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

DESCRIPTIVE REPORT
Topographic

Sheet No. T-5519

State
Florida

LOCALITY
St. Andrew Bay
        Panama City and vicinity
        From Dyars Point to Watson Bayou

1935

CHIEF OF PARTY
   M. H. Reese
Applied Oct 1263 - Feb 1938 - 26-23
Applied to Chr 489 Feb 13, 1933 & M S
" " 868 Aug 1946 Wares
" " 869 Sept 1946 9-8
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.

T5519

Field No. T-5519

REG. NO.

State. Florida

General locality. St. Andrew Bay

Locality. Divers Point to Watson Bayou

Scale 1:10,638 Date of survey 7/21 & 9/13 1935

Photos

VESSEL Air Photo Compilation Party No. 24 Pensacola, Fla.

Chief of party M. H. Reese

Surveyed by See data sheet in descriptive report

Inked by L. L. Wright

Heights in feet above to ground to tops of trees

Contour, Approximate contour, Form line interval feet

Instructions dated June 7 1934

Remarks Compiled on scale of 1:10,638 enlarged and printed by photolithography on scale of 1:10,000 Scale factor 0.94

...
- STATISTICS -

on

SHEET, FIELD NO. REG. NO. T-5519

PHOTOS, NO. TO NO. DATE OF PHOTOGRAPHS TIME

DATE OF PHOTOGRAPHS TIME

BY FROM DATE TO

ROUGH RADIAL PLOT

SCALE FACTOR (0.94)

SCALE FACTOR CHECKED

PROJECTION E. P. Hernandez, Jr. 3/13/35

PROJECTION CHECKED H. E. Smith 3/13/35

CONTROL PLOTTED R. S. French 3/14/35

CONTROL CHECKED C. Carter Brown 3/18/35

TOPOGRAPHY TRANSFERRED J. R. Reynolds

TOPOGRAPHY CHECKED

SMOOTH RADIAL LINE PLOT J. R. Reynolds 3/22/35

RADIAL LINE PLOT CHECKED E. P. Hernandez, Jr. 3/25/35

DETAIL INKED E. L. Wright 6/28/35

PRELIMINARY REVIEW OF SHEET E. L. Pitch 7/6/35

TOTAL AREA OF SHEET 30.0 sq. Statute Miles

AREA OF DETAIL INKED 17.7 sq. Statute Miles (Land Area)

AREA OF DETAIL INKED 3 sq. Statute Miles (Shoals in Water Area)

LENGTH OF SHORELINE (more than 200 m. from nearest opposite shore) 24.0 Statute Miles

LENGTH OF SHORELINE (rivers and sloughs less than 200 m. wide) 26.8 Statute Miles

GENERAL LOCATION St. Andrew Bay

LOCATION Panama City and vicinity

DATUM North American 1927

Buena Vista?

STATION BUENA VISTA 2, 1910-1935 (Unadjusted)

Latitude 30°09'56.388" (1736.3 m)

Longitude 85°42'04.772" (127.7 m)
I. GENERAL INFORMATION:

Instructions dated June 7, 1934.

The information used in the compilation of this sheet was obtained from notes and sketches made by the field inspection party and from aerial photographs of the area.

This sheet covers St. Andrew Bay, from Dyers Point to Watson Bayou, and includes the towns of St. Andrew, Panama City, Bunkers Cove (suburb of Panama City), and Millville. A portion of land around Bear Point and Courtney Point, on the south and west of St. Andrew Bay, is also shown; also, a portion of land on the east of St. Andrew Bay, including Red Fish Point, Smack Bayou, Sheephead Bayou, and Fresh Water Bayou.

U. S. Highway No. 95, serving this section, passes eastward through the town of St. Andrew, makes several curves and jogs, following the coast line into Panama City. From this point, it goes practically due east, curving around Millville southward toward Bay Harbor (see discussion of proper location of Bay Harbor, under III-2). State Highway No. 20 comes into Panama City from the northeast.

The mainland is composed mostly of scattered growths of hardwood, pine and brush, in low, damp spots. There is also a scattering of palmettos, a few palms, and a great deal of cutover land composed of grass, brush and second growth pine. The countryside north of the three main towns is dotted with cultivated fields, orchards and some pastures, especially above Millville. There are some sections where areas have been cleared for future streets, and the clearing is quite distinguishable on the photos. Property lines south of Red Fish Point have been cleared and are clearly distinguishable on the photos.

