

8317

Original

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

Form 504

U. S. COAST AND GEODETIC SURVEY
DEPARTMENT OF COMMERCE

DESCRIPTIVE REPORT

Type of Survey Air Photographic Topographic

Field No. _____ Office No. T-8317
YORKTOWN QUAD.

LOCALITY

State Virginia

General locality York River

Locality Lee Hall

194 4

CHIEF OF PARTY

F. L. Gallen
Fred. L. Peacock

LIBRARY & ARCHIVES

DATE _____

B-1870-1 (1)++

8317

DATA RECORD

T-8317

Quadrangle (II): $7\frac{1}{2}$ minute YORKTOWN
N 3707.5 - W 7630

Project No. (II): C.S. 289

Field Office: Suffolk, Va.

Chief of Party: F. L. Gallen

Compilation Office: Baltimore, Md.

Chief of Party: Fred. L. Peacock

Instructions dated (II III):

Mar. 13, Oct. 20, and Nov. 25, 1943

Jan. 18, 1944

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

Completed survey received in office: 5/26/44

Reported to Nautical Chart Section: 5/27/44

Reviewed: 7/6/44

Applied to chart No.

Date:

Redrafting Completed: 8/28/44

Registered: ~~7/44~~ 7/46

Published: 1944

Compilation Scale: 1:20,000

Published Scale: 1:25,000

Scale Factor (III): None

Geographic Datum (III): N. A. 1927

Datum Plane (III): Mean Sea Level

Reference Station (III): HALSTEAD, 1932, r.1942

Lat.: $37^{\circ} 13' 08.832''$ (272.3m) Long.: $76^{\circ} 33' 46.543''$ (1147.5m) ^{Adjusted}
_{Unadjusted}

State Plane Coordinates (VI): Va. South Zone

X = 2,564,005.65 ft. Y = 328,283.56 ft.

Military Grid Zone (VI)

"A"

"B" overlapping

PHOTOGRAPHS (III)

<u>Number</u>	<u>Date</u>	<u>War Time</u>	<u>Scale</u>	<u>Stage of Tide</u>
12858 to 12860 Inc.	12/31/42	10:57 A.M.	1:20,000	0.3' above M.L.W.
12687 to 12690 "	12/28/42	3:14 P.M.	1:20,000	2.0' above M.L.W.
12891 to 12894 "	12/31/42	11:48 A.M.	1:20,000	At Mean Low-Water

Tide from (III): Predicted tables, Reference Station, Hampton Roads with corrections for Yorktown, Va. and Hog Pt. Va.

Mean Range: 2.3' **Spring Range:** 2.7'

Camera: (Kind or source) U.S. Coast & Geodetic Survey nine lens camera
(focal length 8.25 inches)

Contouring and

Field Inspection by: Joe N. Henningsen, Orvis N. Dalbey, **date:** Dec. 1943, Jan. 1944
Marvin C. Jenkins, Morris W. Burr Feb. 1944
Arnold M. Jylha

Field Edit by: **date:**

Date of Mean High-Water Line Location (III): Same as date of photographs

Projection and Grid ruled by (III) P.J.H., J.T.B. & B.R.C. **date:** 2/28/44

" " " **checked by:** L.U.E. **date:** 2/28/44

Control plotted by: Sidney Mittleman **date:** 4/9/44

Control checked by: Henry P. Eichert **date:** 4/15/44

Radial Plot by: Joseph Steinberg **date:** 4/15 to 4/17/44

Detailed by: D.L. Greene, Chas. P. Palumbo and Wm. N. Brown **date:** 5/6 to 5/25/44

Reviewed in compilation office by: Edward Snyder **date:** 5/24 to 5/25/44
Albert C. Rauck, Jr.

Elevations on Field Edit Sheet

checked by: *K. H. M. M. M.* **date:** 7-3-44

STATISTICS (III)

Land Area (Sq. Statute Miles); 50

Shoreline (More than 200 meters to opposite shore); 8 Statute Miles

Shoreline (Less than 200 meters to opposite shore); 13 Statute Miles

Number of Recoverable Topographic Stations established; 18
(all bench marks)

Number of Temporary Hydrographic Stations located by radial plot;

Leveling (to control contours) - miles;

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.289-A, 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.

C O P Y

NAVY DEPARTMENT
BUREAU OF ORDNANCE
Washington, D. C.

(Ad5)
NT3-2/L11-2(11)

22 December 1943.

From: The Chief of the Bureau of Ordnance
To: The Commanding Officer
Naval Mine Depot
Yorktown, Virginia
Subject: Request for Survey of Naval Mine Depot, Yorktown
Reference: (a) CO, Naval Mine Depot, Yorktown, Va. ltr.
MI-I (Ad1) Serial 7709 to BuOrd dated
3 Dec. 1943.

1. In reply to reference (a) approval of the action of the Commanding Officer as outlined in paragraph 2 of that reference is hereby given. It is suggested that all data obtained be cleared by the Commanding Officer before being released to the Department of Commerce.

G. F. HUBBARD, JR.

/s/ S. G. Atkinson
By direction

LGQ

120643 00569

COPY

U. S. Naval Mine Depot,
Yorktown, Va.

EC/lh

N1-1
Serial 8112
(Ad2)

28 December 1943.

Lt. Comdr. F. L. Gallen, U.S.C. & G.S.,
Department of Commerce,
U. S. Coast and Geodetic Survey,
Washington, D. C.

