

TP-00890

TP-00890

NOAA FORM 76-35

U.S. DEPARTMENT OF COMMERCE  
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION  
NATIONAL OCEAN SURVEY

### DESCRIPTIVE REPORT

Type of Survey .. Special Surveys.....  
Job No. CM-7501..... Map No. TP-00890....  
Classification No. Final Edition No. ....1.....  
Field Edited Map

#### LOCALITY

State .. North Carolina.....  
General Locality .. Oregon Inlet.....  
Locality .. Davis Channel.....

1974 TO 1975

#### REGISTRY IN ARCHIVES

DATE .....

NOAA FORM 76-36A (3-72)	U. S. DEPARTMENT OF COMMERCE NATIONAL OCEANIC AND ATMOSPHERIC ADMIN.	TYPE OF SURVEY <input checked="" type="checkbox"/> ORIGINAL <input type="checkbox"/> RESURVEY <input type="checkbox"/> REVISED	SURVEY TP. <u>00890</u> MAP EDITION NO. <u>(1)</u> MAP CLASS <u>Final</u> JOB <u>CM 7501</u>
		<b>DESCRIPTIVE REPORT - DATA RECORD</b>	

PHOTOGRAMMETRIC OFFICE Coastal Mapping Division, Norfolk	<b>LAST PRECEDING MAP EDITION</b> TYPE OF SURVEY <input type="checkbox"/> ORIGINAL <input type="checkbox"/> RESURVEY <input type="checkbox"/> REVISED	JOB PH. _____ MAP CLASS _____ SURVEY DATES: 19__ TO 19__
OFFICER-IN-CHARGE Cdr. Jeffrey G. Carlen		

<b>I. INSTRUCTIONS DATED</b>	
<b>1. OFFICE</b>	<b>2. FIELD</b>
General Instructions-OFFICE-1/23/75	Instructions-FIELD-10/22/74 Instructions-PHOTOGRAPHY-10/31/74 Instructions-FIELD EDIT-6/30/75

<b>II. DATUMS</b>	
<b>1. HORIZONTAL:</b> <input checked="" type="checkbox"/> 1927 NORTH AMERICAN	OTHER (Specify)
<b>2. VERTICAL:</b> <input checked="" type="checkbox"/> MEAN HIGH-WATER <input checked="" type="checkbox"/> MEAN LOW-WATER <input type="checkbox"/> MEAN LOWER LOW-WATER <input type="checkbox"/> MEAN SEA LEVEL	OTHER (Specify) National Geodetic Vertical Datum of 1929
<b>3. MAP PROJECTION</b> Lambert Conformal	<b>4. GRID(S)</b> STATE ZONE North Carolina N.A. STATE ZONE
<b>5. SCALE</b> 1:5,000	

<b>III. HISTORY OF OFFICE OPERATIONS</b>		
<b>OPERATIONS</b>	<b>NAME</b>	<b>DATE</b>
<b>1. AEROTRIANGULATION</b> Analytic Block METHOD: Adjustment LANDMARKS AND AIDS BY	I. Raborn N.A.	3/75
<b>2. CONTROL AND BRIDGE POINTS</b> METHOD: Coradomat PLOTTED BY CHECKED BY	D. Phillips N.A.	3/75
<b>3. STEREOSCOPIC INSTRUMENT</b> COMPILATION INSTRUMENT: B-8 Photobathymetry SCALE: 1:4,000 pan. to 1:5,000	PLANIMETRY BY CHECKED BY N.A. N.A. J. Byrd & J. Hancock R.R. White	6/75 6/75
<b>4. MANUSCRIPT DELINEATION</b> METHOD: Photobathymetry Smooth compilation drafting SCALE: 1:5,000	PLANIMETRY BY CHECKED BY N.A. N.A. R.R. White J.L. Hancock N.A. N.A.	6/75 6/75
<b>5. OFFICE INSPECTION PRIOR TO FIELD EDIT</b> BY	J.W. Vonasek	6/75
<b>6. APPLICATION OF FIELD EDIT DATA</b> BY CHECKED BY	R.R. White J.W. Vonasek	7/75 7/75
<b>7. COMPILATION SECTION REVIEW</b> BY	J.W. Vonasek	7/75
<b>8. FINAL REVIEW</b> BY	E.L. Rolle	6/29/76
<b>9. DATA FORWARDED TO PHOTOGRAMMETRIC BRANCH</b> BY		
<b>10. DATA EXAMINED IN PHOTOGRAMMETRIC BRANCH</b> BY	E.L. Rolle	6/29/76
<b>11. MAP REGISTERED - COASTAL SURVEY SECTION</b> BY	R.T. Carter	11/76