The Atlanta and St. Andrew Bay Railroad parallels State Highway No. 20 into Panama City, a spur of this railroad serving the town of Millville and the Southern Kraft Corporation Paper Mill. Formerly, a spur was used for the town of St. Andrew, but it has been discontinued.
This sheet was compiled from: (1) - photographs Nos. 820 to 841, inclusive, taken July 21, 1934, at 9:10 a.m., and running in a generally easterly direction from Millville to Dyers Point; (2) - photographs Nos. C-93 to C-98, inclusive, taken September 13, 1934, at 9:40 a.m., and roughly following the line of flight of (1); (3) - photographs Nos. 842 to 846, taken July 21, 1934, at 9:25 a.m., and beginning on St. Andrew Bay below Red Fish Point and running in a southeastwardly direction, covering the area from Red Fish Point to Fresh Water Bayou. Flights (1) and (3) were taken with the Aero Service Corporation's five-lens camera HUI-33, and flight (2) with the Aero Service Corporation's single-lens camera. Flight (2) was used to supplement flight (1).

The difference between high and low water is so small (mean range of tide only 1.3 ft.) that only the high water line, as determined by the field inspection party, was traced on the compilation.

II. CONTROL:

(A) Sources.

The following sources of control were used in the compilation of this sheet:

(a) Triangulation by Geo. L. Anderson, 1934.
(b) Triangulation by Wm. B. Patterson, 1935.

IRIS 3 (1935) was established, but could not be tied in on photographs. A traverse was taken to an eccentric point from IRIS 3 and this eccentric was tied in on the photographs. The position of the eccentric was computed and used as control for the vicinity around IRIS 3, but is not shown on the compilation.

(B) Errors.

There were no errors in control on this compilation.

III. COMPILATION:

(A) Method.

The usual radial line method of plotting was used in the compilation of this sheet.

The area from Red Fish Point to Fresh Water Bayou was traced on sheet T-5517 and transferred by means of a projector to the compilation. This was done because of the greater facility in establishing a radial plot for this area on the T-5517 compilation.
(B) Adjustments of plot.

The scale of the photographs was satisfactory and no more than the usual amount of tilt and distortion was encountered.

As mentioned under I, a single-lens flight was run in over the five-lens plot from Millville to Dyers Point and was found to check satisfactorily with the plot established from the five-lens flight.

(C) Interpretation.

Only the graphic symbols approved by the Board of Surveys and Maps (1932) were used on this sheet, except for the symbol (>) used to denote brush, and for the symbol (————) used to denote a horizontal belt conveyor (Southern Kraft Corporation Paper Mill).

(D) Information from other sources.

Two new piers, one near DRUMMOND 2 (1936) and one near DREW (1935) were marked on the field prints by the field inspection party and were scaled for actual position from Lieut. Wm. D. Patterson's plane table sheet and drawn on the compilation. These two piers are marked "New Piers" on the overlay for identification. (Also Dock East of Trigulation Sho.)

All of the stations shown on the compilation with 2.5 mm. circles, with the exception of U.S.E. DRUMMOND, were scaled from Lieut. Wm. D. Patterson's plane table sheets and transferred to the compilation. Names of these stations are as shown on the plane table sheets. (See Memo. attached)

There is some piling across a part of Watson Bayou between the Texas Company tanks and the bridge on Highway No. 36, which could not be located from photographs. A note showing approximate position of this piling is placed on the overlay.

(E) Conflicting names.

Chart No. 184 shows Bay Harbor on a point of land just to the east of the entrance to Watson Bayou, but the "Official Map of Panama City, Florida", compiled by J. Rice Scott - W. H. Thames, Inc., Structural and Civil Engineers, Panama City (a copy of this map is attached to and made a part of this report), shows Bay Harbor on the east of the Southern Kraft Corp. Paper Mill, on the east side of Highway No. 98, and this is believed to be the correct location of this settlement.
Names of triangulation stations incorporating the name, "Southern Kraft Corp.\textquotedbl", are shown with the name, "Southern Kraft Corp.\textquotedbl", in the Coast and Geodetic Survey list of Geographic Positions of Triangulation Stations for the State of Florida. The official map of Panama City, referred to above, gives the name, "Southern Kraft Corp.\textquotedbl", and the field inspection party states this name is correct.

(F) New names.

