

2694



Treasury Department,  
U. S. COAST AND GEODETIC SURVEY.

*O. H. Tiffmann*  
Superintendent.

State: *Alaska*

DESCRIPTIVE REPORT.

*TOPC.* *Top. Sheet No. 2694*

LOCALITY:

*Rat Island Group*

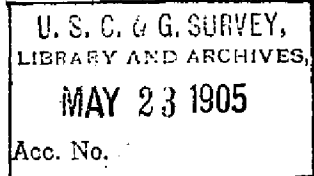
*1904*

CHIEF OF PARTY:

*"J. F. Pratt, Asst."*

U. S. C. & G. SURVEY,  
LIBRARY AND ARCHIVES,  
MAY 23 1905  
Acc. No.

2694



Department of Commerce and Labor

U.S. Coast and Geodetic Survey

O.H. Tittmann, Superintendent

Reconnaissance

Rat Island Group

Aleutian Islands

Alaska

By the party attached to the

U.S.S. "PATTERSON"

J.F. Pratt, Assistant, Commanding

1904

Scale 1/100,000

Descriptive Report to accompany original tracing.

Three pages

Reconnaissance Rat Island Group

Aleutian Islands

Alaska

Scale 1/100,000

The weather conditions in this locality during July, August and September, 1904 were extremely unfavorable for surveying or even reconnaissance purposes. Fog and thick mist prevailed almost all the time with very strong winds, usually southwesterly, varying in force from 30 to 60 miles per hour. The most violent storm experienced was northeasterly, during which the barometer dropped to 28.29 inches. Invariably when there was neither fog nor mist there was a very dense blue haze which prevented seeing anything but the higher summits of some of the nearer islands.

2. Due to the limited coal supply, it was impractical to lay outside and wait indefinitely for the weather to clear, for the purposes of reconnoitering further to the eastward.

3. For the reason that it was stated in several instances that the "PATTERSON" was to return to this locality and work during the summer of 1905, this crude reconnaissance was not plotted in detail, as it was expected that the ground would be covered with much more extensive and accurate work.

4. As this work has been compiled in pencil on a pro-



83  
S TA  
2694A

2694a

Treasury Department,  
U. S. COAST AND GEODETIC SURVEY.

\_\_\_\_\_  
Superintendent.

State: Alaska

DESCRIPTIVE REPORT.

Topic Sheet No. 2694A

LOCALITY:

Rat Island Group

\_\_\_\_\_  
190

CHIEF OF PARTY:

U. S. C. & G. SURVEY,  
LIBRARY AND ARCHIVES.

JUL 1 - 1905

Acc. No.

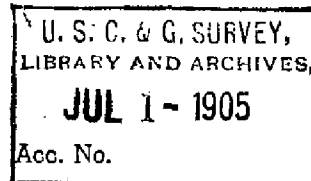
2694a

Department of Commerce and Labor  
COAST AND GEODETIC SURVEY

Washington

June 16, 1905

Mem. to Assistant in charge



-----  
Reconnaissance of Rat Island Group as per Top. Sheet 2694  
received from Assist. Pratt, May 23, 1905.  
-----

My mem. to you of March 24, 1905, gave the results of a study of the scanty and incomplete data then available for the purpose of the location of these islands. The above sheet of Mr. Pratt adds much to our information as it shows the results of a trip through the group between Rat Island and the four islands to the north of it: so much so that our chart No. 9100, 1-1,200,000 can be corrected from the whole data. The question as to whether there are four islands or five in the group may be considered as definitely settled in favor of the latter.

The above sheet is in the form of a tracing and, being on the same scale, can be compared directly with the sheet of rough plotting noted in my mem. of March 24, 1905. The marked agreement of the two in their main features is gratifying. The only difference of consequence is in Rat Island <sup>the</sup> whose location <sup>of which</sup> on sheet 2694 does not agree quite well enough with the observed tangents from a fairly long base on Kiska Island. I have appended to the sheet a correction on tracing paper to suit the case. I have not verified otherwise the plotting of the islands because I found <sup>that</sup> the bearings given in the notes had apparently a correction for deviation, the data for which

had not been furnished. I think for our present purpose and pending a precise survey, the sheet can be accepted as it stands except for the above correction.\*

Among the data sent by Mr. Pratt are a number of photographic films of views among the islands from which prints have been made. These views are interesting but have no particular cartographic value, as the fog interfered much and the relative heights of the islands, for instance, cannot well be defined from them. I recommend as follows.

