### FORM **C&GS-504**

U.S. DEPARTMENT OF COMMERCE ENVIRONMENTAL SCIENCE SERVICES ADMINISTRATION COAST AND GEODETIC SURVEY

# DESCRIPTIVE REPORT

Type of Survey Shoreline (Photogrammetric)  Field No. Office No. T-13127				
LOCALITY				
State Puerto Rico				
General locality Southwest Coast				
Locality Cayo Berberia				
<u> 1966-1</u> 972				
CHIEF OF PARTY				
Alfred C. Holmes, Director, AMC				
LIBRARY & ARCHIVES				

USCOMM-DC 37022-P66

### **DESCRIPTIVE REPORT - DATA RECORD**

	T	-13127	T RECORD	
OJECT NO. (II):				
PH-6708				
FIELD OFFICE (II):			CHIEF OF PARTY	(
None				
PHOTOGRAMMETRIC OFFICE (III):			OFFICER-IN-CHA	RGE
Atlantic Marine Cente	er, Norfolk, VA		Affred C. H	Molmes, Director
INSTRUCTIONS DATED (II) (III):				
	- Nov. 14, 1967 - SUPPLEMENT 1 -	- Nov. 4,	, 1968	
METHOD OF COMPILATION (III):				
Wild B-8 Pbtter				
MANUSCRIPT SCALE (III):		STEREOSCO	PIC PLOTTING IN	STRUMENT SCALE (III):
		1:5,000	0 Pantographed To 1:10,000	
DATE RECEIVED IN WASHINGTON OFF	ICE (IV):	DATE REPO	ORTED TO NAUTIC	AL CHART BRANCH (IV):
APPLIED TO CHART NO.		DATE:		DATE REGISTERED (IV):
	•			JUN 1975
GEOGRAPHIC DATUM (III):			VERTICAL DATU	IM (III): VATER L EXCEPT AS FOLLOWS: as (25) refer to mean high water
Puerto Rico			ĺ.	as <u>(5)</u> refer to sounding datum ter or mean lower low water
REFERENCE STATION (III):	<u>,</u>			
LAT.:	LONG.:	······································	ADJUSTED UNADJUSTED	)
PLANE COORDINATES (IV):			STATE	ZONE
γ=	x =			
OR (1V) WASHINGTON OFFICE. WHEN ENTERING NAMES OF PERSONNI				

FORM C&GS-1816 (3-66)

U.S. DEPARTMENT OF COMMERCE ENVIRONMENTAL SCIENCE SERVICES ADMINISTRATION COAST AND GEODETIC SURVEY

### **DESCRIPTIVE REPORT - DATA RECORD**

T-13127

FIELD INSPECTION BY (II):	DATE:
None	
MEAN HIGH WATER LOCATION (III) (STATE DATE AND METHOD OF LOCATION):	
Air Photo Compilation - Date of Photography 1966	
PROJECTION AND GRIDS RULED BY (IV):	DATE
Coradomat	Sept. 22, 19 <b>7</b> 0
PROJECTION AND GRIDS CHECKED BY (IV):	DATE
Coradomat	Sept. 22, 1970
CONTROL PLOTTED BY (III):	DATE
Aerotriangulation Points: - Coradomat Triangulation Stations: -	Sept. 22, 1970
CONTROL CHECKED BY (III):	DATE
Aerotriangulation Points: - Coradomat Triangulation Stations: -	Sept. 22, 1970
RADIAL PLOT OR STEREOSCOPIC CONTROL EXTENSION BY (III):	Oct. 31, 1967
I. I. Saperstein	Sept. 11, 1970
STEREOSCOPIC INSTRUMENT COMPILATION (III): PLANIMETRY By: R. White  Graphic Method	DATE Dec. 2, 1970
CONTOURS Inapplicable	DATE
MANUSCRIPT DELINEATED BY (III):	DATE
R. White	Dec. 3, 1970
SCRIBING BY (111):	DATE
C. Parker	8/7/72
PHOTOGRAMMETRIC OFFICE REVIEW BY (III):	DATE
L. F. Beugnet	Dec. 3, 1970
Field Edit By: E. Pursel	DATE May 17, 1972

