

5188

U. S. COAST & GEODETIC SURVEY
LIBRARY AND ARCHIVES

NOV 30 1934

Acc. No. _____

Form 504
Rev. Dec. 1933
DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY
R. S. PATTON, DIRECTOR

DESCRIPTIVE REPORT

Air Photo *Topographic* } Field 36
~~Hydrographic~~ } Sheet No. Reg. 5188

State SOUTH CAROLINA

LOCALITY

PORT ROYAL SOUND

~~PORT ROYAL SOUND~~ TRENCHARDS INLET

1934

CHIEF OF PARTY

E. H. KIRSCH

U. S. GOVERNMENT PRINTING OFFICE: 1934

5188

Applied to Cht. 571, Mar. 21, 1935.

K. Reynolds
Applied to Chart 793. March 16, 1936 - *H. MacEwen*

PHOTOS NO.
851 through 862
938 through 952
898 through 904

DATE
September 29, 1933
September 29, 1933
September 29, 1933

TIME
1:38 to 1:47 P.M.
2:45 to 2:51 P.M.
2:14 to 2:19 P.M.

PROJECTION BY

L. C. Ripley 5-7-34
L. C. Ripley

PROJECTION CHECKED BY

E. H. Kirsch 5-7-34
E. H. Kirsch

CONTROL PLOTTED BY

J. H. Wulbern 5-10-34
J. H. Wulbern

CONTROL CHECKED BY

E. S. Ethridge 5-11-34
E. S. Ethridge

CONTROL PLOTTED ON PHOTOS BY

SAVANNAH OFFICE

CONTROL CHECKED ON PHOTOS BY

SAVANNAH OFFICE

SMOOTH RADIAL PLOT BY

E. S. Ethridge 5-28-34
E. S. Ethridge

RADIAL PLOT CHECKED BY

L. C. Lande 5-29-34
L. C. Lande

SCALE PLOT BY

L. C. Lande 5-3-34
L. C. Lande

TOPOGRAPHY TRANSFERRED BY

M. L. Smith
M. L. Smith

TOPOGRAPHY CHECKED BY

E. H. Kirsch
E. H. Kirsch

DETAIL INKED BY

M. L. Smith 8-15-34
M. L. Smith

AREA OF DETAIL INKED: 53.5 Sq. St. Miles (Land Area)

LENGTH OF COASTLINE: 9.2 Statute Miles.

LENGTH OF SHORELINE: 28.8 St. Miles (200m or more from nearest opposite shore).

LENGTH OF STREAMS: 85.4 St. Miles (Rivers & sloughs less than 200 meters. wide)

DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY

REG. NO. 5188

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. 36

REGISTER NO. 5188 5188

State South Carolina

General locality Port Royal Sound

Locality ~~St. Helena Island~~ - Trenchards Inlet

Scale 20,000 Photographs- Sept. 29, 1933
Date of survey

Vessel Air Photo Compilation Party No. 21, Charleston, S. C.

Chief of party E. H. Kirsch

Surveyed by See data Sheet in Descriptive Report.

Inked by M. L. Smith

Heights in feet above to ground to tops of trees

Contour, Approximate contour, Form line interval feet

Instructions dated November 10, 1933, 19

Remarks: None

GENERAL INFORMATION

Statistics:

The land area covered by this sheet is 53.5 square statute miles. There are 9.2 statute miles of outside coastline, 28.8 statute miles of shoreline 200 meters or more from the nearest opposite shore, and 85.4 statute miles of rivers and sloughs less than 200 meters wide.

General Report:

No general report is available for this area. Reference is made to the report furnished with A.C.S. "A" Reg. No. T-6102, "M" Reg. No. T-6101, "N" Reg. No. T-6100, "K" Reg. No. T-6137, and "L" Reg. No. T-6136 Lt. I. E. Rittenberg, 1934. ~~(Sheet K and L not received to date Dec 10, 1934)~~
(Received Dec 17, 1934)

This sheet covers the area directly East of the Beaufort River, including the western end of St. Helena Island. This island is inhabited almost entirely by negroes, and where not heavily wooded, there are small scattered plots of cultivated ground, as is the case with the other small islands in the vicinity. The sheet also embraces a large amount of very low marsh lands, some of which is completely submerged at high tide.

