

TP-00739

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TP-00739

NOAA FORM 76-35

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

DESCRIPTIVE REPORT

Type of Survey ..Chart Compilation.....

Job No. CM-7301..... Map No. TP-00739.....

Classification No. III..... Edition No. .1.....

LOCALITY

State New York-New Jersey.....

General Locality Newark, N.J.

Locality Newark Bay.....

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. 00739 MAP EDITION NO. (1) MAP CLASS III JOB CM-7301	
DESCRIPTIVE REPORT - DATA RECORD				LAST PRECEDING MAP EDITION			
				TYPE OF SURVEY <input type="checkbox"/> ORIGINAL <input type="checkbox"/> RESURVEY <input type="checkbox"/> REVISED		JOB PH. _____ MAP CLASS _____ SURVEY DATES: 19__ TO 19__	
PHOTOGRAMMETRIC OFFICE Coastal Mapping Division (Rockville)				OFFICER-IN-CHARGE Cdr. James Collins			
I. INSTRUCTIONS DATED							
1. OFFICE				2. FIELD			
Instructions-AEROTRIANGULATION-3/27/75 Instructions-OFFICE-8/7/75				Instructions-FIELD-1/23/74 Instructions-FIELD-Admendment I-8/12/74 Instructions-FIELD-Supplement I - 4/16/75 Instructions-FIELD-Supplement II - 10/6/75 Instructions-FIELD-Amendment 1-2/27/74			
II. DATUMS							
1. HORIZONTAL: <input checked="" type="checkbox"/> 1927 NORTH AMERICAN				OTHER (Specify)			
2. VERTICAL: <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			
3. MAP PROJECTION Transverse Mercator				4. GRID(S) STATE New York ZONE East			
5. SCALE 1:10,000				STATE ZONE			
III. HISTORY OF OFFICE OPERATIONS							
OPERATIONS				NAME		DATE	
1. AEROTRIANGULATION BY METHOD: Analytic LANDMARKS AND AIDS BY				I. Rayborn		8/75	
2. CONTROL AND BRIDGE POINTS PLOTTED BY METHOD: Coradomat CHECKED BY				S. Solbeck		9/75	
3. STEREOSCOPIC INSTRUMENT PLANIMETRY BY COMPILATION CHECKED BY				G. Vanderhaven		4/76	
INSTRUMENT: B-8 CONTOURS BY				G. Fromm		4/76	
SCALE: 1:5,000 CHECKED BY				N/A			
4. MANUSCRIPT DELINEATION PLANIMETRY BY				G. Vanderhaven		5/76	
METHOD: Smooth Drafting CHECKED BY				K. Baker		7/76	
SCALE: 1:10,000 HYDRO SUPPORT DATA BY				N/A			
CHECKED BY				N/A			
5. OFFICE INSPECTION PRIOR TO FIELD EDIT BY				G. Fromm		10/14/76	
6. APPLICATION OF FIELD EDIT DATA BY				N/A			
CHECKED BY				N/A			
7. COMPILATION SECTION REVIEW BY				G. Fromm		10/14/76	
8. FINAL REVIEW BY				E. L. Rolle		Jan. 1978	
9. DATA FORWARDED TO PHOTOGRAMMETRIC BRANCH BY				N/A			
10. DATA EXAMINED IN PHOTOGRAMMETRIC BRANCH BY				E. L. Rolle		Jan. 1978	
11. MAP REGISTERED - COASTAL SURVEY SECTION BY				R. J. Cator		May 1978	

TP-00739
COMPILATION SOURCES

1. COMPILATION PHOTOGRAPHY

CAMERA(S) RC-8 (E) RC-10 (B) ^(152.7mm) focal lengths		TYPES OF PHOTOGRAPHY LEGEND (C) COLOR (P) PANCHROMATIC (I) INFRARED B&W		TIME REFERENCE ZONE Eastern MERIDIAN 75th	
TIDE STAGE REFERENCE <input checked="" type="checkbox"/> PREDICTED TIDES <input type="checkbox"/> REFERENCE STATION RECORDS <input checked="" type="checkbox"/> TIDE CONTROLLED PHOTOGRAPHY				<input checked="" type="checkbox"/> STANDARD <input type="checkbox"/> DAYLIGHT	
NUMBER AND TYPE	DATE	TIME	SCALE	STAGE OF TIDE in feet	
74E (C) 7086-7089	10/19/74	1156-1206	1:30,000	*-0.2' MHW	
74E (C) 7145-7149	10/19/74	1233-1240	1:30,000	*-0.2' MHW	
75B (C) 5970R-5974R	10/3/75	1204-1212	1:30,000	Refer to the following page for tide information	

REMARKS * Computation from Predicted Tide Tables.