1. That my rough sheet be filed in the tube with 2694, as 2694a or some other suitable number.
2. That my correction, on tracing paper, of Rat Island, above noted, be filed with the sheet.
3. That this memorandum report, as well as that of March 24, last, above noted, be filed with the sheet or, if filed otherwise that they be so identified by cross references that they can be recognized as an essential part of the subject "Reconnaissance of the Rat Islands".

The rough sheet and correction on tracing paper are sent you in the tube with sheet 2694.

*Gerrham Bradford*

Assist. & Insp. of Charts.

\* The shoreline of David and Little Litten islands should be made continuous by a broken line drawn about as indicated by me in black pencil on sheet 2694  
B.

Mr. Bradford  
FORM 167. *Sp. 6.27.05*  
*Mag. Dir*

Department of Commerce and Labor

COAST AND GEODETIC SURVEY

Washington, *26<sup>th</sup>*, 1905

Respectfully  $\left\{ \begin{array}{l} \text{returned} \\ \text{referred} \\ \text{forwarded} \end{array} \right\}$  to *Asst in*

*Charge*

*Mr Bradford's*  
*recommendations cover*  
*the ground. Has not*  
*the Mag. Dir a table*  
*of variations for the*  
*Pattersons Compass?*

*CHS*

*I herewith send*  
*information as*  
*I have. LHB.*



Deviations of Standard  
 Compass No 14021 on  
 the "Patterson"

Ship's Watch  
 Head Starboard  
 Sept 130-04

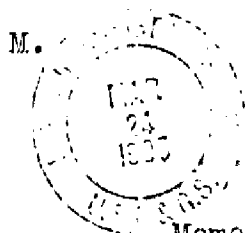
N	0° 36' W
NNE	0 10 W
NE	0 26 W
ENE	1 34 W
E	3 14 W
ESE	4 52 W
SE	5 36 W
SSE	5 10 W
S	3 44 W
SSW	1 58 W
SW	0 36 W
WSW	0 06 W
W	0 22 W
WNW	1 00 W
NW	1 22 W
NNW	1 10 W

To be used  
 on  
 the date and place  
 given

Mag's decl'n at Kiska Lat. 51° 59' 1"  
 Long 177° 32' 4"  
 July + Aug 1904 8.2° E

LHB  
 June 27-05

*Super*  
*A good report*  
*ms*



Department of Commerce and Labor

COAST AND GEODETIC SURVEY

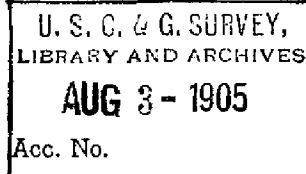
Washington

March 24, 1905

Memorandum for Assistant in charge

Rat Islands, Aleutians, Alaska.

Piece of chart No. 9100, appended to illustrate.



There has been much doubt, in the absence of a regular survey, as to the location, and even the number, of the islands of this group. In the attempt to throw some light on the subject the principal authorities consulted by me have been:

1. Observations by Assist. Pratt in the summer of 1904 from Kiska
2. Log of the C. S. Str. McARTHUR, Sept. 1904.
3. Report of the Revenue Cutter MANNING, cruise of 1903, No. 37 of 1903 of my file.
4. Notebook, Vol. 1, of Act. Assist. W. H. Dall, 1873.
5. Report and sketch by Mr. Dall in Supdt's Report of 1873.
6. Cruise of the U. S. S. PETREL, June 1893.
7. Chart No. 4100, Russian Hyd. Office, 1848
8. Tebenkof's chart, 1849. (*atlas.*)
9. Chart 55 of Hyd. Office, U. S. N. showing work of 1855 by Lieut. Gibson.
10. Coast Survey chart No. 9100
11. List of geog. positions in Supdt's Report of 1867.

I have roughly plotted, on a scale of 1/100,000 the observations of Assistant Pratt and others and have transferred the results to the appended piece of chart No. 9100, showing in red the amended positions of the five islands of the group.