Photographs:

The photographs used for this compilation were made with the Army Air Corps' 5-Lens Camera. Parts of three flights were used; all taken on September 29, 1933 and running parallel to the coast.

Photographs 851 through 862, covering the part of the sheet nearest the coast were taken at 1:45 P.M., 2 hours and 37 minutes before a high tide of 6.7 ft.

Photographs 938 through 952, covering the north eastern portion of the sheet, were taken at 2:45 P.M. one hour and 37 minutes before a high tide of 7.1 ft.

Photographs 898 through 904, used only in compiling the small area in the western corner of the sheet were taken at 2:15 P.M., two hours and 7 minutes before a high tide of 7.4 ft.

CONTROL

Sources:

Triangulation by C. A. Egner, 1933; A.C.S. "J" Reg. No. "K" Reg. No. T-6137, "L" Reg. No. T-6136, "M" Reg. No. T-6101, "N" Reg. No. T-6100, Lt. I. E. Rittenberg, 1934. All control is on 1927 N.A. datum.
~~(Sheets "J", "K", "L" not received to date Dec 10, 1934)~~

Errors:

No errors were found in the plotting of control. A great

many stations could not be recovered for lack of field inspection or because of bad photographs, but there was ample control for a good plot.

Discrepancies:

No control stations established by other organizations were used in the compilation of this sheet.

COMPILATION

Method:

The usual radial line method of plotting was used.

Adjustment of Plot:

Although the photographs were in some cases badly tilted, the plot required no unusual adjustments.

Interpretation:

The only symbols used were the graphic symbols as approved by the Board of Surveys and Maps - 1932.

A great deal of difficulty was encountered in interpreting the detail from the photographs. They were very indistinct in some areas, and the high water line appeared different on several photos. Especially is this true in the following cases; Story River and that part of Skull Inlet directly Southeast of Story River. ⁽¹⁾STATION CREEK from triangulation station COUNTRY to Lat. $32^{\circ} 17'$. ⁽²⁾The area on the Eastern border of the sheet North of Lat. $32^{\circ} 20'$ and East of Long. $80^{\circ} 24'$. ⁽³⁾The area between Ladies Island and Warsaw Island in the Northeast corner of the sheet. Due to bad photographs, the high water line in these cases is largely a matter of interpretation, and probably would not have been interpreted the same by any two compilers. It is felt that the whole compilation however, as interpreted is within the allowable error. It is possible that there might be slightly more error in the above mentioned areas, due to the difficulty in interpretation, but if this be true, it was entirely unavoidable and does not mean that the compilation is in error more than the allowable. (*See Review.*)

In some cases, especially along Station Creek, the high water line was indefinite enough so that it could not be made continuous. The water breaks across often and covers the marsh at high tide, and the marsh lines have been broken or left out where covered by water. However, the high water lines as shown are believed to be correct, and comparisons with the smooth hydrographic sheet covering this stream is entirely satisfactory.

There are no paved roads on this sheet. Improved earth roads, have been shown by double dashed lines, unimproved roads and trails by single dashed lines.

The grassed areas on St. Helena Island and the other small islands North of St. Helena Island consists of cleared land dotted with small plots of cultivated land so small and indefinite as to make it inadvisable to show them.

Ditches have been shown where it was possible to clearly define them. It was difficult to determine in some cases whether certain dark lines were ditches, trails or hedge rows.

Information from other sources:

The following beacon was transferred from A.C.S. "J" Reg. No. T-6133, Lt. I. E. Rittenberg, 1933. It was shown on the A.C.S. as a triangulation station, but since no position was available to this office for this station, it has been shown as a black circle.

Name	Latitude	Longitude	Latitude	Longitude
			X .939	X .939
	(1483.3)	(1244.4)	(1392.8)	(1168.5)
ARCH 1921	32° 21' 364.9	80° 44' 324.5	342.6	304.7

The following shorelines were taken from A.C.S. "M" Reg. No. T-6101, Lt. I. E. Rittenberg, 1934.

