

T-012404

T-012404

NOAA FORM 76-35 (6-80)	
U.S. DEPARTMENT OF COMMERCE NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION NATIONAL OCEAN SURVEY	
DESCRIPTIVE REPORT	
Map No. T-12404	Edition No. 1
Job No. PH-6705	
Map Classification FINAL, FIELD EDITED MAP	
Type of Survey SHORELINE	
LOCALITY	
State ALASKA	
General Locality THORNE ISLAND AND WHALE PASSAGE	
Locality DEICHMAN ROCK	
19 ⁶⁶ TO 19 ⁷⁸	
REGISTERED IN ARCHIVES	
DATE	

NOAA FORM 76-36A (3-72)		U. S. DEPARTMENT OF COMMERCE NATIONAL OCEANIC AND ATMOSPHERIC ADMIN.	
DESCRIPTIVE REPORT - DATA RECORD		TYPE OF SURVEY ☒ ORIGINAL ☐ RESURVEY ☐ REVISED	
PHOTOGRAMMETRIC OFFICE Coastal Mapping Division, Atlantic Marine Center, Norfolk, Virginia OFFICER-IN-CHARGE Jeffrey G. Carlen, CDR		SURVEY TR. <u>12404</u> MAP EDITION NO. <u>(1)</u> MAP CLASS <u>Final</u> JOB PH. <u>6705</u> LAST PRECEDING MAP EDITION TYPE OF SURVEY ☐ ORIGINAL ☐ RESURVEY ☐ REVISED JOB PH. _____ MAP CLASS _____ SURVEY DATES: 19__ TO 19__	
I. INSTRUCTIONS DATED			
1. OFFICE		2. FIELD	
Aerotriangulation October 31, 1966 Planning (Memo) February 8, 1967 Compilation February 27, 1967 Compilation (Suppl. I) November 29, 1967 Compilation (Suppl. II) January 20, 1972		Horizontal Control September 8, 1966 Supplement I March 24, 1967	
II. DATUMS			
1. HORIZONTAL: ☒ 1927 NORTH AMERICAN		OTHER (Specify)	
2. VERTICAL: ☒ MEAN HIGH-WATER ☐ MEAN LOW-WATER ☒ MEAN LOWER LOW-WATER ☐ MEAN SEA LEVEL		OTHER (Specify)	
3. MAP PROJECTION Polyconic		4. GRID(S) STATE Alaska ZONE	
5. SCALE 1:10,000		STATE ZONE	
III. HISTORY OF OFFICE OPERATIONS			
OPERATIONS		NAME	DATE
1. AEROTRIANGULATION BY METHOD: Analytic LANDMARKS AND AIDS BY		V. McNeel	Sept. 1967
2. CONTROL AND BRIDGE POINTS PLOTTED BY METHOD: Coordinatograph CHECKED BY		L. Neterer, Jr. T. Bulfer	Dec 1971 Dec 1971
3. STEREOSCOPIC INSTRUMENT PLANIMETRY BY COMPILATION CHECKED BY INSTRUMENT: Wild B-8 CONTOURS BY SCALE: 1:10,000 CHECKED BY		L. Neterer, Jr. C. Blood N.A. N.A.	Dec 1971 Dec 1971
4. MANUSCRIPT DELINEATION PLANIMETRY BY METHOD: Smooth draft CHECKED BY SCALE: 1:10,000 CHECKED BY HYDRO SUPPORT DATA BY		L. Neterer, Jr. B. Wilson N.A. N.A. L. Neterer, Jr. B. Wilson	Jan 1972 Jan 1972 Jan 1972 Jan 1972
5. OFFICE INSPECTION PRIOR TO FIELD EDIT BY		B. Wilson	Jan 1972
6. APPLICATION OF FIELD EDIT DATA BY		R. Kravitz	Nov 1978
7. COMPILATION SECTION REVIEW BY		L. Neterer, Jr.	Jan 1979
8. FINAL REVIEW Final BY		J. Hancock	May 1986
9. DATA FORWARDED TO PHOTOGRAMMETRIC BRANCH BY		J. Hancock	Jun 1986
10. DATA EXAMINED IN PHOTOGRAMMETRIC BRANCH BY		P. Dempsey	Sept 1986
11. MAP REGISTERED - COASTAL SURVEY SECTION BY		P. Dempsey	Sep 86

NOAA FORM 76-36B
(3-72)

T-12404

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

COMPILATION SOURCES

1. COMPILATION PHOTOGRAPHY

CAMERA(S) Wild RC-8 "L", L=152.21 mm
Wild RC-9 "M", M= 88.20 mmTYPES OF PHOTOGRAPHY
LEGEND

TIME REFERENCE

TIDE STAGE REFERENCE

- ☒ PREDICTED TIDES
☐ REFERENCE STATION RECORDS
☐ TIDE CONTROLLED PHOTOGRAPHY

- (C) COLOR
(P) PANCHROMATIC
(I) INFRARED

ZONE

Pacific

☒ STANDARD

MERIDIAN

120th

☐ DAYLIGHT

NUMBER AND TYPE	DATE	TIME	SCALE	STAGE OF TIDE
66L(P) 5853-5855	Jul. 12, 1966	14:01	1:30,000	4.5 ft. above MLLW
66L(C) 5908-5910	Jul. 12, 1966	15:04	1:20,000	4.8 ft. above MLLW
66M(C) 231-232*	Jul. 12, 1966		1:60,000	
67M(P) 633-634*	May 31, 1967		1:60,000	
(Mean Range = 13.6 ft.)				

REMARKS

*Bridging photographs

2. SOURCE OF MEAN HIGH-WATER LINE:

The MHW Line was compiled from the above listed photographs using stereo instrument methods.

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

None compiled.