The following new names were taken from Lieut. Wm. D. Patterson's plane table sheets and appear on the overlay in the proper position:

Smaek Bayou
Sheephead Bayou
Fresh Water Bayou

The following names were taken from the official map of Panama City, Florida:

Lake Huntington
Lake Ware
Baker Bayou
Dosten Bayou
Massalina Bayou

"Bunkers Cove" is the name of a suburb of Panama City, just to the south of Massalina Bayou and the name dates from the Civil War, according to an old resident of the vicinity. However, nothing is known of the actual derivation of the name.

IV. COMPARISON WITH OTHER SURVEYS;

The junctions of this sheet with sheets to the northeast, northwest, southwest, southeast, and east, Nos. T-5522, T-5521, T-5520, T-5517, and T-5518, respectively, are satisfactory.

This compilation has been compared with the plane table sheets executed by Lieut. Wm. D. Patterson's party in 1934-1935 and was found to agree satisfactorily with main shore detail. There were some variations between the two, mostly in cases where the comparison extended into the several bayous of the region and these are discussed in detail as follows:

(a) Pretty Bayou. There are some differences of as much as 10 meters between the plane table shoreline and that developed from the radial line plot. Plane table shoreline is shown on the compilation in blue.
(b) Snack Bayou. There are some differences of as much as 5 meters between the two shorelines in this bayou. Plane table shoreline is shown in blue.

(c) Sheephead Bayou. There is one maximum difference of 10 meters between the two shorelines in this bayou, probably due to differences in interpretation of the high-water line. Plane table shoreline is shown in blue.

(d) Watson Bayou. The largest and most extensive discrepancies in shoreline and shoreline detail occur in this bayou, the maximum difference being as much as 25 meters. Plane table shoreline is shown in blue. Due to these differences the U. S. No. 98 highway bridge crossing this bayou, as shown on the compilation, does not agree with the position for this bridge as shown on the plane table sheet. For this reason, the position for Station RAT, which is on the south side of this bridge, was determined by radial line intersection and scaled from the compilation. The difference between the position for this station as determined by this method and as determined by plane table methods is shown as follows:

\[
\begin{array}{c|c|c}
\text{Station} & \text{RAT, from plane table sheet} & \text{RAT, from radial line intersection} \\
& 30^\circ 09' & 30^\circ 09' \\
& 85^\circ 38' & 85^\circ 38' \\
& (1112.0) & (1114.0) \\
& 735.5 & 733.5 \\
& (542.5) & (563.6) \\
& 1051.5 & 1042.1 \\
\end{array}
\]

Due to differences between shoreline detail in the vicinity of Station QUE, this station was not transferred to the compilation from the plane table sheet. It is not possible to compare positions, in this case, as the position for this station was not determined by radial line intersection.

(e) Main shoreline opposite Southern Kraft Corp. There is a maximum difference of 20 meters between the two shorelines at this point. It is believed the difference in this case is due to difference in interpretation of the high water line.

V. LANDMARKS:

Landmarks of value to navigation in this area are submitted by the hydrographic party under Lieut. Wm. D. Patterson. Chart Letter 461(1925)
VI. RECOMMENDATIONS FOR FURTHER SURVEYS:

To the best of my knowledge, this sheet is complete in all detail of importance for charting purposes and no additional survey is required.

Submitted by: L. L. Wright
Draftsman.

Approved by: W. H. Reese,
Chief of Party.
Memorandum to accompany Sheet No. T-5519

Station DRUMMOND (U.S.E.) was located by a short traverse, from triangulation station DRUMMOND 2 (1932), and its geographic position computed by Lieut. Wm. D. Patterson. DRUMMOND (U.S.E.) held in the radial line plot and is shown on this sheet by a 2.5 mm. circle.

E. L. Fitch
Surveyor, C. & G. S.
## GEOGRAPHIC NAMES

Survey No. T-5519  
Date. August 14, 1935  
Chart No. 184  
Diagram No. 

**FLORIDA**

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

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

Under investigation. Q

\[ \text{Applied to 869} \ 5-27-46 \]

