

11888

ORIG.

Diag. Cht. No. 903.

Form 504 U. S. DEPARTMENT OF COMMERCE COAST AND GEODETIC SURVEY DESCRIPTIVE REPORT	
Type of Survey	SHORELINE
Field No.	Office No. T-11888
LOCALITY	
State	Puerto Rico
General locality	San Juan to Loiza Aldea
Locality	Catano
<u>19 64-65</u>	
CHIEF OF PARTY J. Bull, Director, Atlantic Marine Center	
LIBRARY & ARCHIVES	
DATE	March 1968

USCOMM-DC 5087

11888

DESCRIPTIVE REPORT - DATA RECORD

T-11888

PROJECT NO. (II):		
21415 PH-6403		
FIELD OFFICE (III):		CHIEF OF PARTY
PHOTOGRAMMETRIC OFFICE (III):		OFFICER-IN-CHARGE
Atlantic Marine Center		J. C. Bull, Director Atlantic Marine Center
INSTRUCTIONS DATED (III) (III):		
September 22, 1964 Field November 17, 1964 Office		
METHOD OF COMPILATION (III):		
Kelsh		
MANUSCRIPT SCALE (III):	STEREOSCOPIC PLOTTING INSTRUMENT SCALE (III):	
1:5,000	1:3,000 pantographed to 1:5,000	
DATE RECEIVED IN WASHINGTON OFFICE (IV):	DATE REPORTED TO NAUTICAL CHART BRANCH (IV):	
APPLIED TO CHART NO.	DATE:	DATE REGISTERED (IV):
GEOGRAPHIC DATUM (III):	VERTICAL DATUM (III):	
Puerto Rico	MHW MEAN SEA LEVEL EXCEPT AS FOLLOWS: Elevations shown as (25) refer to mean high water Elevations shown as (5) refer to sounding datum i.e., mean low water or mean lower low water	
REFERENCE STATION (III):		
CATANO CHURCH STEEPLE, 1934 ✓		
LAT.:	LONG.:	<input checked="" type="checkbox"/> ADJUSTED <input type="checkbox"/> UNADJUSTED
18° 25' 54." 394 (1,672.3m) ✓	66° 06' 45" .214 (1,326.9m) ✓	
PLANE COORDINATES (IV):		STATE
Y = 217,397.73 ft ✓ X = 611,182.16 ft ✓		Puerto Rico
ZONE		
ROMAN NUMERALS INDICATE WHETHER THE ITEM IS TO BE ENTERED BY (II) FIELD PARTY, (III) PHOTOGRAMMETRIC OFFICE, OR (IV) WASHINGTON OFFICE. WHEN ENTERING NAMES OF PERSONNEL ON THIS RECORD GIVE THE SURNAME AND INITIALS, NOT INITIALS ONLY.		

DESCRIPTIVE REPORT - DATA RECORD

FIELD INSPECTION BY (II): None		DATE:
MEAN HIGH WATER LOCATION (III) (STATE DATE AND METHOD OF LOCATION): Air photo compilation Date of photos 17 Feb. 1964		
PROJECTION AND GRIDS RULED BY (IV): A. E. Roundtree	DATE Nov. 1964	
PROJECTION AND GRIDS CHECKED BY (IV): P. Hawkins	DATE Nov. 1964	
CONTROL PLOTTED BY (III): K. Boyle H. Cordell	DATE Nov. 1964	
CONTROL CHECKED BY (III): R. Smith R. Wagner	DATE Nov. 1964	
RADIAL PLOT OR STEREOSCOPIC CONTROL EXTENSION BY (III): H. P. Eichert	DATE Nov. 1964	
STEREOSCOPIC INSTRUMENT COMPILATION (III):	PLANIMETRY L. Sullivan Reviewed: R. Wagner	DATE Dec. 1964
	CONTOURS Inapplicable	DATE
MANUSCRIPT DELINEATED BY (III): L. Sullivan	DATE Dec. 1964	
SCRIBING BY (III): A. Shands	DATE Feb. 1966	
PHOTOGRAMMETRIC OFFICE REVIEW BY (III): R. R. Wagner & R. J. Pate	DATE Feb. 1966	

REMARKS:

FIELD EDIT: D. RICH, MAR 1965

DESCRIPTIVE REPORT - DATA RECORD

CAMERA (KIND OR SOURCE) (III):

"W" Camera

PHOTOGRAPHS (III)