TP-00890

COMPILATION SOURCES

1. COMPILATION PHOTOGRAPHY

CAMERA(S) Wild RC-10 3.5" f.l. Wild RC-8 6" focal length		TYPES OF PHOTOGRAPHY LEGEND		TIME REFERENCE	
TIDE STAGE REFERENCE		(C) <u>COLOR</u> (P) PANCHROMATIC (I) <u>INFRARED B&amp;W</u>		ZONE	
<input type="checkbox"/> PREDICTED TIDES <input type="checkbox"/> REFERENCE STATION RECORDS <input checked="" type="checkbox"/> TIDE CONTROLLED PHOTOGRAPHY				Eastern	
				MERIDIAN	
				75th	
				<input type="checkbox"/> DAYLIGHT	
NUMBER AND TYPE	DATE	TIME	SCALE	STAGE OF TIDE	
74C(C) 1406-1408	10/31/74	1425-1426	1:10,000	Refer to the following page for tidal information.	
1437,38,40	10/31/74	1446	1:10,000		
1474,75,76,78	10/31/74	1503-1506	1:10,000		
1705,06,07 11/1/74	<del>10/31/74</del>	1444-1446	1:10,000		
74E(I) 7639R-7641R	10/31/74	1425-1426	1:5,800		
7665R-7668R	10/31/74	1446	1:5,800		
7701R-7704R	10/31/74	1503-1506	1:5,800		
7727R-7730R	10/31/74	1523-1525	1:5,800		
7753R-7757R	10/31/74	1542-1544	1:5,800		
7837R-7840R 11/1/74	<del>10/31/74</del>	1444-1446	1:5,800		
REMARKS 7864R-7868R 11/1/74	<del>10/31/74</del>	1501-1503	1:5,800		

2. SOURCE OF MEAN HIGH-WATER LINE:

There is no MHW line on this map.

3. SOURCE OF MEAN LOW-WATER OR MEAN LOWER LOW-WATER LINE:

The source of the MLW line is the tide-coordinated color photography and ratioed prints of the B&W infrared photography listed above under item 1.

4. CONTEMPORARY HYDROGRAPHIC SURVEYS (List only those surveys that are sources for photogrammetric survey information.)

SURVEY NUMBER	DATE(S)	SURVEY COPY USED	SURVEY NUMBER	DATE(S)	SURVEY COPY USED

5. FINAL JUNCTIONS

NORTH	EAST	SOUTH	WEST
TP-00888 TP-00889	TP-00891	No contemporary survey	

REMARKS As this is a special job, no attempt was made to junction with other NOS jobs in this area.

TIDE - COORDINATED PHOTOGRAPHY  
TP - 00890

<del>LOCATION AND</del> PHOTOGRAPHY	TIDE STATIONS <i>(In operation at time of photography)</i>		STAGE OF TIDE	MEAN RANGE
	TIDE STATION	TIDAL ZONE*	FEET	FEET
74C(C) 1406-1408	Davis Slough	2	+0.02 MLW	0.9
1406-1408	" "	7	0.00 MLW	1.2
1437-1440	" "	2	+0.07 MLW	0.9
1437-1440	" "	7	0.00 MLW	1.2
1474-1478	" "	2	+0.09 MLW	0.9
1705-1707	" "	2	+0.08 MLW	0.9
74E7639R-7641R	Davis Slough	2	+0.02 MLW	0.9
7639R-7641R	" "	7	0.00 MLW	1.2
7665R-7668R	" "	2	+0.07 MLW	0.9
7665R-7668R	" "	7	0.00 MLW	1.2
7701R-7704R	" "	2	+0.09 MLW	0.9
7727R-7730R	" "	2	+0.17 MLW	0.9
7753R-7757R	" "	2	+0.29 MLW	0.9
7837R-7840R	" "	2	+0.08 MLW	0.9
7864R-7868R	" "	2	+0.07 MLW	0.9

REMARKS:  
  
\* Refer to the following page for a Tidal Zone Diagram.



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NOAA FORM 76-36C  
(3-72)

U. S. DEPARTMENT OF COMMERCE  
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION  
NATIONAL OCEAN SURVEY

TP-00890  
HISTORY OF FIELD OPERATIONS

I.  FIELD INSPECTION OPERATION  FIELD EDIT OPERATION

OPERATION	NAME	DATE
1. CHIEF OF FIELD PARTY	R.S. Tibbetts L.F. Beugnet	10/74 7/75
2. HORIZONTAL CONTROL	RECOVERED BY	R.S. Tibbetts 10/74
	ESTABLISHED BY	R.S. Tibbetts 10/74
	PRE-MARKED OR IDENTIFIED BY	R.S. Tibbetts 10/74
3. VERTICAL CONTROL	RECOVERED BY	R.S. Tibbetts 10/74
	ESTABLISHED BY	R.S. Tibbetts 10/74
	PRE-MARKED OR IDENTIFIED BY	R.S. Tibbetts 10/74
4. LANDMARKS AND AIDS TO NAVIGATION	RECOVERED (Triangulation Stations) BY	NA
	LOCATED (Field Methods) BY	NA
	IDENTIFIED BY	NA
5. GEOGRAPHIC NAMES INVESTIGATION	TYPE OF INVESTIGATION <input checked="" type="checkbox"/> COMPLETE <input type="checkbox"/> SPECIFIC NAMES ONLY <input type="checkbox"/> NO INVESTIGATION BY	L.F. Beugnet 7/75
6. PHOTO INSPECTION	CLARIFICATION OF DETAILS BY	NA
7. BOUNDARIES AND LIMITS	SURVEYED OR IDENTIFIED BY	NA

II. SOURCE DATA

1. HORIZONTAL CONTROL IDENTIFIED All stations pre-marked	2. VERTICAL CONTROL IDENTIFIED All stations pre-marked
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PHOTO NUMBER	STATION NAME	PHOTO NUMBER	STATION DESIGNATION