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
H-9756	Apr/May 1978	Advanced Copy			

5. FINAL JUNCTIONS

NORTH	EAST	SOUTH	WEST
No Survey	No Survey	T-13096	T-12403

REMARKS

T-12404

HISTORY OF FIELD OPERATIONS

I. ☒ FIELD INSPECTION OPERATION (photoidentification) ☐ FIELD EDIT OPERATION

OPERATION	NAME	DATE
1. CHIEF OF FIELD PARTY	J. B. Watkins	Sept 1966
2. HORIZONTAL CONTROL	RECOVERED BY None ESTABLISHED BY None PRE-MARKED OR IDENTIFIED BY None	
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 None LOCATED (Field Methods) BY None IDENTIFIED BY None	
5. GEOGRAPHIC NAMES INVESTIGATION	TYPE OF INVESTIGATION ☐ COMPLETE ☐ SPECIFIC NAMES ONLY ☒ NO INVESTIGATION	
6. PHOTO INSPECTION	CLARIFICATION OF DETAILS BY None	
7. BOUNDARIES AND LIMITS	SURVEYED OR IDENTIFIED BY None	

II. SOURCE DATA

1. HORIZONTAL CONTROL IDENTIFIED		2. VERTICAL CONTROL IDENTIFIED	
None		N.A.	
PHOTO NUMBER	STATION NAME	PHOTO NUMBER	STATION DESIGNATION

3. PHOTO NUMBERS (Clarification of details)

None

4. LANDMARKS AND AIDS TO NAVIGATION IDENTIFIED

None

PHOTO NUMBER	OBJECT NAME	PHOTO NUMBER	OBJECT NAME

5. GEOGRAPHIC NAMES: ☐ REPORT ☒ NONE

6. 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

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(3-72)U. S. DEPARTMENT OF COMMERCE
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION
NATIONAL OCEAN SURVEY

T-12404

HISTORY OF FIELD OPERATIONS

I. ☐ FIELD INSPECTION OPERATION☒ FIELD ~~INS~~ OPERATIONPremarking for new
bridging photography

OPERATION	NAME	DATE
1. CHIEF OF FIELD PARTY	W. L. M.	Apr 1967
2. HORIZONTAL CONTROL	RECOVERED BY L. Riggers	Apr 1967
	ESTABLISHED BY None	
	PRE-MARKED OR IDENTIFIED BY L. Riggers	Apr 1967
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 None	
	LOCATED (Field Methods) BY None	
	IDENTIFIED BY None	
5. GEOGRAPHIC NAMES INVESTIGATION	TYPE OF INVESTIGATION ☐ COMPLETE ☐ SPECIFIC NAMES ONLY ☒ NO INVESTIGATION	
6. PHOTO INSPECTION	CLARIFICATION OF DETAILS BY None	
7. BOUNDARIES AND LIMITS	SURVEYED OR IDENTIFIED BY None	

II. SOURCE DATA

1. HORIZONTAL CONTROL IDENTIFIED

Paneled

2. VERTICAL CONTROL IDENTIFIED

N.A.

PHOTO NUMBER	STATION NAME	PHOTO NUMBER	STATION DESIGNATION
67M634	LUCK POINT NORTH BASE, 1924 (Paneled direct)		

3. PHOTO NUMBERS (Clarification of details)

None

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)

1-form C&GS 152 (CSI)

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(3-72)

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

HISTORY OF FIELD OPERATIONS

I. ☐ FIELD INSPECTION OPERATION☒ FIELD EDIT OPERATION

OPERATION	NAME	DATE
1. CHIEF OF FIELD PARTY	D. Smith	May 1978
2. HORIZONTAL CONTROL	RECOVERED BY D. Smith ESTABLISHED BY None PRE-MARKED OR IDENTIFIED BY None	May 1978
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 None LOCATED (Field Methods) BY None IDENTIFIED BY None	
5. GEOGRAPHIC NAMES INVESTIGATION	TYPE OF INVESTIGATION ☐ COMPLETE ☐ SPECIFIC NAMES ONLY ☒ NO INVESTIGATION	
6. PHOTO INSPECTION	CLARIFICATION OF DETAILS BY D. Smith	May 1978
7. BOUNDARIES AND LIMITS	SURVEYED OR IDENTIFIED BY N.A.	

II. SOURCE DATA

1. HORIZONTAL CONTROL IDENTIFIED

None

2. VERTICAL CONTROL IDENTIFIED

PHOTO NUMBER	STATION NAME	PHOTO NUMBER	STATION DESIGNATION

3. PHOTO NUMBERS (Clarification of details)

66 L(P) 5854-5855 (Field annotated 1:10,000 cronapague ratios)

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

1 Planetable sheet for offshore islands (T-12403 & T-12404)

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

1 field edit report
 1 field edit film print
 1 field book (planetable observations)

NOAA FORM 76-36D
(3-72)

T-12404

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

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	Jan 1972	Class III Manuscript	Feb. 1972	Jan. 1972
Field edit applied compilation complete.	Jan 1979	Class I Manuscript	Jan. 1979	Jan. 1979
Final Review	May 1986	Final Map		

II. LANDMARKS AND AIDS TO NAVIGATION

None

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

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)