U.S. DEPARTMENT OF COMMERCE ENVIRONMENTAL SCIENCE SERVICES ADMINISTRATION COAST AND GEODETIC SURVEY

### **DESCRIPTIVE REPORT - DATA RECORD**

T-13127

MERA (KIND OR SOURCE) (111):

Wild RC-8 "L"

	PHO	TOGRAPHS (III)		
NUMBER	DATE	TIME	SCALE	STAGE OF TIDE
1 - W-T	Nov. 15, 1966	10:19 10:40	1:i5,000 1:15,000	.8 above MLW .8 above MLW
:				

PREDICTE	D TIDE (III)				DIURM
			RATIO OF RANGES	MEAN RANGE	RANGE
REFERENCE STATION: Galveston, Texas					1.4
SUBORDINATE STATION: Playa Cortada, P.R.			0.57		0.4
SUBORDINATE STATION:					
WASHINGTON OFFICE REVIEW BY (IV):  Bernard 1	Kurs, AMC		DATE: March	, 1973	
PROOF EDIT BY (IV):			DATE:		-
NUMBER OF TRIANGULATION STATIONS SEARCHED FOR (II)	): None	RECOVERED: None	None	D:	
NUMBER OF BM(S) SEARCHED FOR (II):  None  RECOVERED:  None			IDENTIFIE None	D	111
NUMBER OF RECOVERABLE PHOTO STATIONS ESTABLISHE	D (III):	None	·		
NUMBER OF TEMPORARY PHOTO HYDRO STATIONS ESTABL	.ISHED (III):		None		

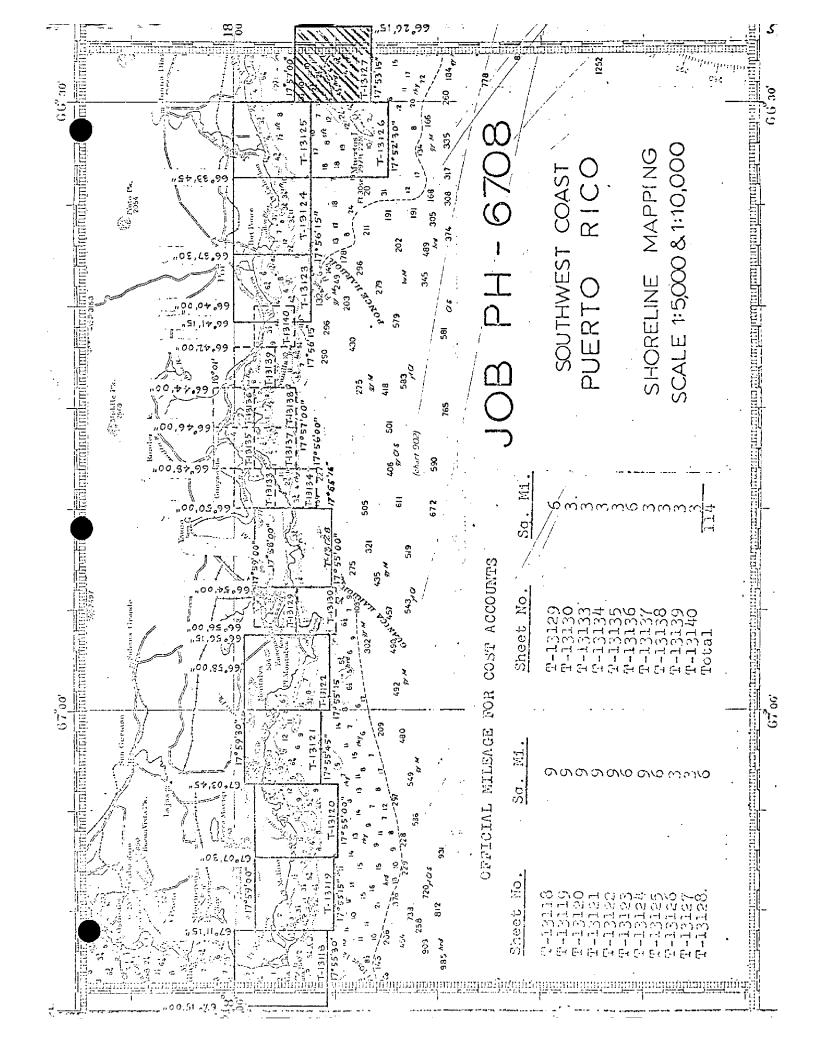
REMARKS:

