

8182

Diag'd. on Diag. Ch. No. 78-3

8182

Form 504

U. S. COAST AND GEODETIC SURVEY

DEPARTMENT OF COMMERCE

DESCRIPTIVE REPORT

Type of Survey Air Photo. Compilation

Field No. 82 Office No. T-8182

LOCALITY

State Virginia

General locality Eastern Shore

Locality Elliot's Creek

ELLIOTS CREEK QUADRANGLE
N3707.5-W7600/7.5

194 2

CHIEF OF PARTY

Lieut. Comdr. Kenneth G. Crosby

Lieut. Comdr. Francis L. Gallen

LIBRARY & ARCHIVES

DATE September 18, 1946

B-1870-1 (1)

DATA RECORD

T-8182

Quadrangle (II): Elliots Creek

Project No. (II): S-278-C

Field Office: Salisbury, Md.

Chief of Party: Patterson, W.D. 3

Compilation Office: Tampa, Fla. Chief of Party: Crosby, K.G.

Instructions dated (II III): 3-4-42

Copy filed in Descriptive
Report No. T- (VI)

Completed survey received in office: 1-19-43

Reported to Nautical Chart Section: 1/45

Reviewed: 2/19/43

Applied to chart No.

Date:

Redrafting Completed: 3/43

Registered:

Published: 7/43

Compilation Scale: 1:20,000

Published Scale: 1:25,000

Scale Factor (III): 1.00

Geographic Datum (III): N.A. 1927

Datum Plane (III): M. S. L.

Reference Station (III): Willis, 1932

Lat.: 37° 12' 11".956 (368.6m) Long.: 76° 00' 31".375 (773.7m) Adjusted
~~Unadjusted~~

State Plane Coordinates (VI):

Virginia coordinate system, South Zone

X = 2,725,491.15

Y = 326,318.12

Military Grid Zone (VI) A

PHOTOGRAPHS (III)

<u>Number</u>	<u>Date</u>	<u>Time</u>	<u>Scale</u>	<u>Stage of Tide</u>
8553	April 13, '42	11:52	1: 20,000	± 0.30 feet

Tide from (III): Predicted tides, Old Plantation Flats, Chesapeake Bay, Va.

Mean Range: 2.4 Spring Range: 2.9

Camera: (Kind or source) U.S.C. & G.S. Nine lens (Focal length $8\frac{1}{4}$ inches.

Field Inspection by: Jylha, AM ; Hanavich, C. date: May, 1942
Photo. Aids

Field Edit by: *Orvis N. Dalbey, photo. Aid* date: Dec. 1942

Date of Mean High-Water Line Location (III): April 13, 1942

Projection and Grids ruled by (III) Washington Office date: Sept. 23, 1942

" " " checked by: date:

Control plotted by: A. L. Kidwell, Jr. Topo. Engr. date: Oct. 7, 1942

Control checked by: V. F. Simmons, Asst. Engr. Drfsman date: Oct. 8, 1942

Radial Plot by: Tampa Office Personnel date: Oct. 15, 1942

Detailed by: C. A. J. Pauw, Sr. Engr. Aid date: Nov. 9-11, 1942

Reviewed in compilation office by: Giles, J. A. date: Nov. 12, 1942
Prin. Photo. Aid

Elevations on Field Edit Sheet
checked by: *Orvis N. Dalbey, photo. Aid* date: Dec. 1942

STATISTICS (III)

Land Area (Sq. Statute Miles): 3.0

Shoreline (More than 200 meters to opposite shore): 4.7

Shoreline (Less than 200 meters to opposite shore): 12.2

Number of Recoverable Topographic Stations established: 1 (one)

Number of Temporary Hydrographic Stations located by radial plot: 2 (Two)

Leveling (to control contours) - miles: 2.7

Roman numerals indicate whether the item is to be entered by, (II) Field Party, (III) Compilation Party, or, (VI) the Washington Office.

When entering names of personnel on this record give the surname and initials (not initials only).

Remarks:

General Procedure in the Production of Topographic Quadrangles for the War Department

This quadrangle, together with similar adjoining maps produced under Project C.S. 278-G was prepared by the Coast and Geodetic Survey for the War Department under "General Specifications for War Department Mapping Program" issued about December 1941, in which is incorporated the "Standard of Accuracy for a National Map Production Program" issued by the Bureau of the Budget under date of June 10, 1941.

The general procedure in the production of this and the adjoining quadrangles was:

FIELD SURVEYS

Aerial photography with the Coast and Geodetic Survey nine-lens camera, with airplane and flight crew furnished by the U. S. Coast Guard. The photographs were taken to the scale of 1:20,000.