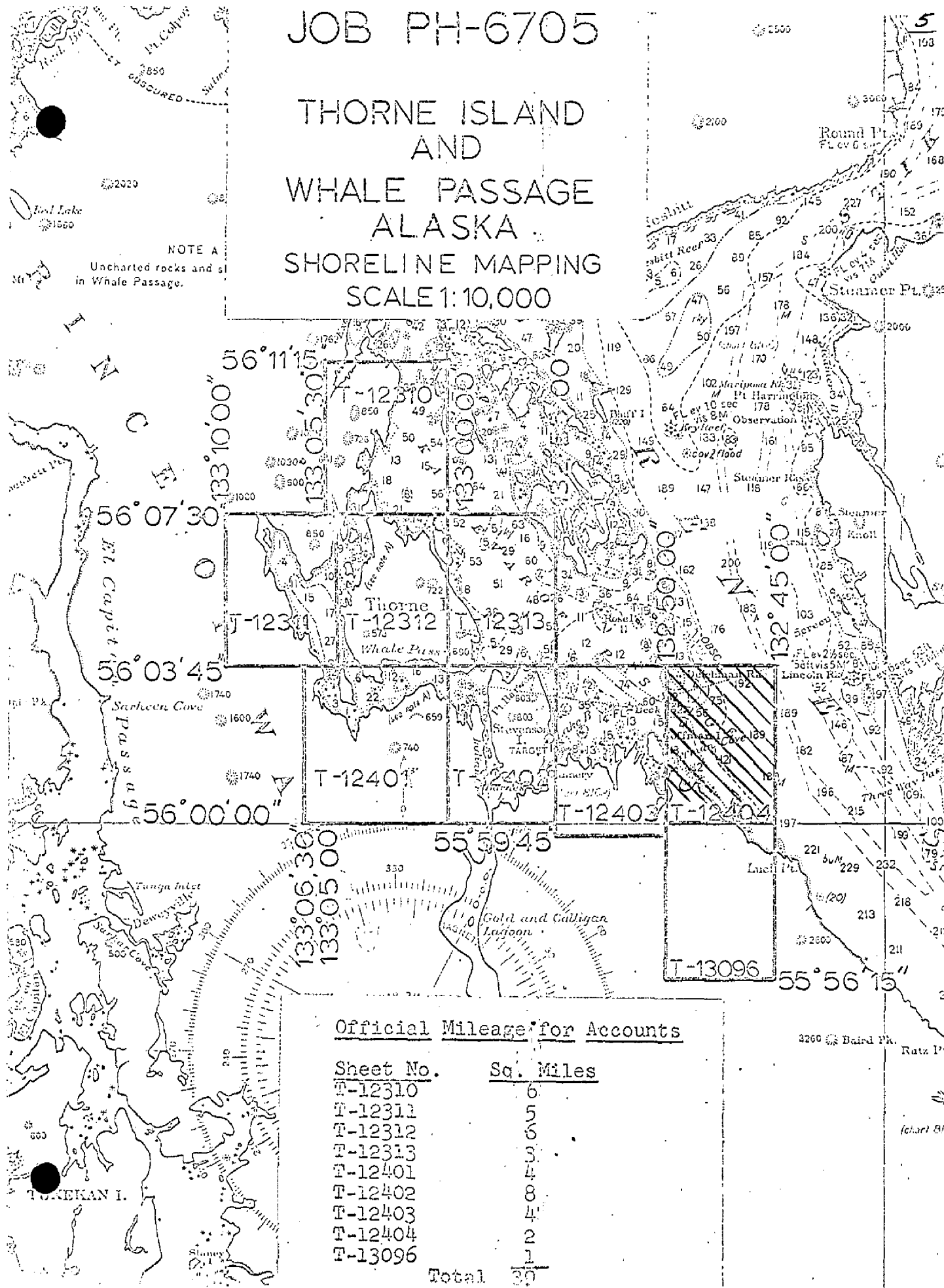
SECOND EDITION	SURVEY NUMBER TP - _____ (2)	JOB NUMBER PH - _____	TYPE OF SURVEY ☐ REVISED ☐ RESURVEY MAP CLASS ☐ II. ☐ III. ☐ IV. ☐ V. ☐ FINAL
	DATE OF PHOTOGRAPHY	DATE OF FIELD EDIT	
THIRD EDITION	SURVEY NUMBER TP - _____ (3)	JOB NUMBER PH - _____	TYPE OF SURVEY ☐ REVISED ☐ RESURVEY MAP CLASS ☐ II. ☐ III. ☐ IV. ☐ V. ☐ FINAL
	DATE OF PHOTOGRAPHY	DATE OF FIELD EDIT	
FOURTH EDITION	SURVEY NUMBER TP - _____ (4)	JOB NUMBER PH - _____	TYPE OF SURVEY ☐ REVISED ☐ RESURVEY MAP CLASS ☐ II. ☐ III. ☐ IV. ☐ V. ☐ FINAL
	DATE OF PHOTOGRAPHY	DATE OF FIELD EDIT	

JOB PH-6705

THORNE ISLAND AND WHALE PASSAGE ALASKA SHORELINE MAPPING SCALE 1:10,000

NOTE A

Uncharted rocks and shoals in Whale Passage.



Official Mileage for Accounts

Sheet No.	Sq. Miles
T-12310	6
T-12311	5
T-12312	6
T-12313	3
T-12401	4
T-12402	8
T-12403	4
T-12404	2
T-13096	1
Total	39

SUMMARY TO ACCOMPANY
DESCRIPTIVE REPORT

T-12404

This 1:10,000 scale final shoreline map is one of nine maps that comprise project PH-6705, Thorne Island and Whale Passage, Alaska. The project was originally assigned as 6 maps (T-12310 thru T-12313, T-12401 and T-12402); however, 3 additional maps (T-12403, T-12404, and T-13096) were included at a later date in order to support an extended area of proposed hydrography.

The purpose of this map was to provide support data to assist hydrographic operations in the vicinity of Whale Passage.

This map portrays shoreline along a portion of Prince of Wales Island just east of Goffman Island. Also featured is the offshore islands referred to as The Triplets and Deichman Rock.

Photo coverage for the project was provided in July 1966 with 1:60,000 scale, 1:30,000 scale, and 1:20,000 scale photographs. The 1:60,000 scale color photographs were taken with the RC-9 "M" camera for aerotriangulation. Panchromatic photographs at 1:30,000 scale were taken with the RC-8 "L" camera for aerotriangulation and instrument compilation. Supplemental color photographs at 1:20,000 scale were also taken with the "L" camera in order to assist compilation and to provide photo coverage for hydro support. Because of inadequate aerotriangulation results, additional panchromatic bridging photographs at 1:60,000 scale were flown in May 1967 with the "M" camera. The stage of tide for all photographs was based upon predicted tide data. No MLLW photographs were provided.

Field work prior to aerotriangulation consisted of the recovery and establishment of horizontal control by photoidentification methods. This activity was performed in September 1966. Additional field work was performed in April 1967 in order to establish horizontal control by premarking methods for new bridging photography. At this same time, field edit for preliminary compilation of T-12310 thru T-12313, T-12401, and T-12402 was also accomplished.

Analytic aerotriangulation was provided by the Washington Science Center in February 1967; however, adequate bridging results could not be obtained. In order to accommodate the hydrographer, the aerotriangulation office forwarded the project data to compilation with the agreement that the six initial manuscripts would be classified as preliminary. New bridging photography, as requested by aerotriangulation, was provided in May 1967. Though six manuscripts had been compiled using the original bridging results, new aerotriangulation activity was performed in September 1967. Consequently, new and adjusted horizontal control was provided and the compilation of new manuscripts was required.

T-12404

Compilation of preliminary manuscripts T-12310 thru T-12313, T-12401 and T-12402 was performed in 1967 at the Coastal Mapping Section, Atlantic Marine Center. With the anticipation of obtaining new photography, preliminary manuscript copies were submitted to the hydrographer for field edit and hydrographic support. When new aerotriangulation results were provided as a result of the new bridging photography, recompilation of the preliminary manuscripts was accomplished. This compilation utilized the field edit data that was performed by the hydrographer during the 1967 field season. Compilation of three additional manuscripts, T-12403, T-12404, and T-13096 was completed in January 1972. Copies of these three Class III manuscripts were submitted to Marine Charts and to the hydrographer for field edit.

Field edit and hydrographic support data for the contemporary hydro surveys were submitted in two stages. A tabulated summary of the six preliminary and three later Class III manuscripts is provided.