3. PHOTO NUMBERS (Clarification of details)

4. LANDMARKS AND AIDS TO NAVIGATION IDENTIFIED

PHOTO NUMBER	OBJECT NAME	PHOTO NUMBER	OBJECT NAME

5. GEOGRAPHIC NAMES: <input checked="" type="checkbox"/> REPORT <input type="checkbox"/> NONE	6. BOUNDARY AND LIMITS: <input type="checkbox"/> REPORT <input checked="" type="checkbox"/> NONE
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7. SUPPLEMENTAL MAPS AND PLANS  
None

8. OTHER FIELD RECORDS (Sketch books, etc. DO NOT list data submitted to the Geodesy Division)  
1 CSI card NOAA FORM 76-53  
1 CSI card FORM C/GS-152

TP-00890

RECORD OF SURVEY USE

I. MANUSCRIPT COPIES

COMPILATION STAGES			DATE MANUSCRIPT FORWARDED	
DATA COMPILED	DATE	REMARKS	MARINE CHARTS	HYDRO SUPPORT
Compilation complete pending field edit	7/3/75	Class III Manuscript		7/3/75
Field Edit Applied	7/22/75	Class I Manuscript		

II. LANDMARKS AND AIDS TO NAVIGATION

1. REPORTS TO MARINE CHART DIVISION, NAUTICAL DATA BRANCH

NUMBER	CHART LETTER NUMBER ASSIGNED	DATE FORWARDED	REMARKS

2.  REPORT TO MARINE CHART DIVISION, COAST PILOT BRANCH. DATE FORWARDED: \_\_\_\_\_

3.  REPORT TO AERONAUTICAL CHART DIVISION, AERONAUTICAL DATA SECTION. DATE FORWARDED: \_\_\_\_\_

III. FEDERAL RECORDS CENTER DATA

- BRIDGING PHOTOGRAPHS;  DUPLICATE BRIDGING REPORT;  COMPUTER READOUTS.
- CONTROL STATION IDENTIFICATION CARDS;  FORM NOS 567 SUBMITTED BY FIELD PARTIES.
- SOURCE DATA (except for Geographic Names Report) AS LISTED IN SECTION II, NOAA FORM 76-36C. ACCOUNT FOR EXCEPTIONS:
- DATA TO FEDERAL RECORDS CENTER. DATE FORWARDED: \_\_\_\_\_

IV. SURVEY EDITIONS (This section shall be completed each time a new map edition is registered)

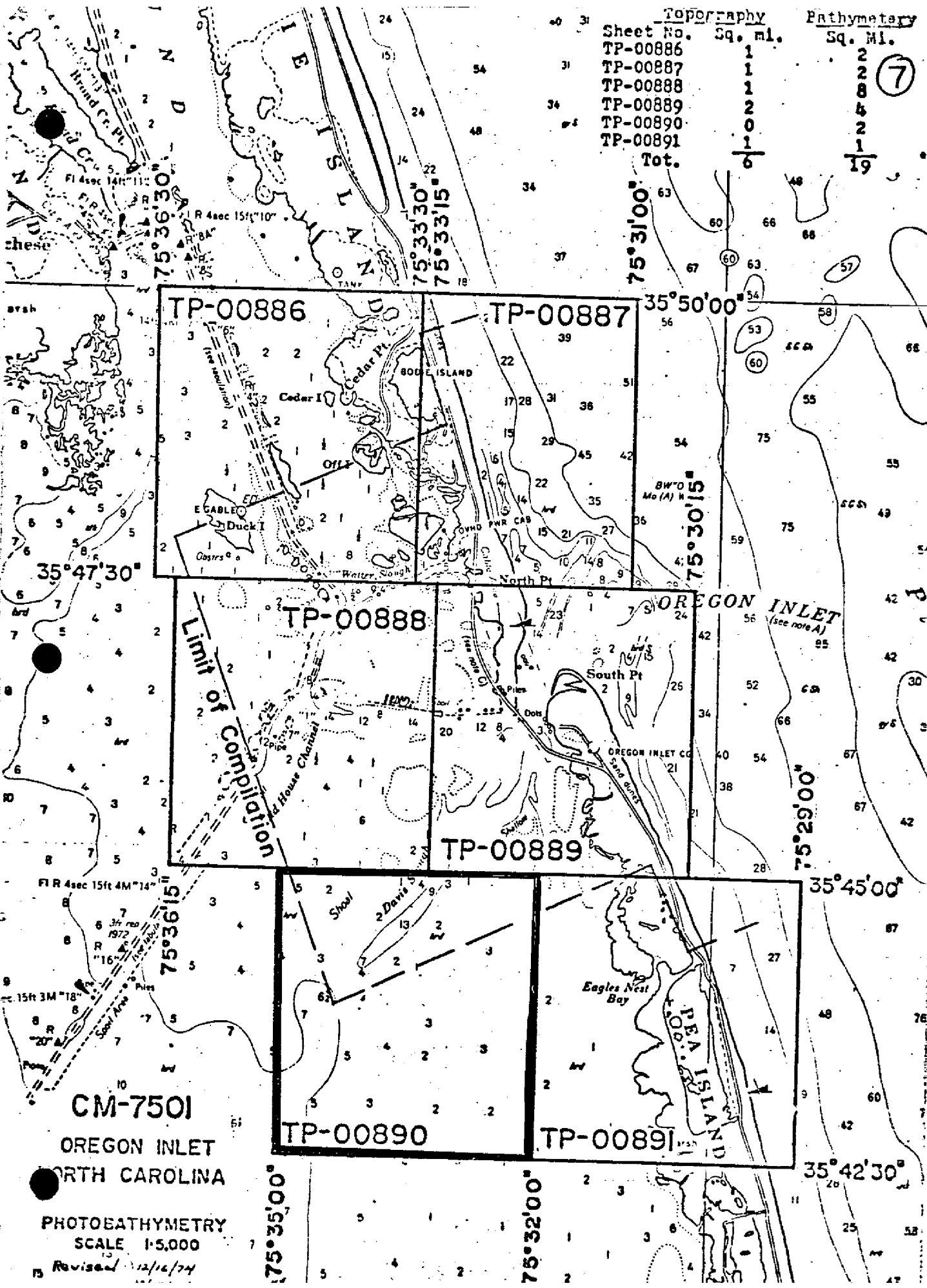
SECOND EDITION	SURVEY NUMBER TP - _____ (2)	JOB NUMBER PH - _____	TYPE OF SURVEY <input type="checkbox"/> REVISED <input type="checkbox"/> RESURVEY  MAP CLASS <input type="checkbox"/> II. <input type="checkbox"/> III. <input type="checkbox"/> IV. <input type="checkbox"/> V. <input type="checkbox"/> FINAL
	DATE OF PHOTOGRAPHY	DATE OF FIELD EDIT	
THIRD EDITION	SURVEY NUMBER TP - _____ (3)	JOB NUMBER PH - _____	TYPE OF SURVEY <input type="checkbox"/> REVISED <input type="checkbox"/> RESURVEY  MAP CLASS <input type="checkbox"/> II. <input type="checkbox"/> III. <input type="checkbox"/> IV. <input type="checkbox"/> V. <input type="checkbox"/> FINAL
	DATE OF PHOTOGRAPHY	DATE OF FIELD EDIT	
FOURTH EDITION	SURVEY NUMBER TP - _____ (4)	JOB NUMBER PH - _____	TYPE OF SURVEY <input type="checkbox"/> REVISED <input type="checkbox"/> RESURVEY  MAP CLASS <input type="checkbox"/> II. <input type="checkbox"/> III. <input type="checkbox"/> IV. <input type="checkbox"/> V. <input type="checkbox"/> FINAL
	DATE OF PHOTOGRAPHY	DATE OF FIELD EDIT	