ESSA FORM 76-36c (2-70)	T-13127 HISTORY OF FIELD		IL SCIENCE SERVIC	MENT OF COMMERC CES ADMINISTRATION D GEODETIC SURVE
I. TIELD INSPECTION	OPERATION X FIEL	D EDIT OPERATION	· · · · · ·	
	OPERATION	NA	ME	DATE
1. CHIEF OF FIELD PART	Υ	E. Pursel, Jr		17 May 72
	RECOVERED BY	11		
Ž. HORIZONTAL CONTROL		N.A.		
ZI HOMEON ME OUN HOL	PRE-MARKED OR (DENTIFIED BY	N.A.		
	RECOVERED BY	N.A.		
3. VERTICAL CONTROL	ESTABLISHED BY	N.A.		
	PRE-MARKED OR IDENTIFIED BY	N.A.		
	RECOVERED (Triangulation Stations) BY	E. Pursel, Jr		17 May 72
4. LANDMARKS AND	LOCATED (Field Methods) BY	N.A.		
AIDS TO NAVIGATION	IDENTIFIED BY	N.A.		
	TYPE OF INVESTIGATION			· ·
5. GEOGRAPHIC NAMES	COMPLETE BY			
INVESTIGATION	SPECIFIC NAMES ONLY	None		
	NO INVESTIGATION			
6. PHOTO INSPECTION	CLARIFICATION OF DETAILS BY	None_		
7. BOUNDARIES AND LIMI	SURVEYED OR IDENTIFIED BY	None	<del></del>	
II. SOURCE DATA  1. HORIZONTAL CONTROL	IDENTIFIED	2. VERTICAL CONT	POL IDENTIFIED	
None	DENTIFIED	None	KOL IDENTII IED	
PHOTO NUMBER	STATION NAME	PHOTO NUMBER	STATION D	ESIGN A TION
3. PHOTO NUMBERS (Clari None 4. LANDMARKS AND AIDS None	TO NAVIGATION IDENTIFIED			
PHOTO NUMBER	OBJECT NAME	PHOTO NUMBER	OBJEC	T.NAME .
5. GEOGRAPHIC NAMES:	☐ REPORT (X) NONE	14 BOUNDARY AND	LIMITE: C	ORT X NONE
7. SUPPLEMENTAL MAPS		6. BOUNDARY AND	LIMITS: L KEP	ORT X NONE
None	5 (Sketch books, etc. DO NOT list data submi-	tted to the Geodesv Divi	ision)	
Field Edit : Forms 76-40	Report			

ESSA FORM 76-36C

T-13127

COMPILATION RECORD	COMPLETION DATE	
Mongshore Area For Hydro. Complete Pending Field Edit	Dec. 1970	Sup <b>ersed</b> ed
Field Edit Applied	July 1972	Superseded
Final Review	March 1973	



### SUMMARY TO ACCOMPANY

### DESCRIPTIVE REPORT

### T-13127

Shoreline survey T-13127 is one of twenty-one similar surveys in project PH-6708. The project is located on the south shore of Puerto Rico and extends from Cabo Rojo to Cayo Berberia. This survey covers Cayo Berberia.

There was no field inspection preceding the incomplete manuscript.

Compilation was by B-8 plotter using November, 1966 photography. A copy of the incomplete manuscript along with ozalids and specially prepared photographs were furnished for the preparation of the boat sheets, location of the photo-hydro signals and field edit use.

This manuscript was a stabilene sheet, three minutes, forty-five seconds in latitude and three minutes, forty-five seconds longitude, at 1:10,000 scale. After field edit was applied and checked, the manuscript was scribed, reproduced, and stuck-up. The final review was at AMC in March, 1973. Onescronaflex and negative of the final reviewed survey are being forwarded for record and registry.

# FIELD INSPECTION REPORT PH-6708 T-13127

There was no field inspection prior to compilation.



### Supplemental Photogrammetric Plot Report Job PH-6708 Puerto Rico

September 11, 1970

This supplemental report covers the two (2) remaining 1:10,000 scale T-sheets T-13126 and T-13127 not bridged in 1967 because of lack of control on the outlying islands of Isla Caja de Muertos and Cayo Berberia. (See Photogrammetric Plot Report Job PH-6708, dated October 31, 1967.)