All listed photography ratioed to 1:10,000

2. SOURCE OF MEAN HIGH-WATER LINE:

The source of the mean high water line is the ~~color~~ photography listed in item one. Refer to paragraph 35 on the Compilation Report bound with this Descriptive Report.

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

The source for the mean low water line is the ratio prints of the black-and-white, tide-coordinated infrared photography listed in item one.

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
No contemp. survey	TP-00740	TP-00743	No contemp. survey
REMARKS			

NOAA FORM 76-36B(1)
(7-75)TP-00739
TIDE - COORDINATED PHOTOGRAPHY
TP - 00739U. S. DEPARTMENT OF COMMERCE
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION
NATIONAL OCEAN SURVEY

LOCATION AND PHOTOGRAPHY	TIDE STATIONS (In operation at time of photography)	STAGE OF TIDE In feet	MEAN RANGE In feet
	THE BATTERY (Reference Station)		4.5
75B5970R-5972R (Passaic River)	Newark (Sub Sta.)	-.20 MLW	5.1
75B5970R-5972R (Hackensack River)	Kearny Pt. (Sub Sta.)	-.44 MLW	5.0
75B5972R-5974R (Newark Bay)	Port Newark Terminal (Sub Sta.)	-.59 MLW	5.1
NOTE: The reference station(s) only were in operation at the time of photography.			

REMARKS:

Water penetration is apparent on the infrared photography. Refer to paragraph 35 of the Compilation Report bound with this Descriptive Report.

HISTORY OF FIELD OPERATIONS

TP-00739

I. ☒ FIELD INSPECTION OPERATION☐ FIELD EDIT OPERATION

OPERATION	NAME	DATE
1. CHIEF OF FIELD PARTY	R. S. Tibbetts	8/74
2. HORIZONTAL CONTROL	RECOVERED BY N/A ESTABLISHED BY N/A PRE-MARKED OR IDENTIFIED BY N/A	
3. VERTICAL CONTROL	RECOVERED BY N/A ESTABLISHED BY N/A PRE-MARKED OR IDENTIFIED BY N/A	
4. LANDMARKS AND AIDS TO NAVIGATION	RECOVERED (Triangulation Stations) BY N/A LOCATED (Field Methods) BY N/A IDENTIFIED BY N/A	
5. GEOGRAPHIC NAMES INVESTIGATION	TYPE OF INVESTIGATION <input type="checkbox"/> COMPLETE <input type="checkbox"/> SPECIFIC NAMES ONLY <input checked="" type="checkbox"/> NO INVESTIGATION	N/A
6. PHOTO INSPECTION	CLARIFICATION OF DETAILS BY N/A	
7. BOUNDARIES AND LIMITS	SURVEYED OR IDENTIFIED BY N/A	

II. SOURCE DATA

1. HORIZONTAL CONTROL IDENTIFIED

None

2. VERTICAL CONTROL IDENTIFIED

None

PHOTO NUMBER	STATION NAME	PHOTO NUMBER	STATION DESIGNATION

3. PHOTO NUMBERS (Clarification of details)

4. LANDMARKS AND AIDS TO NAVIGATION IDENTIFIED

None

PHOTO NUMBER	OBJECT NAME	PHOTO NUMBER	OBJECT NAME

5. GEOGRAPHIC NAMES: ☐ REPORT ☒ NONE6. BOUNDARY AND LIMITS: ☐ REPORT ☒ NONE

7. SUPPLEMENTAL MAPS AND PLANS

None

8. OTHER FIELD RECORDS (Sketch books, etc. DO NOT list data submitted to the Geodesy Division)

None

TP-00739

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	10/14/76	Class III Map field edit postponed	10/19/76	
Final review prior to registration.	Jan. 1978	Class III Map	May 1978	

II. LANDMARKS AND AIDS TO NAVIGATION

1. REPORTS TO MARINE CHART DIVISION, NAUTICAL DATA BRANCH

NUMBER	CHART LETTER NUMBER ASSIGNED	DATE FORWARDED	REMARKS
6		Oct. 1977	Digitized Forms 76-40 were submitted as a final report. The computer cards for these landmarks and aids are on file in the CMD Special Projects Section, and will be destroyed 5 years after the date of Final Review

