6002

ORIGINAL

Form 504
Ed. June, 1928

DEPARTMENT OF COMMERCE

U. S. COAST AND GEODETIC SURVEY

R. S. Patton, *Director*

State: N. C.

DESCRIPTIVE REPORT

Topographic / ~~*Hydrographic*~~ *Sheet No.* C 6002

LOCALITY

Jumping Run to Bogue Inlet

19 33

CHIEF OF PARTY

Herman Odessey

U. S. GOVERNMENT PRINTING OFFICE: 1933

6002

DESCRIPTIVE REPORT
to accompany
TOPOGRAPHIC SHEETS- - - A,B,C,D,E.
Back Sound to New River Inlet, N. Carolina.

PROJECT HT - 127, 1933.

DATE OF INSTRUCTIONS December 29, 1932.

CHIEF OF PARTY Herman Odessey, H.& G.Eng., Comm'd'g. Ship GILBERT.

TOPOGRAPHER S. B. Grenell, Jr. H.& G.Engr.

CONTROL The control for the topographic survey consisted of second and third order triangulation executed in 1908, 1914, and 1927, supplemented and revised by a second order revision survey executed in 1933 and carried in advance of the topography.

INSTRUMENTS, SHEETS, etc. The standard alidade, telemeter rods and plane table equipment were used with the exception of a new type aluminum-mounted sheet with a special board and clamps. These sheets proved to be exceptionally adapted to this type of work in as much as there was absolutely no projection distortion. The new type board and clamps proved to be convenient in the field.

PURPOSE OF SURVEY Before the topography was begun, the entire area covered by this survey was photographed with the five-lens, aerial camera. The center prints arrived in the field while work was being done on the first sheet and from then on the topographer carried these prints in the field as an aid in selecting control points. Since it was understood that all detail would be transferred from the prints to the sheet at a later date, no traverse was run by the topographer to fill in extensive detail, but, after a careful inspection of the prints an effort was made to locate on the sheet - for each adjoining print - at least two detailed features which could be identified on the print. At least two points on a print serve as a basis for scale reduction and orientation and thus make it possible to transfer all detail required from the print directly to the sheet.

INSPECTION OF PHOTOGRAPHS As noted in the paragraph above, adjoining prints were taken in the field by the topographer each day and carefully checked with the area covered. Prominent objects could be easily identified and detailed notes were made directly upon the photographs to aid the com- the compiler in determining the following features: high and low water line, vegetation, mud and sand flats, marsh, fast land, cultivation, fences, types of roads and trails, bridges, culverts, streets, railroad tracks, tanks, etc.

In addition to the daily field inspection the topographer frequently took the prints on inspection by automobile and thus by driving along the inland roads much detailed notation could be made for areas not visible from plane table set-ups or from the water.

For certain features, located for control purposes, it was necessary to prepare a sketch book for noted on measured distances to prominent objects. This was particularily true for church steeples and tanks located by triangulation and referenced to buildings, center lines of streets, etc. which show clearly on the prints. This sketch book will be forwarded with the photographs.

NOTATIONS ON SHEETS;
INKED DETAILS When prominent details for control could be identified at or near triangulation stations, set-ups were made at these stations, but for intermediate points it was necessary to work three point fixes. The triangulation control was admirably suited for this type of plane table location and it was always possible to check a three point fix with additional resections; thus assuring a high degree of accuracy in location. From these set-ups the required details were carefully rodded in and notes made on the prints to aid in identification.

All details inked on the sheets were carefully rodded in and no field sketching was done.

Many triangulation stations used for field control have been omitted from the inked sheets because they can not be identified in the prints, have no connection with control data shown, and would obscure details to be added later. The triangle has been omitted and only the center point shown in red for many stations in order to avoid obscuring control details.

All lighted beacons, located by triangulation, have been plotted on the sheets and many of these have been marked on the prints. By stereoptican investigation many more of the beacons may be identified in the office.

Beside each inked detail on the sheet appears an encircled number in pencil. This is the number of the print on which were made the field noted relative to that particular detail. In addition, penciled notes have been made to aid in identifying details which could not be easily shown by a symbol: i.e. 'lone tree', 'white sand mound', 'bushes', 'small pond', etc.

To aid in orienting prints the center lines of roads, railroads, and bridges have been shown in pencil. Also on long tangents the edges of the dredged cut have been shown by a dotted pencil line as an aid to the compiler. Occasional pencil cuts to objects, which will show on the wing prints, have been left to aid in orienting these prints.

A blueprint of the progress sketch, which shows the sheet layout and all triangulation control, is attached to this report.

For the information of the reviewer, paragraph 8 of of the Instructions dated December 29, 1932 is quoted herewith: " As it is planned to photograph this region in the near future with the 5-lens camera, your topographic work shall be confined, in general, to supplementing the triangulation as necessary (1) to furnish adequate control for reducing the photographs and (2) to provide that all U.S.Engineer stations and all aids to navigation are located."