Dear Sir:

Reference is made to the Commanding Officer's letter of 3 December 1943 concerning your request for permission to make certain surveys on the Naval Mine Depot and forwarding copy of letter to the Bureau of Ordnance asking approval therefor.

Enclosed herewith is copy of reply to the subject letter which is self-explanatory. It is requested that the data obtained by your engineers be cleared by the Executive Officer as suggested by the Chief of the Bureau of Ordnance.

By direction of the Commanding Officer:

L. J. Manees,
Commander, USN,
Executive Officer.

Encl: 1 HW

FIELD INSPECTION REPORT
QUADRANGLE T-8317
Project CS-289-A
F. L. Gallen, Chief of Party

1. DESCRIPTION OF AREA:

The area covered by this quadrangle lies in York, Warwick and James City counties, Va., and is at the narrow part of the peninsula formed by the York and James Rivers. Military reservations cover a large portion of the area. The Naval Mine Depot covers a large section at the northern part of the quad; the southwestern portion is almost entirely within the boundaries of Fort Eustis, and the southeastern portion is covered by Camp Patrick Henry. The Colonial National Monument, which is a historical park covering the Yorktown Battlefield, covers a large portion of the eastern and northeastern portion of the quadrangle. The land area, in general, is heavily wooded and has large swamp areas which drain, by small creeks, to the York and James Rivers. The northern section of this quadrangle has elevations ranging from 3 to 97 feet and is cut up by numerous small runs and creeks. The southern portion is low, flat land with elevations of 3 to 45 feet. Malberry Island, a portion of which covers the southwestern section of the quad, is a very low, flat, marshy and heavily wooded area. It is wholly within the limits of Fort Eustis Military Reservation, and is used for gunnery practice by Fort Eustis and bombing grounds for Langley Field. The area covered within the quadrangle limits slopes, generally, from north to south and is drained by Skiffs Creek, Warwick River and its tributaries, and Felgates Creek, which is to the north of the quadrangle. Yorktown, which is in the northeast corner of the survey, is the county seat of York County and is served to the south by U. S. highway #17. Ferry connections at Yorktown serve this unincorporated town with an outlet to the north, via Gloucester Point. Denbigh is a small village in the southeast section and is the county seat of Warwick County. It is located on highway #60, which is one of the main highway lines between Richmond and Newport News. Lee Hall is a small village located about the center of the quad and on the main line of the Chesapeake and Ohio Railroad between Newport News and Richmond. Lee Hall is the town nearest to Fort Eustis. The main highway, #168, is a four-lane road that runs parallel to the Chesapeake and Ohio Railroad. The two outside lanes are concrete and the inner lanes are macadam.

2. COMPLETENESS OF FIELD INSPECTION:

The field inspection is thought to be complete. All topographic features have been classified. The color scheme for buildings that were inked on the topo photographs is as follows: dwellings (red), barns (purple), stores (green) and public buildings (blue). Only the buildings inked in are to be shown on the map drawing. Trails are shown by a dashed line, thus-----, and generally labeled "trail". The drainage and marsh areas as inked on the photographs is correct as shown. Highways and roads have been classified and shown on the topo photographs. It is thought that all necessary information is shown on the field sheet that should be shown on the map drawing. Classification of bridges and culverts which have been designated on the photos, and any other small items erroneously omitted will be noted by the field edit party. Information on the various military reservations on this quadrangle is discussed under this heading on the next page of this report.

2. COMPLETENESS OF FIELD INSPECTION (CONT.):

NAVY MINE DEPOT--No map, except a boundary map, was available for the Navy Mine Depot. This map was obtained and used, on the premises, to locate the depot boundaries on photograph 12860; and these boundaries are correct as shown. By order of the Executive Officer, Commander L. J. Manees, no detail may be shown inside the reservation except the Marine Barracks, Lee Mansion, contours and drainage, all roads visible on the photographs, except spur roads into the individual mine magazines which show up well on the photos, and a small group of buildings just east of Lackey. The roads that may be shown on the map drawing have been classified. The housing project just east of Lackey has been field inspected in the regular color scheme. In general, all information that has been inked on the photographs for the Navy Mine Depot may be shown, and has been approved by the Executive Officer in accordance with the attached letter which was received from the Navy Department-Bureau of Ordnance, Washington, D. C.

PORT EUSTIS MILITARY RESERVATION--A large part of Fort Eustis Military reservation falls in this quadrangle. It was possible to secure an up to date plan layout of the industrial section, and an older copy of the boundary map. Part of the boundaries have been put on topo photograph 12858 and part of them remain to be put on by the compilation office. However, no difficulty should arise in putting on the remaining boundary line, as the boundary map shows all distances and direction. Only a small part of the boundary remains to be completed, and it is in the heavily wooded section in the northwest corner of the reservation. A note to the effect that no railroads or water systems may be shown within the reservation is on the plan layout. Any other items not to be shown are crossed out. This is in accordance with instructions from Major Houck of the Army Engineers, Fort Eustis. Any other information shown on these maps that are furnished may be used to any advantage that the compilation office sees fit. Detail shown on the photographs for Mulberry Island is complete.

CAMP PATRICK HENRY MILITARY RESERVATION--A plan layout of Camp Patrick Henry was obtained from Lieut. Col. T. H. Fieker, Director of Security, and a note as to the detail to be shown on the map drawing has been written in red pencil by him. Boundaries of the reservation have been shown on photo 12690. They are correct as shown. An area enclosed by a red dashed line, near the center of photo 12691, has a note to the effect that "The detail within the dashed line contains secret information and is to be shown as a wooded area by order of Lieut. Col. T. H. Fieker, Director of Security, Camp Patrick Henry should not be overlooked." All information shown on the layout may be used to the best advantage by the compilation office, in accordance with the note in the lower right hand corner of the map.

