

3939

See Topo. 2746a

Diag. Cht. No. 8201-2

Also see Topographic Dec. Report 2746a

Department of Commerce and Labor  
COAST AND GEODETIC SURVEY

*E. Lester Jones*  
Superintendent.

State: *ALASKA*

DESCRIPTIVE REPORT.

Sheet No. ....

LOCALITY:

*Zimmeria Strait -*

*Central Section*

1906

CHIEF OF PARTY:

*C. G. Quillian*

3939

See Topo. 2746a

DEPARTMENT OF COMMERCE  
U. S. COAST AND GEODETIC SURVEY

HYDROGRAPHIC TITLE SHEET

The finished Hydrographic 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. 3939

State . . . Alaska (S E) . . . . .

General locality . . . . . Zimovia Strait . . . . .

Locality . . . . . Central Part of Zimovia Strait . . . . .

Chief of party . . . . . Assistant, C. G. Quillian . . . . .

Surveyed by . . . . . Aid, C. T. Bussell . . . . .

Date of survey . . . . . October 10-12, 1916 . . . . .

Scale . . . . . 1/10,000 . . . . .

Soundings in . . . . . Fathoms . . . . .

Plane of reference Mean of lower low water. Corresponds to 2.3 ft. on tide-staff.

Protracted by C.T. Bussell . Soundings in pencil by Ernest E. Reese.

Inked by . . . . . Verified by . . . . .

Records accompanying sheet (check those forwarded):

Des. report,  Tide books,  Marigrams,  Boat sheets,

Sounding books,  Wire-drag books,  Photographs.

Data from other sources affecting sheet . . . . .

Remarks:

## Descriptive Report To Accompany

Hydrographic Sheet #3939

## Zimovia Strait, Central Section.

Extent. This sheet comprises the hydrography of Zimovia Strait from about two miles NW of to about three miles SE of the Deserted Village. This includes the most narrow and most shoal part of the strait.

Control. A scheme of triangulation with mostly complete quadrilaterals was carried up the strait and as the stations necessarily had to be close together there are many of them in this area and the control is good. A plane table survey was carried far enough to give the shore line along the main part of the channel.

The hydrography done in this area is mostly through the best parts of the channel, the inshore parts not being surveyed. So the work is practically a reconnaissance to develop a possible safe route through this part of the strait. The work was done with the launch Delta. Mr. Bussell was in charge.

Appearance of Shore and Landmarks. The general appearance of the shore at this part of the channel is low heavily wooded hills with high mountains in the near background. All the islands except the very small ones are wooded. There are so many islands that a person making the first trip thru the channel is apt to mistake some of them in trying to interpret their location on a chart. The best island landmark is the one a quarter of a mile south of signal But and a third of a mile east of triangulation Tide. The NE third, as viewed from the SE or NW, is almost cleared on account of the trees being either cut or burned off. The rest of the island is covered with large trees. The cleared space is very prominent. Off of  $\Delta$  Ice are some prominent piles, formerly a fish trap, extending almost to the shoal near mid-channel. These serve as an aid in clearing the shoal.

Dangers. A shoal of 60 meters extent and bearing 6 ft on the east side at M.L.L.W. lies 770 meters  $N65^{\circ}W$  of  $\Delta$  Colt. This shoal should be left on the port side in going NW. If the fish trap south of the shoal should ever be removed a mark of some kind should be placed on the shoal as it is in a location which makes would make it very dangerous without a mark. South  $70^{\circ}$  east of  $\odot$  But 230 meters is a large shoal indicated on the smooth sheet. As I did not do the hydrography I can not say at just what stage of tide it bares but I believe it bares at about half tide and the area shown blank on the smooth sheet north of the shoal is quite shoal and rocky. Eighty to 90 meters off shore between  $\Delta$  Jig and  $\odot$  Awl are two rocks which bare at low water. In mid-channel between  $\Delta$  Jig and  $\odot$  Ave is a bad rock which bares 3 feet at M.L.L.W. During the kelp season there is kelp over it but the surrounding area is also covered with the same growth and that over the shoal does not serve in locating the danger.