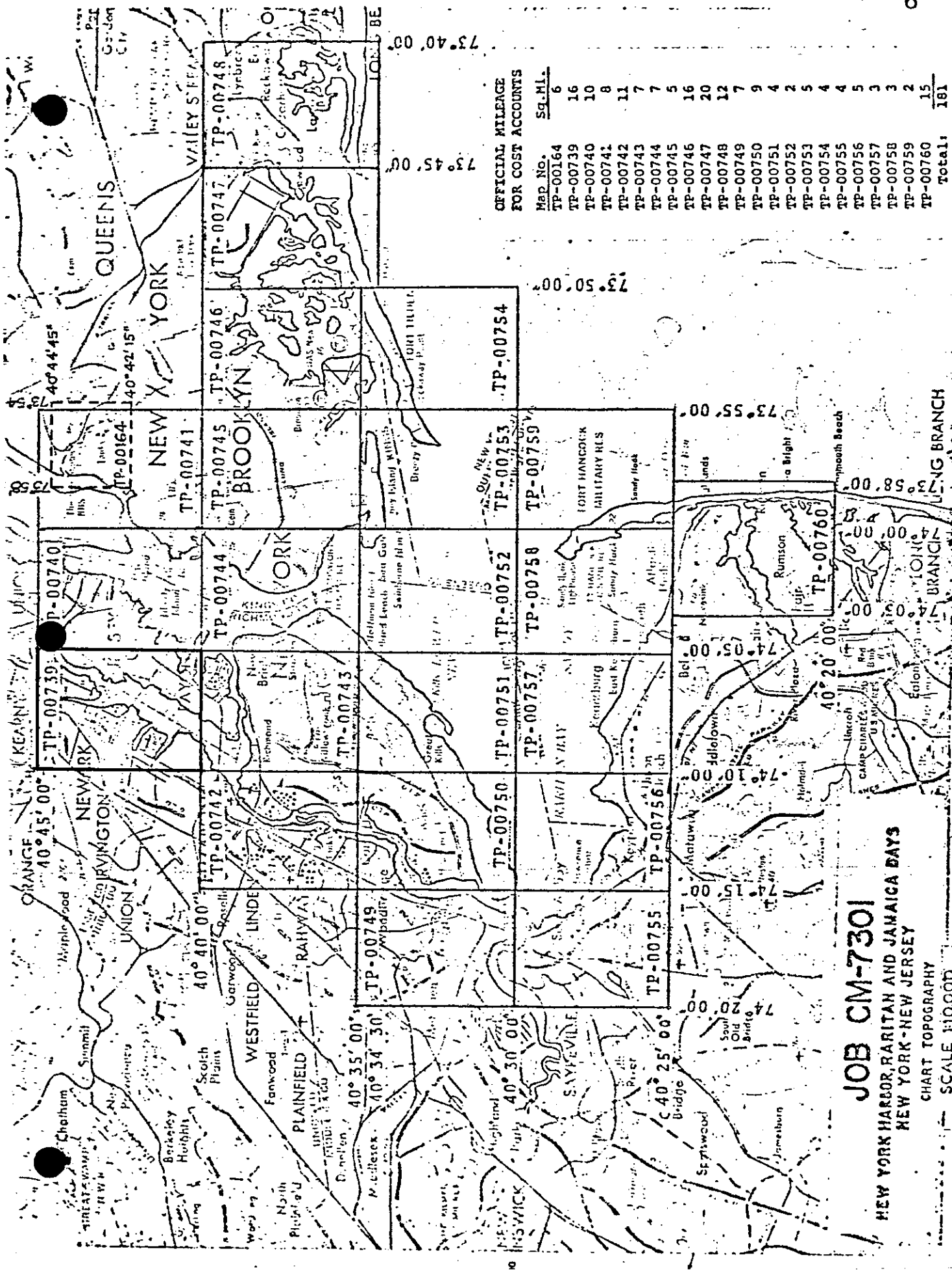
2. ☐ REPORT TO MARINE CHART DIVISION, COAST PILOT BRANCH. DATE FORWARDED: _____
3. ☐ REPORT TO AERONAUTICAL CHART DIVISION, AERONAUTICAL DATA SECTION. DATE FORWARDED: _____

III. FEDERAL RECORDS CENTER DATA

1. ☒ BRIDGING PHOTOGRAPHS; ☒ DUPLICATE BRIDGING REPORT; ☒ COMPUTER READOUTS.
2. ☐ CONTROL STATION IDENTIFICATION CARDS; ☐ FORM NOS 567 SUBMITTED BY FIELD PARTIES.
3. ☐ SOURCE DATA (except for Geographic Names Report) AS LISTED IN SECTION II, NOAA FORM 76-36C.
ACCOUNT FOR EXCEPTIONS:
4. ☐ 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	
	DATE OF PHOTOGRAPHY	DATE OF FIELD EDIT	MAP CLASS <input type="checkbox"/> II. <input type="checkbox"/> III. <input type="checkbox"/> IV. <input type="checkbox"/> V. <input type="checkbox"/> FINAL	
THIRD EDITION	SURVEY NUMBER TP - _____ (3)	JOB NUMBER PH - _____	TYPE OF SURVEY <input type="checkbox"/> REVISED <input type="checkbox"/> RESURVEY	
	DATE OF PHOTOGRAPHY	DATE OF FIELD EDIT	MAP CLASS <input type="checkbox"/> II. <input type="checkbox"/> III. <input type="checkbox"/> IV. <input type="checkbox"/> V. <input type="checkbox"/> FINAL	
FOURTH EDITION	SURVEY NUMBER TP - _____ (4)	JOB NUMBER PH - _____	TYPE OF SURVEY <input type="checkbox"/> REVISED <input type="checkbox"/> RESURVEY	
	DATE OF PHOTOGRAPHY	DATE OF FIELD EDIT	MAP CLASS <input type="checkbox"/> II. <input type="checkbox"/> III. <input type="checkbox"/> IV. <input type="checkbox"/> V. <input type="checkbox"/> FINAL	