NUMBER	DATE	TIME	SCALE	STAGE OF TIDE
64 W 3237	17 Feb. 64	1645	1:15,000	0.0
3238	17 Feb. 64	1645	1:15,000	
3239	17 Feb. 64	1646	1:15,000	
3240	17 Feb. 64	1646	1:15,000	
3241	17 Feb. 64	1647	1:15,000	
64 W 3212	17 Feb. 64	1630	1:15,000	+0.1
3213	17 Feb. 64	1631	1:15,000	
COLOR				
64 W 3127	16 Feb. 64		1:15,000	+0.6
3128			1:15,000	
3129			1:15,000	

TIDE (III) *Predicted*

		RATIO OF RANGES	MEAN RANGE	SPRING RANGE
REFERENCE STATION:	San Juan, Puerto Rico		1.1	1.3
SUBORDINATE STATION:				
SUBORDINATE STATION:				
WASHINGTON OFFICE REVIEW BY (IV):	<i>Atlantic Marine Center</i> <i>M. M. SLAVNEY</i>	DATE:	<i>Aug. 1966</i>	
PROOF EDIT BY (IV):		DATE:		
NUMBER OF TRIANGULATION STATIONS SEARCHED FOR (II):	?	RECOVERED:	2	IDENTIFIED: 2
NUMBER OF BM(S) SEARCHED FOR (III):	None	RECOVERED:		IDENTIFIED
NUMBER OF RECOVERABLE PHOTO STATIONS ESTABLISHED (III):	None			
NUMBER OF TEMPORARY PHOTO HYDRO STATIONS ESTABLISHED (III):	None			

REMARKS:

T-11888

COMPILATION RECORD

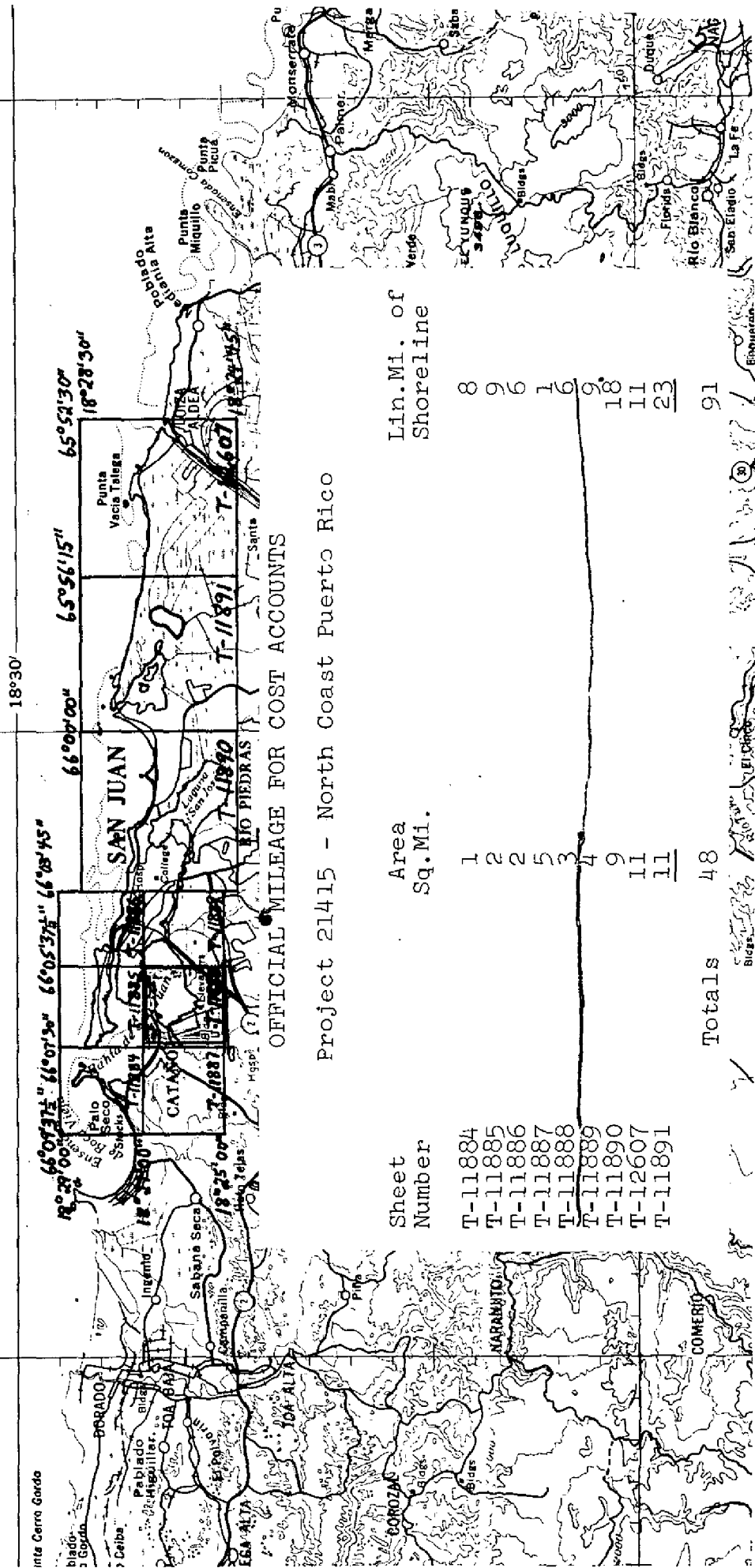
COMPLETION DATE

REMARKS

COMPILATION RECORD	COMPLETION DATE	REMARKS
Alongshore area for hydro	Jan. 1965	Superseded
Alongshore area revised from field edit	Dec. 1965	

T " C O " C E " A

PROJECT 21415
SHORELINE MAPPING
PUERTO RICO
SAN JUAN TO LOIZA ALDEA
1:5,000 & 1:10,000 SCALES



OFFICIAL MILEAGE FOR COST ACCOUNTS

Project 21415 - North Coast Puerto Rico

Lin. Mi. of Shoreline

Area Sq. Mi.

Sheet Number	Area Sq. Mi.	Lin. Mi. of Shoreline
T-11884	1	8
T-11885	2	9
T-11886	2	6
T-11887	5	6
T-11888	3	9
T-11889	4	18
T-11890	9	11
T-12607	11	23
T-11891	11	
Totals	48	91



SUMMARY TO ACCOMPANY
DESCRIPTIVE REPORT T-11888

Shoreline manuscript T-11888 is one of six 1:5,000 scale manuscripts in Ph-6403 (San Juan to Loiza Aldea, Puerto Rico), which also contains three 1:10,000 scale manuscripts. The sketch on page 5 of this report shows the position of this manuscript in the project.

This is a stereo-instrument project in advance of hydrographic surveys of the area. 1:15,000 scale and 1:30,000 scale panchromatic photographs were taken with the W camera; which was also used for 1:10,000 scale and 1:15,000 scale color photographs. All the photographs were taken on February 17, 1964. The stereo bridge was run and adjusted to field identified control in the Washington Office. Compilation was done with the Kelsh Plotter. Ratio prints, at 1:5,000 scale were processed, and provided for photo-hydro support.

Field work preceding compilation consisted of control identification only; no inspection was provided for compilation. The manuscript was field edited in conjunction with photo-hydro support.

The compilation manuscript was a vinylite sheet 2 minutes, 00 seconds in latitude, and 1 minute 52.5 seconds in longitude. The smooth manuscript was on cronaflex for review. One cronar positive and one cronar negative are furnished for registry and record after final review.

FIELD INSPECTION REPORT

There was no field inspection prior to compilation.

MAP T. 11888

PROJECT NO. 21415

SCALE OF MAP 1:5,000

SCALE FACTOR None

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR U-COORDINATE LONGITUDE OR X-COORDINATE	DISTANCE FROM GRID IN FEET. OR PROJECTION LINE IN METERS		DATUM CORRECTION	N.A. 1927 - DATUM		FACTOR DISTANCE FROM GRID OR PROJECTION LINE IN METERS
				FORWARD	(BACK)		FORWARD	(BACK)	
REFINERY CHIMNEY, 1899	GP 69	Puerto Rico	18° 26' 32".048 ✓ 66 07 24.619 ✓						
BRUGAL TOWER 1939	GP 73	"	18 25 32.113 ✓ 66 05 54.524 ✓						
CEMENT MILL STACK, 1939	GP 72	"	18 25 12.833 ✓ 66 07 05.993 ✓						
WAREHOUSE, 1939	"	"	18 26 38.093 ✓ 66 07 06.676 ✓						
CATANO CHURCH STEEPLE, 1934	"	"	18 25 54.394 ✓ 66 06 45.214 ✓						
CAT, 1961	GP	N.A. 1927	18 26 39.417 66 06 47.516	1211.8 (632.8) 1394.3 (366.3)	+292.4 -15.9	1504.7 (339.9) ✓ 1378.4 (382.2) ✓			
BRUGAL 1939 (LOST 1964)	GP 71	Puerto Rico	18 25 31.381 ✓ 66 05 56.093 ✓						

COMPILATION REPORT
T-11888

PHOTOGRAMMETRIC PLOT REPORT

Submitted with T-11884

31. DELINEATION

Compilation was done by the Kelsh plotter. Color photography was used as an aid in delineation of rocks and other offshore features. There was no field inspection.