Topography

Bathymetry

Sheet No.	Sq. mi.	Sq. Mi.
TP-00886	1	2
TP-00887	1	2
TP-00888	1	2
TP-00889	2	4
TP-00890	0	2
TP-00891	1	1
<b>Tot.</b>	<b>6</b>	<b>19</b>

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CM-7501

OREGON INLET  
NORTH CAROLINA

PHOTOBATHYMETRY  
SCALE 1:5,000

Revised 12/11/74

TP-00886

TP-00887

TP-00888

TP-00889

TP-00890

TP-00891

Limit of  
Compilation

OREGON INLET  
(see note A)

EAGLE'S NEST BAY  
PEA ISLAND

these

dash

35°47'30"

FR 4sec 15ft 4M"14"

15ft 3M"18"

75°35'00"

75°32'00"

35°45'00"

35°42'30"

75°36'30"

75°33'30"

75°33'15"

75°31'00"

75°30'15"

75°29'00"

35°50'00"

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these

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SUMMARY  
TP-00886 thru TP-00891

Under a cooperative agreement with the Corps of Engineers, Wilmington District, which became effective in October 1974, these six maps (TP-00886 thru TP-00891) were compiled at 1:5,000 scale in the area of Oregon Inlet, North Carolina.

The purpose of this special survey is to provide data for the Corps of Engineers on siltration rates in the entrance channel, possible impacts of entrance channel deepening on adjacent beaches, possible changes effected by dredging on the tidal prism and the circulation pattern, to update and establish tidal datums, and to update nautical charts covering the area.

Field operations, which began in October 1974, generally consisted of aerial photography, establishment of tidal datums, pre-marking of horizontal and vertical control, and field edit.

Aerotriangulation and compilation tide-coordinated photography was furnished at 1:10,000 scale from natural color film taken with the Wild RC-10 super-wide-angle camera. Supplemental black-and-white infrared tide-coordinated photography at 1:5,800 scale, taken concurrently in an independent mode using infrared film in the RC-8 camera, was also furnished.

Six strips of the 1:10,000 scale color photography were bridged by analytic aerotriangulation methods and adjusted to ground with the block adjustment. Thirteen horizontal control stations and twenty-four vertical control stations were weighted in the block adjustment. This provided horizontal and vertical control for compilation.

Compilation photography was the 1:10,000 scale color photography and the supplemental infrared photography. The Wild B-8, using the 1:10,000 scale photography, was used to compile planimetry, topography, and photobathymetry. The topography consists of 2-foot interval contours and spot elevations referred to the Mean Low Water Datum established by NOS. The photobathymetry consists of discrete soundings and 2-foot interval depth curves referred to the Mean Low Water Datum established by NOS.

All line work is smooth compilation drafting.