COLONIAL NATIONAL MONUMENT (YORKTOWN BATTLEFIELD VIRGINIA)--A fairly recent map of this area was obtained from the park headquarters at Yorktown, Va. It was not possible to secure a map of this park until the contouring was nearly complete. However, the contours were found to agree well with the exception that our field parties did not show the earthworks and redoubts that are shown on the map obtained. This may be explained by the fact that the map secured of the park was on a scale of 1:9600 or 800 feet to one inch. The contour interval is 5 feet. The map is on a standard polyconic projection, North American datum, and the boundaries of the park shown are tied in, in reference to this datum. It is thought that when compiling this area, either the contours should be taken from the map secured of the park, as the survey is fairly recent and on a closer interval than ours, or additions from the park survey, such as, redoubts, earthworks, and more minor details not shown by our topographers should be added to our field

This detail falls on T-8312 and T-8313

2. COMPLETENESS OF FIELD INSPECTION (CONT.):

inspection information. *A number of boundary monuments have been located on the photographs. Part of the boundary has been drawn in. However, it is thought that, in view of the fact the boundaries are tied down to a projection, a much more accurate location may be obtained by transferring them directly from the map to our compilation. It is suggested that every use be made of this map in regards to contours, boundaries, minor information and location of traverse stations that were recovered by this party. The map has been checked and no errors were found in the above detail.

3. INTERPRETATION OF THE PHOTOGRAPHS: *Map used for boundaries, except between Naval Mine Depot + Yorktown Battlefield which apparently has been revised so that the two boundaries no longer overlap. Also the Naval Mine School, formerly a fuel depot, no longer overlaps the Battlefield boundary.*

The photographs for this quadrangle are typical to corresponding areas of this type. The evergreens show up in a darker color than the deciduous trees and are generally found on the higher ground. The bottoms of the larger drains have only deciduous trees growing in them and show up in a light gray, generally, bordered by a mixture of evergreen and deciduous trees. However, ordinarily, where perennial drainage stops no definite distinction in the surrounding vegetation can be noticed to the upper limits of the drains. As a whole, the marsh areas are easily identified. In some of the more heavily wooded areas good stereoptic effect was not obtained, due to the density of tree growth. In areas like this, a number of the streams were located by planetable.

4. HORIZONTAL CONTROL:

The horizontal control stations for this area were recovered and pricked on photographs which were submitted to the compilation office in February, 1944.

5. VERTICAL CONTROL:

Bench marks were recovered and pricked on photographs which were submitted to the compilation office in February, 1944. Supplemental level lines were run over the main roads in this quadrangle to provide sufficient control for the planetable party. These lines were run by a separate four-man party and were assumed to be correct. Lines with a closure of less than .35 of a foot were not adjusted. Lines with a closure of more than .35 of a foot and less than one foot were adjusted. No lines had a closure with more than .53 of a foot error.

6. CONTOURS AND DRAINAGE:

Contouring was carried on by a four-man planetable party using standard Coast and Geodetic Survey methods and equipment. The first operation in contouring was to establish a line of magnetic declination on the photo. It was established by orienting the planetable along a long, straight stretch of road, that was free of magnetic attractions, near the center of the photo. The declinatoire was used thereafter to orient the table where it was impossible to orient by other means. The date and time of day were recorded near the line of declination. All contouring was done on the photographs. Planetable shots and cultural detail were used whenever possible to locate the contours. Hand level lines and pacing were used to locate and space the contours wherever the woods were too thick to use the planetable efficiently. The larger portion of contours and elevations shown were taken by planetable shots. The

* These monuments as shown on photographs do not check with boundaries shown on Yorktown Battlefield map 1960 1933, and have been deleted from manuscript as of doubtful position.

secondary drainage and flow lines were located by stereoscope and checked in the field. The stereoscope was found very helpful in shaping the contours in this area. Closed contours were occasionally shown below the contour interval in order to express properly the topography of the area. Planetable traverses were tied in to pre-determined elevations. None of the closures were over 0.6 of a foot. Vertical control for some hand level lines was obtained from the tidal marsh areas which was pre-determined to be 1.8 feet above mean sea level. Tracings on acetate were taken from the photo and used to locate elevations on ridges and on drains bordering the tidal marsh areas. It was found that most drainage above the perennial had to be put in by field inspection and checked by planetable for location. In numerous instances contours were set in drains and on ridges and elevations not shown. In these cases the contours were set with the hand level and checked at intervals with actual planetable shots.

7-13. The items under these headings in the field inspection report do not apply to this area.

14. ROAD CLASSIFICATION:

Roads were classified according to instructions issued by the Army War College, Washington, D. C.

15. BRIDGES AND CULVERTS:

Classification of bridges and culverts will be done on the field edit sheet. Bridges have been indicated on the field sheet along with main culverts.

16. BUILDINGS AND STRUCTURES:

All buildings to be shown on the map drawing have been indicated in the regular color scheme mentioned in Part 2. Any building not inked is to be deleted. These buildings are ones so badly "tumbled down" that they are beyond repair and will not last for more than a short period of time, or else they are too small to show.