1. The entire coastline of Bay Point Island including sand spit called Coles Care.

2. The shoreline of Capers Island West of 80° 35' and approximately 300 meters North of 32° 16'. (Bull Point)

Conflicting Names:

There are several names in conflict with U. S. C. & G. S. Charts 571 and 1240 as follows. (Name list submitted for approval)

Chart No. 571	Chart 1240	Correct Local Usage
Pritchard Inlet	Pritchard Inlet	Pritchards Inlet ✓
Trenchard Inlet	Trenchard Inlet	Trenchards Inlet ✓
Archer Creek	Archer Creek	Archers Creek ✓
Horse Island Creek	Morse Island Creek	Morse Island Creek ✓
St. Michael Head	Bull Point	Bull Point ✓
Phillips Island	Phillips Island	St. Phillips Island ✓
Pritchard Island	Pritchard Island	Pritchards Island ✓

U. S. Engineers Map, Ft. Fremont Quad, 807-S-1-E/2 shows above names as Pritchard's Inlet, Trenchard's Inlet, Horse Island Creek, St. Phillip's Island, and Pritchard's Island.

The source of the local names listed above is explained in Lt. Rigg's letter to the Director, dated October 22, 1934 on subject of Geographic Names. *See review of book*

COMPARISON WITH OTHER SURVEYS

Junctions:

Satisfactory junctions were made with the following sheets:

This compilation is exceptionally well controlled and the estimate of the accuracy of the plot as given on the opposite page should be about right except for the areas skirted on page 2, par. interpretation. Detail in this area is accepted as sufficiently accurate for charting.

The photographs will be examined when they are received in the office.

B.G. Jones

Northeast - Reg. No. 5187,
 West between Long. $80^{\circ} 38'$ and $80^{\circ} 39'$ Reg. Nos. 5208, 5209, 5210.
 Savannah 1:10,000.
 East between Long. $80^{\circ} 43'$ and $80^{\circ} 44'$ Reg. Nos. 5208, 5209, Savannah
 1:10,000.
 Northwest between $80^{\circ} 43'$ and $80^{\circ} 45'$ Reg. No. 5189.

Landmarks:

A complete list of landmarks will be submitted by Lt.
 I. E. Rittenberg with A.C.S. "I" Reg. No. 7-6131, "K" Reg. No. 7-6137,
 "L" Reg. No. 7-6136, "M" Reg. No. 7-6101, and "N" Reg. No. 7-6100, 1934.

RECOMMENDATIONS FOR FURTHER SURVEYS

The compilation of this sheet as interpreted from the
 photographs have a probable error of not more than .3 millimeters in
 well defined detail of importance for charting, and not more than .6
 millimeters for other data. There is a possibility of slightly greater
 error in places difficult to distinguish, as noted under "Interpretation".

See below for opposite page.
 To the best of my knowledge, this sheet is complete in
 all detail of importance for charting purposes within the accuracy stated
 above, and no further surveys are required.

Remarks:

In general the photographs were badly tilted, indistinct,
 and badly out of scale. A great deal of the compilation had to be done
 from detail on the edges of the wing prints. The compilation is believed
 to be as accurate as it could possibly be made from these photographs,
 as great care was observed in selecting the best photograph, and shifting
 between points was carefully done.

Assisted by:

E. H. Kirsch
 E. H. Kirsch,
 Chief of Party.

Submitted by:

M. L. Smith
 M. L. Smith.

REVIEW OF AIR PHOTO COMPILATION NO. 7-5188

Chief of Party: E. H. Kirsch

Compiled by: M. L. Smith

Project: HT 162

Instructions dated: Nov. 10, 1933

1. The charts of this area have been examined and topographic information necessary to bring the charts up to date is shown on this compilation. (Par. 16a, b,c,d,e,g and i; 26; and 64) ✓
2. Change in position, or non-existence of wharfs, lights, and other topographic detail of particular importance to navigation which affect the chart, is discussed in the descriptive report. (Par. 26; and 66 g,n) ✓
3. Ground surveys by plane table, sextant, or theodolite have been used to supplement the photographic plot where necessary to obtain complete information, and all such surveys are discussed in the descriptive report. (Par. 65; and 66 d,e) ✓
4. Blue-prints and maps from other sources which were transmitted by the field party contain sufficient control for their application to the charts. (Par. 28) ✓
5. Differences between this compilation and contemporary plane table and hydrographic surveys have been examined and rectified in the field before forwarding the compilations to the office and are discussed in the descriptive report.
6. The control and adjustment of the photo plot are discussed in the descriptive report. Unusual or large adjustments are discussed in detail and limits of the area affected are stated. (Par. 12b; 44; and 66 c,h,i) ✓
7. High water line on marshy ~~and mangrove~~ coast is clear and adequate for chart compilation. (Par. 16a, 43, and 44)