Two (2) control stations were established on Cayo Berberia and sub points identified, on the 66-L(C)-photography. This island can be compiled graphically by transferring the sub points to the ratio prints and holding to the plotted positions on the manuscript.

Photographs 66-L(C)-8363 through 8366, 1:15,000 scale, on Isla Caja de Muertos were bridged and can be set on the B-8. This is a 3 point bridge making it a unique fit with no check, except for the companion points at each station. Due to poor selection of sub points it was very difficult to identify these points on the photographs during bridging. Closures to control on companion points were larger than expected but still within accuracy limits. (Maximum error about 8 feet.)

Ratio prints have been ordered for all photographs. Projections and grids have been drawn, and pass points and control plotted on the sheets by the Coradi.

Respectfully submitted,

I. I. Saperstein

Approved and forwarded,

Henry P/ Mchert

Chief, Aerotriangulation

Section

66,30

00.19

**イバボラド大学スペッジ** ここの子

CTITE STANIES WELLY FRAST STACKS 1966

Charles Atomos men 1960

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Supplementa

Bridge Sept. 1970

Southwest in a PUZRTO

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Par THAS FROMT FREAK RANGE LTS. 1966 A MAN STATION WELD MANTE 1966

10, FONCE, DON Q RUM CO. STACK, 1960 11. FERSTA DE GUARICA RANGE FRONT

9. CACESSAN 12. AND 1.14. 1900

13 44 12 . 4 ONDON THE SOLE CO. W. A. 1966

- A Control Used in Adjustinent
- 01:15,000 1000000

1:60,000 Photos, color

· 1:30,000 Protes

15. MUSELTOS 1.

16 1167,1970

12. WAY 1970

1.14. 1800

U.S. DEPARTMENT OF COMMERCE ENVIRONMENTAL SCIENCE SERVICES ADMINISTRATION COAST AND GEODERIC SURVEY

164	
C&GS-164	M-DC
~	(4-68) USCOMM-DC 50318-P68
	-

# DESCRIPTIVE REPORT CONTROL RECORD

MAP T- 13127 PROJECT NO.	T NO. PH-6708	SCA	SCALE OF MAP 1:10,000 scal	SCALE FACTOR None
NOLTATION	SOURCE OF INFORMATION (INDEX)	ратим	LATITUDE OR Y COORDINATE LONGITUDE OR X COORDINATE	N.A. 1927 - DATUM DISTANCE FROM GRID OR PROJECTION LINE IN METERS (1 Ft. = 3048006 moter) FORWARD (BACK)
Kay, 1970		Puerto Rico	36,805.17 ft. 491,011.20 ft.	1,805.17 ft. (3,194.83 ft.) 1,011.20 ft. (3,988.80 ft.)
Claire, 1970		Puerto Rico	33,556.18 ft. 493,011.30 ft.	3,556.18 ft. (1,44382 ft.) 3,011.30 ft. (1,988.70 ft.)
Note: The positionsof Kay, 19 were determined by thre grammetric Mapping purp ked by topographic stat	f Kay, 1970 and Claire, 19 d by three point fix for F ping purposes only, and ar phic station disks.	1970, Photo- are mar-		
COMPUTED BYR, R. White	DATE Dec. 3, 1970	70	CHECKED BY	DATE     O   O   O   O   O   O   O   O   O

### COMPILATION REPORT

### T-13127

### 31. DELINEATION

Compilation was by graphic methods using the two substitute stations for each of the two topographic stations KAY 1970 and CLAIRE 1970, which were located by 3 point fix from triangulation intersection stations. Additional photo hydro points were cut in to control the photographs.

### 32. CONTROL

See Supplemental Photogrammetric Plot Report dated Sept. 11, 1970.

### 33. SUPPLEMENTAL DATA

None

### 34. CONTOURS AND DRAINAGE

Contours are inapplicable. There was no drainage to compile.

### 35. SHORELINE AND ALONGSHORE DETAILS

All detail was compiled from office interpretation of the photographs. Because of the small variation between high and low tide, no low water line was compiled.