32. CONTROL

See photogrammetric plot report.

33. SUPPLEMENTAL DATA

None

34. CONTOURS AND DRAINAGE

Inapplicable

35. SHORELINE AND ALONGSHORE DETAILS

Shallow lines were delineated from office interpretation.

No low water line was shown.

36. OFFSHORE DETAILS

See Item 49.

37. LANDMARKS AND AIDS

These are to be ascertained during the hydrographic survey.

38. CONTROL FOR FUTURE SURVEYS

None

39. JUNCTIONS

Junctions are in agreement with T-11889 to the east, T-11885 to the north and T-11887 to the west. There is no contemporary survey to the south.

40. HORIZONTAL AND VERTICAL ACCURACY

No statement

46. COMPARISON WITH EXISTING MAPS

A comparison has been made with U.S.G.S. Quadrangle, San Juan, Puerto Rico, scale 1:20,000 dated 1957.

47. COMPARISON WITH NAUTICAL CHARTS

A comparison has been made with Chart No. 908 scale 1:10,000, revised 11/19/62.

ITEMS TO BE APPLIED TO NAUTICAL CHARTS IMMEDIATELY

None

ITEMS TO BE CARRIED FORWARD

None

Karl G. Boyle

Karl G. Boyle
Cartographic Tech.

Approved and Forwarded:

J. Bull
J. Bull
Director, Atlantic Marine Center

T-11888

48. GEOGRAPHIC NAMES

- AMELIA
- BAHIA DE PUERTO NUEVO
- BAHIA DE SAN JUAN
- CATANO
- *ESCOLLO MOJIGANGA
- ~~ISLA CHIVOS~~ *NOT AN ISLAND NOW*
- *MONTES DE CANEJA
- *MUNICIPIO DE CATANO
- *MUNICIPIO DE GUAYNABO
- PTA CATANO
- *PUEBLO VIEJO
- SABANA
- *ESCOLLO GRANDE **
- ~~RIO PUERTO NUEVO~~ * *on T-11889*
- *MARGARITA *

NOTE:

* Not on name list of A. J. Wraight
 **Name from Chart No. 908

** Feature not delineated, name not used
 W.M.S.*

GEOGRAPHIC NAMES
Ph 21415 (Puerto Rico)

T-11888 (shoreline)

Amelia

Bahia de Puerto Nuevo

Bahia de San Juan

Catano

* Escollo Mojiganga

~~Isla Chivos~~ NOT AN ISLAND NOW, FILL HAS INCORPORATED IT
INTO THE MAINLAND. W.U.S.

* Montes de Caneja

* Municipio de Catano

* Municipio de Guaynabo

Pta Catano

* Pueblo Viejo

- Sabana

* Feature not delineated, name not used.
W.U.S.

A. J. Wraight
A. J. Wraight
Geographic Names

49. NOTES TO THE HYDROGRAPHER

Offshore features such as piles, dolphins, etc. have been shown according to office interpretation. These should be verified by the hydrographer. Two wrecks near Pta Catano have been shown, but due to the poor images on the photographs, their heights could not be determined from the Kelsh instrument. This will have to be furnished by the hydrographer.

Landmarks, aids to navigation and azimuths of lights, and daybeacons have not been shown and will have to be furnished by the hydrographer. See Project Instructions dated September 22, 1964 Par. 6.06.

Features believed to be of landmark value have been shown, but their visual or navigational value should be verified.

A discrepancy exists with notes for verification to the hydrographer and/or field editor is being forwarded with this report.