<u>DATA SUBMITTED FOR FIELD EDIT</u>	<u>DATE OF EDIT</u>	<u>EDITOR</u>	<u>CONTEMPORARY HYDRO SURVEY</u>
T-12310 (Preliminary)	May 1967 (Partial Edit)	C&GS Ship LESTER JONES	H-8946
T-12311 (Preliminary)	May 1967	C&GS Ship LESTER JONES	H-8945 & H-8946
T-12312 (Preliminary)	May 1967	C&GS Ship LESTER JONES	H-8945 & H-8946
T-12313 (Preliminary)	May 1967 (Partial Edit)	C&GS Ship LESTER JONES NOAA Ship RAINIER	H-8945 & H-8946 H-9754
T-12401 (Preliminary)	May 1967	C&GS Ship LESTER JONES	H-8945
T-12402 (Preliminary)	May 1967 (Partial Edit) May 1978 (Completion of Edit)	C&GS Ship LESTER JONES NOAA Ship RAINIER	H-8945 H-9754
T-12403 (Class III)	May 1978	NOAA Ship RAINIER	H-9754 & H-9756
T-12404 (Class III)	May 1978	NOAA Ship RAINIER	H-9756
T-13096 (Class III)	May 1978	NOAA Ship RAINIER	No Survey

T-12404

Field edit for this map was applied at the original compilation office in January 1979.

Final review for this final map was performed at the Atlantic Marine Center in May 1986. A comparison was made with the common nautical charts and hydrographic surveys. The original base manuscript and related data along with a final Chart Maintenance Print and a Notes to Hydrographer Print were forwarded to the Washington Science Center for registration and distribution.

FIELD INSPECTION

T-12404

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

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PHOTOGRAMMETRIC PLOT REPORT
JOB PH-6705
THORNE ISLAND AND
WHALE PASSAGE, ALASKA

February 15, 1967

21. Area Covered

The area covered in this report is in the vicinity of Thorne Island. The sheets covered are T-12310, T-12311, T-12312, T-12313, T-12401, T-12402 and T-12403. Only part of T-12404 and none of T-13096 are covered by present photography. Because of inadequate bridging photography and poor placement of control, it is recommended by this office that the manuscripts be classified as "Preliminary".

22. Method

Five strips of photography were bridged by analytic aerotriangulation. Strip 1 (scale of 1:60,000, RC-9 color) was adjusted to ground with field identified control points. Strips 2, 3, 4 and 5 (scale of 1:30,000, RC-8 panchromatic) were adjusted to ground with common points transferred from Strip 1.

23. Adequacy of Control

The distribution of the field identified control was not optimum for a proper analysis of the adjustment of Strip 1. The control is located near both ends of the strip with nothing in the middle.

Two of the identified subpoints could not be held in the bridge. They are ROSE 1916, subpoint A and POLE 1916, subpoint A. The two points would not hold because they could not be positively identified in the office.

24. Supplemental Data

None

25. Photography

The RC-9 color photography was inadequate. The fiducial marks were not visible and the image definition was poor.

Respectfully submitted:

Don O. Norman

Don O. Norman

Approved and Forwarded:

Henry P. Eichert
Henry P. Eichert

FILE HQ2

THORNE ISLAND AND
WHALE PASSAGE, ALASKA

CLOSURES TO CONTROL (FT.)

STRIP 1

1. LAKE BAY MAGNETIC STATION 1916

subpoint A	+ 1.2	- 1.8
subpoint B	- 1.0	- 0.4

2. BARNACLE ROCK 1916

subpoint A	+ 1.8	- 2.6
subpoint B	+11.1	-11.7
subpoint C	+ 7.4	+ 8.0

3. ROSE 1916

subpoint A	+15.4	-34.6
subpoint B	+ 1.6	- 1.1
subpoint C	- 2.7	+ 0.6

4. POLE 1916

subpoint B	+ 4.0	+19.4
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5. RAG 1916

subpoint A	+ 4.6	- 1.6
subpoint B	+ 5.1	+ 0.5

6. MOSS 1916

subpoint A	- 3.7	+ 0.4
subpoint B	- 7.2	+ 9.2

STRIP 2

05801	- 1.3	+ 0.6
05802	- 8.0	+14.3
04801	- 4.7	- 9.5
02802	- 1.5	+ 3.7
02803	+ 4.4	-32.1
02801	+ 2.9	+ 1.9
01801	- 1.4	- 2.0
01802	+12.8	+12.3

STRIP 3

LAKE BAY MAGNETIC STATION, 1916

	subpoint A	- 0.2	- 2.6
	subpoint B	- 0.2	+ 2.4
01801	- 6.3	- 0.9	
01802	+11.5	+ 9.7	
02804	+ 1.5	+ 2.4	
02801	+ 0.7	+ 1.9	
02802	+ 2.3	+ 4.4	
02803	+ 5.8	-31.0	
04801	- 1.4	+ 0.1	
05802	+ 3.8	+26.3	

RAG, 1916

	subpoint B	+ 1.9	- 1.3
05803	+ 3.0	- 5.5	
05804	+ 7.8	+ 1.2	

STRIP 4

03801	- 0.8	- 0.5
03802	+ 9.1	+ 2.5
04802	+ 2.8	+ 2.8

POLE, 1916

	subpoint A	+ 2.1	- 0.9
	subpoint B	- 3.5	-20.0
04804	+ 1.8	- 5.4	
04803	- 4.7	+ 2.5	