### 36. OFFSHORE DETAILS

None

### 37. LANDMARKS AND AIDS

None

### 38. CONTROL FOR FUTURE SURVEYS

None

### 39. JUNCTIONS

Although this sheet is joined to the West by T-13125 and T-13126 of project PH-6708 and to the North by T-13373 of project PH-6904, all junctions are entirely within water areas with no detail to make a match. There is no contemporary survey to the East or South.

### 40. HORIZONTAL AND VERTICAL ACCURACY

No statement.

### 46. COMPARISON WITH EXISTING MAPS

A comparison was made with U.S.G.S. Quadrangle SANTA ISABEL, PR, scale 1:20,000 dated 1960.

### 47. COMPARISON WITH NAUTICAL CHARTS

A comparison was made with Chart 926 PUNTA PETRONA to ISLA CAJA de MUERTOS, scale 1:20,000 2nd Edition dated May 3, 1965.

### ITEMS TO BE APPLIED TO NAUTICAL CHARTS IMMEDIATELY

None

### ITEMS TO BE CARRIED FORWARD

None

Submitted by:

Bernard Lungfor Richard R. White

Cartographic Technician

Dec. 3, 1970

Approved:

Alfred C. Holmes RADM, NOAA

Director, AMC

### ADDENDUM TO FIELD EDIT REPORT

Field edit was adequate. The field editor recommended only one change and there was enough data supplied to make that change. The recovery card for station SOUTH, 1926 could not be found. There is no position for station SOUTH, 1926 with the group of adjusted positions sent from Rockville. Station SOUTH, 1941 falls far to the east and north of this sheet.

December 11, 1972

GEOGRAPHIC NAMES

FINAL NAME SHEETS

Ph-6708 (Puerto Rico)

TP-13127

Cayo Berberia

Mar Caribe

Approved:

A. Joseph Wraight Chief Geographer

Prepared by:

Charles E. Harring

Cartographer

### T-13127

## 49- NOTES FOR THE HYDROGRAPHER

Two recoverable topographic stations fall within the limits of this manuscript. They are: KAY, 1970 and CLAIRE, 1970.

FORM C&GS-1002			L	J.S. DEPARTMENT OF COMMERCE	
PHOTOGRAMMETRIC OFFICE REVIEW  COAST AND GEODETIC SURVE					
			13127		
1. PROJECTION AND GRIDS	2 TITLE		3. MANUSCRIPT NUMBERS	4. MANUSCRIPT SIZE	
		_			
LFB	LFI	3 <b></b>	LFB	LFB	
CONTROL STATIONS		14		T+	
5. HORIZONTAL CONTROL STA THIRD-ORDER OR HIGHER A	CCURACY	OF LESS TH	BLE HORIZONTAL STATIONS AN THIRD-ORDER ACCURACY (a stationa)	7. PHOTO HYDRO STATIONS	
LFB			XX	ХХ	
8, BENCH MARKS XX	PLOTTING OF FIXES XX	OF SEXTANT	10. PHOTOGRAMMETRIC PLOT REPORT LIFB	11. DETAIL POINTS LFB	
XX				III D	
ALONGSHORE AREAS (Nautical	Chart Data)	<u></u>	<u> </u>		
12. SHORELINE	13. LOW-WATE	RLINE	14. ROCKS, SHOALS, ETC.	15. BRIDGES	
LFB	LFI	3	LFB.;	LFB	
16. AIDS TO NAVIGATION	17. LANDMARK		18. OTHER ALONGSHORE	19. OTHER ALONGSHORE CULTURAL FEATURES	
			PHYSICAL FEATURES		
LFB	LFI	3	LFB	LFB	
PHYSICAL FEATURES 20. WATER FEATURES		21 NATURAL	GROUND COVER	22 0 115 15 15 15 15 15 15 15 15 15 15 15 15	
20. WATER PEATURES		AI, NAI URAL	GROOMD COVER	22. PLANETABLE CONTOURS	
LFB			XX	XX	
23. STEREOSCOPIC INSTRUMENT CONTOURS	24. CONTOURS	IN GENERAL	25. SPOT ELEVATIONS	26. OTHER PHYSICAL FEATURES	
хх	l xx		[ xx	XX	
CULTURAL FEATURES	<u> </u>				
27. ROADS	28. BUILDINGS	i	29. RAILROADS	30. OTHER CULTURAL FEATURES	
LFB	XX		XX	, XX	
BOUNDARIES	<u> </u>		<u> </u>	<u>,                                    </u>	
31. BOUNDARY LINES			32. PUBLIC LAND LINES		
XX		···	XX	<u> </u>	
MISCELLANEOUS 33. GEOGRAPHIC NAMES	<del></del>	34. JUNCTION	<u> </u>	35. LEGIBILITY OF THE	
				MANUSCRIPT	
LFB	137 200		LFB	LFB	
36. DISCREPANCY OVERLAY	37. DESCRIPTI	VE REPORT	38. FIELD INSPECTION PHOTOGRAPHS	39. FORMS	
LFB	LFE	}	RR <b>W</b>	LFB	
40. REVIEWER		***	SUPERVISOR, REVIEW SECTION	ON OR UNIT	
Leo F. Beugn	et		A.C. Rauck, Jr.	C. Kauck. Jr.	
41. REMARKS (See attached shee		<del></del>	<u> </u>	<u> </u>	
FIELD COMPLETION ADDITION		TIONS TO THE M	ANUSCRIPT		
42. Additions and corrections script is now complete exc	furnished by th	e field complet	ion survey have been applied	to the manuscript. The manu-	
COMPILER A.L. Shand	-		SUPERVISOR / DE	+ 1 Pour - In1	
Reviewed By: R.R. 1	o ou Tha Atink	ly 21,1972 ly 25,1972	A.C. Rauck, Jr.	f C. Ranch.	
43. REMARKS			<u>l.                                    </u>		
	Enom: Pic	.14 F4∹+ ^	galid		
Field Edit Applied	rrom: F16	:iu Balt O	Zallu		
<b>?</b>					