17. BOUNDARY MONUMENTS AND LINES:

Refer to Part 2 for discussion of the boundary lines and monuments of the military reservation and park boundaries. The quadrangle lies in York, Warwick and James City Counties. No map of York or James City Counties was available. However, it was possible to secure a map of Warwick County which was of a 1942 revision and published by the Public Works Department of Warwick County on a Polyconic Projection. Warwick County and York County join each other and, therefore, no map of York county was necessary. This is true with the exception of the small bit of county line between York County and James City County in the northwest corner of the quadrangle. This small bit of county line should be secured by the field edit party when doing the field edit. This may be secured from original files in the courthouse at Williamsburg, Va. A number of county line markers were located on the York-Warwick County line, but it is suggested that the county map of Warwick

County which is submitted with the photographs for the quadrangle be transferred directly on to the map drawing in reference to the polyconic projection that it is printed on. Any county line that has been located on the photographs for this quadrangle between York and Warwick Counties should be ignored. County line markers and monuments should be in agreement, and should be tied in with the county line map submitted. //

18. GEOGRAPHIC NAMES:

Geographic Names for this quadrangle are the subject of a special report by A. J. Wraight in Project CS-289-A. ✓*

19. JUNCTIONS:

Junctions with quadrangle T-8318 on the west, T-8312 on the south, and T-8316 on the east have been made and are in agreement. There are no recent surveys to the north and junction with T-8326 should be made by the compilation office.

20. PHOTOGRAPHS USED:

Photographs used in surveying this area were: Nos. 12687, 12688, 12689, 12690, 12857, 12858, 12859, 12860 and 12892.

Approved and forwarded by:

F. L. Gallen

F. L. Gallen
Chief of Party

Submitted by:

Marvin C. Jenkins

Marvin C. Jenkins
Sr. Photo. Aid.

SHEET NO. T-8317

Breakdown of Field Completion Operations

SHORELINE:---Joe N. Henningsen, Asst. Photo. Eng.---Jan. 1944.
 Orvis N. Dalbey, Senior Photo. Aid.---Jan. 1944.
 RECOVERY:---Marvin C. Jenkins, Sen. Eng. Aid.---Jan. 1944.
 Morris W. Burr, Sen. Photo. Aid.---Dec. 1943 & Jan. '44
 BOUNDARIES:---Joe N. Henningsen, Asst. Photo. Eng.---Jan. 1944.
 FIELD INSPECTION AND CONTOURING:---as shown below. Dec. 1943 - Febr. 44

O.
N.
Dalbey

Arnold M. Jylha

Marvin C.
Jenkins

Morris
W.
Burr

Jenkins

Arnold M.
Jylha

Morris W.
Burr

Morris W.
Burr

Water

Marvin C.
Jenkins

Orvis N.
Dalbey

26 CONTROL:

The Field Party responsible for the identification of horizontal control in the area of Project C.S. 283 recovered and identified on the 1:10,000 field photographs the following stations:

Those falling within the detail limits:

P.T.S. 29P, 1918 (U.S.G.S.)
P.T.S. No. 14C, 1918 (U.S.G.S.)
P.T.S. No. 16, 1918C (U.S.G.S.)
EUTIS, 1938
FT. EUTIS ALUMINUM WATER TANK, 1932
LEE HALL, BLACK FLAT TOP WATER TANK, 1932
P.T.S. No. 36P, 1918 (U.S.G.S.)
P.T.S. No. 26P, 1918 (U.S.G.S.)
P.T.S. No. 23P, 1918 (U.S.G.S.)
HALSTEAD, 1932, r.1942
P.T.S. No. 33P, 1918 (U.S.G.S.)
SLIDE, 1938
P.T.S. No. 15C, 1918 (U.S.G.S.)
P.T.S. No. 13, 1918C, (U.S.G.S.)
P.T.S. No. 7, 1918C, (U.S.G.S.)
P.T.S. No. 17, 1918C, (U.S.G.S.)
TOWER, near triangulation station CRAWFORD, FLAGFOLE, 1938

Those falling just outside the limits of the Map Manuscript:

DEEP WATER SHOALS L.H., 1870, r.1910, 1938
GROVE ECC., 1932
MULBERRY (U.S.E.) 1930, r.1938

All of the above horizontal control stations were transferred to the 1:20,000 photographs at the Compilation Office.

The Field Party responsible for the identification of horizontal control in the area of Project C.S. 289 recovered and identified on the 1:20,000 field photographs the following stations:

Those falling within the limits of the Map Manuscript are:

26 CONTROL: (Continued)

FORT, 1906, r.1932
YORKTOWN MONUMENT, 1906, r.1911
WATER TANK (LACKEY), 1932
YORKTOWN GASOLINE TANK, 1932, r.1933
GLOUCESTER POINT STEAMBOAT PIER BN., 1932

Those falling just outside the limits of the Map Manuscript are:

NAVY MINE DEPOT, SQUAT TANK, 1942
NAVY MINE DEPOT TANK, 1942
LITTLE RICHMOND WHITE WOODEN TANK, 1932
SARAH CREEK, S.W. BN., 1932
WARWICK RIVER, TOWER, FLAGPOLE, 1938

At many of the above horizontal control stations the Field Parties established field inspection points at well defined points of detail near the stations.

All of the above horizontal control stations were used to establish photograph centers; secondary points and detail points.

27 RADIAL PLOT:

The Radial Plot for this Map Manuscript is part of Main Radial Plot No. 4, Project C.S. 289, the descriptive report for which will be included in the descriptive report of Map Manuscript for Survey No. T-8318, which will be submitted to the Washington Office in the near future.