One plastic copy of each map, ten ozalid copies of each map, and one set of color printons covering the project were forwarded to:

Department of the Army  
Wilmington District, Corps of Engineers  
P.O. Box 1890  
Wilmington, NC 28401  
ATTN: Mr. R.P. Masterson, Jr.

A Chart Maintenance Print for each map was submitted to the Marine Chart Division.

The following items are registered in the Bureau Archives:

1. A plastic copy of each map (1:5,000 scale)
2. A Descriptive Report for each map

Negatives for each map are filed in the Reproduction Division.

All field data are filed in the National Archives.

FIELD OPERATIONS REPORT  
SPECIAL SURVEYS  
OREGON INLET, N. C.  
JOB CM-7501

Operations commenced on October 16, 1974. A total of 25 pre-marks, 15 horizontal and 10 vertical, were placed in position by October 26, 1974. Horizontal panel no. 3 and vertical panel no. 16 were combined into one station due to their proximity. One extra horizontal control panel, included in the above total, was placed near Hill, 1974 which is an auxiliary station used in locating some of the other control stations. Photography commenced on October 31, 1974 and was completed November 1, 1974. A total of eight lines were flown with two of them being reflown on the 1st. No high water photography was taken.

Ten of the paneled control stations were in water. These panels were placed in position by jetting down, with a small gasoline powered pump, four two by fours 12 feet in length to a depth of stability. The two by fours were then braced diagonally from the center with one by fours and laterally with fourteen gauge galvanized wire. The panels were then fastened to the top of the resulting structure. All control was paneled with the same configuration of panels. No distinctions were made between vertical control panels and horizontal control panels, i.e., both have 1.6 foot equilateral triangles for center panels and rectangular wing panels.

Nine of the horizontal control stations were located by three point theodolite fixes with check angles. Three were located by traverse, four by angle and distance, one by solar azimuth and distance, and one station was marked direct. The vertical control stations in the water were located with sextant fixes which are included on the back of their respective Control Station Identification Cards. Traverses and three point fixes were entered in Form 76-52 Observation of Horizontal Directions which is enclosed with this report.

Information regarding angles and distances, solars and stations marked direct are included on the respective Control Station Identification card of the station involved.

A total of fifteen miles of levels was run to establish elevations on the National Geodetic Vertical Datum of 1929 on seven horizontal control panels and one vertical control panel. These are panel nos. 1, 2, 3 and 16 combined, 9, 10, 11, 12 and 21. Elevations of panel nos. 13, 14 and 15 were effected by transferring the water level from the Davis Slough Tide Staff. Elevations are given in feet above staff zero as no NGVD elevation was available for the staff. Water level transfers were made to panel nos. 7, 22 and 23 from Davis Slough Tide Staff and Old House Slough Tide Staff. Once again elevations were given in feet above staff zero as no NGVD elevations were available for the staffs. Panel nos. 17 and 19 had elevations transferred from the Oregon Inlet Marina Tide Staff and the Duck Island Tide Staff. The statement regarding elevations of previous panels also applies to these panels. The elevations for panel nos. 24 and 25 was transferred by water level from No Name Tide Staff. Panel no. 18 was transferred from the Duck Island Tide Staff as were the water level stakes for panel nos. 4



and 5. Two water level stakes were used for panel no. 5 as an island was directly between the panel and the tide staff involved. The water level between the two stakes checked almost flat.

Panel nos. 8 and 20 were leveled directly from the Main Channel Tide Staff by differential levels. Elevations were given in feet above staff zero as no NCVD elevation for the staff was available.

The extra panel near Hill 1974 and panel no. 6 were leveled directly from Old House Slough Tide Staff by differential levels. Once again elevations were given above staff zero as no NCVD elevation for the staff was available.

Water transfers of elevations to panel nos. 7, 13, 14, 15, 18, 19, 22, 23 and 24 were made by using a level rod as a portable tide staff. The rod was held in the water against the center panel and wigged around until settlement in the sandy bottom ceased. The top of the panel on the rod was then read and observations commenced on the water level on the rod. Simultaneous observations were made on the respective tide staffs and transmitted by radio to the party at the panel, by subtracting the mean water level reading on the rod from the reading at the top of the panel and adding the result to the mean tide staff reading, the elevations of the panels above zero of the tide staffs involved was obtained.

Elevations were transferred to panel nos. 4, 5, 17 and 25 by using a combination of water level and differential leveling. A stake was driven to water level near the stations while tide staff observations were transmitted via radio to the level party. Differential levels were then run from the water level stakes to the panels. By adding the height of the panel above the stake to the mean staff reading, the elevations of the panels above zero of the respective staffs were obtained.

Names used for the tide staffs involved in the above operations were indicated on the job diagram which is included with this report. Information obtained was entered in several Forms 76-77. Levels run to the land stations were entered in Form 638 Wye Leveling. Both are included with this report.

Tide observations during photography and leveling to the Jennette's Pier Tide Staff and the Oregon Inlet Bridge Tide Staff were entered in Form 76-77 Leveling Record - Tide Station. Prior levels had been run to the Jennette's Pier Tide Staff by a tide party from Rockville office. No such levels were run to the Oregon Inlet Bridge Tide Staff. A new tidal bench mark (No. 5, 1974) was established near Oregon Inlet Bridge Tide Staff and this mark was then tied to the existing marks at the Oregon Inlet Marina. The elevations obtained were referred to the zero of the Oregon Inlet Bridge Tide Staff.