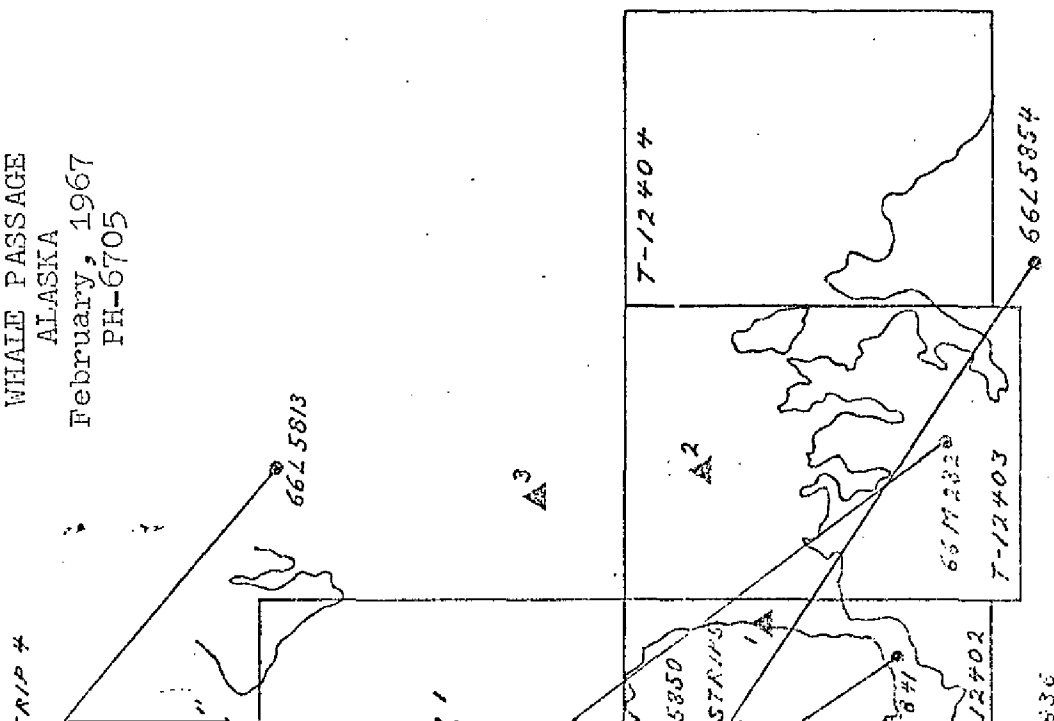
MOSS, 1916

	subpoint A	+ 0.2	- 0.1
	subpoint B	- 2.8	+ 8.7
06801	- 0.2	0.0	
06802	+ 9.4	-24.1	

STRIP 5

02808	0.0	0.0
01801	+ 0.6	- 1.0
01806	0.0	0.0
01807	+ 0.6	- 0.4
01803	- 3.0	+ 4.8
01804	+ 2.4	- 1.7
01804	0.0	0.0

AEROTRIANGULATION SKETCH
 THORNE ISLAND
 AND
 WHALE PASSAGE
 ALASKA
 February, 1967
 PH-6705



PHOTOGRAMMETRIC PLOT REPORT
Job PH-6705
Thorne Island and Whale Passage, Alaska

September 25, 1967

This report supersedes the preliminary report dated February 15, 1967. The original bridge strip of "M" photography flown in 1966 proved to be inadequate for the major portion of the area. It was, therefore, necessary to obtain a new bridge strip of "M" photography which was flown in May, 1967.

21. Area Covered

The area covered is in the vicinity of Thorne Island, Alaska. The sheets covered are T-12310 thru T-12313, T-12401 thru T-12404 and T-13096.

22. Method

Five strips of photography were included in this job.

Strip 1 (scale of 1:60,000, RC-9 panchromatic) was bridged by analytic aerotriangulation and adjusted to ground with field identified control points. The bridges from the preliminary report of February 15, 1967, were retained for Strips 2, 3 and 4 (scale of 1:30,000, RC-8 panchromatic). Strips 2 and 3 were readjusted using new values for common points established by the adjustment of Strip 1. Strip 4 could not be readjusted since it had no points in common with Strip 1. The preliminary adjustment of February 15, 1967, is considered adequate for Strip 4 and should be retained. Strip 5 (scale of 1:30,000, RC-8 panchromatic) was increased by three photographs -- 66-L-5855 thru 5857. It was bridged by analytic aerotriangulation and adjusted using values for common points established by the adjustment of Strip 1.

23. Adequacy of Control

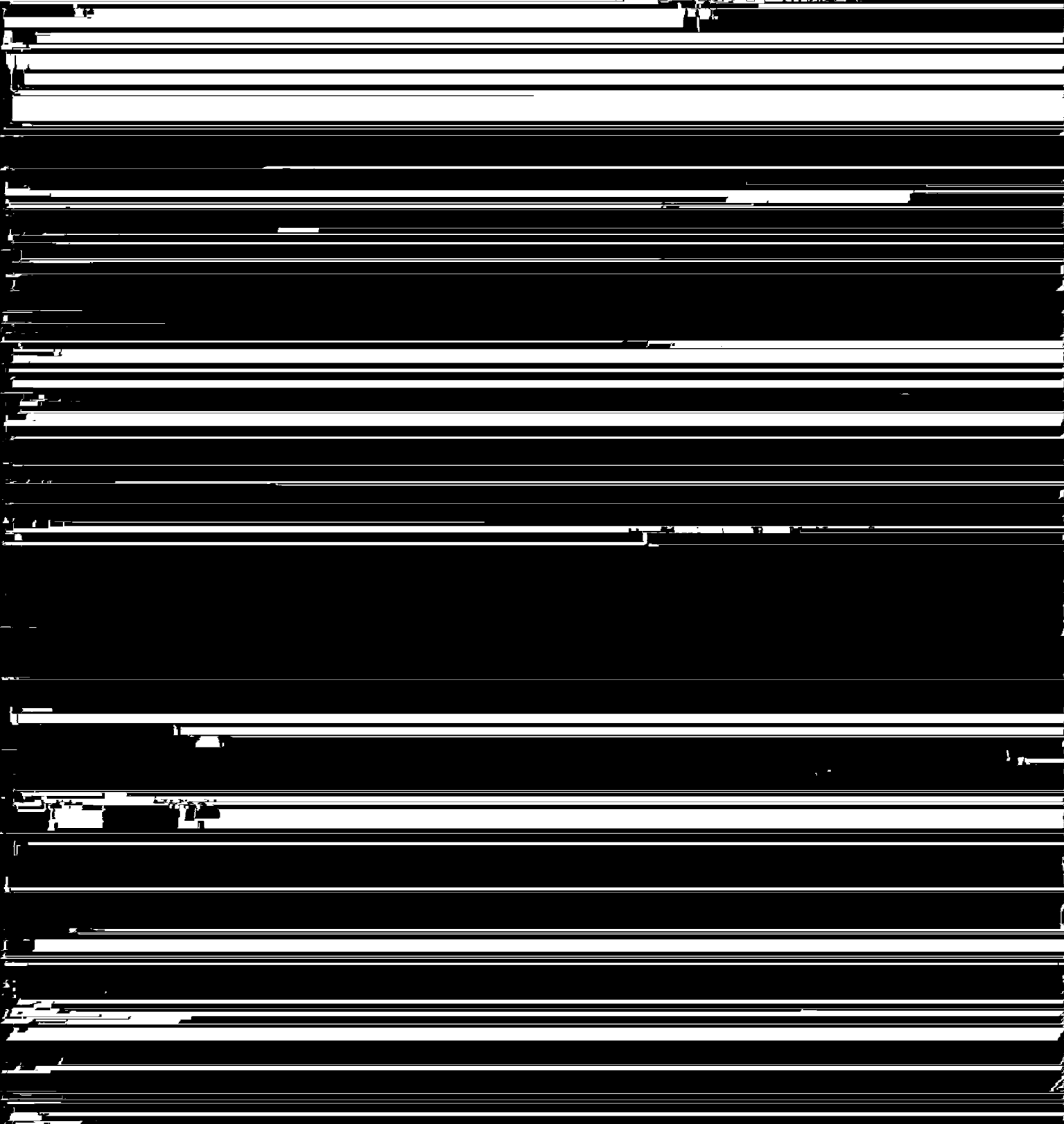
Horizontal control was adequate and complied with the project instructions. Closures to control are tabulated and attached.