JOB CM-7301 **NEW YORK HARBOR, RARITAN AND JAMAICA BAYS** **NEW YORK-NEW JERSEY**

CHART TOPOGRAPHY
SCALE 1:10,000
and 1:5,000

OFFICIAL MILEAGE FOR COST ACCOUNTS

Map No.	Sq. MI.
TP-00164	6
TP-00739	16
TP-00740	10
TP-00741	8
TP-00742	11
TP-00743	7
TP-00744	7
TP-00745	5
TP-00746	16
TP-00747	20
TP-00748	12
TP-00749	7
TP-00750	9
TP-00751	4
TP-00752	2
TP-00753	5
TP-00754	4
TP-00755	4
TP-00756	5
TP-00757	3
TP-00758	3
TP-00759	2
TP-00760	15
Total:	191

SUMMARY TO ACCOMPANY DESCRIPTIVE REPORTS
TP-00739 through TP-00760 and TP-00164

This map is one of twenty-three chart compilation maps that comprise Job CM-7301. Maps TP-00739 through TP-00760 were compiled at 1:10,000 scale and map TP-00164 was compiled at 1:5,000 scale.

The purpose of this job is to provide chart compilation for use in the maintenance and reconstruction of published nautical charts covering the project area.

The project area includes New York Harbor, Raritan Bay, and Jamaica Bay in the states of New Jersey and New York.

Field operations, which began in September 1974, generally consisted of the premarking of control and flying the needed aerial photography.

Aerotriangulation photography was furnished at 1:60,000 scale from natural color film taken in 1974 with the RC-10(C) camera. Color compilation photography was taken in 1974 at 1:30,000 scale and in 1975 at 1:15,000 scale, using the RC-8(E) and RC-10(B) cameras. Supplemental black-and-white infrared, tide-coordinated photography was flown in 1975 at 1:30,000 scale using the RC-10(B) camera.

Five strips of the 1:60,000 scale color photography were bridged using analytic aerotriangulation methods. Thirteen strips of the 1:30,000 scale color compilation photography and two strips of the 1:15,000 scale color compilation photography were also bridged by analytic aerotriangulation procedures.

Compilation photography was the 1:15,000 and 1:30,000 scale color photography and the 1:30,000 scale supplemental infrared photography. The maps were compiled on the Wild B-8 stereoplotter using the natural color photography. Ratioed prints of the black-and-white infrared photography were used graphically to delineate the approximate mean low water line and to supplement the B-8 instrument compilation.

All map line work is smooth compilation drafting.

Field edit data was prepared for each of the twenty-three maps. Field edit was postponed in 1977 after this preparation of data was completed.

Final review of the maps was done by the Quality Control Group of the Photogrammetric Branch. All maps were registered as Class III maps.

A Chart Maintenance Print for each map was forwarded to the Nautical Data Section of the Marine Chart Division.

The following items are registered in the National Ocean Survey Archives:

1. A plastic copy of each map
2. A Descriptive Report for each map

Two 20 cm x 30 cm negatives of each map are on file in the Photo Map and Imagery Information Section of the Photographic Operations Branch.

FIELD INSPECTION

There was no field inspection prior to compilation. Field work accomplished was limited to the recovery and identification of the horizontal control necessary for aerotriangulation.

July 1975

21. Area Covered

The area covered by this report pertains to the shorelines of New York Harbor, Raritan and Jamaica Bays, New York-New Jersey. This area is covered by twenty-two 1:10,000 scale sheets, TP-00735 thru TP-00760 and one 1:5,000 sheet, TP-00164. The 5,000 scale sheet (TP-00164) was not plotted at this time because of the lack of low altitude photo coverage.

22. Method

Five strips of 1:60,000 scale color photography were bridged by analytic aerotriangulation methods. The strips were controlled by field identified control paneled in 1974 with office identified control floated as checks. Thirteen strips of 1:30,000 scale color photography were also bridged by analytic aerotriangulation methods. These strips were controlled by field identified control and with common points dropped from the 1:60,000 scale photography. Normally the 1:30,000 scale strips would not be bridged, but, due to the poor definition of photography, this had to be done in order to meet the National Map Accuracy Standards. Ties were made between all bridging strips. Points were located on the 1:30,000 scale photography to determine the ratio scale. Ratios were ordered for the 1:10,000 scale sheets. Data for ruling projections were furnished to the Coradomat to be plotted in the New York East state plane coordinate system. The grids were plotted in zones as indicated per instructions in a letter from the Chief, Coastal Mapping Division, dated March 27, 1975.

