6488a&b (Additional Work, 1937)

Graphic Control

(Additional Work, 1937)
6488a&b
Graphic Control

Form 504
Rev. Dec. 1933

DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY
R. S. PATTON, DIRECTOR

DESCRIPTIVE REPORT

Topographic / *Hydrographic* } *Sheet No.* Z & AA
(Additional Work 1937)

State Florida

LOCALITY

St. Johns River

Broward River & Dunn Creek (Z)

Trout River (AA)

1937

CHIEF OF PARTY

Benjamin H. Rigg

U.S. GOVERNMENT PRINTING OFFICE: 1934

Form 537a
Ed. Nov. 1929

DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

REG. NO.

TOPOGRAPHIC TITLE SHEET

The Topographic Sheet should be accompanied by this form, filled in as completely as possible, when the sheet is forwarded to the Office.

Field No. Z

REGISTER NO. T-6488 a (Additional Work 1937)

State Florida

General locality St. Johns River Florida

Locality Broward River and Dunn Creek

Scale 1/10,000 Date of survey March 12, 19 37

Vessel Charleston, S. C.

Chief of party Benjamin H. Rigg

Surveyed by Benjamin H. Rigg

Inked by Benjamin H. Rigg

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

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

Instructions dated Orders March 5, 19 37

Remarks: Resurvey to locate Aids to Navigation

GPO

DESCRIPTIVE REPORT TO ACCOMPANY
G.C.S. T-6488 a (Additional Wk. 1937)

INSTRUCTIONS

Director's orders dated March 5, 1937
For information regarding inking see Director's letter
Reference 80-LEF, 9/15-36

PURPOSE OF REVISION

Location of Aids to Navigation built since the last survey. Due to the widening of Brills Cut, Drummond Creek Cut and Trout Creek Cut by additional dredging, it was necessary to move the range structures marking the center lines of the channels. In addition to this, curved channel light No. 13 and curved channel light No. 11A had been knocked down and rebuilt in slightly different positions. Inasmuch as the Master of the Lighthouse Tender, responsible for the maintenance of buoys in this area, reported that he was dependent on these various aids for obtaining positions of the buoys, it was deemed necessary that their positions be checked.

SURVEYING METHODS

Standard topographic methods were used in executing all new work on this sheet. The new structures were located by cuts from recovered triangulation stations each of which was checked by an orientation on one triangulation station and a check on an additional station. In addition to locating the new range structures, a small boat was anchored near the opposite end of the range and a complete round of sextant angles was observed and plotted on the graphic control sheet. The foregoing method was used because it was impossible to establish a recoverable point near the end of the range.

REVISION WORK

New positions were obtained for the following:

Curved channel light 11A
Curved channel light 13
Brills Cut range front light
Brills Cut range rear light
Drummond Creek range front light
Trout Creek range rear light
Trout Creek range front light

The large steel building on Broward Point has been torn down thereby destroying Triangulation Station Broward Point, Steel Shed, Gable 1926. It might also be stated here that the true azimuths (directions) for the new ranges are the same as was originally determined.

TRIANGULATION STATIONS DESTROYED

Beacon No 47 1926
Broward Point steel shed and gable 1926
Beacon No 51 1926
Beacon No 52 1926

RECOVERABLE TOPOGRAPHIC STATIONS DESTROYED

WHO
Curved Channel Beacon No 13
Brills Cut front range Beacon No 20
Drummond Creek front range Light
Reddie Point Beacon No 19

LEGEND

New work shown in brown ink.

Respectfully submitted:

Benjamin H. Rigg
Chief of Party

New work examined and files brought up to date 5/5/37
L.C. Landy

Form 537a
Ed. Nov. 1929

DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

REG. NO.

TOPOGRAPHIC TITLE SHEET

The Topographic Sheet should be accompanied by this form, filled in as completely as possible, when the sheet is forwarded to the Office.

Field No. AA

REGISTER NO. T-6488 b (Additional Work, 1937)

State Florida

General locality St. Johns River

Locality Trout River

Scale 1/10,000 Date of survey March 12, 1937

Vessel Charleston, S. C.

Chief of party Benjamin H. Rigg

Surveyed by Benjamin H. Rigg

Inked by Benjamin H. Rigg

Heights in feet above ____ to ground to tops of trees

Contour, Approximate contour, Form line interval ____ feet

Instructions dated Orders March 5, 1937

Remarks: Sheet was used to obtain location of Shell Tank and authorized positions for buoys

GPO

DESCRIPTIVE REPORT TO ACCOMPANY
G.C.S. T-6488 b (Additional WK. 1937)

INSTRUCTIONS

Director's orders dated March 5, 1937
For information regarding inking see Director's letter
Reference 80-LEF, 9/15-36

PURPOSE OF REVISION

To obtain position of an additional object for use in locating buoys and as a landmark for the chart.