<table>
<thead>
<tr>
<th>Status</th>
<th>Name on Survey</th>
<th>Name on Chart</th>
<th>New Names in local use</th>
<th>Names assigned by Field</th>
<th>Location</th>
</tr>
</thead>
<tbody>
<tr>
<td>✓</td>
<td>North Bay</td>
<td>✓</td>
<td>Same</td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Pretty Bayou</td>
<td>✓</td>
<td>✓</td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Dyers Point</td>
<td>✓</td>
<td>✓</td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Lake Huntington</td>
<td>✓</td>
<td>Same</td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓</td>
<td>St Andrew</td>
<td>✓</td>
<td>Same</td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Panama City</td>
<td>✓</td>
<td>✓</td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓</td>
<td>St Andrew Bay</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Bear Point</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Puena Vista Point</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Funks Cove</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Watson Bayou</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Millville</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓</td>
<td>Town Point</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Redfish Point</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Courtney Point</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Smack Bayou</td>
<td>✓</td>
<td>Same</td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓</td>
<td>Sheephead Bayou</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Freshwater Bayou</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Dosten Bayou</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓</td>
<td>Lake Ware</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓ ✓</td>
<td>Massaline Bayou</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>✓</td>
<td>Baker Point</td>
<td>✓</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Names underlined in red are approved. W.J.W.
Comparison with Graphic Control Surveys

T-6304 (1935) 1:10,000. Covers western part of T-5519. On page 5 of the Descriptive Report differences of as much as 10 meters in Pretty Bayou are mentioned. The compilation shoreline is accepted. The difference is probably due to a swing in azimuth in the plane table work. One recoverable station YEL (Stack) is shown on T-6304 in this area. Although this station could not be accurately identified in the photographs it is considered slightly in error and is not shown on this survey.

T-6284 (1935) 1:10,000. Covers eastern part of T-5519. On page 6 of the descriptive report a maximum difference in shoreline at the Southern Kraft Corp. is noted. This difference is no doubt due to interpretation. Also as mentioned on page 6 of the descriptive report differences are noted in Watson Bayou. The compilation is accepted. Recoverable station 89X (Stack) was cut in by the radial plot and a new position obtained some ten meters south of the position on T-6284. Recoverable station CUP (Gable of Boathouse) was checked by the radial plot.

T-6302 (1935) 1:10,000. Covers major portion of T-5519. As mentioned on page 6 of the descriptive report differences exist in Smack Bayou (30°07'31", 86°40'0"), Sheephead Bayou (30°07'33", 86°39'3/4") and Watson Bayou (30°09'1", 86°38'1"), see also DE-7462. In Smack Bayou and Sheephead Bayou the differences are probably due to interpretation. In Watson Bayou the differences amount to as much as 25 meters and are apparently due to a swing in azimuth in the plane table work. The photographs were replotted in the office and the compilation checked. Adjusted positions for the two piles, just north of 30°09'1" were determined and are shown on this survey. As stated in the descriptive report the radial plot furnished a different position for the described station RAT. A new position was determined for described station QUE. Recoverable station PAR (pile) was not visible in the photographs. Its position was adjusted and is shown on T-5519.

All three of the above surveys show low water lines. These low water lines have not been transferred to T-5519. T-5519 shows all detail over the common area on T-6302, T-6304, and T-6284, except low
water lines, 0 YEL (Stack), Magnetic meridians, and temporary signals. New positions are given for several of the recoverable stations as mentioned above.

Comparison with Contemporary Hydrographic Surveys.

H-5782 (1835) 1:10,000.

The shoreline of T-5519 conflicts in several places with the hydrography, the most serious conflict being in Watson Bayou north 30° 08'3'. The shoreline for the hydrographic survey is from T-6302 and T-6284. The discrepancies between T-5519 and these two plane table surveys as discussed under Comparison with Graphic Control Surveys, naturally influence the hydrography.

Since H-5782 has been verified, inked and reviewed, this matter has been called to the attention of the Chief of Field Records Section for disposal.

Several piles, wrecks, fishing stakes, etc., which are not visible in the photographs are shown on the hydrographic survey. They have not been transferred to T-5519.

H-5783 (1835) 1:10,000.

There are a few slight conflicts between the shoreline of T-5519 and the hydrography due to the fact that the hydrographic shoreline in this area is from T-6304. This has been called to the attention of the Chief of Field Records Section.

There is a pile on H-5783 at 30° 10'3', 85° 42'3' which is not visible in the photographs and has not been transferred to T-5519.

Comparison with Previous Topographic Surveys.

T-477 (1855) 1:20,000
T-1146 (1870) 1:20,000
T-1147 (1870) 1:20,000

There has been very little change in shoreline in this area since these old surveys.

T-5519 is adequate to supersede T-477, T-1146, and T-1147 over the common area except for contours.

Comparison with Chart 184.

Several of the docks shown on the chart have been removed and new ones built. Changes and additions have also occurred in the street and road systems.
The wreck on the chart at 30°08', 85°37'-3/4', is shown on this survey as 0 OLD BOILER.