23. Adequacy of Control

The control was adequate.

24. Supplemental Data

USGS Quadrangles were used to provide vertical control for the adjustment.

25. Photography

The photography was adequate as to coverage and overlap except for the 1:5,000 scale sheet, TP-00164. This photography has not been taken as of this report. Definition of the photography at all scales was very poor due to haze at time of photography.

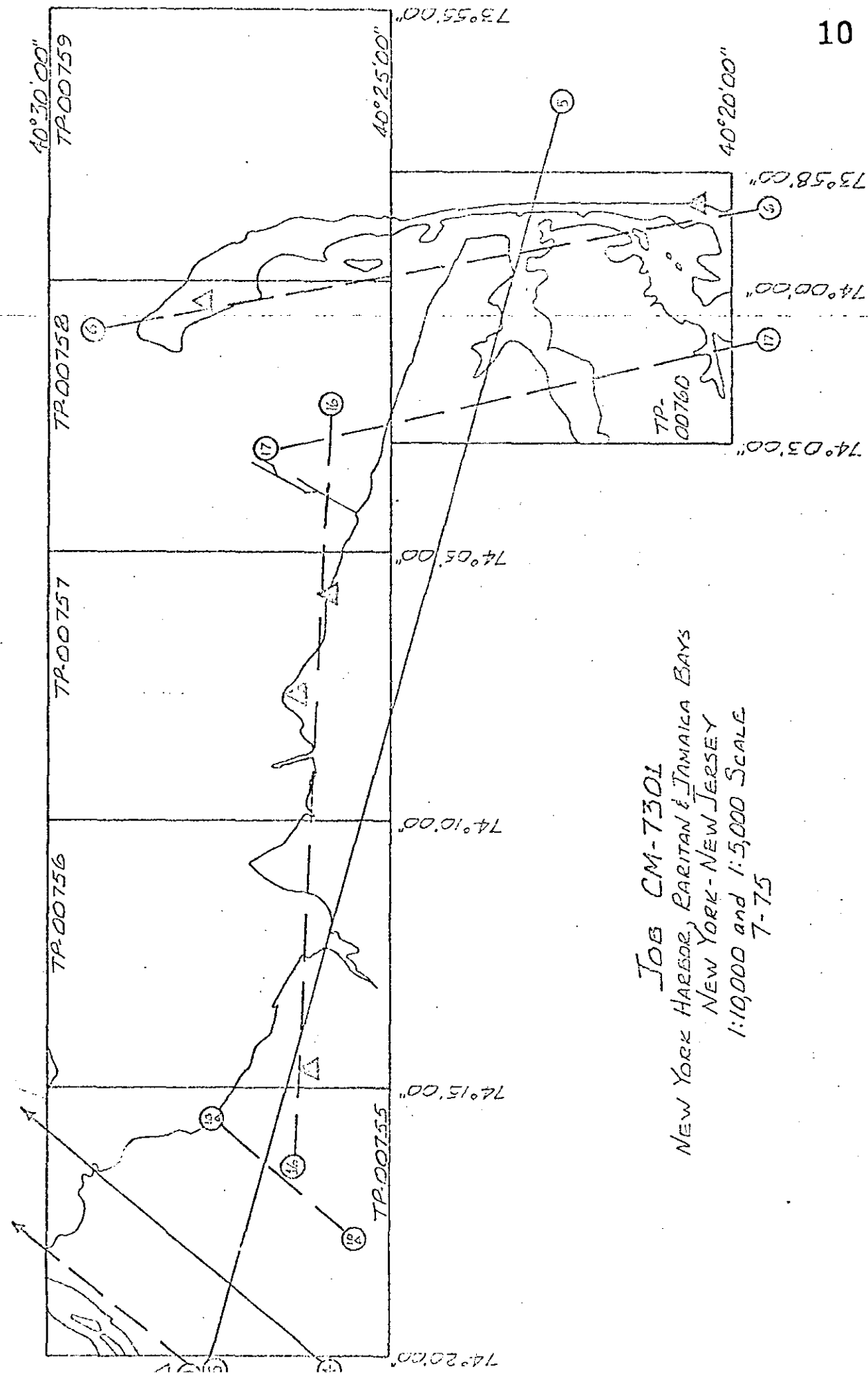
Respectfully submitted,

Ivan O. Raborn
Ivan O. Raborn

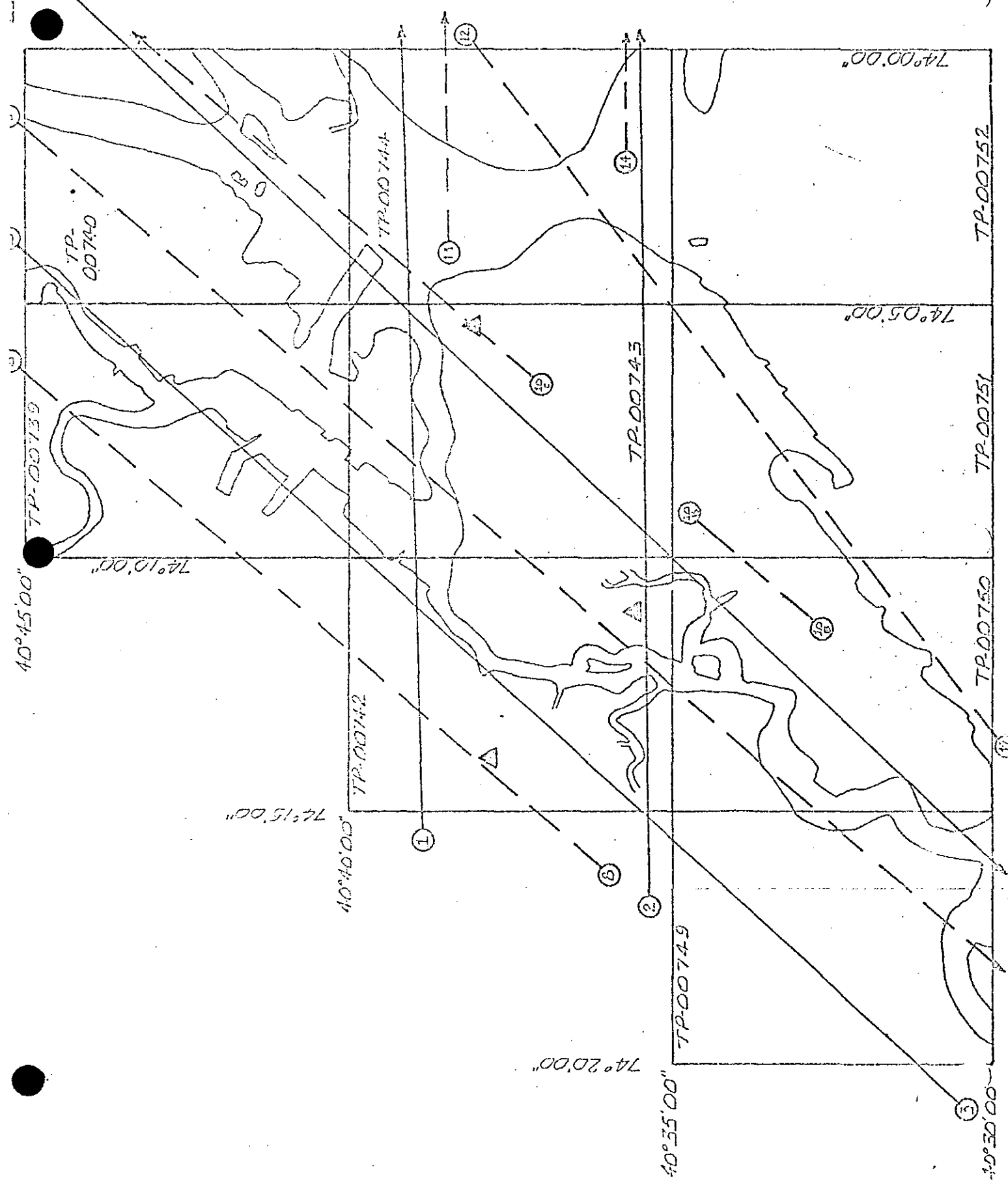
Approved and forwarded:

