

5171

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

DEPARTMENT OF COMMERCE

U. S. COAST AND GEODETIC SURVEY

R. S. Patton, Director

State: South Carolina

DESCRIPTIVE REPORT

Air
Photo

Topographic

Hydrographic

Sheet No.

Field No. 19

Reg. No. 5171

LOCALITY

CHARLESTON HARBOR AND VICINITY

WANDO RIVER SOUTH OF WANDO CAINHOY

1934

CHIEF OF PARTY

E. H. Kirsch

U. S. GOVERNMENT PRINTING OFFICE: 1928

5171

E. H. K.

Applied to chart 681 2 m. a. April 1937

" " " 1234 2 m. a. " "

J O B S H E E T
TO
Accompany Sheet No. 19
Reg. No. 5171
5171

PHOTO NO.: M-80 - 823A-8 to M-85 - 823A-8 DATE: November 17, 1933 at 11:35 AM.

M-98 - 823A-8 to M-102- 823A-8 November 17, 1933 at 12:25 PM.

PROJECTION BY

L. C. Ripley
L. C. Ripley

2-6-34

PROJECTION CHECKED BY

E. H. Kirsch
E. H. Kirsch

2-6-34

TRIANGULATION PLOTTED BY

M. L. Smith
M. L. Smith

2-6-34

TRIANGULATION CHECKED BY

E. S. Ethridge
E. S. Ethridge

2-7-34

TRIANGULATION PLOTTED ON PHOTOS
BY

F. H. McBeth
F. H. McBeth

TRIANGULATION CHECKED ON PHOTOS
BY

J. F. Richardson
J. F. Richardson

SCALE PLOT BY

J. H. Wulbern
J. H. Wulbern

RADIAL PLOT BY

J. H. Wulbern
J. H. Wulbern

2-9-34

DETAIL INKED BY

R. G. Hickson
R. G. Hickson

2-13-34 to 3-22-34

AREA OF DETAIL INKED: 11.6 Square statute miles (land area)

AREA OF DETAIL INKED: None (Shoals in water)

LENGTH OF SHORELINE: 5.6 statute miles. (More than 200 meters from opposite shore)

LENGTH OF COASTLINE: None

LENGTH OF STREAMS: 8 statute miles (less than 200 meters wide)

DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

REG. NO. 5171

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. 19

REGISTER NO. 5171

State SOUTH CAROLINA

General locality CHARLESTON HARBOR

Locality WANDO RIVER SOUTH OF WANDO CAINHOY

Scale 1:10,000 Date of Photographs - 11-17-33 - 11:35 A.M.
survey 11-17-33 - 12:25 PM¹⁹

Compilation - MARCH 1934.
Vessel AIR PHOTO COMPILATION PARTY NO. 21, CHARLESTON, S. C.

Chief of party E. H. KIRSCH

Surveyed by SEE JOB SHEET IN THE DESCRIPTIVE REPORT

Inked by R. G. HICKSON

Heights in feet above ----- to ground to tops of trees

Contour, Approximate contour, Form line interval ---- feet

Instructions dated NOVEMBER 10th, 1933, 19

Remarks: ONE OF SIXTEEN ATLAS SHEETS OVER CHARLESTON HARBOR
AND VICINITY.

GENERAL INFORMATION

Statistics:

The land area covered by this sheet is 11.6 square statute miles. There are 5.6 statute miles of shore line as measured along rivers, the width of which is over 200 meters as measured from the nearest opposite shore. There are 8 statute miles of shore line as measured along rivers and sloughs less than 200 meters in width.

General Report:

This sheet is one of sixteen Atlas sheets covering Charleston, S. C., harbor and vicinity. A general field inspection report was made of this entire area by Lt. B. H. Rigg, Chief of Party - 1933-34. The area covered by this sheet is mostly thickly wooded with pine trees and a few oak trees, except the marsh area along the Wando River and creeks. There are a few scattered cultivated and uncultivated fields.

For Lt. Rigg's Report see Desc. Report T-5153.

Photo Numbers:

The following photos taken by the U. S. Army Air Corp's single lens camera were used in inking the detail of this sheet. No. M-80 - 823A-8 through M-85 - 823A-8. These pictures were taken along Long. $79^{\circ} 52'$ between Lat. $32^{\circ} 53'$ and Lat. $32^{\circ} 57'$ on November 17, 1933 at 11:35 A.M.

Also pictures No. M-98 - 823A-8 through No. M-102 823A-8. These pictures were taken along Long. $79^{\circ} 49'$ between Lat. $32^{\circ} 53'$ and Lat. $32^{\circ} 57'$ on November 17, 1933 at 12:25 P.M.