Field work was completed on November 19, 1974 and all control panels were removed by November 21st. All pertinent data was completed and sent to Rockville on November 25, 1974.

*Richard E. Kesselring*  
Richard E. Kesselring  
Surveying Technician  
Photo Party 62

NOTE: There was no field inspection of the tide staffs.

Photogrammetric Plot Report  
Oregon Inlet, North Carolina  
CM-7501  
March 1975

21. Area Covered

This report pertains to six sheets in the vicinity of Oregon Inlet, North Carolina. The Sheets (1:5,000) are TP-00886 thru TP-00891.

22. Method

Six strips (see sketch) of 1:10,000-scale color photography were bridged by analytic aerotriangulation methods and adjusted to ground with the block adjustment program. Points were established for determining ratios of 1:5,800-scale infrared support photography and also the bridging photography. Common points were located between strips 6 and 7 in order to set models in strip 7 if needed. Data for ruling projections were furnished to the Calcomp to be plotted in the North Carolina State plane coordinate system.

23. Adequacy of Control

The control was adequate, but horizontal panel number 2 (Bodie Island L.H. 1875, SS"A") did not meet the National Map Accuracy Standards in either of the strips or the block. Since the home station was "floated" and fit the adjustment, the substation was eliminated from the adjustment. Thirteen horizontal control stations were weighted in the adjustment. The largest residual in the fit to horizontal control was 1.7 feet.

Twenty-four vertical control stations were weighted. The largest residual in the fit to these stations was 0.72 foot.

24. Supplemental Data

USGS quadrangles were used to provide vertical control for some of the strips adjustment.

25. Photography

The photography was adequate as to coverage, overlap, and definition.

Respectfully submitted,

*Ivey O. Raborn*  
Ivey O. Raborn

Approved and forwarded:

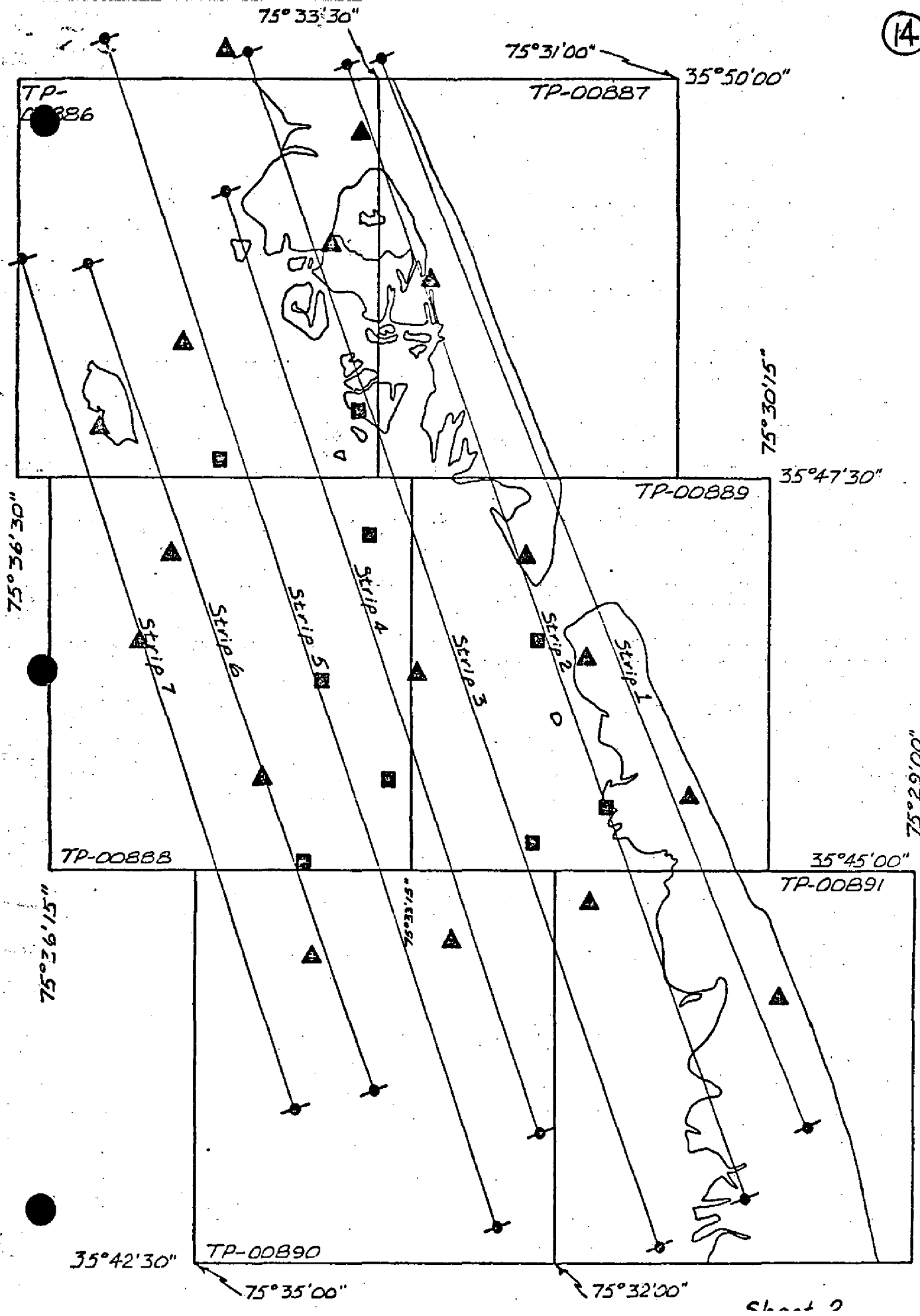
*John D. Perrow, Jr.*  
John D. Perrow, Jr.  
Chief, Aerotriangulation Section