SURVEYING METHODS

Standard topographic methods were used in determining the position of Shell Oil Company tank and stack. The authorized positions for the buoys marking Trout Creek Cut and Six Mile Cut were plotted on this sheet and shown by pencilled circles. These proposed positions were obtained from U. S. Engineer's blueprint File No. 1-12-10014 which accompanies this report. Each new buoy position, denoted by a small black arrow on the Engineer's print, was scaled four ways, adjusted for distortion and then reduced to North American 1927 datum. In this manner the positions as shown by the pencil circles on the G.C.S. were obtained. The reason for this operation was to scale a bearing and distance from some permanent object for the buoy position file kept in this office. It also enabled me to obtain the geographic position on North Ameriaan 1927 datum for transmittal to the Coast & Geodetic Survey. The buoys were actually ~~placed~~ established in these positions and their locations verified by me on this sheet in the field. The established position in all cases agreed ~~very closely~~ with the proposed position.

REVISION WORK

The only revision work accomplished on this sheet was the determination of one additional landmark for the chart, namely, Shell Oil Company Tank.

RECOVERABLE TOPOGRAPHIC STATIONS DESTROYED

Middle Brown Beacon 19a (Ground)

LEGEND

New work shown in brown ink.

Respectfully submitted

Benjamin H. Rice
Chief of Party

FORM M-238

MEMORANDUM

IMMEDIATE ATTENTION

SURVEY
DESCRIPTIVE REPORT
PHOTOSTAT OF

No. T-6488 a&b (Add'l Wk. 1937)

received April 6, 1937
registered April 30, 1937
verified
reviewed
approved

This is forwarded in order that your attention may be directed to the matters as indicated below. Please initial in column 3 as an acknowledgement that your attention has been thus directed. The complete original records are available if desired. If you cannot give this your immediate attention, please initial, note, and forward to the next section marked, calling for the records at your convenience.

ROUTE		Initial	Attention called to
20			
22			
24			
25			
26			
30			
40			
62			
63			
82			
83			
88			
90			

RETURN TO

82	C. K. Green

6488a

Graphic Control

19

Form 504
Rev. Dec. 1933

DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY
R. S. PATTON, Director

DESCRIPTIVE REPORT

Topographic
~~*Hydrographic*~~ } *Sheet No.* Z

State Florida

LOCALITY

St. Johns River

(Broward River and Dunn Creek)

1934

CHIEF OF PARTY

Hubert A. Paton

U. S. GOVERNMENT PRINTING OFFICE: 1934

6488a
6488a
6488a

Graphic Control

Form 537a
Ed. Nov. 1929

DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY

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. Z

REGISTER NO. 6488a

State Florida

General locality St. Johns River

Locality Broward River and Dunn Creek

Scale 1:10,000 Date of survey December, 1934

~~Vessel~~ Party No. 26

Chief of party Hubert A. Paton

Surveyed by C. N. Strong

Inked by C. N. Strong

Heights in feet above to ground to tops of trees

Contour, Approximate contour, Form line interval feet

Instructions dated December 5, 1933

Remarks:

DESCRIPTIVE REPORT
TO ACCOMPANY
SHEET Z
ST. JOHNS RIVER, FLORIDA
PARTY NO. 26 - PROJECT H. T. 168

April 1935.

INSTRUCTIONS:

The work on this sheet was done in accordance with instructions dated December 5, 1933.

LIMITS:

This sheet covers a portion of the St. Johns River extending from the mouth of Trout River to Mitchell Bluff, and including the lower portions of Dunn Creek and Broward River (Cedar Creek).

PURPOSE:

Since the hydrography in the lower St. Johns River had already been done by the U.S.E. Department, the only topographic work necessary in the main river was the locating of beacons, ranges, landmarks, recoverable objects, etc. No form lines were located.

Hydrographic signals and permanent stations were built and located along the shores of the two principal tributary streams, Dunn Creek and Broward River (Cedar Creek).

METHODS:

For the work on the main river, it was necessary only to set up on the various triangulation stations and take cuts to the beacons and landmarks. The work on the tributary streams required a system of graphic triangulation along each stream. No traverses were necessary. All work was done in accordance with the methods outlined in Special Publication No. 144.

CONTROL:

Excluding beacons, there are 11 triangulation stations on the sheet which were recovered and used. Triangulation station Bank U.S.E. was not used. Of the 14 beacons that had been located by triangulation, only 4 were found in their old position, (Beacons 47, 50, 51 and 52). The following beacons had been moved: 42, 43, 44, 45, 46, 48, 49, 53, 54 and 55.

Recovery notes for all stations accompany this report unless previously submitted with other reports. The control was ample for the work required.

DATUM:

Field computations on North American Datum, based upon the triangulation performed by W. H. Bainbridge in 1926, had been furnished by the Washington Office for all triangulation stations on the sheet except CRAB (U.S.E.) 1908. In order to plot the stations on North American 1927 Datum, the following corrections were applied to the positions computed in the field:

Latitude	- 4.0 meters
Longitude	- 7.9 meters

Except for those beacons which had been moved, these positions were found to check in the field within the limits of accuracy required for planetable work.

An estimated correction of Latitude -2.9 meters and Longitude -9.2 meters was applied to the old position of CRAB (U.S.E.) 1908, based upon U. S. Standard Datum, in order to bring it approximately to North American 1927 Datum. This position did not check very well in the field and a new position was determined by planetable, which was several meters to the west and about 1 meter south of the plotted point. The adjusted position, based upon observations of W. H. Bainbridge in 1926, was later received, but failed to check the planetable position by about the same amount.

MAGNETIC MERIDIAN:

The magnetic meridian as obtained by the planetable declinatoire at triangulation station DUNN 1926 has a variation of 1° 08' east of the true meridian.