Ground inspection of the photographs for identification of control points, and classification and clarification of planimetric details on the photographs.

Contouring by planetable directly on the photographs. Supplementary vertical control was established by means of an extensive subordinate level net, furnishing unmarked elevations at road intersections, drive-ways, and numerous other points identifiable on the photographs.

COMPILATION OF MANUSCRIPT

Compilation on the map manuscripts by radial plot methods (celluloid hand templets) of all planimetry and contours. These manuscripts were drawn on the scale of 1:20,000 on celluloid sheets on which polyconic projections had been ruled with the Projection Ruling Machine in the Washington Office. Compilation was accomplished in the ~~Baltimore~~ Tampa Photogrammetric Office.

FIELD EDIT

Comparison of a copy of the manuscript with the ground. This included inspection for completeness and accuracy as well as the location by planetable methods of additional details, checking of nautical and aeronautical aids to navigation, etc.

Accuracy Tests - Application of systematic horizontal and vertical accuracy tests to check the maps for conformity with the specifications. These tests consisted of comparison of the map position and elevation of selected random points with the true position and elevation as independently determined by standard survey methods.

PROCESSING IN THE WASHINGTON OFFICE

Review - Examination of the manuscript for accuracy and completeness of compilation and compliance with specifications, correcting where necessary; addition of military and state grids and other special features; and verification of the general adequacy of the manuscript as a basis for the production of a finished map.

Drafting and Reproduction - Preparation of smooth color separation drawings on 1:20,000 scale on metal-mounted "blue-line" copies of the manuscript. From these drawings, negatives and printing plates were prepared for reproduction of the finished map on the scale of 1:31,680 or 1:25,000.

COMPILATION REPORT
TO ACCOMPANY
SHEET NO. T-8182
ELLIOTS CREEK

CONTROL

Control on this sheet consisted of two triangulation stations. This sheet was rigidly controlled by numerous stations on the adjoining sheet No. T-8181.

RADIAL PLOT

The discussion of the main radial plot, which included this sheet was made apart of the descriptive report for sheet No. T-8176.

An independent check was made of the main radial plot concurrently with sheet No. T-8181. Additional radials were added as needed by the compiler of sheet No. T-8181.

DETAILING

This map drawing was detailed entirely from photograph No. 8552 whose center lies in sheet No. T-8181.

LANDMARKS AND AIDS TO NAVIGATION

Two aids to navigation have been listed upon Form 567, which has been made apart of this report. Also, one of the triangulation stations is a lighthouse.

HYDROGRAPHIC CONTROL

There is one monumented and two temporary topographic stations along the shores. The geographic position of these stations are listed on Forms 524. Triangulation station Willis, located on a steep hill some 300 meters from the shores of Chesapeake Bay, may also prove valuable for the control of hydrographic surveys.

COMPARISON WITH EXISTING TOPOGRAPHIC QUADRANGLES

No topographic quadrangle was available in this office for comparison with this map drawing.

COMPARISON WITH NAUTICAL CHART

This map drawing and U. S. C. & G. S. Chart 1222 (scale 1:80,000 and published) compare favorably with the following exception: At latitude 37 12' 15" and Longitude 76 00' 30", the chart indicates a lake, where actually this is a steep hill, 49 feet high, on top of which is located station Willis. *Not a lake - these are contours from T-2676.*

SUPPLEMENTAL DATA

No graphic control surveys by this Bureau, maps or plans of other organizations were used to supplement the photographs.

Respectfully submitted

Cornelius A. J. Pauw
Cornelius A. J. Pauw,
Senior Engineering Aid

Forwarded:

Kenneth G. Crosby
Kenneth G. Crosby,
Chief of Party.

FIELD EDIT REPORT
Quadrangle T-8182
Project CS-278-C
F.L. Gallen, Chief of Party

1. There is very little land area on this sheet; wooded and cultivated areas are about equally distributed.
5. U. S. C. & G. S. B.M. B301 was established by F. L. Gallen, Chief of Party, in 1942.
15. The bridge classification was carried out in accordance with the instructions.
17. There are no political boundaries on this sheet.
18. Geographic Names were taken from a special report CS-278-B, submitted by A. J. Wraight, Photogrammetric Aid.
46. All additions, deletions, and corrections were made on the map manuscript and transferred to the smooth copy after completion of field work.

