower and the azimuth lines to various prominent objects drawn as indicated. The position of the tower can readily be plotted on the 1936 topographic sheets of Juneau executed by this party.

The general consensus of opinion of the local aviators and also of the captain of the "Baby Clipper" is that the tower presents a distinct hazard for fliers making Juneau in thick weather. They are accustomed to set down at Juneau by "contact flying", that is, by following the edge of the mountains while flying at a low altitude and setting down after spotting the rock dump. As they would be watching the right shore when flying up Gastineau Channel, they might not see the radio tower. Especially if they were not overly familiar with the territory. If possible it is recommended that notice be given of the location of this radio tower where it will be sure to reach all fliers who might have occasion to call at Juneau.

H. Arnold Karo
Comdg M.V. WESTDAHL.

Position (Scaled from T-6519)
58°17' 1610 m.
134°23' 622 m.
LOCATION OF
Radio Station "KINY"
ON MINE DUMP
AT
JUNEAU, ALASKA.

M.V. Westdahl
H. Arnold Kad, Chief of Party

Scale: 1:150,000 7 September 1938