The declinatoire was checked at Jacksonville Magnetic Station "A", where a declination of 0° 45' East was obtained as compared with the correct declination of 0° 54' East. Applying the declinatoire correction of 0° 09' East, the corrected magnetic variation is 1° 17' East.

JUNCTIONS:

This sheet joins Sheet Y on the east, Sheet AA on the west and Sheet BB on the southwest corner.

There are no signals or triangulation stations common to Sheets Z and Y.

Sheets Z and AA have the following recoverable triangulation stations in common:

Merrill 2 U.S.E.	1908, 1926
Ben U.S.E.	1926
Chase 2 U.S.E.	1926
Beacon 51	1926
Beacon 52	1926

The following beacons were located on both Sheet Z and Sheet AA:

Beacon	Discrepancies (Meters) Lat.	Long.
Reddie Point Beacon No. 19	0	0
Beacon "F" (Swash Channel)	0	1

Gone see L.H.N.O.M 38(1935) JTW

There are no triangulation stations or signals common to Sheets Z and BB.

PERMANENT STATIONS:

The following have been marked and described as recoverable topographic stations:

Dar	Dunn 2 U.S.E.	Ter
Dun	Nor	

Also, the following new beacons have been described as recoverable stations:

Petty Bank Beacon No. 11
Curved Channel Beacon No. 11A
Curved Channel Beacon No. 13
Brills Cut Front Range Beacon No. 20
Curved Channel Beacon No. 15
Drummond Creek Front Range Light
Cedar Creek Beacon No. 17
Reddie Point Beacon No. 19
Beacons A, B, C, D, E and F (Swash channel)

Descriptions of the above stations are furnished on Form #526 and the points are indicated on the sheet with the letter "(d)". As the small beacons which mark the swash channel across the shoal area north of Reddie Point bear no numbers they have been arbitrarily designated by letters assigned by the topographer.

SHORELINE:

A total of 12.6 kilometers of shoreline was rodded in on this sheet. We had been advised that the shoreline detail of the St. Johns River had already been obtained by the U. S. E. Department, and that the aerial photo-compilation party of the Coast and Geodetic Survey would furnish the shoreline as far south as Latitude 30° 25'. In order to complete the picture it was necessary for our topographic party to rod in the high water line between the limits of the work of the above named groups. The mouths of Dunn Creek and Broward River (Cedar Creek) are shown in detail, as well as the location of the highway and railway bridges. North of Latitude 30° 25' only as much shoreline was located as was possible at each setup. The photo-compilation sheets for this vicinity have not been received as yet, so that a comparison cannot be made.

The shoreline of the St. Johns River in this vicinity consists mainly of firm sandy beach and is usually heavily wooded, except in the vicinity of triangulation station CRAB 2 where there are a number of marshy islets with soft mud below the grass line. The lower portions of the large tributary streams have a well-defined shoreline which is a rather firm mixture of sand and mud, with many hidden stumps and snags. Usually the banks are heavily wooded. In a few places near the mouths of small creeks and in the upper sections of the main streams, there are extensive stretches of soft marsh lying between the woods and the water.

NAMES:

Dunn Creek: This stream is shown on some Coast Survey charts as Dunns Creek and on others as Dunn Creek. The latter name is preferable.

Cedar Creek: This name is generally applied by natives of the region to the stream named Broward River on Coast Survey charts. It is recommended that the name Cedar Creek be adopted as the other name is not known locally. The recommended name is used on Geological Survey maps and in the Coast Pilot.

Cedar Heights: The group of houses on the high bluff in the vicinity of station "Nor" on Cedar Creek, is known locally as Cedar Heights and this name is recommended for use on the charts.

Mitchell Bluff: On Chart #577 this is called Mitchells Bluff, but on chart #1243 and Geological Survey Maps it is Mitchell Bluff. The latter term is the one in common use locally and it is recommended that the form Mitchell Bluff be adopted on all the charts.

RANGES:

Two new ranges were located by planetable: Drummond Creek Range and Brills Cut Range. The latter range was known until recently as Cedar Creek Range. A point on each range was located by sextant fixes and the new range lines are shown on the sheet. A third range, Trout Creek Range, also falls within the limits of the sheet.

Name of Range	True Azimuth
Brills Cut Range	316° 29'
Drummond Creek Range	58 23
Trout Creek Range	16 22

BRIDGES:

There are three drawbridges shown on the sheet, all unattended. Heckscher Drive crosses Dunn Creek and Cedar Creek by wooden highway bridges both of which are single leaf bascule bridges with a horizontal clearance of 29 feet and a vertical clearance of 9 feet above mean high water.

The railway bridge over Cedar Creek has a swing span which is left open as this branch of the Atlantic Coast Line is not used at present. It has a vertical clearance (closed) of 4 feet above mean high water and horizontal clearances of 43 feet (east span) and 39 feet (west span). The bridge has a "Y" constructed on trestles approximately one-third of the total span from the east bank. The east end of the bridge has been destroyed by fire so that the bridge is now impassible for railroad traffic.

COMPARISON WITH PREVIOUS SURVEYS:

The shoreline checks very well with that shown on the latest charts. There are a few minor changes in topographic details, however.