28 DETAILING:

The field inspection data furnished the Compilation Office for this Map Manuscript was in general, satisfactory. The field inspection data of Project C.S. 283, which was also available for the compilation of this Map Manuscript, aided materially in the delineation of the High-Water Line and adjacent areas.

All detailing was accomplished in accordance with the above field inspection data.

28 DETAILING: (Continued)

Drainage and the limits of marsh areas were verified by stereoscopic examination of the photographs.

The extreme southwest tip of Mulberry Point which would fall in the area of this Map Manuscript for Survey T-8311, has been detailed on this Map Manuscript in order to show it to better advantage. *Do not show on published map*

Contours in the area of Colonial National Monument Yorktown Battlefield, Va., were traced from a printed map of this area, Scale 1:9600, by use of the vertical projector, to the discrepancy overlay so that a comparison may easily be made with the contours shown on the Map Manuscript, which were taken from the field photographs.

The contours shown on the field photographs have not been completed in many cases. These areas have been noted on the discrepancy overlay for completion during the field edit.

29 SUPPLEMENTAL DATA:

The following previous surveys made by the U.S. Coast & Geodetic Survey, were not available to the Compilation Office, namely:

Survey No.	Date	Scale
T-685	1867	1:20,000
T-1266	1871-73	1:20,000
T-1289	1873	1:20,000
T-1289a	1910	1:20,000

A printed map of the Colonial National Monument Yorktown Battlefield, Va. Scale, 1:9600, was furnished the Compilation Office by the Field Party.

Black line prints of Fort Eutis, Va., and Camp Patrick Henry, Va., both Scale, 1" equals 200', were

29 SUPPLEMENTAL DATA: (Continued)

also furnished by the Field Party.

An ozalid print of Map Drawing for Survey No. T-8059, Scale, 1:10,000, was available for comparison purposes.

30 HIGH-WATER LINE:

The approximate stage of tide of all the photographs used in the process of detailing this Map Manuscript, was computed and found to be at or just above, Mean-Low Water. The field inspection data of Project C.S. 283 was of great help in delineating the High-Water Line shown on this Map Manuscript.

31 LOW-WATER AND SHOAL LINES:

Approximate Low-Water and Shoal Lines were not indicated by field inspection data and none could be delineated with any certainty on the office photographs.

32 DETAILS OFFSHORE FROM THE HIGH-WATER LINE:

In the area of Survey No. T-8059, which covers a portion of this Map Manuscript, no additional details offshore from the High-Water Line, other than those discussed in the descriptive report of Map Drawing for Survey No. T-8059, were noted.

In the area outside of the Survey No. T-8059 are several details offshore from the High-Water Line in the York River. These were not indicated by field inspection data and are not visible on the photographs. Appropriate notes have been shown on the discrepancy overlay recommending investigation of these details.

33 WHARVES AND SHORELINE STRUCTURES:

All wharves and shoreline structures indicated in the field inspection data from Projects C.S. 283 and C.S. 289, have been shown. Others visible on the photographs outside the area of Project C.S. 283 and not indicated in the field data of Project C.S. 289, have been shown.

34 LANDMARKS AND AIDS TO NAVIGATION:

See Chart Letter 917(49) Copy enclosed.

The landmarks and aids to navigation in the James River have been discussed in the descriptive reports of Map Drawings for Surveys Nos. T-8059 and T-8070 of Project C.S. 283.

A small portion of the York River falls within the area of this Map Manuscript. This area has not been recently mapped by the U.S. Coast and Geodetic Survey. Shown on Chart No. 492, Scale, 1:20,000, reissued Mar. 6, 1944, in this area are 7 landmarks, namely:

BLACK STACK shown on Map Manuscript as MARINE BARRACKS
BLACK STACK, 1932 L 1943 p 560
FLAGSTAFF shown on Map Manuscript as MARINE BARRACKS,
FLAGPOLE, 1932
CHILNEY shown on Map Manuscript as CHILNEY, 1932
MONUMENT shown on Map Manuscript as YORKTOWN MONUMENT,
1906, r.1911
WINDMILL shown on Map Manuscript as GLOUCESTER POINT
WINDMILL, 1932
COOKS HOUSE
WEST OIL TANK.

See
Ch. Letters
A 998-1-49
A 928-1-49

The first five named were recovered as triangulation stations but were not identified by the Field Party responsible for the identification of horizontal control for Project C.S. 289.

This Compilation Office has not been furnished any data regarding the last two named and it is recommended that the Field Edit Party investigate these two landmarks and make the proper recommendation as to their continuance as charted landmarks.

One fixed aid to navigation appears in the area of the portion of the York River falling within the limits of this Map Manuscript, namely:

GLOUCESTER POINT WHARF Fl. W. 6 sec.

This fixed aid to navigation is also triangulation station GLOUCESTER POINT STEAMBOAT PIER BEACON, 1932.

35 HYDROGRAPHIC CONTROL:

A full discussion of hydrographic control covering the portion of this Map Manuscript falling within the area of Map Drawing for Survey No. T-8059, may be found in the descriptive report for that survey.

The War Mapping Field Party of Project C.S. 289 presumably felt that the landmarks and fixed aids to navigation mentioned in Paragraph 34, met the requirements for recoverable topographic stations in the area not covered by Survey T-8059, Project C.S. 283

36 LANDING FIELDS AND AERONAUTICAL AIDS:

There are no landing fields within the limits of this Map Manuscript and no recommendations have been made by the Field Party concerning aeronautical aids.