24. Supplemental Data

USGS quadrangles were utilized to obtain vertical control needed for strip adjustment.

25. Photography

The coverage of the photography was adequate. The diapositives were of good quality.



CLOSURES TO CONTROL (FEET)
 Job PH-6705
 Thorne Island and Whale Passage, Alaska

STRIP #1

	ΔX	ΔY
LUCK POINT SOUTH BASE, 1915 (32100)	-0.3	0.0
LUCK POINT NORTH BASE, 1924 (34100)	+0.5	+0.8
LAKE BAY MAGNETIC STATION (35100)	+0.8	+1.8
BEST, 1916, Substation (36100)	+1.5	+1.4
DAVID, 1967 (37100)	-3.7	-6.2
RAG, 1916 (38100)	+0.3	+0.1

STRIP #2

	ΔX	ΔY
5801	-0.3	-0.7
4801	+0.3	+1.7
2802	+0.4	-1.5
2803	+3.8	+4.8
1801	+0.2	+0.4

STRIP #3

	ΔX	ΔY
LAKE BAY MAGNETIC STATION, Subpoint A, 01101	0.0	0.0
02804	-4.2	0.0
02802	-0.3	-0.5
02803	+1.9	-3.3
04801	+0.3	+0.1
RAG, 1916, Subpoint B 05104	-0.1	0.0
05805	+4.1	-11.7

STRIP #5

	ΔX	ΔY
02805	+0.3	-0.2
01803	-3.3	-6.4
35801	-1.9	+0.5
35802	-5.8	-4.2
34801	+1.9	-1.4
34802	+1.0	+3.3
33801	-1.6	-0.3
32801	+4.8	-3.2
32802	+0.5	+0.2

DESCRIPTIVE REPORT CONTROL RECORD

MAP NO.	STATION NAME	JOB NO.	SOURCE OF INFORMATION (Index)	AEROTRI- ANGULATION POINT NUMBER	GEODETTIC DATUM		COORDINATES IN FEET STATE Alaska ZONE 1	GEOGRAPHIC POSITION		ORIGINATING ACTIVITY	REMARKS
					N.A. 1927	Unit, AMC, Norfolk, VA		ϕ LATITUDE	λ LONGITUDE		
T-12404		PH-6705									
	LUCK POINT NORTH BASE, 1924		G.P. Vol. 3 pg. 985			X=		ϕ 56 00 59.904			
						Y=		λ 132 48 33.595			
						X=		ϕ 56 03 30.473			
	TRIPLIET, 1978 (Field Position)					Y=		λ 132 49 50.452			
						X=		ϕ			
						Y=		λ			
						X=		ϕ			
						Y=		λ			
						X=		ϕ			
						Y=		λ			
						X=		ϕ			
						Y=		λ			
						X=		ϕ			
						Y=		λ			
						X=		ϕ			
						Y=		λ			
						X=		ϕ			
						Y=		λ			
						X=		ϕ			
						Y=		λ			
						X=		ϕ			
						Y=		λ			
COMPUTED BY	L. O. Neterer, Jr.				DATE	1/7/72	COMPUTATION CHECKED BY	R. R. White		DATE	1/10/72
LISTED BY					DATE		LISTING CHECKED BY			DATE	
HAND PLOTTING BY	R. Kravitz				DATE	1/79	HAND PLOTTING CHECKED BY	F. Mauldin		DATE	1/79

COMPILATION REPORT

T-12404

PH-6705

31. DELINEATION

The Wild B-8 stereoplotter was used to delineate shoreline, alongshore and interior detail based upon office interpretation of the 1:30,000 scale compilation photographs. The compilation photographs did not cover two islands in the northern portion of this sheet. These are to be located by field methods during field edit.

There was no field inspection prior to compilation.

All photographs used to compile this map are listed on NOAA form 76-36B. The compilation photography was adequate except for the previously mentioned photo coverage.

32. CONTROL

See Photogrammetric Plot Reports dated February 15, 1967 and September 25, 1967.

33. SUPPLEMENTAL DATA

None.

34. CONTOURS AND DRAINAGE

Contours are inapplicable.

Drainage was compiled from office interpretation of the photographs.

35. SHORELINE AND ALONGSHORE DETAILS

Shoreline and alongshore detail was compiled from office interpretation of the photographs. There was no low water photography for delineation of the mean low water line.

36. OFFSHORE DETAILS

All offshore detail was compiled by office interpretation of the aerial photographs.

T-12404

37. LANDMARKS AND AIDS

None.

38. CONTROL FOR FUTURE SURVEYS

A sufficient number of "pass points" have been established to facilitate the location of Hydro signals.

39. JUNCTIONS

See form 76-36B.

40. HORIZONTAL AND VERTICAL ACCURACY

See Photogrammetric Plot report dated September 25, 1967.

46. COMPARISON WITH EXISTING MAPS

Comparison was made with USGS Quadrangle
PETERSBURG (A-3), Alaska, scale 1:63,360, dated 1953.

47. COMPARISON WITH NAUTICAL CHARTS

Comparison was made with US&GS Charts
8160, scale 1:80,000, 7th edition, dated December 19, 1966
8201, scale 1:217,828, 15th edition, dated November 15, 1969.

Chart 8162 was not available to make a comparison.

ITEMS TO BE APPLIED TO NAUTICAL CHARTS IMMEDIATELY

None.

ITEMS TO BE CARRIED FORWARD

None.