The form used by the reviewer in checking the topographic sheets in the Washington Office was received aboard the GILBERT after the topography had been completed and the party had left the field. When the sheets were inked, the form was carefully checked over, and the following explanation is given for the omissions noted.

Magnetic Meridians:

Due to an oversight no magnetic meridians were drawn on the sheets in the field. The area covered by these sheets is very flat, and there is no indication of rock or mineral deposits to suggest the possibility of local attraction.

Vertical Control:

Since these sheets were intended primarily for photo control, no attempt was made to secure elevation data.

Geographic Names:

Few geographic names have been inked on the sheets to avoid interfering with detail to be added by the compilers. Enquiry, made while the field work was in progress, showed that the names are correct as charted.

SPECIFIC NOTES, SHEET - C.

LIMITS Jumping Run to Bogue Inlet.

This sheet has two projections dividing the area equally and thus making it possible to show a greater extent of canal and coast line on one sheet.

PROCEDURE The work continued from a junction with sheet B on the east to the western limit of sheet C at Bogue Inlet. Set-ups were made at triangulation stations and intermediate points where it was possible to work a strong fix and rod in control detail.

The control points along the north shore of Bogue Sound are shown on the center prints but all of the south shore and outside beach falls on the wing prints which were not sent to the field. The topographer used great care in selecting the control points for the south shore using only such details as he felt sure would show clearly in the prints.

There are sufficient pencil notes on the details to assure identification.

Approved:
Herman Odessey
Herman Odessey,
Chief of Party.

Respectfully submitted,
S. B. Grenell
S. B. Grenell,
Topographer.

This is to certify that topographic sheet C, covering the survey of Bogue Sound from Jumping Run to Bogue Inlet, has been inspected and is approved.

Herman Odessey

Herman Odessey, H.& G.E.,
U.S.Coast & Geodetic Survey,
Commanding Ship GILBERT.

Plane Table Positions Sheet C.

Letter	Approx. Lat.	Approx. Long.	Description of object
A	34 - 41.5	76 - 53.4	Northrenmost house on piling
B	34 - 41.8	76 - 59.7	Duck blind on south east corner of dock
C	34 - 41.0	77 - 01.8	Old ruined house under large oak tree
D	34 - 40.7	77 - 04.2	Prominent chimney, SE corner of house

Form 567
Ed. Dec., 1929

DIVISION OF CHARTS, FILE NO. ____

Duplicate

DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

LANDMARKS FOR CHARTS

Norfolk, Va.

August 21, 1933

DIRECTOR, U. S. COAST AND GEODETIC SURVEY:

The following determined objects are prominent, can be readily distinguished from seaward from the description given below, and should be charted.

Herman Odessey
Chief of Party.

DESCRIPTION	POSITION				DATUM	METHOD OF DETERMINATION	CHARTS AFFECTED
	LATITUDE		LONGITUDE				
	° ′	D. M. METERS	° ′	D. P. METERS			
Salters Pass Church Spire	34-45	446.15	76-54	432.53	N A.	Trian - gulation	1234
Bogue Sound Beacon No. 7A	34-43	543.0	76-52	1435.0	N A	Topo	1234
" " " No. 9	34-43	279.08	76-53	1341.08	N A	Trian- gulation	1234
" " " No. 9A	34-43	26.0	76-54	1197.0	N A	Topo	1234
" " " No.11	34-42	1632.31	76-55	1016.94	N A	Trian- gulation	1234
" " " No.11A	34-42	1216.0	76-56	763.0	N A	Topo	1234
" " " No.13	34-42	728.58	76-57	698.25	N A	Trian- gulation	1234
" " " No.13A	34-42	511.0	76-58	425.0	N A	Topo	1234
" " " No.15	34-41	1691.41	76-59	328.45	N A	Trian- gulation	1234
" " " No.15A	34-41	1063.0	76-59	1510.0	N A	Topo	1234
" " " No.17	34-41	438.20	77-00	1131.24	N A	Trian- gulation	1234
" " " No.19	34-40	1065.55	77-02	375.81	N A	"	1234

A list of objects which are of sufficient prominence for use on the charts, together with a description of the same, must be furnished in a special report on this form, and a copy of such report must be attached by the Chief of Party to his descriptive report. The selection, determination, and description of these points are of primary importance.

The description of each object should be short, but such as will identify it; for example, standpipe, water tower, church spire, tank, tall stack, red chimney, radio mast, etc. Generally, flagstaffs and like objects are not sufficiently permanent to chart.

U. S. GOVERNMENT PRINTING OFFICE: 1931

Form 537a
Ed. Nov., 1929

DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

REG. NO. 6002

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. C

REGISTER NO. 6002

State North Carolina

General locality Bogue Sound ~ Large

Locality Jumping Run to Bogue Inlet

Scale 1:20,000 Date of survey March, 19 33

Vessel GILBERT

Chief of party Herman Odessey

Surveyed by S. B. Grenell

Inked by S. B. Grenell

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

Contour, Approximate contour, Form line interval - - feet

Instructions dated December 29, 19 32

Remarks: Photo control sheet.