JOB CM-7501  
OREGON INLET  
NORTH CAROLINA

1:5000 SCALE

JAN '75

- STRIP 1 1:10000 Color 74C(©)1236-1267  
1:5800 B/w IR 74E 7524R-7553R
- STRIP 2 1:10000 Color 74C(©)1307-1339  
1:5800 B/w IR 74E 7567R-7587R  
1:5800 " " " 7590R-7617R
- STRIP 3 1:10000 Color 74C(©)1384-1417  
1:5800 B/w IR 74E 7619R-7647R
- STRIP 4 1:10000 Color 74C(©)1418-1444  
1:5800 B/w IR 74E 7649R-7675R
- STRIP 5 1:10000 Color 74C(©)1448-1484  
1:5800 B/w IR 74E 7678R-7709R
- STRIP 6 1:10000 Color 74C(©)1688-1711  
1:5800 B/w IR 74E 7821R-7748R  
1:5800 B/w IR 74E 7711R-7736R
- STRIP 7 1:10000 Color 74C(©)1718-1744  
1:5800 B/w IR 74E 7849R-7878R  
1:5800 " " " 7738R-7763R







Compilation Report  
TP-00890

31. Delineation

The map was compiled on the Wild-B-8 stereoplotter using the 1:10,000 scale color photography. Black-and-white infrared photography, taken concurrently, was ratioed and used graphically to supplement compilation of the mean low water line and areas of shallow depth.

32. Control

Refer to the Photogrammetric Plot Report bound with this Descriptive Report. The identification, density, and placement of horizontal and vertical control was adequate.

33. Supplemental Data

A diagram, outlining 18 tidal zones within the project area, was furnished. The diagram provided the mean range of tide and the vertical differences between MLW datum and the NGVD of 1929 for each zone.

34. Contour and Drainage - None

35. Shoreline and Alongshore Details - None

The mean low water line was compiled on the B-8 stereoplotter using contour compilation methods. The black-and-white infrared photography was used graphically to supplement compilation of the mean low water line. Control data for this compilation was furnished by field methods and the photogrammetric plot.

Shoal areas were delineated from office interpretation of the photography and referred to the field editor.

36. Offshore Details and Photobathymetry

All discrete underwater depths (soundings), 2-foot interval underwater contours (depth curves), and all other pertinent offshore details were compiled on the B-8 stereoplotter. The photobathymetry is referenced to the mean low water datum established by NOS. Areas of questionable compilation accuracy were referred to the field editor and/or the hydrographic party for verification.

Silt, sun glare, and soft texture of the bottom of Pamlico Sound, in an area north of latitude  $35^{\circ}44'30''$  and west of longitude  $75^{\circ}33'45''$ , impeded compilation of photobathymetry.

37. Landmarks and Aids - None

38. Control for Future Surveys - None

39. Junctions

Refer to Form 76-36B, item #5, submitted with this Descriptive Report.

40. Horizontal and Vertical Accuracy

This map complies with National Map Accuracy Standards.

41. thru 45. Inapplicable

46. Comparison with Existing Maps

A comparison has been made with USGS quadrangle of Pea Island, NC, scale 1:24,000, edition of 1950, photorevised 1970.

47. Comparison with Nautical Charts

A comparison has been made with the following Nautical Charts:

NOS No. 12204(1229), scale 1:80,000, 20th edition, March 8, 1975.

NOS No. 12205(129-SCO), scale 1:40,000, 9th edition, Feb. 22, 1975.

Items to be Applied to Nautical Charts Immediately - None

Items to be Carried Forward - None

Submitted by,

*James L. Byrd*  
James L. Byrd

Approved and forwarded:

*Joseph W. Vonasek*  
Joseph W. Vonasek  
Chief, Special Projects Section, AMC

Approved:  
*Victor E. Serena*  
Victor E. Serena  
Chief, Photogrammetric Branch, AMC

49. NOTES FOR THE HYDROGRAPHER

The Atlantic Hydrographic Party was furnished with preliminary reconnaissance maps of the project area showing approximate shorelines, channels, shallow and shoal areas compiled graphically from the ratio photos.

As the model work progressed, copies of the worksheets were furnished to indicate areas where photobathymetry was being accomplished.

Ozolid copies of the inked manuscripts in an advanced stage of completion were furnished as a final designation of areas lacking photobathymetry.

FIELD EDIT REPORT

JOB CM-7501

OREGON INLET, NC

MAP TP-00890

51. METHODS

The area compiled in this manuscript is comprised entirely of water area, and the field edit was accomplished by skiff. All corrections, additions or deletions have been noted on the field edit ozalid.

52. ADEQUACY OF COMPILATION

With the exception of one tide gage which falls within the compilation limits, all compilation consisted of photogrammetric bathymetry.