Submitted

Lowell O. Neterer, Jr.
for Lowell O. Neterer, Jr.
Cartographic Technician

Approved

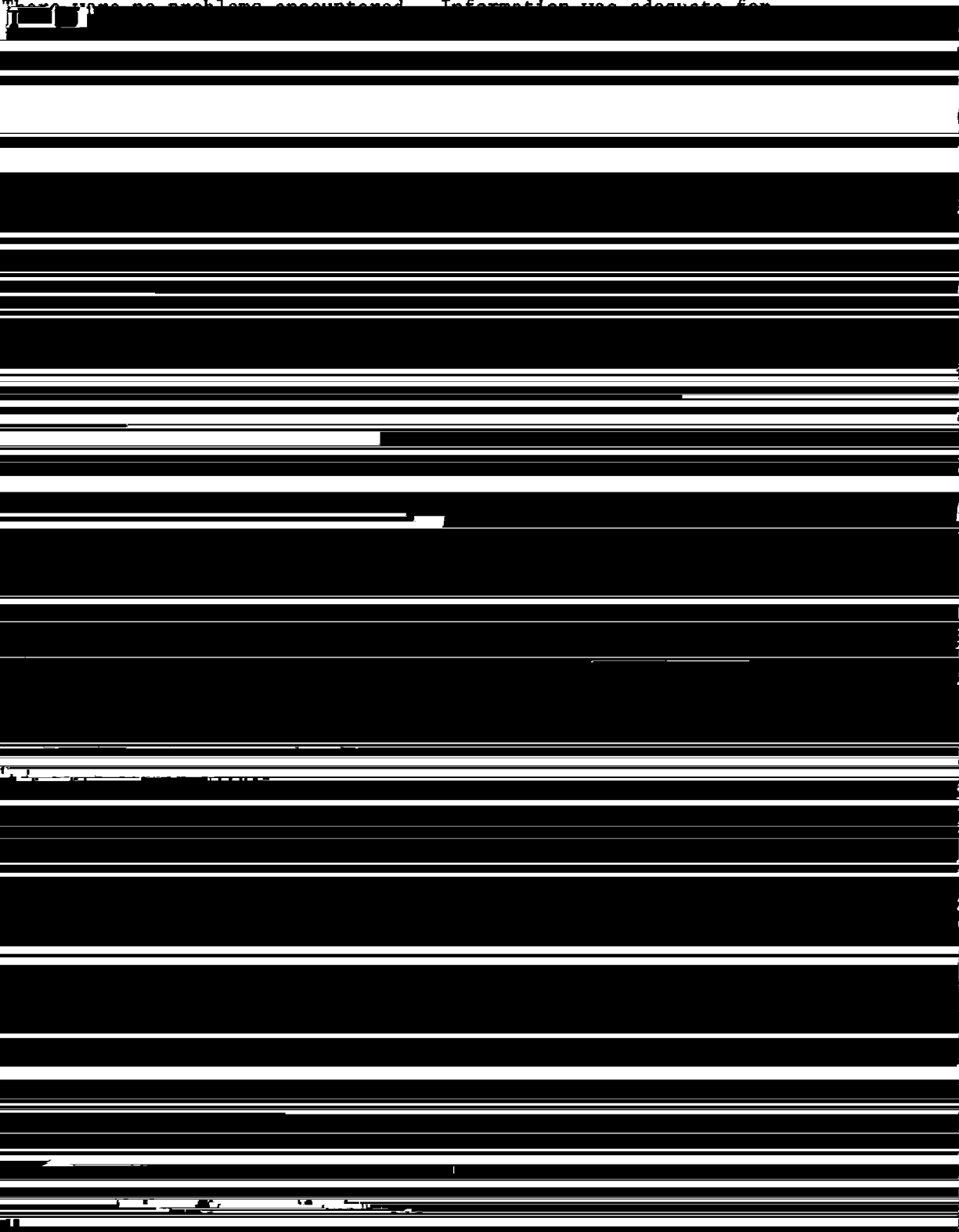
A. C. Rauck, Jr.
for A. C. Rauck, Jr.
Chief, Coastal Mapping Division

ADDENDUM TO THE COMPILATION REPORT

T-12404

FIELD EDIT

There were no problems encountered. Information was adequate for



APR 30 ¹² 1986

GEOGRAPHIC NAMES

FINAL NAME SHEET

PH-6705 (Thorne Island to Whale Passage, Alaska)

T-12404

Chum Creek

Clarence Strait

Coffman Cove

Coffman Island

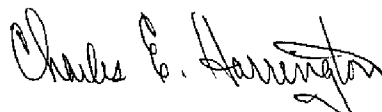
Deichman Rock

Kashevarof Passage

Prince of Wales Island

The Triplets

Approved:



Charles E. Harrington
Chief Geographer
Nautical Charting Division
Charting and Geodetic Services

FIELD EDIT REPORT
T-1204

51. METHODS

Field edit of TP-12404 involved two distinct areas. The first, extending south-east from Coffman Cove on Prince of Wales Island, had been compiled photogrammetrically on the manuscript. Topographic detail in this area was edited and noted on TP-12404 (master field edit ozalid) and photos 66L5854 and 66L5855. Notes were color coded as follows: red - addition or revision, violet - verification, green - deletion. Field edit was accomplished by foot and outboard powered skiff. Rocks, ledges, and reefs were identified at low or negative tide states with height and G.M.T. noted on the appropriate photograph. A floating pier in Coffman Cove not appearing on the 1966 photography was delineated by plane table on photograph 66L5854. Photo-hydro signals were located in this area by radial plot using photographs 66L5852, 66L5853, 66L5854 and 66L5855. (see misc. section)

The second area, surrounding "The Triplets" and Deichman Rock, was not covered by aerial photography and was compiled by plane table in the field. The plane table sheet covers areas located on both TP-12403 and TP-12404 (the boundary of the sheets, Long. $132^{\circ}50'00''W$ passes through "The Triplets") and was produced at a scale of 1:5,000 to provide a more detailed representation of features and reduce graphical error. The MLLWL was delineated at negative tide states. The location of the line was determined by changes in benthic vegetation on the reefs and ledges and by referencing the water level to predicted tides. All offshore rocks are noted with height and GMT on the smooth plane table sheet. Azimuths, stadia distance calculations, and raw data are recorded in the plane table data book and on the rough plane table sheet. A 1:5,000 scale pantograph enlargement of the area (chart 17401, 7th ed.) was made for comparison the Plane Table Sheet.

52. ADEQUACY OF COMPILATION

The change in detail and symbolization necessary to render manuscript T-12404 complete and adequate are noted on the master field edit ozalid, photos 66L5854 and 66L5855, and the smooth plane table sheet. Items requiring further explanation are as follows:

The manuscript as compiled shows no rock symbols along the shore of Prince of Wales Island, but simply indicates the entire coastline as "foul".

Much of the foreshore of Prince of Wales Island is a rocky ledge which uncovers at low water. In several areas the foul legend was deleted (see master F.E. ozalid) and replaced by ledge symbolization and distinct rocks. All offshore rocks are noted with heights and GMT on photos 66L5854 and 66L5855.