Sailing Directions.— In coming from the south pass 140 meters off  $\Delta$  Colt. This will bring the point at  $\Delta$  Carl and the right tangent of the large island south of  $\odot$  But in range. Then head for 100 meters to the left of the left tangent of the point at  $\odot$  Pil until the island 700 meters SE of Pil is abeam. Then head for apparently half way between  $\Delta$  Lute and  $\odot$  But. Local boats keep closer to  $\Delta$  Colt than what I have given but as the hydrography is not completed off the island NW of  $\Delta$  Colt it is not certain as to what water would be found there. These boats run a single course from off  $\Delta$  Colt to a point midway between Button Island and the shore 200 meters NW of  $\Delta$  Lute. I was told that a knob on the mountain slope back of  $\Delta$  Village aids in making this course but as I did not do the hydrography I can not give any definite information about this range. While running the last mentioned course, as soon as the island on which  $\odot$  Ave. is located is opened up on the north side of Button Island change course to pass about 75 meters off the later island, heading east true. When half way between Button Island and  $\Delta$  Jig pick up the range, south tangent of Button Island and north tangent of island 700 meters SE of  $\odot$  Pil, and run this range to abeam  $\Delta$  Village. This will clear the shoal in mid-channel. It is a range I used at a time when the shoal was bare. Then make a course to pass about 100 meters off the small prominent island which is the most NE'ly of the Village Island group. In returning SE head for the left tangent of the large island south of Button Island until the two-island range mentioned above is made, Then continue back over the courses mentioned in the first of this paragraph. In running the course from off  $\Delta$  Lute to  $\Delta$  Colt it would be very helpful to be able to use a range over  $\Delta$  Colt and run direct for it until beyond the shoal off the fish trap. But, as previously stated, the hydrography is not carried far enough to say whether this course would be advisable or not.

Respectfully submitted,

*Ernest E. Reese*

Asst., C. and G. Survey.

Postscript:

This investigation indicates that four fathoms and possibly a little more, can be carried thru these islands by following <sup>various</sup> ~~x~~ courses to the southward of the courses given <sup>when westward of Button Id.</sup> above and to the south of the middleground lying about 700 meters W x N. <sup>W</sup> of Button Id. This channel is more crooked than the one given by Mr. Reese, which is the one used by local vessels.

"Button Island" is a name given to that island by a field officer to prevent confusion. No local name was heard for any of these islands. individual

*E. E. Reese*  
Asst. C. and G. Survey.

Statistics To Accompany Hydrographic Sheet # \_\_\_\_\_

Zimovia Strait, Central Section.

| Date 1916 | Letter   | Vol.     | Positions | Soundings  | Miles      |                  |
|-----------|----------|----------|-----------|------------|------------|------------------|
|           |          |          |           |            | Statute    | Vessel           |
| Oct 10    | a        | 1        | 110       | 356        | 20.0       | launch<br>Delta. |
| " 11      | b        | 1        | 98        | 336        | 10.3       | "                |
| " 12      | <u>c</u> | <u>1</u> | <u>31</u> | <u>112</u> | <u>2.5</u> | "                |
|           | 3        | 1        | 239       | 804        | 32.8       |                  |

*J. S. J.*

ADDRESS  
U. S. COAST AND GEODETIC SURVEY  
WASHINGTON, D. C.

REFER TO NO

5-LAC

DEPARTMENT OF COMMERCE  
U. S. COAST AND GEODETIC SURVEY  
WASHINGTON

September 27, 1917.

Division of Hydrography and Topography:

Division of Charts:

Tidal reductions are approved in  
1 volume of sounding record for

HYDROGRAPHIC SHEET 3939.

Zimovia Strait, S. E. Alaska,  
C. G. Quillian in 1916.

Plane of reference is  
Mean lower low water, reading  
2.3 ft. on tide staff at Olive Cove.

*L. P. Shidy*

Acting Chief, Section of  
Tides and Currents.

Hyd. Sheet 3939.

This survey is practically a reconnaissance to develop a possible safe route through the Central section of Junivoria Strait, and as such it is very good.

The crossings are good and the roads are well kept. The most southerly shoal (N.W. of  $\Delta$  Coll) which is a very dangerous one, is marked only by a fish trap which is mentioned in the edg. words, but no location for it is given.

S. L. Rosenberg,  
April 14, 1919.