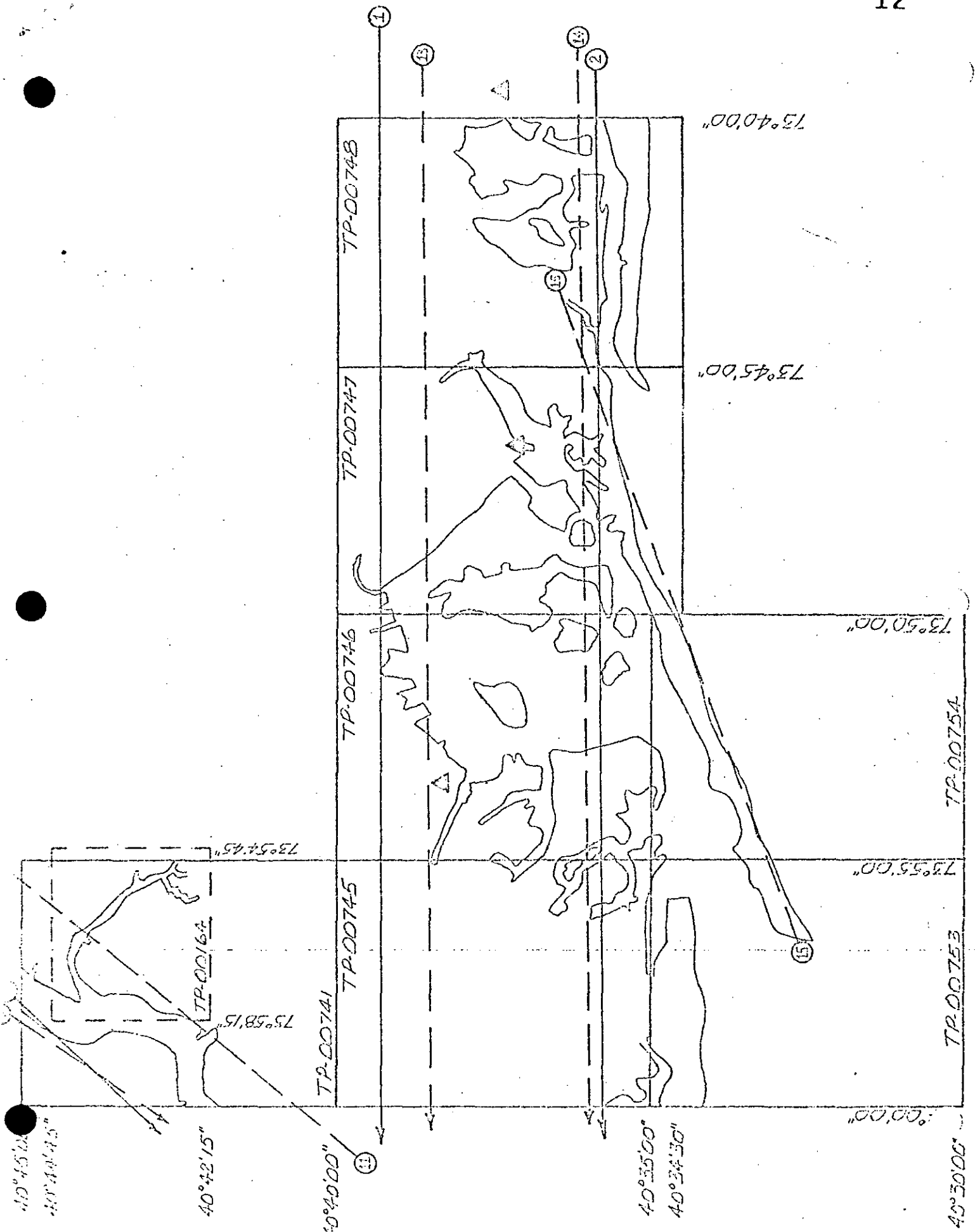
John D. Perrow, Jr.
John D. Perrow, Jr.

Chief, Aerotriangulation Section



JOB CM-7301
 NEW YORK HARBOR, BARITAN & JAMAICA BAYS
 NEW YORK-NEW JERSEY
 1:10,000 and 1:5,000 SCALE
 7-75





Strip No.	Scale	Photo Nos.
1	60,000	74C(C)864-874
2	"	851-861
3	"	74C(C)892-902
4	"	877-887
5	"	1202-1207
6	30,000	74E(C)6963-6970
No strip numbered 7		
8	30,000	74E(C)7145-7154
9	"	7083-7099
10A	"	7125-7127
10B	"	7131-7133
10C	"	7135-7143
11	"	7076-7082
12	"	7186-7196
13	"	7056-7069
14	"	7040-7052
15	"	7172-7179
16	"	7162-7170
17	"	7197-7202