54. RECOMMENDATIONS

None

*Leo F. Beugnet*

Leo F. Beugnet  
Supervisory Cartographer

10 July 1975

PHOTOGRAMMETRIC OFFICE REVIEW

TP-00890

1. PROJECTION AND GRIDS JWV	2. TITLE JWV	3. MANUSCRIPT NUMBERS JWV	4. MANUSCRIPT SIZE JWV
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CONTROL STATIONS

5. HORIZONTAL CONTROL STATIONS OF THIRD-ORDER OR HIGHER ACCURACY NA	6. RECOVERABLE HORIZONTAL STATIONS OF LESS THAN THIRD-ORDER ACCURACY (Topographic stations) NA	7. PHOTO HYDRO STATIONS NA
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8. BENCH MARKS NA	9. PLOTTING OF SEXTANT FIXES NA	10. PHOTOGRAMMETRIC PLOT REPORT JWV	11. DETAIL POINTS NA
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ALONGSHORE AREAS (Nautical Chart Data)

12. SHORELINE NA	13. LOW-WATER LINE JWV	14. ROCKS, SHOALS, ETC. JWV	15. BRIDGES NA
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16. AIDS TO NAVIGATION NA	17. LANDMARKS NA	18. OTHER ALONGSHORE PHYSICAL FEATURES NA	19. OTHER ALONGSHORE CULTURAL FEATURES NA
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PHYSICAL FEATURES

20. WATER FEATURES JWV	21. NATURAL GROUND COVER NA	22. PLANETABLE CONTOURS NA
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23. STEREOSCOPIC INSTRUMENT CONTOURS JWV	24. CONTOURS IN GENERAL JWV	25. SPOT ELEVATIONS JWV	26. OTHER PHYSICAL FEATURES NA
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CULTURAL FEATURES

27. ROADS NA	28. BUILDINGS NA	29. RAILROADS NA	30. OTHER CULTURAL FEATURES NA
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BOUNDARIES

31. BOUNDARY LINES NA	32. PUBLIC LAND LINES NA
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MISCELLANEOUS

33. GEOGRAPHIC NAMES JWV	34. JUNCTIONS JWV	35. LEGIBILITY OF THE MANUSCRIPT JWV
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36. DISCREPANCY OVERLAY JWV	37. DESCRIPTIVE REPORT JWV	38. FIELD INSPECTION PHOTOGRAPHS JWV	39. FORMS JWV
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40. REVIEWER <i>Joseph W. Vonasek</i> Joseph W. Vonasek	SUPERVISOR, REVIEW SECTION OR UNIT Special Projects Section
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41. REMARKS (See attached sheet)

FIELD COMPLETION ADDITIONS AND CORRECTIONS TO THE MANUSCRIPT

42. Additions and corrections furnished by the field completion survey have been applied to the manuscript. The manuscript is now complete except as noted under item 43.

COMPILED BY <i>Richard R. White</i> Richard R. White	SUPERVISOR <i>Joseph W. Vonasek</i> Joseph W. Vonasek
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43. REMARKS

Review Report  
Photogrammetric Bathymetry  
and Topographic Map TP-00890  
June 1976

61. General Statement

The map was reviewed in its Class I (field edit applied) stage by the Quality Control Section. The Descriptive Report contains all of the pertinent information which may be required by users of this map.

62. Comparison with Registered Topographic Surveys - None

63. Comparison with Maps of Other Agencies

Refer to the Compilation Report, item #46.

64. Comparison with Contemporary Hydrographic Surveys

Photobathymetry is a component part of the map. A copy of the map was furnished the hydrographic party to provide support for a standard hydrographic survey. The hydrographic survey was accomplished in all areas not covered by photobathymetry. Sounding lines were run to evaluate the photobathymetry and to resolve questions noted by the compilation office.

The Officer-in-Charge, Atlantic Hydrographic Party, had the final authority and responsibility for resolving discrepancies, if any, between hydrographic and photogrammetric data. All accepted photobathymetry was transferred to the smooth sheets and identified as such by the hydrographer.

A comment is carried on the map as follows: Depths on this map may not be final. Refer to contemporary hydrographic surveys of the area for combined photobathymetry and hydrography.

65. Comparison with Nautical Charts

Refer to Compilation Report, item 47.

66. Adequacy of Results and Future Surveys

This map meets the National Standards of Map Accuracy and complies with compilation instructions and Bureau requirements.

Submitted by,  
*E. L. Rolle*  
E.L. Rolle

Approved and forwarded:  
*[Signature]*  
Chief, Photogrammetric Branch

*[Signature]*  
Chief, Coastal Mapping Division

20 August 1975

GEOGRAPHIC NAMES

FINAL NAME SHEET

PH-7501 (Oregon Inlet, North Carolina)

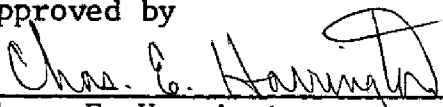
TP-00890

Davis Channel

Pamlico Sound

Pea Island National Wildlife Refuge

Approved by

  
 \_\_\_\_\_  
 Chas. E. Harrington  
 Staff Geographer-C51x2

TP-00890  
National Archives Data

- 1 Discrepancy Print for the Field Editor
- 1 NOAA Form 76-53 Control Station Identification
- 1 Form C&GS-152 Control Station Identification

Photography: None