On the date that these pictures were taken there was a high tide of 7.2 at 8:05 AM and a low tide of -.3 at 2:34 P.M.

CONTROL

Sources:

The only control used on this sheet was the triangulation survey made by Mr. R. F. A. Studds in 1928, except Δ Wando established by C. D. Meaney in 1932. No aluminum control sheets were made of this area in 1933-34.

The control has been reduced to 1927 N. A. Datum. Adjusted positions were not available at time of compilation except the position of Wando.

Errors:

No errors were found in the control by the photo plot.

COMPILATION

Method:

Due to the small area covered by this sheet the plot was made by the radial line method on overlay sheets "A" and "B",

covering a much greater area and then transferred to the small atlas sheet.

Adjustments of Plot:

Photos No. M-80 - 823A-8 through No. M-85 - 823A-8 were badly out of scale and constant shifting was necessary in inking the detail. However, as the shifting was done carefully, inking in only a small area at a time, this is not believed to have affected the accuracy of the sheet. No adjustment in the Radial Plot.

Interpretation:

The usual graphic symbols were used on this sheet. Some difficulty was experienced in determining the high water line of the Wando River but this was cleared up by field inspection by the compiler.

Double broken lines indicate dirt roads in fair condition. Single dashed lines indicate very poor roads or trails. An abandoned narrow gauge railroad near Long. $79^{\circ} 50'$, Lat. $32^{\circ} 56'$ has been indicated by a single broken line and labeled.

The low water line shown by a single dashed line is subject to appreciable error as it was very indistinct on the photos from which it was taken. The mud area between the high and low water lines was left blank and labeled except in a few spots where there is considerable sand and shells mixed with the mud, in which case the sand symbol is used.

Information from Other Sources:

No aluminum control sheets were made of this area in 1933-34. Field inspection by the compiler and Lieut. B. H. Riggs' field inspection party furnished the only other information.

This sheet should be compared with Mr. Studds' ^{hydro-}~~topo-~~ graphic sheets of 1928. *H-4904, H-4903. Lamm.*

Conflicting Names:

No conflicting names were recorded by the field inspection party. ~~No new names are shown. All names shown agree with the charts.~~ ** See below. ^*

COMPARISON WITH OTHER SURVEYS

Junctions:

Junction with sheet No. 18, Reg. No. 5170 on the East is satisfactory. Junction with sheet No. 22, Reg. No. 5174 on the South is satisfactory. Junction with Sheet No. 20, Reg. No. 5172 on the West is satisfactory. Junction with sheet No. 9, Reg. No. 5161 on the North is satisfactory.

** Only one new name is shown, Cainkoy Road. The source of this name is not given. It has been retained on the compilation pending Mr. Bocons decision B.G. Jones.*

covering a much greater area and then transferred to the small atlas sheet.

Adjustments of Plot:

Photos No. M-80 - 823A-8 through No. M-85 - 823A-8 were badly out of scale and constant shifting was necessary in inking the detail. However, as the shifting was done carefully, inking in only a small area at a time, this is not believed to have affected the accuracy of the sheet. No adjustment in the Radial Plot.

Interpretation:

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The low water line shown by a single dashed line is subject to appreciable error as it was very indistinct on the photos from which it was taken. The mud area between the high and low water lines was left blank and labeled except in a few spots where there is considerable sand and shells mixed with the mud, in which case the sand symbol is used.

Information from Other Sources:

No aluminum control sheets were made of this area in 1933-34. Field inspection by the compiler and Lieut. B. H. Riggs' field inspection party furnished the only other information.

This sheet should be compared with Mr. Studds ^{hydro-}~~topo-~~ graphic sheets of 1928. *H-4904, H-4903. Larn.*

Conflicting Names:

No conflicting names were recorded by the field inspection party. ~~No new names are shown. All names shown agree with the charts.~~ *except the name "Cainkoy Road" * see below. ^*
COMPARISON WITH OTHER SURVEYS

Junctions:

Junction with sheet No. 18, Reg. No. 5170 on the East is satisfactory. Junction with sheet No. 22, Reg. No. 5174 on the South is satisfactory. Junction with Sheet No. 20, Reg. No. 5172 on the West is satisfactory. Junction with sheet No. 9, Reg. No. 5161 on the North is satisfactory.

** Only one new name is shown, Cainkoy Road. The source of this name is not given. It has been retained on the compilation pending Mr. Brown's decision B.G. Jones.*

Landmarks:

No landmarks were found from examination of the photos. No landmarks were recorded by field inspection by the compiler. Reference is made to Mr. R.F.A. Studds topographic survey of 1928. Five lone piles are shown on chart 470 along the Wando River that could not be recovered from the photos covering this area. Field inspection shows that they have been removed.

