

5143

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

DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

_____, Director

State: Georgia & S. Car.

DESCRIPTIVE REPORT

Topographic } Sheet No. T-5143
Hydrographic }

LOCALITY

Georgia & S. Carolina

Savannah River - Barnwell Island

Barnwell Island

193 4

CHIEF OF PARTY

S. B. Grenell

U. S. GOVERNMENT PRINTING OFFICE: 1923

5143

Applied to chart 839 Nov. 1935 HNE.

Applied to chart 440 June 12, 1936 G.H.S.

DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY

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.

REGISTER NO. 5143 1240-V
5150

State Georgia & South Carolina

General locality Savannah River

Locality Savannah River vicinity Elba Island

Date of photographs: 10/11/33

Scale 1:10,000 Date of ~~survey~~ camp: , 19

Vessel

Reviewed and recommended for approval: S. B. Grenell

Chief of party Lieut. (j.g.) S. B. Grenell

Photographs plotted by:

~~Surveyed by~~ T. P. Cooper R. D. Cross

Inked by J. W. Osteen, Jr.

Heights in feet above to ground to tops of trees

Contour, Approximate contour, Form line interval feet

Instructions dated November 10, 1933

Remarks: Compilation of aerial photos Nos.: 1114 to 1127, and 1368 to 1378

--NOTES OF COMPILATION--

One copy of this form must accompany each chart from beginning to completion. The last draftsman, whose name appears on this form, is responsible for it and all personnell will endeavor to keep these forms up to date and correctly posted. This form is very important inasmuch as the final Descriptive Report of the chart compiled is based upon the information contained herein.

SHEET No. 5143

PHOTO NO ¹¹¹¹1368 to PHOTO NO. ¹¹²⁷1378

BY	START	FINISH
ROUGH RADIAL PLOT <u>Warren Fitch</u>	<u>12/21/33</u>	<u>12/21/33</u>
SCALE FACTOR (940) <u>S. B. Grenall</u>	<u>1/6/34</u>	<u>1/6/34</u>
SCALE FACTOR CHECKED <u>S. B. Grenall</u>		
PROJECTION <u>J. C. Partington</u>	<u>1/30/34</u>	<u>1/30/34</u>
PROJECTION CHECKED <u>F. B. Hickman</u>	<u>1/30/34</u>	<u>1/30/34</u>
CONTROL PLOTTED <u>T. R. Cooper</u>	<u>1/31/34</u>	<u>1/31/34</u>
CONTROL CHECKED <u>S. B. Grenall</u>		
TOPOGRAPHY TRANSFERRED		
TOPOGRAPHY CHECKED		
SMOOTH RADIAL LINE PLOT <u>R. D. Cross</u>	<u>2/7/34</u>	<u>2/26/34</u>
RADIAL LINE PLOT CHECKED <u>S. B. Grenall</u>		<u>2/26/34</u>
DETAIL INKED <u>J. W. Osteen, Jr.</u>	<u>10/2/34</u>	<u>10/18/34</u>
AREA DETAIL INKED <u>11</u>	Square Statute Miles	
LENGTH OF SHORE LINE OVER 200m. <u>9.7</u>	Statute Miles	
LENGTH OF SHORE LINE UNDER 200m. <u>13.4</u>	Statute Miles	
GENERAL LOCATION <u>Savannah River</u>	Georgia, East Coast	
LOCATION <u>Barnwell Island</u>	vicinity Liba Island	
DATUM STATION <u>Savannah South Base</u>	LATITUDE <u>32-05-33.773 (1040.2M)</u>	
(S.C.) 1850-1932		
DATUM <u>N. A. 1927</u>	LONGITUDE <u>81-03-18.709 (190.5M)</u> (adjusted)	

REPORT OF COMPILATION:

COMPILATION METHOD:

See note of 9/21/34 which is attached to this report.

ADJUSTMENT METHOD:

The pictures for this sheet had more than the average amount of tilt. This necessitated the interlacing of radial points and very careful adjustment was required.

There should have been a great many more points than were picked on these photographs.

INTERPRETATION:

With the exception of a few pictures of the area covered by abandoned rice fields, the photographs were clear and all shoreline well defined. Standard symbols were used throughout.