# FIELD EDIT REPORT Job PH-6708 SOUTH COAST PUERTO RICO T-13127

### 52. ADEQUACY OF COMPILATION

Compilation is confirmed as being adequate.

### 54. KECOMMENDATIONS

None.

### 56. LANDMARKS AND AIDS TO NAVIGATION

No landmarks or aids to navigation fall within the limits of this sneet.

### 5γ. ADDITIONAL INFORMATION

Limits of the coral reef on this sneet are correctly delineated by the hydrographer on Boat Sheet MI-10-2-72. In addition to the two topographic stations CLAIRE 1970 and KAY 1970, triangulation station SOUTH 1926 was also recovered. Recovery notes accompany data with this sneet.

Respectfully submitted,

E. Pursel, Jr. For Cartographic Tech

Bernard Kurs

Cartographic Technician National Ocean Survey

### REVIEW REPORT

### SHORELINE

### T-13127

### 61. GENERAL STATEMENT

See summary which is page 6 of the descriptive report.

### 62. COMPARISON WITH REGISTERED SURVEYS

A comparison with registered survey No. 2416, 1899 at 1:20,000, was made. There are natural changes which have occured over the interval of years. These changes are shown on the discrepancy print in blue.

Registered survey No. 2416 is superseded by T-13127 for nautical chart construction purposes.

### 63. COMPARISON WITH MAPS OF OTHER AGENCIES

Comparison was made with USGS Quadrangle Santa Isabel, PR 1960 at 1:20,000 scale. Natural changes account for all differences noted on the discrepancy print in brown.

### 64. COMPARISON WITH CONTEMPORARY HYDROGRAPHIC SURVEYS

Comparison was made with H-9265 dated 1972 at 1:10,000 scale. Any differences were small and negligable except for one small area of coral heads awash. This is noted on the discrepancy print in purple.

### 65. COMPARISON WITH NAUTICAL CHARTS

Comparison was made with Chart 926 dated Feb. 5, 1972, at 1:20,000 scale. The differences are natural ones and are noted on the discrepancy print in red.

Comparison

# 66. ADEQUACY OF RESULTS AND FUTURE SURVEYS

This survey meets with project instructions and the National Standards of Map Accuracy.

Reviewed by:

Cartographer

Approved for forwarding:

CDR, NOAA

Malvin J. Umbach, CDR, NOAA Thief, Coastal Mapping Division, AMC

Approved:

Approved:

red C. Holmes, RADM, NOAA Director, Atlantic Marine Center

Chief, Photogrammetry Branch, Chief, Coastal Mapping Division