DESCRIPTIVE REPORT CONTROL RECORD

MAP NO.	JOB NO.	GEODETIC DATUM	COORDINATES IN FEET	AEROTRI- ANGULATION POINT NUMBER	ORIGINATING ACTIVITY Coastal Mapping Division Rockville, Maryland	REMARKS
			STATE ZONE		ϕ LATITUDE λ LONGITUDE	
TP-00739	CM-7301					
South Kearny Public Service Elec. Po. Co. North Stack 1931	NJ Vol. I G.P.-P. 556		X=	894116	ϕ 40-44-13.421	
			Y=		λ 74-05-47.611	
South Kearny Public Service Electric Power Co. Middle Stack 1931	NJ Vol. I G.P.-P. 556		X=		ϕ 40-44-12.709	
			Y=	894110	λ 74-05-48.498	
South Kearny Public Service Elec. Po. Co. South Stack 1931	NJ Vol. I G.P.-P. 556		X=		ϕ 40-44-11.998	
			Y=	894117	λ 74-05-49.383	
Port Newark Sears Roebuck Co. Tank 1931	NJ Vol. I G.P.-P. 554		X=	23	ϕ 40-41-37.228	Not visible on photos. Appears de-
			Y=		λ 74-09-11.029	stroyed. Not plotted
Port Newark Weyerhaeuser Timber Co. Tank 1931	NJ Vol. I G.P.-P. 554		X=	24	ϕ 40-41-37.008	
			Y=		λ 74-08.52.776	
Newark Bay Kellogg Co. Tank 1931	NJ Vol. I G.P.-P. 553		X=	27	ϕ 40-42-36.252	Not visible on Photos. Not Plotted.
			Y=		λ 74-06-17.223	
Bayonne Leolastic Works Everlasting Co. Tank 1931	NJ Vol. I G.P.-P. 660		X=	28	ϕ 40-40-28.725	
			Y=		λ 74-07-15.790	
Port Newark, Terminal Mercur Co. East Tank, 1931			X=	178	ϕ 40-42-01.110	
			Y=		λ 74-08-33.611	
Newark, Amer. Agriculture Chem. Co. Chimney, 1931	NJ Vol. I G.P.-P. 556		X=	130	ϕ 40-44-25.057	
			Y=		λ 74-08-09.545	
Kearny Point, Western Elec. Co. North Twin Chimney 1931	NJ Vol. I G.P.-P. 554		X=	134	ϕ 40-43-24.593	
			Y=		λ 74-07-08.085	
COMPUTED BY	N/A	DATE	COMPUTATION CHECKED BY	N/A	DATE	
LISTED BY	G. Fromm	11/7/75	LISTING CHECKED BY	G. Ball	DATE	11/7/75
HAND PLOTTING BY	N/A	DATE	HAND PLOTTING CHECKED BY	N/A	DATE	

NOAA FORM 76-41
(6-75)U.S. DEPARTMENT OF COMMERCE
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION

DESCRIPTIVE REPORT CONTROL RECORD

MAP NO.		JOB NO.		GEODEIC DATUM		ORIGINATING ACTIVITY		REMARKS
TP-00739		CM-7301		N/A 1927		Coastal Mapping Division Rockville, Maryland		
STATION NAME	SOURCE OF INFORMATION (Index)	AEROTRI- ANGULATION POINT NUMBER	COORDINATES IN FEET STATE _____ ZONE _____		GEOGRAPHIC POSITION φ LATITUDE λ LONGITUDE			
Hacksack River Beacon #3 1931	NJ Vol. I G.P.-P.553	135	X=		φ 40-42-58.160			
			Y=		λ 74-06-32.965			
Hacksack River Beacon No. 1 1931	NJ Vol. I G.P.-P.553	136	X=		φ 40-42-43.267			
			Y=		λ 74-06-57.532			
Jersey City German	NJ Vol. I		X=		φ 40-42-06.324			
Luthern Church Spire 1913	G.P.-P.661	139	Y=		λ 74-05-35.231			
St. Paul's Spire 1913	NJ Vol. I G.P.-P.458	140	X=		φ 40-41-47.060			
			Y=		λ 74-05-37.900			
Greenville Penn. R.R. Grain Elevator, Tower 1930	NJ Vol. I G.P.-P.523	141	X=		φ 40-40-42.906		Not visible on photos. Appears de-	
			Y=		λ 74-05-02.623		stroyed. Not Plotted.	
Bayonne, St. Vincents Church Spire, 1930	NJ Vol. I G.P.-P.523	142	X=		φ 40-40-54.966			
			Y=		λ 74-06-26.714			
Bayonne, First Reformed Church, Spire 1887	NJ Vol. I G.P.-P.523	143	X=		φ 40-40-24.330			
			Y=		λ 74-06-51.040			
Newark Meadow Ball Blueing Co. Tallest Chimney 1913	NJ Vol. I G.P.-P.553		X=		φ 40-43-05.132		Not visible on photos. Appears de-	
			Y=		λ 74-08-38.361		stroyed. Not plotted.	
Port Newark, Sears-Roebuck and Co. Chimney 1931	NJ Vol. I G.P.-P. 554		X=		φ 40-41-37.862			
			Y=		λ 74-09-13.294			
Kearny Point WTRN.Elec. Co. South Twin Chy. 1931	NJ Vol. I G.P.-P.554		X=		φ 40-43-24.147			
			Y=		λ 74-07-08.321			
COMPUTED BY N/A		DATE	COMPUTATION CHECKED BY N/A			DATE		
LISTED BY G. Fromm		DATE 11/7/75	LISTING CHECKED BY G. Ball			DATE 11/7/75		
HAND PLOTTING BY N/A		DATE	HAND PLOTTING CHECKED BY N/A			DATE		

SUPERSEDES NOAA FORM 76-41, 2-71 EDITION WHICH IS OBSOLETE.