All aids to navigation and landmarks shown on the chart and recommended by the field (Chart letter 467 (1935) are shown on this survey.

REVIEW OF AIR PHOTO COMPILATION NO. T-5519

Chief of Party: M. H. Reese
Compiled by: L. L. Wright

Project: Florida Compilation
Instructions dated: June 7, 1934

1. The charts of this area have been examined and topographic information necessary to bring the charts up to date is shown on this compilation. (Par. 16a, b, c, d, e, g and i; 26; and 64)
   Yes.

2. Change in position, or non-existence of wharfs, lights, and other topographic detail of particular importance to navigation which affect the chart, is discussed in the descriptive report. (Par. 28; and 66 g, n)
   Noted in report.

3. Ground surveys by plane table, sextant, or theodolite have been used to supplement the photographic plot where necessary to obtain complete information, and all such surveys are discussed in the descriptive report. (Par. 65; and 66 d, e)
   No supplementary survey necessary.

4. Blueprints and maps from other sources which were transmitted by the field party contain sufficient control for their application to the charts. (Par. 88)
   None were submitted.

5. Differences between this compilation and contemporary plane table and hydrographic surveys have been examined and rectified in the field before forwarding the compilations to the office and are discussed in the descriptive report.
   Yes.

6. The control and adjustment of the photo plot are discussed in the descriptive report. Unusual or large adjustments are discussed in detail and limits of the area affected are stated. (Par. 12b; 44; and 66 c, h, i)
   Mentioned in report.

7. High water line on marshy and sandy coast is clear and adequate for chart compilation. (Par. 16a, 43, and 44)
   Yes.

NOTE: Strike out paragraphs, words or phrases not applicable and modify those requiring it. Paragraph numbers refer to those in the Topographic Manual. Refer also to the pamphlet "Notes on the Compilation of Planimetric Line Maps from Five Lens Air Photographs."
9. The representation of low water lines, reefs, shoals, and rocks, and legends pertaining to them is satisfactory. (Par. 36, 37, 38, 39, 40, 41)

   Mentioned in report.

9. Recoverable objects have been located and described on Form 524 in accordance with circular 30, 1933, circular letter of March 3, 1933, and circular 31, 1934. (Par. 29, 30, and 57)

By Lieut. Wm. D. Patterson's hydrographic party.

Filed under T-6202, T-6301, T-6284, T-6559

10. A list of landmarks was furnished on Form 567 and instructions in the Director's letter of July 15, 1934, Landmarks for Charts, complied with. (Par. 16d, e, and 60)

   By Lieut. Wm. D. Patterson's party. Chart letter 467 (1935)

11. All bridges shown on the compilation are accompanied by a note stating whether fixed or draw, clearance, and width of draw if a draw bridge. Additional information of importance to navigation is given in the descriptive report. (Par. 16c)

   Shown on overlay.

12. Geographic names are shown on the overlay tracing. The accepted local usage of new names has been determined and they are listed in the report, together with a general statement as to source of information and a specific statement when advisable. Complete discussion of place names differing from the charts and from the U. S. G. S. Quadrangles is given in the descriptive report, together with reasons for recommendations made. (Par. 64, and 66k)

   Yes.

13. The geographic datum of the compilation is N. A. 1927 and the reference station is correctly noted. (Unadjusted)

   Yes.

14. Junctions with adjoining compilations have been examined and are in agreement. (Par. 66j)

   Yes.

15. The drafting is satisfactory and particular attention has been given the following:

   Yes.

1. Standard symbols authorized by the Board of Surveys and Maps have been used throughout except as noted in the report.

2. The degrees and minutes of Latitude and Longitude are correctly marked.
3. All station points are exactly marked by fine black dots.

4. Closely spaced lines are drawn sharp and clear for printing.

5. Topographic symbols for similar features are of uniform weight.

6. All drawing has been retouched where partially rubbed off.

7. Buildings are drawn with clear straight lines and square corners where such is the case on the ground.

(Par. 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 48)

16. No additional surveying is recommended at this time.

17. Remarks:

18. Examined and approved;

\[\text{[Signature]}
\text{Chief of Party}\n
19. Remarks after review in office:

Reviewed in office by: \[\text{[Signature]}\]

Examined and approved:

\[\text{[Signature]}
\text{Chief, Section of Field Records}

\[\text{[Signature]}
\text{Chief, Division of Charts}

\[\text{[Signature]}
\text{Chief, Section of Field Work}

\[\text{[Signature]}
\text{Chief, Division of Hydrography and Topography.}