The basis of the positions is given below. Two of the islands are mentioned by numbers because there has been so much diversity in the application of names, the same name having been given to different islands by different authorities etc..

1. Chugal (or Iron) Island.

The north and south tangents were well determined by Pratt in 1904<sup>by cuts</sup> from three triangulation points on the Kiskas, the base between extreme points being about one third the distance to the island. The crater peak was determined from a rather short base.

2. Rat Island (called Davidoff by Pratt in 1904).

The north and south tangents were well determined by Pratt in 1904 by cuts from two triangulation points on the Kiskas, base about one third the distance to the island.

3. Little Sitkin Island.

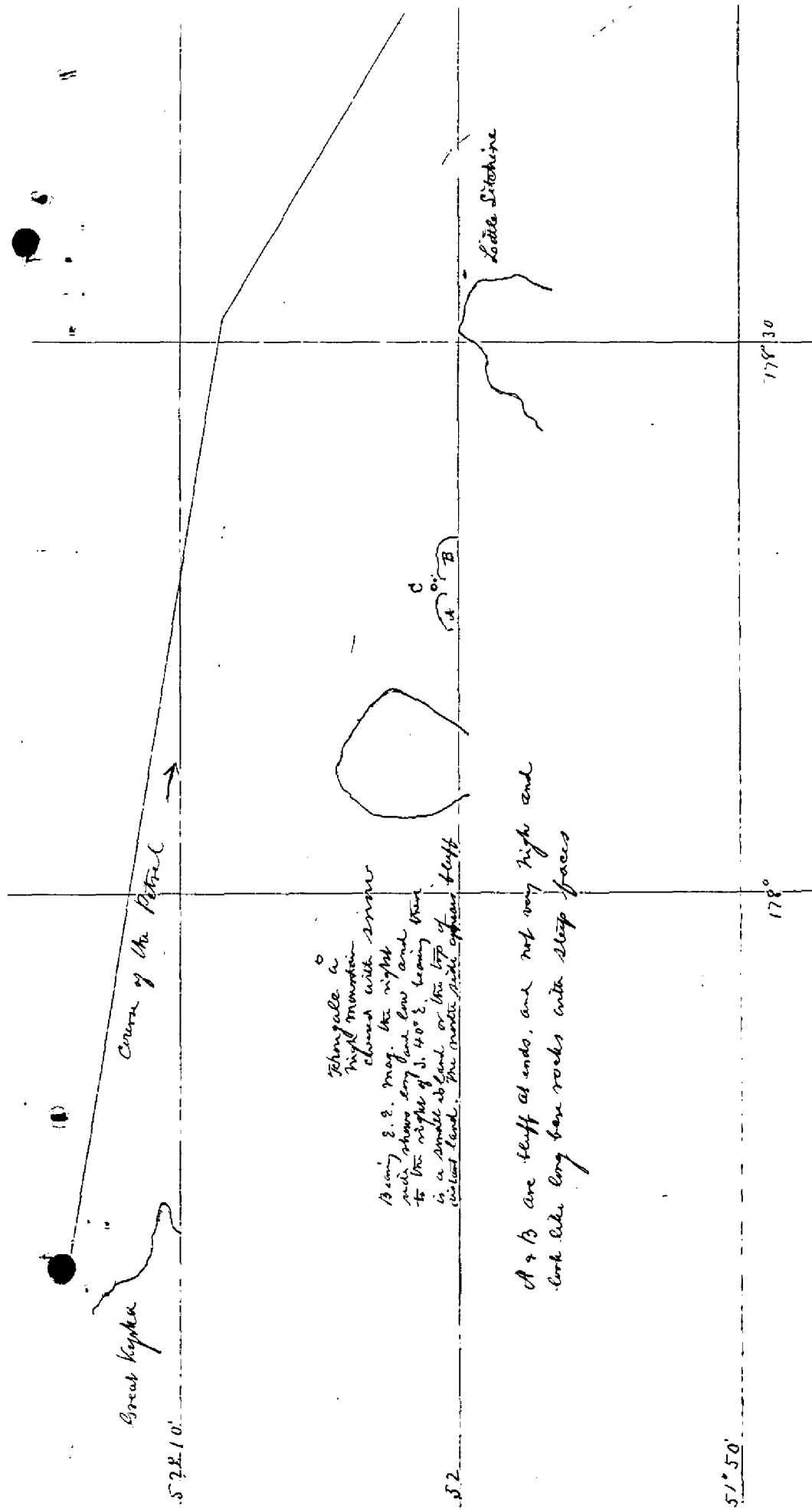
The southern tangent is located from two triangulation points on the Kiskas, base about one quarter the distance to the island. A peak which is assumed to be that of Little Sitkin is located by a cut from a Kiska triangulation point on "snow peak east of Chugal", crossed by a bearing of Dall from the Yukon in 1873 on what he supposed to be the "peak of Kivostof". The island is further determined by a bearing on the "east end of Kivostof" from the McARTHUR on her cruise homeward in September, 1904. The evidence of Pratt's party, the MANNING, the PETROV and the two Russian charts is that there are two very prominent peaks in the group and we know that there is such a one on