The long point of ground on the west bank of Dunn Creek, about 600 meters north of the Heckscher Drive bridge, is shown on the charts as marshy. The eastern tip of this point, between hydrographic signals "Sum"and"If", is high, heavily wooded ground.

The large buildings in the western part of Eastport, shown cross-hatched on Chart #577, have been razed. The buildings shown solidly still remain. The railroad tracks of the Atlantic Coast Line have been removed east of the bridge over Cedar Creek except for the stub-track leading from the southeast branch of the "Y".

The main track which runs west of north from the steel gantry shed (below the highway bridge) to connect with the main line of the Seaboard Air Line Railway near Highway #17, is the only other track still in existence. All the other interconnected tracks have been removed. The plant of the Brooks-Scanlon Corporation was shut down in 1929 and the town of Eastport was practically deserted for several years until a unit of the Civilian Conservation Corps was established there.

The two large docks at Chaseville are now in ruins.

LANDMARKS:

Lists of Landmarks for Charts and Aids to Navigation accompany this report on Form #567.

Respectfully submitted,

C. N. Strong,
Surveyor, C.&. G. S.

Approved and forwarded,

Hubert A. Paton,
Lieut. C. &. G. S.,
Chief of Party.

See Letter 484 (1935)

Form 567
Rev. Jan. 1933

DIVISION OF CHARTS, FILE NO._____

DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY

LANDMARKS FOR CHARTS

Palatka, Florida.

February 4, 1935.

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:

Hubert A. Paton, *Chief of Party.*

	DESCRIPTION	POSITION						METHOD OF DETERMINATION	CHARTS AFFECTED
		LATITUDE			LONGITUDE		DATUM		
		° '	D.M. METERS		° '	D.P. METERS			
*	STEEL BUILDING, S.E. gable, (A Broward Point, steel shed, gable, 90 ft. high) (3)	30 25	14		81 36	70	North American 1927	Triangulation 1926	577, 1243
	HOUSE, northwest gable (⊙ Jol) (3)	30 26	373		81 36	1409	"	Topography 1934	"
*	HOUSE, west gable (⊙ Nor) (3)	30 26	103		81 37	1060	"	"	"
	HOUSE, west gable (⊙ Lan) (3)	30 25	884		81 34	1501	"	"	"
*	GABLE, north, white building (3)	30 22	768		81 34	1126	"	"	"
	FLAGPOLE (3)	30 22	679		81 34	1588	"	"	"
	The above objects have all been viewed from the water area.								

A list of objects carefully selected because of their value as landmarks as determined from seaward, together with individual descriptions, 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 an important factor in the value of the chart. Landmarks selected at appropriate intervals can be clearly charted. However, when none is outstanding, a group of two or three objects may by their interrelationship provide positive indentification. A group so selected should be indicated.

The description of each object should be short, but such as will clearly identify it; for example, a standpipe, elevated tank, gas tank, church spire, tall stack, red chimney, radio mast, etc. Assign numerals to landmarks to indicate: (1) Offshore, (2) inshore, (3) harbor, 1, 2, 3 would be a mark useful on all charts. Generally, flagstaffs and like objects are not sufficiently permanent to chart.

U.S. GOVERNMENT PRINTING OFFICE: 1934 25379

Form 567
Rev. Jan. 1933

DIVISION OF CHARTS, FILE NO. _____

DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY

LANDMARKS FOR CHARTS

Palatka, Florida.

AIDS TO NAVIGATION

February 4, 1935.

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:

Hubert A. Paton, *Chief of Party.*

DESCRIPTION	POSITION						METHOD OF DETERMINATION	CHARTS AFFECTED
	LATITUDE			LONGITUDE		DATUM		
	° '	D.M. METERS		° '	D.P. METERS			
Petty Bank Bn. #11 (Green light on black square daymark)	30 23	1432		81 34	680	North American 1927	Topography 1934	577, 1243
Curved Channel Bn. #11A (Green light on black rectangular daymark)	30 24	435		81 34	1118	"	"	"
Curved Channel Bn. #13 Green light on black rectangular daymark)	30 24	870		81 35	404	"	"	"
Brills Cut Front Range Light #20	30 24	1190		81 35	367	"	"	"
Drummond Creek Front Range Light	30 24	1237		81 35	1194	"	"	"
Curved Channel Bn. #15 Green light on black rectangular daymark)	30 24	981		81 35	1173	"	"	"
Cedar Creek Bn. #17 (Green light on black rectangular daymark)	30 24	568		81 36	401	"	"	"
Beacon, swash channel (⊙Beacon "A")	30 23	1558		81 34	1032	"	"	"
Beacon, swash channel (●Beacon "B")	30 23	1409		81 34	1082	"	"	"
Beacon, swash channel (⊙Beacon "C")	30 23	1348		81 35	366	"	"	"

A list of objects carefully selected because of their value as landmarks as determined from seaward, together with individual descriptions, 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 an important factor in the value of the chart. Landmarks selected at appropriate intervals can be clearly charted. However, when none is outstanding, a group of two or three objects may by their interrelationship provide positive indentification. A group so selected should be indicated.