C&GS FORM 1002
(11-13-61)

U.S. DEPARTMENT OF COMMERCE
COAST AND GEODETIC SURVEY

PHOTOGRAMMETRIC OFFICE REVIEW

T-10363 T-11888

1. PROJECTION AND GRIDS RJP		2. TITLE RJP		3. MANUSCRIPT NUMBERS RJP		4. MANUSCRIPT SIZE RJP	
CONTROL STATIONS							
5. HORIZONTAL CONTROL STATIONS OF THIRD-ORDER OR HIGHER ACCURACY RJP			6. RECOVERABLE HORIZONTAL STATIONS OF LESS THAN THIRD-ORDER ACCURACY (Topographic stations) XX			7. PHOTO HYDRO STATIONS XX	
8. BENCH MARKS XX		9. PLOTTING OF SEXTANT FIXES XX		10. PHOTOGRAMMETRIC PLOT REPORT BRIDGE (WO)		11. DETAIL POINTS KELSH	
ALONGSHORE AREAS (Nautical Chart Data)							
12. SHORELINE RJP		13. LOW-WATER LINE XX		14. ROCKS, SHOALS, ETC. RJP		15. BRIDGES XX	
16. AIDS TO NAVIGATION XX		17. LANDMARKS XX		18. OTHER ALONGSHORE PHYSICAL FEATURES RJP		19. OTHER ALONGSHORE CULTURAL FEATURES RJP	
PHYSICAL FEATURES							
20. WATER FEATURES RJP			21. NATURAL GROUND COVER RJP			22. PLANETABLE CONTOURS XX	
23. STEREOSCOPIC INSTRUMENT CONTOURS XX		24. CONTOURS IN GENERAL XX		25. SPOT ELEVATIONS XX		26. OTHER PHYSICAL FEATURES RJP	
CULTURAL FEATURES							
27. ROADS RJP		28. BUILDINGS RJP		29. RAILROADS XX		30. OTHER CULTURAL FEATURES RJP	
BOUNDARIES							
31. BOUNDARY LINES XX				32. PUBLIC LAND LINES XX			
MISCELLANEOUS							
33. GEOGRAPHIC NAMES RJP			34. JUNCTIONS RJP			35. LEGIBILITY OF THE MANUSCRIPT RJP	
36. DISCREPANCY OVERLAY RJP		37. DESCRIPTIVE REPORT RES		38. FIELD INSPECTION PHOTOGRAPHS XX		39. FORMS RJP	
40. REVIEWER RJP <i>R. d. Pate</i>				SUPERVISOR, REVIEW SECTION OR UNIT ACR <i>Albert C. Rauck, Jr.</i>			
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.							
COMPILER RJP <i>R. d. Pate</i>				SUPERVISOR ACR <i>Albert C. Rauck, Jr.</i>			
43. REMARKS							

TIDE COMPUTATION

PROJECT NO. Ph-21415 T-11888

Time and date of exposure 17 Feb 64 Reference station San Juan, Puerto Rico Mean range 1.1
Spring Ratio of ranges 1.3

Date of field inspection _____ Subordinate station _____

	Time		Height x Ratio of ranges	Time	
	h.	m.		h.	m.
High tide	11	37	1.0		
Low tide	18	01	-0.4		
Duration of rise or fall	6 24		1.4		

	h.	m.	Ht. H.T. or L.T. Tabular correction #	Height feet	Height x Ratio of ranges	Time H.T. or L.T. Required time Interval	Time H.T. or L.T. Required time Interval	Feature bares Stage of tide above MLW	feet	Photo. No. #
Time H.T. or L.T. Required time Interval	18 01	15 47	2 14	1.0	1.0	11 37 09 25	18 01 15 29	Feature bares Stage of tide above MLW	-0.4 0.4	PAN 1:15,000 64W 32 40, 41
Time H.T. or L.T. Required time Interval	18 01	15 29	2 32	-0.4	-0.4	11 37 09 25	18 01 15 29	Feature bares Stage of tide above MLW	-0.4 0.5	PAN 1:15,000 64W 32 12, 13
Time H.T. or L.T. Required time Interval	18 01	15 29	2 32	0.1	0.1	11 37 09 25	18 01 15 29	Feature bares Stage of tide above MLW	0.1 0.4	COLOR 1:15,000 64W 31 28, 29
Time H.T. or L.T. Required time Interval	18 01	15 29	2 32	0.6	0.6	11 37 09 25	18 01 15 29	Feature bares Stage of tide above MLW	0.6	
Time H.T. or L.T. Required time Interval	18 01	15 29	2 32	0.6	0.6	11 37 09 25	18 01 15 29	Feature bares Stage of tide above MLW	0.6	
Time H.T. or L.T. Required time Interval	18 01	15 29	2 32	0.6	0.6	11 37 09 25	18 01 15 29	Feature bares Stage of tide above MLW	0.6	

High tide 1137 Low tide 527
 Duration of rise or fall 624
 Range of tide 1.0
 * Used duration of rise or fall 620 on all photos
 * Used average time of photo series
 Computed by R.H. Barnes Checked by _____
 M-2617-12

FIELD EDIT REPORT
FOR
SHORELINE MAPS T-11884 THROUGH T-11889

The Field Edit Report and the Report on Landmarks are included with the Descriptive Report for T-11884, pages 22 through 32.