37 DISCREPANCY OVERLAY:

A discrepancy overlay has been prepared to accompany this Map Manuscript. On it are notes which are deemed likely to be of assistance during the field edit. The contours taken from the Map of Colonial National Monument Yorktown Battlefield, Va., which according to the field report, agree with the contours shown on the field photographs, have been shown for comparison purposes. A set of general notes is included to aid in the interpretation of symbols shown on the Map Manuscript.

38 GEOGRAPHIC NAMES:

The results of a geographic names investigation have been furnished the Compilation Office on a copy of the U. S. Geological Survey Yorktown, Va. 15 minute quadrangle. There are no disputed names within the limits of this Map Manuscript. A list of undisputed geographic names is attached to this descriptive report. Two names are recommended for deletion.

39 HORIZONTAL ACCURACY:

The horizontal accuracy of this Map Manuscript is believed to be within the limits set forth for well defined and less well defined points of detail for War Mapping Projects. Considerable trouble was encountered from several photographs, subject to one and one-half to two degrees of tilt, during the process of detailing. It is possible that in poorly defined areas where it was not possible to radially plot detail points, that some error may have been made in detailing. Every effort was made during the compilation to prevent any error of this type.

See horizontal accuracy test comparisons filed in Review unit.

40 RECOMMENDATIONS FOR FUTURE SURVEYS:

The planimetry, as shown on this Map Manuscript is believed to be complete, except as noted herein. It is subject to corrections, additions and deletions at the time of the field edit.

41 JUNCTIONS:

The following satisfactory junctions have been made:

To the West with Map Manuscript for Survey No. T-8318
To the South with Map Manuscript for Survey No. T-8312
To the East with Map Manuscript for Survey No. T-8316

No contemporary survey to the North is available to the Compilation Office for junction purposes.

42 REMARKS:

The description of the area as contained in the field report, is adequate. It is assumed that the Field Party in the statement found in the field report that Paragraphs 7 to 13 are not applicable, referred to the portion of this Map Manuscript falling within the area of Project C.S. 283. There is, however, a portion of the York River area falling within the limits of this Map Manuscript which these Paragraphs would apply to.

42 REMARKS: (Continued)

The Compilation Office cannot concur in the statement that the contours shown on the Map of the Colonial National Monument Yorktown Battlefield, Va. agree with those shown on the field inspection photographs by the Field Party.

Corrected by Field Edit Party.

43 RECOVERABLE TOPOGRAPHIC STATIONS:

Form 524 is being submitted for each of 18 recoverable topographic stations, all of which are bench marks. These were radially plotted on the Map Manuscript.

44 COMPARISON WITH EXISTING TOPOGRAPHIC SURVEYS:

Comparison was made with the ozalid print of Map Drawing for Survey No. T-8059, scale 1:10,000, which covers the southwest portion of the area of this Map Manuscript. All common topographic features were in good agreement.

Comparison was made with the U. S. Geological Survey Yorktown, Va. 15 minute quadrangle, scale 1:62,500. Minute comparison was not convenient due to scale difference. A visual comparison shows common detail, especially waterways and the High-Water Line, to be in good agreement. Many new roads and two army encampments are not shown on the U. S. Geological Survey quadrangle.

45 COMPARISON WITH NAUTICAL CHARTS:

Comparison was made with the following U. S. Coast and Geodetic Survey Nautical Charts, portions of which partially cover the area of this Map Manuscript.

Chart No. 492, scale, 1:20,000 issued Nov. 1938, and reissued Jan. 1943, Common topographic features were in good agreement. Two piers shown on the Chart, one at Gloucester Point and the other at Yorktown, could not be seen on the photographs.

Chart No. 495, scale, 1:40,000 issued Aug. 1931, reissued Dec. 1943. The comparison shows the same for this

45 COMPARISON WITH NAUTICAL CHARTS: (Continued)

chart as stated for Chart No. 492.

Chart No. 529, scale 1:40,000, issued Sept. 1940, reissued Dec. 1943. The High-Water Line and other common topographic features are in general fair agreement. A road which extends along the shore from Mulberry Point to Skiffes Creek is not shown on the chart.

Respectfully submitted:

May 25, 1944

D. L. Greene

D. L. Greene

Asst. Photogrammetric Engineer

Charles P. Palumbo

Chas. P. Palumbo

Asst. Engineering Aid

and

William Brown

William Brown.

Tr., Jr. Engineering Draftsman

Map Manuscript, Discrepancy
Overlay and Descriptive Report

Reviewed by:

Edward H. Snyder

Edward H. Snyder

Sr. Photogrammetric Aid

and

Albert C. Rauck, Jr.

Albert C. Rauck, Jr.

Sr. Photogrammetric Aid

Compilation of Map Manuscript
Supervised by:

Joseph Steinberg

Joseph Steinberg

Asst. Photogrammetric Engineer

and

J. Edward Deal, Jr.

J. Edward Deal, Jr.

Asst. Photogrammetric Engineer

Approved and Forwarded:

May 26, 1944

Fred. L. Peacock

Fred. L. Peacock

Commander C. & G. Survey

Officer-in-Charge

Baltimore Photogrammetric Office

FIELD EDIT REPORT
TO ACCOMPANY
QUADRANGLE T-8317
PROJECT CS-289-A-1

F. L. Gallen

Chief of Party

5. The designation and elevation of each bench mark appearing on the map manuscript have been checked and verified. The ^{fly-level} elevations will be checked by the Washington Office.
6. The contours shown on the discrepancy overlay were checked in the field by planetable. In most cases the original C. & G. Survey contours were found to be within the limits required for this project. The vertical error was seldom found to be more than two or three feet, however since the park survey map was contoured on a five foot interval their contours were used in most places. Additions and corrections to both the C. & G. Survey contours and Park Survey Contours are shown on the compilation. The contours now shown are well within the limits required for this project.
46. The field edit was done by visual inspection in the field. All deletions, additions and corrections were made on the manuscript.