The inking of the map manuscript was done in accordance with the following scheme:

<u>FEATURES</u>	<u>COLORS</u>
Additions, Bench marks, wye level elevations, crosses	Black
Deletions	Green
Drainage features	Blue
Political boundary name	Purple
47. The position and amount of detail on this manuscript is complete and accurate.	
48. The horizontal accuracy traverse was run in quadrangles T-8174 and T-8175.	

The vertical accuracy test was run in quadrangle T-8174, on which the contouring was done by the same topographer, as on this sheet.

Submitted by

Orvis N. Dalbey
Orvis N. Dalbey,
Photogrammetric Aid

Approved by

F. L. Gallen
F. L. Gallen, Chief of Party

T-8182

Oranecock, Va.

Dec. 16, 1942

The positions given have been checked after listing

Chief of Party.

GENERAL LOCALITY	CHESAPEAKE BAY, VA.	POSITION							METHOD OF LOCATION	DATE OF LOCATION	HARBOR CHART	INSHORE CHART	OFFSHORE CHART	CHARTS AFFECTED
		LATITUDE		LONGITUDE		DATUM								
		°	'	°	'		D. P. METERS							
CAPE CHARLES CITY FRONT LIGHT		37	14	1427	76	01	725	N.A. 1927	Sextant	1942	X		1222	
CAPE CHARLES CITY REAR LIGHT		37	14	1664	76	01	592	"	"	1942	X		1222	
Admiralty of Entrance Range 540 true OLD PLANTATION FLATS LIGHTHOUSE (Old Plantation Flats Lighthouse 2)		37	13	1329.2	76	02	1238.6	N.A. 1927	Triangulation	1939	X		1222	

Chart letter 14-1943
LIST OF PERMANENT (NON-FLOATING)
AIDS TO NAVIGATION. SHEET T-8182

LANDMARKS FOR CHARTS

TO BE CHARTED
TO BE DELETED } STRIKE OUT ONE

I recommend that the following objects which have ~~not~~ been inspected from seaward to determine their value as landmarks, be charted on ~~(deleted from)~~ the charts indicated.

The positions given have been checked after listing.

K. S. Curdsey

Tampa, Florida

November 18,

1942

K. G. Crosby

Chief of Party.

[illegible]

This form shall be prepared in accordance with 1934 Field Memorandum, "LANDMARKS FOR CHARTS." Positions of charted landmarks and nonfloating aids to navigation, if redetermined, shall be reported on this form. The data should be considered for the charts of the area and not by individual field survey sheets. Information under each column heading should be given.

GEOGRAPHIC NAMES FOR T-8182

Allegood Pond ✓

Costins Pond ✓

Elliot's Creek ✓

Old Plantation Creek ✓

Pond Drain ✓

RECORDS

Between January, 1942 and July, 1944, this Bureau completed 323 quadrangles. These maps have been published, or are in the process of being published on scales of 1:31,680 or 1:25,000. This series of quadrangles includes a land area of approximately 15,000 square miles. Incident to this work, a considerable volume of survey records and data has accumulated which will be filed for future reference. This material is filed as follows:

Registered and Filed in the Vault

Cloth-mounted copy of the published quadrangle.
published quadrangle at 1:20,000 scale
Black and white cloth-mounted copy of the map
manuscript. This copy is filed to preserve
original survey detail shown on the manuscript
at 1:20,000 scale which may not have been shown
on the published sheet. For ~~political-boundaries~~,
woodland, ~~marshy-and-swamp-limits~~, refer to the
published quadrangle for the finally adopted
positions.

Descriptive Report.

Filed in the Photogrammetric Section - Surveys Branch

Field inspection photographs.

Contoured photographs (on which planetable contouring work was performed.)

Field edit sheet.

Descriptions of recoverable topographic stations (Form 524), filed in Reviewing Unit.

Supplementary traverse and level records.

Field notes, computations, lists of positions, and tabulations of results of horizontal and vertical accuracy tests.

Reproduction proof.

Correction sheet (copy of quadrangle showing in red changes to be made when next printed.)

Check lists of work performed on each sheet in the Washington Office during review, drafting, edit, and reproduction.

Original celluloid manuscript.

Copies of specifications and all instructions to field parties and field offices.

Filed in Reproduction Branch

Glass negatives of the color separation drawings.

Filed in the Library

~~Special report on field work by Commander K. T. Adams, 1944.~~

Special report on office work by B. G. Jones, 1944.

Season's report on field work by Commander F. L. Gallen, 1944.

Season's report on field work by Commander R. L. Schoppe, 1944.