The description of each object should be short, but such as will clearly identify it; for example, a standpipe, elevated tank, gas tank, church spire, tall stack, red chimney, radio mast, etc. Assign numerals to landmarks to indicate: (1) Offshore, (2) inshore, (3) harbor, 1, 2, 3 would be a mark useful on all charts. Generally, flagstaffs and like objects are not sufficiently permanent to chart.

U.S. GOVERNMENT PRINTING OFFICE: 1934 25370

Form 567
Rev. Jan. 1933

DIVISION OF CHARTS, FILE NO._____

DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY

LANDMARKS FOR CHARTS

Palatka, Florida.

February 4, 1935.

AIDS TO NAVIGATION (continued)

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:

Hubert A. Paton, *Chief of Party.*

DESCRIPTION	POSITION					METHOD OF DETERMINATION	CHARTS AFFECTED
	LATITUDE		LONGITUDE		DATUM		
	° ′	D.M. METERS	° ′	D.P. METERS			
Beacon, swash channel (⊙ Beacon "D")	30 23	1267	81 35	155.4	North American 1927	Topography 1934	577, 1243
Beacon, swash channel (⊙ Beacon "E")	30 23	1270	81 36	7.4	"	"	"

A list of objects carefully selected because of their value as landmarks as determined from seaward, together with individual descriptions, 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 an important factor in the value of the chart. Landmarks selected at appropriate intervals can be clearly charted. However, when none is outstanding, a group of two or three objects may by their interrelationship provide positive indentification. A group so selected should be indicated.

The description of each object should be short, but such as will clearly identify it; for example, a standpipe, elevated tank, gas tank, church spire, tall stack, red chimney, radio mast, etc. Assign numerals to landmarks to indicate: (1) Offshore, (2) inshore, (3) harbor, 1, 2, 3 would be a mark useful on all charts. Generally, flagstaffs and like objects are not sufficiently permanent to chart.

U.S. GOVERNMENT PRINTING OFFICE: 1934 25379

M-189

6488a

REVIEW OF GRAPHIC CONTROL SURVEY T- ~~5670~~ , SCALE 1 : 10,000

Date of Review 5/21/40

1. This survey has been reviewed in connection with Air Photo Compilation Nos. T-5670, T5669 , , with particular attention to the following details:

(a) Projection has been checked in the Field. —

(b) Accuracy of location of plane table control points. —

(c) Discrepancies between detail on this survey and the air photo compilations listed above. —

(d) Discrepancies found in descriptions submitted on Form 524 when compared with the air photo compilations listed above. —

2. Refer to the reviews and descriptive reports of air photo compilations Nos. T-5670, T5669 , , for a more complete discussion of any errors or discrepancies found.

Any material errors found on this survey are noted in subsequent paragraphs of this review, and these have been reported to the Field Records Section and the Cartographic Section. —

Notes and corrections resulting from the review are shown on this survey in green. —

L. C. Lamb

6488 b

19

Form 504
Rev. Dec. 1933
DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY
R. S. PATTON, DIRECTOR

DESCRIPTIVE REPORT

Topographic / ~~*Hydrographic*~~ } *Sheet No.* AA

State Florida

LOCALITY

St. Johns River, Florida.

Trout River

1935

CHIEF OF PARTY

Hubert A. Paton

U. S. GOVERNMENT PRINTING OFFICE: 1934

6488 b

6488 b

Form 537a
Ed. Nov., 1929

DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

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. AA

REGISTER NO. 6488 b

State Florida

General locality St. Johns River ~~and Trout River~~

Locality Trout River 10'

Scale 1:10,000 Date of survey January, 1935

~~Vessel~~ Party No. 26.

Chief of party Hubert A. Paton

Surveyed by C. N. Strong

Inked by C. N. Strong and C. T. Schwalb

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

Contour, Approximate contour, Form line interval -- feet

Instructions dated December 5, 1933

Remarks:

DESCRIPTIVE REPORT
TO ACCOMPANY
SHEET AA
ST. JOHNS RIVER, FLORIDA.
PARTY NO. 26 - PROJECT H.T. 168

May 1935.

INSTRUCTIONS:

The work on this sheet was done in accordance with instructions dated December 5, 1933.

LIMITS:

This sheet covers a small portion of the St. Johns River extending from just west of the north of Drummond Creek to Long Branch (Six-Mile Creek), and the lower part of Trout River from its mouth up to the Lem Turner Road bridge. The mouths of Moncrief Creek and Ribault River are also included.

PURPOSE:

The hydrography in the lower St. Johns River had already been done by the U.S.E. Dept., so that the only topographic work necessary on the main river was the locating of beacons, ranges, landmarks, recoverable objects, etc. A more complete survey was made of Trout River. Hydrographic signals were located up to the Lem Turner Road bridge and at the mouths of the two principal tributary streams, in addition to landmarks and recoverable objects. The shoreline of Trout River was rodded in completely from the Atlantic Coast Line Railway bridge near the mouth up as far north as the 30° 25' parallel of latitude which was the southern limit of the shoreline to be furnished by the aerial photo-compilation party.

METHODS:

The beacons and landmarks on the main river were located by cuts from the various triangulation stations. The work on Trout River required a system of graphic triangulation extending from the mouth up to the limits of the sheet. It was possible to tie in on check cuts from triangulation station Riverview near the upper portion of the stream.

No traverses were necessary and no form lines were located. All work was done in accordance with the methods outlined in Special Publication No. 144.