The color scheme is as follows:

Additions and corrections	Black
Deletions	Green
Political Boundaries	Violet
Contours	Brown
Drainage	Blue
47. There were several buildings omitted by the compilation office, which were added during the field edit. Several plane table traverses were run to establish control for checking contours in the vicinity of the Yorktown Naval Mine Depot and Yorktown and ~~it was found that~~ several road inter-sections were found to be out of position.
48. Two tests were made to determine the accuracy of contours in this quadrangle. A planetable traverse was run on photograph No. 12860, which had been used for fly-leveling. Spot elevations were taken from the main traverse line and intermediate short traverses run from the main line. The contours were checked by placing a tracing of the contours from the contour photograph over the accuracy traverse. On fly-level photograph No. 12688 a system of five foot contours were run over an area. The contours put in by this manner were accurately located by taking planetable shots on them approximately 100 meters apart. The contours were checked by placing a tracing of the contours from the contour photograph over the accuracy traverse.

48. continued -

Both test traverses were run by Wm. M. Reynolds; on Photograph No. 12860 to check the work of Arnold M. Jyhla, and on Photograph No. 12688 to check the work of M. W. Burr. The latter test falls partly in quadrangle T-8316. The results of both tests were satisfactory and indicated that the contours in this quadrangle comply with the national standard map accuracy requirements. See also paragraph 6 of this report.

The horizontal accuracy test in this quadrangle will be scaled by the Washington Office.

49. The junction with T-8316 on the east has been checked and the following changes should be made on T-8316: At Latitude 37-09.7 the underground pipe line is not shown on T-8317; at Latitude 37-12.0 the road 40 shown on T-8316 is not shown on T-8317; at Latitude 37-13.3 the road 40 shown on T-8316 is not shown on T-8317. * Added to 8317 by reviewer

The junction with T-8312 on the south has been checked and the following should be added.: At Longitude 76-32.8 the "Rd. 173" is Virginia State Highway No. 173.

The junction with T-8318 on the west has been checked.

There is no contemporary survey to the north.

Submitted by:

Orvis N. Dalby per F.H.G.
Orvis N. Dalby
Sr. Photo. Aid

Approved and forwarded by:

F. L. Gallen

F. L. Gallen
Chief of Party

*Horizontal Accuracy Test No. 6 (F 8316 & T-8317)
is found with descriptive report T-8316.*

GEOGRAPHIC NAMES

Undisputed

~~✓~~ Bailey Banks
~~✓~~ Bailey Creek
~~✓~~ Baptist Run
~~✓~~ Blows Mill Run
~~✓~~ Booth
~~✓~~ Chesapeake and Ohio R.R.
~~✓~~ Chisholm Creek
~~✓~~ City of Newport News Reservoir
~~✓~~ Colonial Battlefield Park
~~✓~~ Colonial Parkway
~~✓~~ Denbigh P. C.
~~✓~~ Depot Road
~~✓~~ Felgates Creek
~~✓~~ Fort Crawford (Ruins)
~~✓~~ Fort Eustis
~~✓~~ Gloucester County
~~✓~~ Gloucester Point (pt 2 well)
~~✓~~ Great Run
~~✓~~ Gricks Creek Run
~~✓~~ Hickory Point
~~✓~~ Hoops Landing - on T4312
~~✓~~ Island Creek
~~✓~~ James City County
~~✓~~ James River

~~✓~~ Jones Run
~~✓~~ Lackey
~~✓~~ Lee Hall
~~✓~~ Lee Landing
~~✓~~ Mulberry Island
~~✓~~ National Cemetery
~~✓~~ Old Fort McPherson
~~✓~~ Old Fort
~~✓~~ Oriana
~~✓~~ Pocahontas Trail
~~✓~~ Point of Rocks (not here)
~~✓~~ Reservoir Station
~~✓~~ Shipyard Landing
~~✓~~ Skiffs Creek
~~✓~~ Stony Run
~~✓~~ U. S. Naval Mine Depot
~~✓~~ Warwick County
~~✓~~ Warwick Courthouse
~~✓~~ Warwick River
~~✓~~ Woods Creek
~~✓~~ York County
~~✓~~ York River
~~✓~~ Yorktown
~~✓~~ Yorktown Road

NAMES TO BE DELETED

~~✓~~ Halsteads Point

~~✓~~ Mulberry Island (Town)

T-8317

1

Remarks

Decisions

1		USGB
2		"
3		
4		
5		
6		
7		
8		Railway Guide
9		370765
10		Road Maps
11		"
12		"
13		
14		
15		
16		
17		
18		
19		
20		371764
21	Denbigh is county seat and p.o. Covers also	371765 USGB
22	Settlement at courthouse of Warwick Co.	"
23		"
24		"
25		"
26		"
27		"