INFORMATION FROM OTHER SOURCES:

All information for the compilation of this sheet was obtained from the photographs.

COMPARISON WITH OTHER SURVEYS:

All junctions with other sheets have been made satisfactorily.

This sheet joins single lens sheet No. ^{T-5146}~~5214-A~~ at the ^{on}~~southeast corner and part of the shoreline is covered by No. 5214-A, T-5146~~. There was a difference in scale between these two sheets and proportional dividers were used to make these junctions.

On the Corps of Engineers U. S. Army Tactical Map in the Savannah Quadrangle, two islands are shown to the west of Elba Island in Back River. They are named Barnwell 1 and 2.

Dredging operations in the past few years have filled the space between these islands and also between these islands and the mainland. The South Carolina - Georgia boundary line at this point was formerly the creek which divided these islands from the mainland.

The present existing conditions are shown on sheet T-5143.

The Central of Georgia R. R. tracks from Savannah to Tybee Island have been taken up to a point approximately one mile east of Le Pageville. This old roadbed has been shown by a double row of sand dots.

REPORT OF COMPILATION

ACCURACY AND COMPLETENESS:

The area covered by these sheets is complete in every detail as nearly as can be determined by the photographs.

All well defined detail is located with a probable error of not more than 4 meters; less well defined detail with an error of not more than 10 meters.

PHOTOGRAPHS:

No. to	No.	Date	Time	Stage of Tide
1368	1378	10/11/33	10.45A.M.	3/5
1415	1425	10/11/33	11.00A.M.	3/5

J. V. Osteen, Jr.
J. V. Osteen, Jr.,
Draftsman

Approved: *S. B. Grenell*
S. B. Grenell

9/21/34


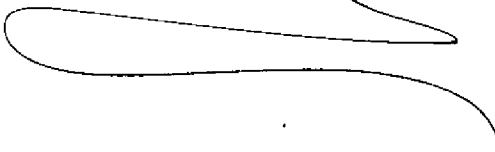
SHEETS: T-5142, T-5143, 50

5 Lens, 1:10,000 scale

The two 1400 flights on this sheet were run through by R. D. Cross at an earlier date and the north flight (1300) was held up due to lack of control. Due to difference in celluloid, it was impossible to fasten sheets 5141, ^{T-5142}~~5142~~, ~~5149~~ and ^{T-5143}~~5150~~ together to run this flight, so a master projection was made for these sheets and radial plot carried through holding new control and points established by 1400 flights.

These points were transferred by matching projection lines near the points to be transferred.

F. B. Hickman

Approved: 


Note: -

Additional detail from T-6165 (Additional work 1936) has been added to the file copy and to the proof of this compilation for which printing is not yet completed.

H. H. Schleiter

1/11/37

Review of Air Photo Compilation T 5143 (1935)

June 1935

1. Projection

The projection has been checked in the office. Parallel 81°00' is from 0 to 3 meters too far east. This has not been corrected as the change would affect the location of control.

2. Comparison with Contemporary Graphic Control Surveys

T 6155a, b (1:10,000), June-September 1934

No shore line is shown on the graphic control surveys. The high water line is indicated by pencil lines connecting points measured from U.S.E. sounding ranges. (See descriptive report T 6154a-T 6156b.) The compilation shore line agrees, in general, with the penciled lines on T 6155a and b.

See opposite page

Details appearing on T 6155a and b which have not been transferred to the compilation are as follows:

- (a) Temporary topographic stations.
- (b) Magnetic meridians.
- (c) Range azimuths. All range beacons are shown but the azimuths have not been transferred to the compilation.
- (d) U.S.E. dredging ranges.
- (e) U.S.E. grid system. For discussion of the grid system see descriptive report T 6154a-T 6156b.

3. Comparison with Previous Surveys

(a) T 343 (1:10,000), 1852

Only sections of shore line between Fig and Elba Islands are shown on T 343.

The compilation is complete and adequate to supersede T 343.

(b) T 383 (1:5,000), 1852

The rice fields shown on T 383 have been abandoned and are becoming indistinguishable from the surrounding marsh.