Deleted wk

Unknown object

Pipeline

Added Wreck

REVIEW REPORT T-11888
SHORELINE
November 1966

61. GENERAL STATEMENT

See summary accompanying Descriptive Report (page 6)

62. COMPARISON WITH REGISTERED TOPOGRAPHIC SURVEYS

- Registered Survey 2414, 1:5,000, 1899
- Registered Survey 2487, 1:10,000, 1900

The Comparison Print shows large and numerous changes, most of which are obviously the result of filling and dredging.

This map supersedes the listed prior surveys for nautical chart construction.

63. COMPARISON WITH MAPS OF OTHER AGENCIES

San Juan, P.R., U.S.G.S., 1:20,000, 1939-40 - Revised 1957.

The Comparison Print shows discrepancies of up to 50 meters in the bulkheads and piers on the south side of Bahia de Puerto Huevo, which are apparently caused by a datum shift.

The changes along the west shore of the bay are obviously from construction.

64. COMPARISON WITH CONTEMPORARY HYDROGRAPHIC SURVEYS

- Boat Sheet H-8848 (EX 5-1-65), 1:5,000, 1965
- Boat Sheet H-8849 (EX 5-2-65), 1:5,000, 1965

Boat Sheet 8848 and this map are in agreement.

The Comparison Print shows piles, poles, stakes, etc., not on T-11888 that appear on Boat Sheet H-8849. They are not visible on black and white photographs 64-W-3211 through 3213, and 3239 through 3241; nor were they noted by the field editor. There was no color photo coverage of these areas.

65. COMPARISON WITH NAUTICAL CHARTS

Chart 908, 1:10,000, 24th Edition, November 8, 1965, revised September 12, 1966.

The Comparison Print shows the shoreline changes from construction; and the markers, piles, stakes, lights, etc., that appear on the chart but do not appear on this map. Appropriate notes are on the print pertaining to the lack of identification of these details by the field editor, and their subsequent identification, or lack of it, by the hydrographic party.

66. ADEQUACY OF RESULTS AND FUTURE SURVEYS

No accuracy tests have been run in the field. This map meets the National Standards of Map Accuracy and Bureau requirements.

Approved by:

Reviewed by:

J. Bull 4, 1966
Director, Atlantic Marine Center

M. M. Slavney
M. M. Slavney

Charles L. Lamer 548
Chief, Photogrammetric Branch

J. Ralph Sobieralski
Chief, Photogrammetry Division

Wallace A. Bruder, for
Chief, Marine Chart Division

NONFLOATING AIDS OR LANDMARKS FOR CHARTS

November 10 19 66

Atlantic Marine Center

TO BE CHARTED
X TO BE REVISED
X TO BE DELETED
STRIKE OUT TWO

I recommend that the following objects which have ~~been~~ been inspected from seaward to determine their value as landmarks be charted on ~~charts~~ the charts indicated.

The positions given have been checked after listing by M. M. Slaveney

J. Bull, ADC

CHARTING NAME	STATE	DESCRIPTION	SIGNAL NAME	POSITION				METHOD OF LOCATION AND SURVEY No.	DATE OF LOCATION	HARBOR CHART	INSHORE CHART	OFFSHORE CHART	CHARTS AFFECTED
				LATITUDE*		LONGITUDE*							
				D. M. METERS	''	D. P. METERS	''						
TOWER		East Gable		18 26	12 72	06 06	1180m -	Puerto Rico T-11888	1966*	X		908	
		*This location supersedes the position submitted in February 1965 for BUILDING, Grain Elevator S. E. corner											

This form shall be prepared in accordance with Hydrographic Manual, Publication 20.2, Sec. 1-55, 2-39, 6-36, 7-18 to 22 inclusive, and Fig. 79. Positions of charted landmarks and nonfloating aids to navigation, if redetermined, shall be reported on this form. Revisions shall show both the old and new positions. The data should be considered for the charts of the area and not by individual field survey sheets. Information under each column heading should be given.

* TABULATE SECONDS AND METERS

NOTES TO VERIFIER
T-11888 Project 21415 (Ph-6403)
BOAT SHEET NO. H-8848 (EX 5-1-65) H-8849 (EX 5-2-65)

See Items 64, 65, and Comparison Print for changes; and for
stakes, markers, etc., not on this map.