NOTE: Strike out paragraphs, words or phrases not applicable and modify those requiring it. Paragraph numbers refer to those in the Topographic Manual. Refer also to the pamphlet "Notes on the Compilation of Planimetric Line Maps from Five Lens Air Photographs."

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. Recoverable objects have been located and described on Form 524 in accordance with circular 30, 1933, circular letter of March 3, 1933, and circular 31, 1934. (Par. 29, 30, and 57) T-6137.
*(Filed under T-6100, T-6101, T-6102.)
 Air photo control sheets!*

10. A list of landmarks was furnished on Form 567 and instructions in the Director's letter of July 16, 1934, Landmarks for Charts, complied with. (Par. 16d, e; and 60)
(Furnished with air photo control sheets mentioned above.)

- ~~11. All bridges shown on the compilation are accompanied by a note stating whether fixed or draw, clearance, and width of draw if a draw bridge. Additional information of importance to navigation is given in the descriptive report. (Par. 16c)~~
No bridges.

12. Geographic names are shown on the overlay tracing. The accepted local usage of new names has been determined and they are listed in the report, together with a general statement as to source of information and a specific statement when advisable. Complete discussion of place names differing from the charts and from the U. S. G. S. Quadrangles is given in the descriptive report, together with reasons for recommendations made. (Par. 64, and 66k)
*No U.S.G.S. quadrangles available for this area.
 U.S. Engineers' "Fort Fremont" reconnaissance sheet used. See following report at lock.*

13. The geographic datum of the compilation is *N.A. 1927* and the reference station is correctly noted. *(as being - adjusted)*

14. Junctions with adjoining compilations have been examined and are in agreement. (Par. 66j)

15. The drafting is satisfactory and particular attention has been given the following:
 1. Standard symbols authorized by the Board of Surveys and Maps have been used throughout except as noted in the report. ✓
 2. The degrees and minutes of Latitude and Longitude are correctly marked. ✓

3. All station points are exactly marked by fine ✓
black dots.
4. Closely spaced lines are drawn sharp and clear
for printing. ~~Not as good as could be shown.~~
5. Topographic symbols for similar features are of
uniform weight. ✓
6. All drawing has been retouched where partially
rubbed off. ✓
7. Buildings are drawn with clear straight lines
and square corners where such is the case on
the ground. ✓

(Par. 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 48)

16. No additional surveying is recommended at this time. ✓

17. Remarks:

18. Examined and approved;

E. H. Kirsch
Chief of Party

19. Remarks after review in office:

See following page.

Reviewed in office by: Leonard A. Minkman B. G. Jones

Examined and approved:

K. T. Adams
Asst Chief, Section of Field Records
L. D. Golbat
Chief, Division of Charts

F. S. Borden
Chief, Section of Field Work
G. H. de
Chief, Division of Hydrography
and Topography.

REVIEW OF AIR PHOTO COMPILATION NO.T-5188 (1934)

Topographic Stations

The following recoverable topographic stations described on Form 524 are shown on this compilation with the conventional circle.

Description filed under T-6100	SHED	(d)
	(CON	(d)
Descriptions filed under T-6101	(CORN	(d)
	(SIN	(d)
Description filed under T-6102	TAN	(d)*
Description filed under T-6137	CHY	(d)

* Station TAN (d) is also a triangulation station, "Fort Fremont Tank, 1916"

Stations Transferred by - L.A. McGann *L.A. McGann*
" Checked by - D.H. Benson *D.H. Benson*

With reference to note concerning "Arch 1921" on page 3: This station is a triangulation station.
Lat. 32°21'. 11."793
Long. 80°44'. 12."386 and shown with the conventional triangle. It is Beacon No.3

Comparison with other Surveys

1. T-6100 (1934); T-6101 (1934); T-6102 (1934); T-6137(1934)

On T-6100 sketches of topography agree closely with the compilation around stations "SIN" 1933 and "Creek" 1933.