CONTROL:

There are eleven triangulation stations on this sheet which were recovered and used, including two beacons. Three beacons

(Beacons 53, 54 and 55) had been removed. Triangulation station Cummer U.S.E. 1908 could not be found. Recovery notes for all stations accompany this report unless already submitted with other descriptive or triangulation reports.

The control was ample for the work required, although the distribution of the stations was somewhat inconvenient.

DATUM:

The five triangulation stations located by H. C. Warwick in 1932 were plotted directly upon North American 1927 Datum as those positions had already been furnished by the Washington office. The stations that had been located by W. H. Bainbridge in 1926 were computed on North American Datum and were plotted from the field computations, applying an estimated correction of Latitude - 4.0 meters, Longitude - 8.0 meters.

The position of Cummer 2 1926 was not plotted on the sheet. Instead, a new position was calculated for Cummers Water Tank, based on the 1926 field position of Cummer 2. This new position was correctedas above in order to obtain the approximate position on North American 1927 Datum. The approximate position of triangulation station Cummer U.S.E. 1908 was determined by applying a correction of Latitude - 3.0 meters, Longitude - 9.2 meters to the old position given in the publication, "Triangulation along the East Coast of Florida", in order to correct the position from U.S. Standard to North American 1927 Datum. This station was not found. The positions of the other stations were found to check in the field within the limits of accuracy required for planetable work.

MAGNETIC MERIDIAN:

The magnetic meridian as obtained by the planetable declinatoire at triangulation station Merrill 2 U.S.E. has a variation of 0° 12' East of the true meridian.

The declinatoire was checked at Jacksonville Magnetic Station "A", where a declination of 0° 45' East was obtained as compared with the correct declination of 0° 54' East. Applying the declinatoire correction of 0° 09' East, the corrected magnetic variation is 0° 21' East.

JUNCTIONS:

This sheet joins Sheet Z on the east and Sheet BB on the south. Sheets Z and AA have the following recoverable triangulation stations in common:

Merrill 2 U.S.E.	1908, 1926	Beacon 51	1926
Ben U.S.E.	1926	Beacon 52	1926
Chase 2 U.S.E.	1926		

The following beacons were located on both Sheet Z and Sheet AA:

Beacon	Discrepancies (meters) Lat.	Long.
Reddie Point Beacon #19	0	0
Beacon "F" (Swash Channel)	0	1

There were no triangulation stations or signals common to Sheets AA and BB.

PERMANENT STATIONS:

The following have been marked and described as recoverable topographic stations:

Ape Dol Egg
Est Hap Map
Stations "A", "B", "C", "D", "E", "F"
Trout

Stations "A" to "F", noted above, are triangulation stations located by the City of Jacksonville Engineer Department. The following new beacons have also been described as recoverable stations:

Chaseville Beacon
Middle Ground Beacon No. 19A
Reddie Point Beacon No. 19
Beacons F, G, H, I, and J (swash channel)

Descriptions of the above stations are furnished on form #526, and the points are indicated on the sheet by the letter "(d)". As the small beacons which mark the swash channel across the shoal area north of Reddie Point bear no numbers of their own, they have been arbitrarily designated by letters assigned by the topographer.

SHORELINE:

The shoreline of Trout River was located completely from the Atlantic Coast Line Railway bridge near the mouth as far north as Latitude 30° 25'. Short stretches of shoreline were run up Moncrief Creek and Ribault River. No shoreline was located along the St. Johns River as we had been advised that the shoreline detail of the main river had already been obtained by the U.S.E. Department. A total of 20.1 kilometers of shoreline was rodded in on this sheet.

The shoreline of that portion of the St. Johns River which falls within the limits of the sheet consists principally of firm sandy beach and is quite heavily wooded. A short stretch along the western side of Reddie Point is soft marsh. There are several ruined docks and old piling near Chaseville.

Across from Reddie Point and south of Trout River is the beginning of the industrial section of Jacksonville. Most of this area is taken up by the old plant of the Cummer Lumber Company which has been abandoned for about eight years. Several buildings remain but the docks are completely in ruin. The elevated water tank is the most conspicuous landmark falling within the limits of the sheet. The largest active enterprise is the Shell Petroleum Corporation which is on the north shore of Long Branch (Six-Mile Creek). The shore between Long Branch and Trout River is dangerous because of the dilapidated docks and old piling which extend out from the shore partially submerged.

The south bank of Trout River between the A.C.L. Railway bridge and Moncrief Creek is built up with residences, private docks and boathouses. It is heavily wooded above Moncrief Creek, except for an occasional clearing. There is very little marshy ground along this shore and most of the shore is a rather firm mixture of sand and mud. The shores of the tributary streams are generally marshy.

The north bank of Trout River is lower and more marshy. There are no structures of any kind above the S.A.L.Ry. bridge. The shore is usually firm except in the marshy areas where soft mud is found. There are many snags all along the river, making navigation hazardous. There are few outstanding landmarks. Those recommended for charts are all buildings, the most conspicuous of which is described as signal Hap.

The shoreline on this sheet was inked in before the receipt of the new instructions pertaining to the method of inking.

NAMES:

Trout River: This stream is called Trout Creek on Geological Survey maps, but the generally accepted name is Trout River, as shown on Coast Survey Charts.