Delivered to the Army Map Service in accordance with the contract

Film negatives and film positives of the color separation drawings.

All color separation drawings.

~~Original celluloid manuscript.~~

A correction sheet consisting of a copy of the first edition of the quadrangle with notes in red indicating changes desirable at the next printing.

DIVISION OF CHARTS

SURVEYS BRANCH

REVIEW OF AIR PHOTOGRAPHIC SURVEY T-8182

ELLIOTS CREEK QUADRANGLE

This quadrangle manuscript has been examined for completeness, accuracy, and conformity with the specifications. It is adequate for smooth drafting, reproduction and publication. Revisions found to be necessary in this office are discussed on the next page.

Horizontal and Vertical Accuracy

The nearest horizontal accuracy test is described in the descriptive report T-8181. There is no vertical accuracy test anywhere in this area.

Previous Surveys

This manuscript has been compared with the following previous topographic surveys of this Bureau and other agencies. This map is satisfactory to supersede the previous surveys over the common area.

T-495	1:20,000	1852-88
T-1202a	1:20,000	1869-88
T-1203	1:20,000	1869-88
T-2676	1:20,000	1904-05

Comparison with Nautical Charts Nos. 1222

The manuscript has not been applied to the charts at the date of this review. The following comments are pertinent to the compilation and correction of nautical charts:

The details of T-8182 are complete and adequate for chart correction.

The following revisions of the map manuscript were found to be necessary and were accomplished as a part of this review:

Only changes of a minor nature were necessary during the review of this map manuscript.

Reviewed Feb. 18, 1943 By Ray E. Elkins
under direction of D. H. Benson *per H.M.*

Inspected by B. G. Jones *B.G. Jones 8/46*

Examined and approved:

K.T. Adams
Chief, ~~Surveys Branch~~
Division of Photogrammetry

Chief, Topography Section

Robert W. Knox
Chief, Div. of Charts
Robert W. Knox
Chief, Nautical Chart Branch
Raymond E. Gorman
Chief, Div. of Coastal
Surveys

Remarks.

Decisions

1	This ^m nae has been referred to USGB for decision with respect to the form ELLIOTS Creek: apply	372760 U.S.G.B. Decision
2	Elliot's pending its decision.	"
3		"
4		"
5		"
6		371759
7		USGB
8		
9		
10		
11		
12		
13		
14		
15		
16		
17		
18		
19		
20		
21		
22		
23		
24		
25		
26		
27		

GEOGRAPHIC NAMES

Survey No. T-8182

ELLIOTS CREEK quadrangle

Name on Survey *ebb*

	On Chart No.	On previous survey No.	On U. S. quadrangle Maps	From local information	On local Maps	P. O. Guide or Map	Rand McNally Atlas	U. S. Light List	
A,	B,	C,	D	E	F	G	H	K	
✓ <u>Elliot's Creek</u> ✓									1
✓ <u>Old Plantation Creek</u> ✓									2
✓ <u>Old Plantation Flats Lighthouse</u>									3
✓ <u>Allegood Pond</u> ✓									4
✓ <u>Costin Pond</u> ✓									5
✓ <u>Pond Drain</u> ✓									6
✓ <u>Chesapeake Bay</u> ✓									7
									8
									9
									10
									11
									12
									13
									14
									15
									16
									17
									18
									19
									20
									21
									22
									23
									24
									25
									26
									27

RECEIVED
L. HECK
11/6/43

Review T-8182

ELLIOTS CREEK QUADRANGLE

Comparison with other surveys and maps

T-495 1:20,000 1852-88

T-1202a 1:20,000 1869-88

T-1203 1:20,000 1869-88

T-2676 1:20,000 1904-05

Changes in the position of the shore line was noted in comparing with the above surveys, the maximum being 150 meters.

The 20 & 40 foot contours of T-2676 differ with those of T-8182 by 200 meters in position. These are close to the water and appear to be old sand dunes.

T-8103 is complete and supersedes the above surveys for charting purposes.

There are no contemporary surveys of this Bureau within the area covered by T-8182.

Nautical Charts

1222 1:80,000 printed 8-5-42

The details of nautical chart 1222 are from the 1904 survey - T-8182 has not been applied.

Published Quadrangles

Elliot's Creek 1:62,500 W.P.A. revision of 1908 (Army)

This Quad shows only planimetric details; which agree closely with those of T-8182.

Detailing

Row of piling added from field inspection photo. Other rows of piling appear to exist in this area - They are visible only on single photographs and therefore have not been detailed.

Reviewed Roy E. Elkins
2-19-43