Chart No. 681 shows four small docks on the Wando River at Cainhoy. One of these has been abandoned, ~~and~~ ^{here} Only three or four piles remain. These have been shown on this sheet and labeled.

Chart No. 681 does not show the abandoned narrow gauge railroad which is shown on this sheet near Long. $79^{\circ} 50'$, Lat. $32^{\circ} 56'$

Recommendation for Further Surveys:

The compilation of this sheet is believed to have a probable error of not more than 3 meters in position of well defined detail of importance for charting and of not more than 6 meters for other data. See below

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 additional surveys are required.

Assisted by:

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

Submitted by:

R. G. Hickson
R. G. Hickson.

The accuracy of location given above is high. A better estimate is an accuracy of location of 3 to 5 meters for interested points and 5 to 10 meters for other detail.

B.G. Jones.

Note There are no previous topographic surveys by this bureau covering this area. The whole line along the Wards River was surveyed by planimeter and sextant and shown on surveys # 4903, # 4904, and # 4905 (1928). This compilation has been compared with the 1928 hydrographic surveys and is adequate to supersede the topographic information shown on those sheets.

B. G. Jones

REVIEW OF PHOTO TOPOGRAPHIC SURVEY NO.

Title (Par. 56) S. C. Charleston Harbor, Wando River S. of Wando Cainhoy

Chief of Party E. H. Kirsch

Compiled by R. G. Hickson

See Job Sheet

Project F.P.-13-S.C. 1933 to 35

Instructions dated November 10, 1933

Air Photo Compilation Party No. 21.

1. The survey and preparation for it conform to the requirements of the Topographic Manual. (Par. 2; and 16, a, b, c, d, e, g and i.)
2. The character and scope of the compilation satisfy the instructions and the "Notes on the Compilation of Planimetric Line Maps from Five Lens Aerial Photographs".
3. The control and adjustment of the radial plot were adequate. (Par. 12, 29.)
4. There is sufficient control on maps from other sources that were transmitted by the field party for their application to the charts. (Par. 28.) None.
5. High water line on marshy ~~and mangrove coast~~ is clear and adequate for chart compilation. (Par. 16a, 43, 44.)
6. 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.)
7. Important details shown on previous surveys and on the chart have been compared with this sheet and a statement has been entered in the report regarding the removal from the chart or change in position of important detail such as rocks, lights, beacons, prominent objects, bridges, docks, and structures along the water front. No changes noted. *See opposite page.*
8. The span, draw and clearance of bridges are shown. (Par. 16c.)
No bridges.
9. The data furnished by the Field Inspection is adequate.

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.

10. The descriptive report covers all details listed in the Manual, so far as they apply to this survey. (Par. 64, 65 and 66.)
11. The descriptive report also contains all additional information required in photo topography as prescribed in the instructions and in the "Notes on the Compilation of Planimetric Line Maps from Five Lens Aerial Photographs".
12. The descriptions of recoverable stations and references to shore line were accomplished on Form 524, and scaling of positions checked. (Par. 29, 30 and 57.) No aluminum control sheet. ✓
13. A list of landmarks for charts was furnished on Form 567 and scaling of positions checked. (Par. 16d, e, 60.)
See Mr. Studds 1928 ^{Hydro}Topo-Sheet. H-4904, H-4903.
14. The geographic datum of the sheet is North American 1927 and the reference station is correctly noted. (Par. 34.)
15. Junctions with contemporary surveys are adequate.
16. Geographic names are shown on the sheet and are covered by the Descriptive Report. (Par. 64, 66k.) ✓
17. The quality of the drafting is good. (Par. 31, 32, 33, 35, 36, 37, 38, 39, 40, 41, 42, 45, 46.)
18. No additional surveying is recommended. ✓

19. Remarks: *See following page.*
~~This is a joint topographic map. No~~
~~comparisons, therefore, can be made with previous~~
~~charts.~~

20. Examined and approved: *E. H. Kirsch*
Chief of Party

21. Remarks after review in office:

Reviewed in office by: *Leonard A. McSauer*
B.G. Jones.

Examined and approved:
K.T. Adams
Chief, Section of Field Records
L.O. Pollock
Chief, Division of Charts

T.S. Borden
Chief, Section of Field Work
G. Wade
Chief, Division of
Hydrography and Topography.

Date. Nov 13, 1934

Survey No. T-5171

Chart No. 681, 470

Acc. No.

Diagram No. 1239

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

[illegible]

Survey No. T 5171

Chart No. 1239. 470

Names approved Feb. 2, 1935

Diagram No. 1239-2

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

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

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

04 100

led to drawing of Chart # 470. May 8, 1935.

g.H.S.