Ribault River: Correct as shown on Chart #577. This stream is incorrectly called Sixmile Creek on Geological Survey maps. The latter name is applied to one of the upper branches on Duval County maps, but Ribault River is the name of the principal stream.

Moncrief Creek: This is the correct name for the large creek, left nameless on Chart #577, which empties into Trout River from the southwest at a point about midway between Ribault River and the mouth of Trout River. This term is in use on Geological Survey Maps and County Maps. Its use is recommended.

Sandfly Point: Geological Survey and City Maps apply the name Sandfly Point to the small point of land on the south bank of Trout River which juts out to the north about 100 meters east of the A. C. L. Railway bridge. Its adoption is not recommended, as the point is not of special prominence.

RANGES:

There is one range on this sheet. It is in the St. Johns River and is known as Trout Creek Range. Its true azimuth is 16° 22', calculated inversely from the geographic positions of the front and rear ranges. There are no ranges or aids to navigation in Trout River itself.

BRIDGES:

There are three drawbridges shown on the sheet, all crossing Trout River. The Atlantic Coast Line Railway bridge is a single-track trestle about 3,000 feet in length having a steel swing span 150 feet long over the channel. The horizontal clearance on each side of the center pier is 56 feet and the vertical clearance (closed) is 2 feet above mean low water. The bridge is unattended and is left open as this branch of the railroad is not in use at present.

The county highway bridge crossing Trout River at Main Street (U.S.Highway No. 17) is a concrete drawbridge of the double-leaf bascule type about 1200 feet long overall. It has a horizontal clearance of 53 feet and a vertical clearance above mean low water of 11.5 feet (closed).

The Seaboard Air Line Railway bridge is a single track trestle about 1450 feet long overall, with a steel swing span over the channel. The horizontal clearance is 50 feet and the vertical clearance above mean low water is 3.8 feet (closed). There is a passageway for small boats a short distance south of the draw span. This opening has a horizontal clearance of 11.5 feet and an 8.0 foot vertical clearance.

A fourth bridge across Trout River falls just beyond the western limit of the sheet. The Lem Turner Road bridge (State Highway No. 138) is a steel truss bridge about 400 feet long with a horizontal swing span. It has a horizontal clearance of 40 feet and a vertical clearance (closed) of 7.0 feet above mean low water.

COMPARISON WITH PREVIOUS SURVEYS:

We have no Coast Survey charts showing the area west of Longitude 81° 40.8' so that no comparison is possible for the upper portion of Trout River. The shoreline of lower Trout River is much more irregular than that shown on Chart #577. Although the east bank is still marshy in places, the marshy portion is only about fifty percent of the area indicated on the chart. Heavy woods extend to the water's edge

nearly the entire stretch between the mouth of the small creek across from Station "Hap" and the sandy point upon which Station "F" is located. The point of land between Station "F" and the S.A.L. Ry. bridge is all solid except for a small patch of marsh immediately west of the railroad embankment. North of Signal "Vot" the shore is soft marsh for a distance of about 500 meters, above which point the firm ground extends to the water's edge in several places. The more extensive marsh areas occur north of Latitude 30° 24.5', on the east and north bank. The distribution of marsh and solid ground is very nearly as shown on the Geological Survey map (Jacksonville Quadrangle).

The shoreline of Trout River is receding in certain places, due to the erosion of the banks. This was especially noted in the vicinity of Signal "Let".

The south shore of Trout River between Longitude 81° 39' and the mouth has been developed considerably since the City Limits of Jacksonville were extended to Trout River. Many private docks have been constructed as well as a number of residences, and the shore has been protected by the construction of bulkheads and walls.

The west shore of the St. Johns River immediately south of the mouth of Trout River has changed due to the abandonment of the Cummer Lumber Company plant. The docks and bulkhead have fallen into ruins and most of the larger buildings are gone.

LANDMARKS FOR CHARTS:

Lists of Landmarks for Charts and Aids to Navigation accompany this report on Form #567.

Respectfully submitted,

C. N. Strong

C. N. Strong,
Surveyor, C. &. G. S.

Approved and Forwarded,

Hubert A. Paton

Hubert A. Paton,
Lieut. C. &. G. S.,
Chief of Party.

Form 567
Rev. Jan. 1933

DIVISION OF CHARTS, FILE NO._____

DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY

LANDMARKS FOR CHARTS

Palatka, Florida.

April 20, 1935.

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:

See letter 482 (1935)

Hubert A. Paton *Chief of Party.*

	DESCRIPTION	POSITION						METHOD OF DETERMINATION	CHARTS AFFECTED
		LATITUDE			LONGITUDE		DATUM		
		°	' D.M. METERS		°	' D.P. METERS			
*	HOUSE, north gable	30	23 58.4		81	36 15.5	North American 1927	Topography 1934	577, 1213
*	TANK (ELEVATED), steel (△Cummers W.T., 125 Ft. high)	30	22 1609		81	38 20.4	"	Triangulation 1934	"
*	RADIO MAST, steel (△E.A.T. Co. N. Radio Mast, 130 ft. high)	30	24 502		81	38 1196	"	Triangulation 1932	"
*	RADIO MAST, steel, (△E.A.T. Co. S. Radio Mast, 130 ft. high)	30	24 365		81	38 1196	"	"	"
	HOUSE, west gable, white (⊙Bat)	30	23 1730		81	38 973	"	Topography 1934-35	"
*	HOUSE, north gable, yellow (⊙Hap)	30	23 1639		81	39 1504	"	"	"
	HOUSE, brick (⊙Dal)	30	23 870		81	38 1171	"	"	577, 1213
	HOUSE, red brick, chimney (⊙Pac)	30	23 815		81	39 782	"	"	"
*	HOUSE, white, S.Gable (⊙All)	30	24 1617		81	40 1048	"	"	577
	BOATHOUSE, white, (⊙Bag)	30	25 57		81	41 250	"	"	No chart exists

All the above landmarks belong under the classification (3). They have all been viewed from the water area.