Chugal and another on Little Sitkin; of the former we have a photograph by the McARTHUR, of the other the view on chart 55. The peak on Chugal has been located as above noted; therefore the other cuts should refer to the peak of Little Sitkin. The distance of the peak, as plotted<sup>by me</sup>, from the northwestern end of Amchitka Island is  $19\frac{1}{2}$  miles: by Dall 20; by Tebenkof  $20\frac{1}{2}$ ; by chart No. 55, 20; by chart No. 9100,  $19\frac{1}{2}$ ; the bearing by these authorities varies very little. The geog. positions of the south point and peak of Little Sitkin, as plotted, agree closely with that of Gibson in 1855, see Supdt's Report of 1867.

#### 4. Second and third islands.

There lies between Chugal and Little Sitkin a land mass which I believe to be two islands and have so plotted it in dotted red line. Its northern and southern tangents are defined by cuts from Kiska triangulation points. Its dual character is inferred from the report of the MANNING which gives a sketch of four islands in a row, and names them as on chart 9100. As the vessel passed the row of islands approximately broadside to, there can hardly be an error in the number. The MANNING was 9 or 10 miles distant to northward and bound westward. In 1893 the PETREL passed to northward of the Islands at about the same distance, but bound eastward.

There is a sketch in plan and a sketch in elevation as follows.



Reynolds a  
high mountain  
clouds with snow  
being S. 2. mag. the night  
side shows long low land and  
to the right of S. 40° E. being then  
in a small island, or the top of  
island land. The water side appears steep

A & B are steep at ends, and not very high and  
look like long low rocks with steep faces



View. rock C being S. 1/4 E. Nazy

The text is "attached there is a tracing of the islands between Great Kyska and Little Sitchine. The positions of Great Kyska and Little Sitchine are taken from H. O. chart No. 55. They agreed with the run of the ship and the position of Little Sitchine was afterwards checked by a bearing on N. W. point of Amchitka. On Little Sitchine only tangents were used and at times all the islands were covered with fog. It could not be determined whether or not there was a smaller island close to and on the N. W. side of Little Sitchine as marked on some of the charts. The positions of the islands are determined by log and frequent compass bearings while the ship was on the course marked on the tracing".

The rock C of the sketches is probably the same lone rock as was seen by Pratt from Kiska and cut on. If there be two <sup>islands between Chugak and Little Sitchine</sup> ~~intermediate islands~~, as is probable, it is impracticable to determine with precision how far apart they are and how far each is from the nearest large island, although the latter item is much controlled by the observed tangents. I think, however, that the plotted positions are a rather close approximation; both Tebenkofs chart and Russ. chart 4100 show two smaller islands between Chugak and Little Sitkin.

The point marked N.E. Rock in red on the piece of chart No. 9100 corresponds to the rock printed some 4 miles northward. This will show how erroneously Kiska has been charted and may account in some degree for errors in charting the western end of the Rat Island group, if reference were made to the northern end of Kiska. If chart 9100 is corrected for the Rat Island group in accordance with my plotting, the

island of Kiska should, of course, be corrected to correspond, from the Pratt survey of last season. It would be well to make the Rat Island group correction from my rough sheet,  $\frac{1}{100,000}$  scale, which can be verified from the original records above mentioned.

Gresham Bradford

Assistant & Inspector of Charts.