-2-

The foul limit off Prince of Wales Island between Long. $132^{\circ}46'30''W$ and $132^{\circ}47'45''W$ appears to have been compiled to include several kelp beds which are well offshore of any exposed rocks. The foul limit in this area was deleted (see master F.E. ozalid) and replaced by ledge and kelp symbolization (photo 66L5585).

The foul limit surrounding the offshore rocks, Lat $56^{\circ}00'45''N$, Long. $132^{\circ}48'00''$, was revised after inspection of the area by skiff (master F.E. ozalid).

The cove west of station Luck Point North Base 1924, Lat. $56^{\circ}01'00''N$, Long. $132^{\circ}49'00''W$. with the exception of isolated rocks has a smooth sand bottom and although shallow is not foul as indicated on the manuscript. This portion of the foul limit was deleted (master F.E. ozalid) and the rocks and sand bottom noted on photo 66L5854. The rock symbols on chart 17401 for this cove appear in slightly different positions than the rocks identified on photo 66L5854. This area bares at low water and was inspected on foot. The rocks indicated on photo 66L5854 are the only rocks in the cove.

The shore of Coffman Cove extending from Lat. $56^{\circ}01'15''N$ south to Lat. $56^{\circ}00'30''N$, depicted as "foul" on the manuscript was revised to show gravel beach and mud flats (master F.E. ozalid and photo 66L5854).

The area compiled as "foul", Lat. $56^{\circ}01'10''N$, Long. $132^{\circ}48'50''W$, contains 3 prominent rocks which bare at low water. One of the rocks is identified on photo 66L5854, the other two (not visible on the photography) are located on hydrographic survey RA-5-2-78 run concurrently with the field edit.

The offshore rocks approximately Lat. $56^{\circ}00'48''N$, Long. $132^{\circ}47'56''W$, questioned in the discrepancy print exist as shown on charts 17382 (formerly C&GS 8160) and 17401. They are noted on photo 66L5854.

All the buildings in the Coffman Cove logging camp are temporary and were deleted from the master F.E. ozalid.

The Coffman Cove floating pier, rebuilt since the 1966 photography, was located by plane table on photo 66L5854.

The plane table survey of "The Triplets" shows a much larger area enclosed by the MHWL than indicated on chart 17401. It appears from inspection in the field that the MHWL shown on chart 17401 represents the edge of the 3 clumps of trees on the islets. The true MHWL lies seaward of the tree line and forms

-3-

only two islets (see plane table sheet and 1:5,000 chart pantograph). All rocks visible at -2 feet of tide were located on the plane table sheet. Several rocks are plotted on the plane table sheet which do not appear on chart 17401 and several rocks appearing on chart 17401 are plotted at slightly different positions on the plane table sheet. Four (4) rocks appearing on chart 17401 were not close to any rocks plotted on the plane table sheet (visible at -2' of tide). These are numbered on the 1:5,000 pantograph sheet and located as follows:

RK. #1 Lat. $56^{\circ}03'33.5''$ N
Long. $132^{\circ}49'58.5''$ W

RK. #3 Lat. $56^{\circ}03'29.7''$ N
Long. $132^{\circ}49'29''$ W

RK. #2 Lat. $56^{\circ}03'29.7''$ N
Long. $132^{\circ}49'46.5''$ W

RK. #4 Lat. $56^{\circ}03'30.5''$ N
Long. $132^{\circ}49'27''$ W

No conclusions regarding the disposition of submerged rock symbols on chart 17401 could be made without hydrography in areas not covered by the photography.

53. MAP ACCURACY

Positional accuracy of photo identifiable features throughout T-12404 was checked by resection (sextant and theodolite) from third order class I signals and photo hydro signals. In most cases this was done directly on the T-sheet in the

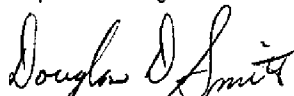
-4-

55. MISCELLANEOUS

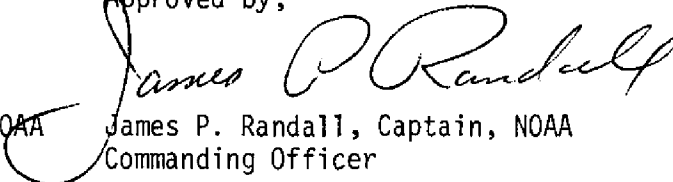
Thirteen (13) photo hydro signals were located by the Field Editor on T-12404. Signals were located by radial plot using photos 66L5852, 66L5853, 66L5854 and 66L5855; and manuscripts T-12403 and T-13096 (used in conjunction with T-12404 to provide necessary photo centers). Because of position "jumps" photo hydro signal positions were checked by plane table intersection. No signals on T-12404 were relocated.

Respectfully submitted,

Approved by,



Douglas D. Smith, ENS, NOAA

James P. Randall, Captain, NOAA
Commanding Officer

REVIEW REPORT
SHORELINE

T-12404

61 - GENERAL STATEMENT

Final review for this final map was accomplished at the Atlantic Marine Center in May 1986. For a schedule of the office and field operations, refer to the Summary included with this Descriptive Report.

62 - COMPARISON WITH REGISTERED TOPOGRAPHIC SURVEYS

Not applicable.

63 - COMPARISON WITH MAPS OF OTHER AGENCIES

A comparison was made with USGS quadrangle Petersburg (A-3), Alaska, dated 1953, scale 1:63,360.

64 - COMPARISON WITH CONTEMPORARY HYDROGRAPHIC SURVEYS

A portion of contemporary hydrographic survey H-9756 is common to the western region of this map. A comparison was made with an advance copy of the hydrographic smooth sheet, field surveyed April/May 1978, 1:5,000 scale. No significant discrepancies were noted.

65 - COMPARISON WITH NAUTICAL CHARTS

A comparison was made with the following NOS charts
17401, 8th edition, dated October 6, 1979, 1:10,000 scale
17382, 12th edition, dated July 25, 1981, 1:80,000 scale.

66 - ADEQUACY OF RESULTS AND FUTURE SURVEYS

This map complies with the Project Instructions, and meets the requirements for National Standards of Map Accuracy.

T-12404

Submitted by

Jerry L. Hancock

Jerry L. Hancock
Final Reviewer

Approved for forwarding

Billy H. Barnes

Billy H. Barnes
Chief, Photogrammetric Section, AMC

Approved,

John A. Mcneary

Chief, Photogrammetric Operations,
Rockville

Ronald K. Brewer

Chief, Photogrammetry Branch,
Rockville