A list of objects carefully selected because of their value as landmarks as determined from seaward, together with individual descriptions, 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 an important factor in the value of the chart. Landmarks selected at appropriate intervals can be clearly charted. However, when none is outstanding, a group of two or three objects may by their interrelationship provide positive indentification. A group so selected should be indicated.

The description of each object should be short, but such as will clearly identify it; for example, a standpipe, elevated tank, gas tank, church spire, tall stack, red chimney, radio mast, etc. Assign numerals to landmarks to indicate: (1) Offshore, (2) inshore, (3) harbor, 1, 2, 3 would be a mark useful on all charts. Generally, flagstaffs and like objects are not sufficiently permanent to chart.

U.S. GOVERNMENT PRINTING OFFICE: 1934 25379

Form 567
Rev. Jan. 1933

DIVISION OF CHARTS, FILE NO._____

DEPARTMENT OF COMMERCE
U.S. COAST AND GEODETIC SURVEY

LANDMARKS FOR CHARTS

Palatka, Florida.

April 20, 1935

AIDS TO NAVIGATION
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:

Robert A. Paton, *Chief of Party.*

DESCRIPTION	POSITION						METHOD OF DETERMINATION	CHARTS AFFECTED
	LATITUDE			LONGITUDE		DATUM		
	° ′	D.M. METERS		° ′	D.P. METERS			
Chaseville Beacon (Red and black square daymark, unlighted)	30 23	379		81 37	653	North American 1927	Topography 1934	577, 1213
Reddie Point Beacon #19 (Green light on black square daymark)	30 23	931		81 37	697	"	"	"
Middle Ground Beacon #19A (Green light on black square daymark)	30 22	1113		81 37	1118	"	"	"
Beacon, swash channel (⊙Beacon "F")	30 23	924		81 37	240	"	"	"
Beacon, swash channel (⊙Beacon "G")	30 23	840		81 37	488	"	"	"
Beacon, swash channel (⊙Beacon "H")	30 23	582		81 37	420	"	"	"
Beacon, swash channel (⊙Beacon "I")	30 23	127		81 37	721	"	"	"
Beacon, swash channel (⊙Beacon "J")	30 23	107		81 37	603	"	"	"

A list of objects carefully selected because of their value as landmarks as determined from seaward, together with individual descriptions, 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 an important factor in the value of the chart. Landmarks selected at appropriate intervals can be clearly charted. However, when none is outstanding, a group of two or three objects may by their interrelationship provide positive indentification. A group so selected should be indicated.

The description of each object should be short, but such as will clearly identify it; for example, a standpipe, elevated tank, gas tank, church spire, tall stack, red chimney, radio mast, etc. Assign numerals to landmarks to indicate: (1) Offshore, (2) inshore, (3) harbor, 1, 2, 3 would be a mark useful on all charts. Generally, flagstaffs and like objects are not sufficiently permanent to chart.

U.S. GOVERNMENT PRINTING OFFICE: 1934 25879

FORM M-238

MEMORANDUM

IMMEDIATE ATTENTION

SURVEY
DESCRIPTIVE REPORT
~~PHOTOSTATIC~~

~~No. H~~

No. T 6488a & b

received July 21, 1936
registered July 29, 1936
verified
reviewed
approved

This is forwarded in order that your attention may be directed to the matters as indicated below. Please initial in column 3 as an acknowledgement that your attention has been thus directed. The complete original records are available if desired. If you cannot give this your immediate attention, please initial, note, and forward to the next section marked, calling for the records at your convenience.

ROUTE		Initial	Attention called to
20			
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90			

RETURN TO

82	C.K.Green

7/30/36

M 189

64886

REVIEW OF GRAPHIC CONTROL SURVEY T-~~5669~~ , SCALE 1: 10,000

Date of Review 6/11/40

1. This survey has been reviewed in connection with Air Photo Compilation Nos. T-5669 , , , with particular attention to the following details:

(a) Projection has been checked in the Field. ✓

(b) Accuracy of location of plane table control points. —

(c) Discrepancies between detail on this survey and the air photo compilations listed above. —

(d) Discrepancies found in descriptions submitted on Form 524 when compared with the air photo compilations listed above. —

2. Refer to the reviews and descriptive reports of air photo compilations Nos. T-5669, , , for a more complete discussion of any errors or discrepancies found. —

Any material errors found on this survey are noted in subsequent paragraphs of this review, and these have been reported to the Field Records Section and the Cartographic Section. —

Notes and corrections resulting from the review are shown on this survey in green. —

L. C. Landy