The compilation is complete and adequate to supersede that part of T 383 which it covers.

(c) T 992 (1:20,000), 1865-67

T 992 covers the area on the compilation south of the Savannah River. The detail is not complete, but the area appears to have remained practically the same.

The compilation is complete and adequate to supersede that portion of T 992 which it covers.

(d) T 1027 (1:5,000), 1866

This is a detailed survey of Ft. Jackson and adjacent fortifications on both sides of the Savannah River. It is now obsolete.

4. Comparison with Contemporary Hydrographic Surveys

H 5572 (1:10,000), 1934

No conflicts have been found between the compilation shore line and the hydrography.

5. Comparison with Charts

The area of the compilation is covered on charts Nos. 440 and 1240. The jetties shown on the charts at Fig Island and Mackey Point can not be identified on the photographs. They have not been shown on the compilation.

The following corrections are recommended to be applied to the charts:

- (a) Remove pier at lat. $32^{\circ}05.7'$, long. $81^{\circ}01.3'$
- (b) Remove C. of G. R.R. east of long. $81^{\circ}02.5'$
- (c) Remove railroad bridge at lat. $32^{\circ}04.4'$, long. $81^{\circ}00.1'$
- (d) Replace railroad bridge at lat. $32^{\circ}04.5'$, long. $81^{\circ}00.9'$ with piling.
- (e) Remove railroad spur from lat. $32^{\circ}04.3'$, long. $81^{\circ}03.3'$
to river
- (f) Add a pier at lat. $32^{\circ}05.2'$, long. $81^{\circ}01.4'$

6. Additions and Corrections

(a) The mooring dolphins (lat. $32^{\circ}05.2'$, long. $81^{\circ}01.5'$) have been added to the compilation from the photographs.

(b) The training wall (lat. $32^{\circ}06.1'$, long. $81^{\circ}00.1'$ to lat. $32^{\circ}05.9'$, long. $81^{\circ}01.1'$) has been added to the compilation in the office. This detail was noted on the field photographs.

(c) The jetty (lat. $32^{\circ}05.5'$, long. $81^{\circ}01.1'$) has been added to the compilation to the extent shown on the field photographs. The piling located on H 5572 (lat. $32^{\circ}05.4'$, long. $81^{\circ}01.2'$) checks the end of the jetty as shown on the compilation.

7. Recoverable Stations

All recoverable stations shown on the compilation have been transferred from T 6155a and b, and T 6165. Those marked (d) are described on Form 524 and filed under T 6155a and b and T 6165. Transfer of all recoverable stations to this compilation has been checked in the office by laying the compilation over the graphic control surveys. *The locations of Pure Oil Tank (d) and Standard Oil Tank (d) on T 6155b do not agree with the photo plot locations of these stations. These positions have been scaled from the compilation by V. R. Sobieralski and checked by D. H. Benson. Descriptions on Form 524 are filed under T 5143. The cards have been corrected to agree with the photo plot positions, and a note made on the plane table survey.

8. Landmarks, Lights and Beacons

No landmarks are shown on the charts. All lights and beacons shown on charts Nos. 440 and 1240 are included on the compilation.

Within this area
Respectfully submitted,

V. R. Sobieralski
8-23-35

B. J. Jones

Approved
K. T. Adams

REVIEW OF AIR PHOTO COMPILATION NO. *T-5143*Chief of Party: *S. B. Grenell*Compiled by: *J. Osteen Jr.*Project: *F.P. 4 Ga. Party 18*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) *None*
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) *None*
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)
Form 524 submitted by C.A. Egner 1934.
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)
Form 567 submitted by C.A. Egner 1934.
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)
None
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)
13. The geographic datum of the compilation is *NA 1927* and the reference station is correctly noted. ✓
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. ✓
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;

[Signature]

Chief of Party

19. Remarks after review in office: *See review pages.*

Reviewed in office by: *V. R. Sobieralski* *[Signature]*
8-23-38

Examined and approved:

K.T. Adams
Asst Chief, Section of Field Records
Division of Charts
L.O. Solhat
Chief, Division of Charts

J.S. Borden
Chief, Section of Field Work
[Signature]
Chief, Division of Hydrography
and Topography.