The shoreline on T-6101 was transferred to the compilation as noted in the report on Page 3.

T-6102 shows control points only

T-6137. There is fair agreement with the portions of topography shown in the vicinity of Stations "SWEDE 1933" and "JEW, 1933". These sketches were checked by means of proportional dividers. Only small differences were noted.

2. This compilation supersedes T-840 (1859) and T-3814 (1920). These surveys show considerable changes, particularly along the coast at Trenchards Inlet.

Names

After conferring with Mr. Bacon the names listed on Page 3 are shown as listed under Correct Local Usage

B. G. Jones

Survey No. T-5188

GEOGRAPHIC NAMES FEB 15 1935

Chart No. 571, 1240Date. Jan. 8, 1935Diagram No. 1240

Names underlined in red approved Nov 13, 1935

Acc. No.

Harlow Bacon

*, Approved by the Division of Geographic Names, Department of Interior.

Q, Not Approved by the Division of Geographic Names, Department of Interior.

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

Q Under investigation

Names marked Q are
the subject of further
study by the DGN
Do not object till approved
H.B.

Status	Name on Survey	Name on Chart	New Names in local use	Names assigned by Field	Location
	<u>St. Phillips Island</u> ^Q	^{GN4} ¹²⁴⁰ Phillips Island.			
OK	<u>Morse Island Creek</u>	^{ON 1240} Horse-Island-Cr. (571).			
OK	<u>Bull Point</u>	^{BULL PT. ON 1240} St. Michaels Head (571).			
	<u>Pritchard Inlet</u> ^Q	^{GN4} ¹²⁴⁰ do	<u>Pritchards Inlet</u> ✓		
	<u>Trenchard Inlet</u> ^Q	^{GN4} ¹²⁴⁰ do	<u>Trenchards Inlet</u> ✓		
	<u>Archers Creek</u>	^{GN4} ^{Archer Cr} ^{ON 1240} do	<u>Archers Creek</u>		
	<u>Pritchard Island</u> ^Q	^{GN4} do	<u>Pritchards Island</u> ✓		
	<u>Ladies Island</u>	do			
	<u>Warsaw Island</u>	U.S. Engineers' "Fort Fremont" sheet.			
	<u>Chowan Creek</u>	^{PMM 571} ¹²⁴⁰ do			
	<u>Sea side road</u>	^{PMM} do	✓	✓	
	<u>Beaufort River</u>	do			
	<u>Bay Point Island</u>	^{ON 571} ^{Not on 1240 or PMM} do			
	<u>Skull Inlet</u>	do ¹²⁴⁰			

GEOGRAPHIC NAMES

Survey No. T-5188Date. Jan 8, 1935Chart No. 571, 1240Diagram No. 1240

*, Approved by the Division of Geographic Names, Department of Interior.

Ø, Not Approved by the Division of Geographic Names, Department of Interior.

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

Status	Name on Survey	Name on Chart	New Names in local use	Names assigned by Field	Location
	<u>Fort Fremont</u>	^{571 PMM} do			
	<u>Caper</u>	do (571)			
	<u>Chisholm</u>	do (571)			
	<u>Scott</u>	do (571)			
	<u>Longwood</u>	do (571)			
OK	<u>Station Creek</u>	^(571-1240-PMM) do			
	<u>St. Helena Island</u>	^(571-1240-PMM) do			
	<u>Scott Creek</u>	⁵⁷¹ do			
OK	<u>Story River</u>	^(571-1240-PMM) do			
	<u>Capers Island</u>	^(571-1240-PMM) do			
	<u>Skull Inlet</u>	do			
	<u>Turtle Creek</u>	⁵⁷¹ do			
Add	<u>Coles Care</u>	^{571 T5517}			32° 15.5' 80° 36.50'
	<u>Bay Point</u>	^{1240-PMM} do			(M 100)