GEOGRAPHIC NAMES

Survey No. **7-8917**

YORKTOWN quadrangle

1 Name on Survey

	A	B	C	D	E	F	G	H	K	
✓ <u>Virginia</u>	✓									1
✓ <u>James River</u>	✓									2
✓ <u>Warwick County</u>	✓									3
✓ <u>James City County</u>	✓									4
✓ <u>York County</u>	✓									5
✓ <u>Gloucester County</u>	✓									6
✓ <u>York River</u>	✓									7
✓ <u>Chesapeake and Ohio Ry.</u>	✓									8
✓ <u>Warwick River</u>	✓									9
✓ <u>U.S. No. 60</u>	✓									10
✓ <u>U.S. No. 17</u>	✓									11
✓ <u>Va. Nos. 168, 173, 174, 238</u>	✓									12
										13
✓ <u>Denbigh District, Stanley</u>	✓	Warwick Co.								14
✓ <u>Stanley</u> "	✓	"								15
✓ <u>Jamestown District</u>	✓	James City County								16
✓ <u>Grafton District</u>	✓	York County								17
✓ <u>Nelson District</u>	✓	"								18
✓ <u>Abingdon District</u>	✓	Gloucester County								19
✓ <u>Camp Patrick Henry</u>	✓									20
✓ <u>Denbigh</u>	✓									21
✓ <u>Griana</u>	✓									22
✓ <u>Old Fort McPherson</u>	✓									23
✓ <u>Pocahontas Trail</u>	✓	(US No. 60)								24
✓ <u>Stony Run</u>	✓									25
✓ <u>Shipyard Landing</u>	✓									26
✓ <u>Lee Landing</u>	✓									27

Remarks.

Decisions

1		371765
2		"
3		"
4		"
5		"
6		372765
7		"
8		"
9		"
10		"
11		"
12		372764
13		372765
14		"
15		"
16		"
17		"
18		"
19		" USGB
20		372866
21		371766
22		"
23		" USGB
24		"
25		"
26		"
27		" USGB

GEOGRAPHIC NAMES

Survey No. T-8317

GEOGRAPHIC NAMES											
Survey No. T-8317											
Name on Survey		A	B	C	D	E	F	G	H	K	
✓	<u>Hickory Point</u>	✓									1
✓	<u>Fort Eustis</u>	✓									2
✓	<u>Reservoir Station</u>	✓									3
✓	<u>Jones Run</u>	✓									4
✓	<u>City of Newport News Reservoir</u>	✓									5
✓	<u>Lee Hall</u>	✓									6
	<u>U.S. Naval Mine Depot</u>	US NAVAL RESERVATION									7
✓	<u>Colonial National Monument</u>	✓	(used on quadrangle to eastward)								8
✓	<u>Great Run</u>	✓									9
✓	<u>Baptist Run</u>	✓									10
✓	<u>Yorktown</u>	✓									11
✓	<u>Yorktown Road</u>	✓									12
✓	<u>Gloucester Point</u>	✓	(point of land)								13
✓	<u>Gloucester Point</u>	✓	(village, p.o.)								14
✓	<u>Colonial Parkway</u>	✓									15
	<u>Depot Road</u>	✓									16
✓	<u>Felgates Creek</u>	✓									17
✓	<u>Lackey</u>	✓									18
✓	<u>Blows Mill Run</u>	✓									19
✓	<u>Booth</u>	✓									20
✓	<u>Griggs Run</u>	✓									21
✓	<u>Woods Creek</u>	✓									22
✓	<u>Skiffes Creek</u>	✓	This name is correct								23
✓	<u>Bailey Creek</u>	✓									24
✓	<u>Bailey Banks</u>	✓									25
✓	<u>Island Creek</u>	✓									26
✓	<u>Chisholm Creek</u>	✓									27

Remarks

Decisions

1		371766
2		371765
3		371766
4		"
5		371765
6		"
7		
8		
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GEOGRAPHIC NAMES

Survey No. **T-8317**

GEOGRAPHIC NAMES											
Survey No. T-8317											
3	Name on Survey	A	B	C	D	E	F	G	H	K	
✓	Fort Crawford (ruins)	✓									1
✓	Mulberry Island	(partly here)									2
✓	Mulberry Point	(apparently now here)									3
	Ford Creek	(any of it here ?)									4
✓	York River cliffs	-see chart 492									5
✓	National Cemetery	✓									6
											7
											8
											9
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											24
											25
											26
											27

Names underlined in red approved
by L. Heck on 7/25/44

off ground.
No

M 234

Names underlined in red approved
by L. Heck on 7/25/44

off quad.
No

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, ~~marsh~~, and ~~swamp limits~~, refer to the published quadrangle for the finally adopted positions, outlines.

Descriptive Report.

Division.

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 Section.

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-8317

YORKTOWN 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

A horizontal accuracy test was run in this quadrangle and found to be satisfactory. See the files in the Division of Photogrammetry.

Two vertical accuracy tests were run in this quadrangle and found to be satisfactory. See Item 48 in the Field Edit Report enclosed in this Descriptive Report.

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-1266	1:20,000	1871-73
T-1289	1:20,000	1873
T-1289a	1:20,000	1910

Comparison with Nautical Charts Nos. 92, 495, 529

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-8317 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 July 3, 1944
under direction of D. H. Benson

By K. H. Mahi

Inspected by B. G. Jones B. G. Jones 7/46

Examined and approved:

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

~~Chief, Topography Section~~

Robert W. Kuhn
Chief, Div. of Charts
Nautical Chart Branch
Raymond B. Egan
Chief, Div. of Coastal
Surveys

NAUTICAL CHARTS BRANCH

SURVEY NO. T-8317

Record of Application to Charts

[illegible]

M-2168-1

A basic hydrographic or topographic survey supersedes all information of like nature on the uncorrected chart. Give reasons for deviations, if any, from recommendations made under "Comparison with Charts" in the Review.