11527 THRU 11531

11527 THRU 11531

Form 504

U. S. DEPARTMENT OF COMMERCE

COAST AND GEODETIC SURVEY

DESCRIPTIVE REPORT

Type of Survey Topographic

Field No. ..... *Office No.* T-11527 thru T-11531

LOCALITY

State Alaska (Aleutian Islands)

General locality Andreanof Islands

Locality Atka Island

1953

CHIEF OF PARTY

W. H. Bainbridge, Chief of Party
L. W. Swanson, Washington Office

LIBRARY & ARCHIVES

DATE .....

USCOMM-DC 5087

DATA RECORD

T-11527 through T-11531

Project No. (II): ~~24050~~ PH-34 Quadrangle Name (IV):

Field Office (II): Ship ~~Explorer~~ Pioneer Chief of Party: ~~E. H. Kirsch~~ W. H. Bainbridge

Photogrammetric Office (III): Washington, D. C. Officer-in-Charge: L. W. Swanson

Instructions dated (II) (III): Proj. Instructions 16 Dec. 1954 Copy filed in Division of
Supp. Instructions 10 Nov. 1955 Photogrammetry (IV)
Supp. Instruction 1 Oct. 1956 Office Files
Compilation Instructions 5 Nov. 1957

Method of Compilation (III): Graphic Contours: Reading Nine Lens Plotter

Manuscript Scale (III): 1:20,000 Stereoscopic Plotting Instrument Scale (III): 1:20,000

Scale Factor (III): 1.0

Date received in Washington Office (IV): 4-8-58 Date reported to Nautical Chart Branch (IV):

Applied to Chart No. Date: Date registered (IV):

Publication Scale (IV): Publication date (IV):

Geographic Datum (III): N.A. 1927 Vertical Datum (III): 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):

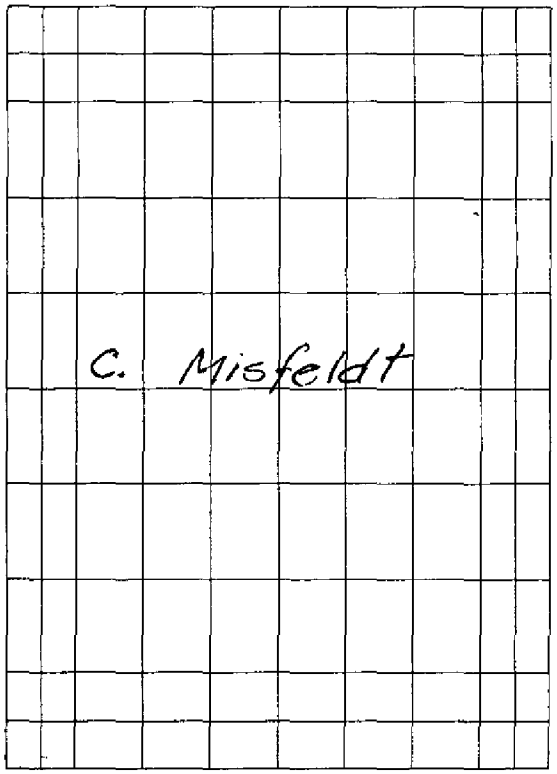
Lat.: Long.: Adjusted
Unadjusted

Plane Coordinates (IV): UTM State: Alaska Zone: I

Y= X=

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.



Areas contoured by various personnel
(Show name within area)
(II) (III)

DATA RECORD

Field Inspection by (II): W. H. Bainbridge Date: May-June 1953

Planetable contouring by (II): None Date:

Completion Surveys by (II): None Date:

Mean High Water Location (III) (State date and method of location):

Identified on photographs taken 1953 and 1954 using predicted tides.

Projection and Grids ruled by (IV): J. Chaconas Date: 1 Nov. 1956

Projection and Grids checked by (IV): H. Wolfe Date: 7 Nov. 1956

Control plotted by (III): H. Lucas Date: 4 Jan. 1957

Control checked by (III): G. Amburn Date: 5 Jan. 1957

Radial Plot or Stereoscopic Control extension by (III): J. P. Battley, Jr. Date: 30 Apr. 1957

Stereoscopic Instrument compilation (III): Planimetry C. Misfeldt, W. Heinbaugh. Date:
Contours V.E. McNeel Date: 1960 – 1969

Manuscript delineated by (III):

		Date:
T-11527	G. Amburn	7 May 1957
T-11528	G. Amburn	14 May 1957
T-11529	J. Battley	7 May 1957
T-11530	G. Amburn	10 May 1957
T-11531	R. Sugden	6 May 1957

Photogrammetric Office Review by (III): E. Ramey, shoreline Date:
K.N. Maki, Contours,

Elevations on Manuscript checked by (II) (III): Date:

M-2618-12(4)

Camera (kind or source) (III): C&GS Nine-lens

PHOTOGRAPHS (III)

Number	Date	Time	Scale	Stage of Tide
42007-11	21 Sept 1953	1540-4	1:20,000	2.4 above MLW
42013-18	21 Sept 1953	1550-5	1:20,000	2.4
42020-26	21 Sept 1953	1603-7	1:20,000	2.4
42029-33	21 Sept 1953	1612-5	1:20,000	2.4

Tide (III)

Diurnal

	Ratio of Ranges	~~Mean~~ Range	Spring Range
Reference Station: Sweeper Cove, Adak I.		3.7	
Subordinate Station: Nazan Bay, Atka I.		3.3	
Subordinate Station:			

Washington Office Review by (IV): K.N. Maki Date: July 1971

Final Drafting by (IV): Date:

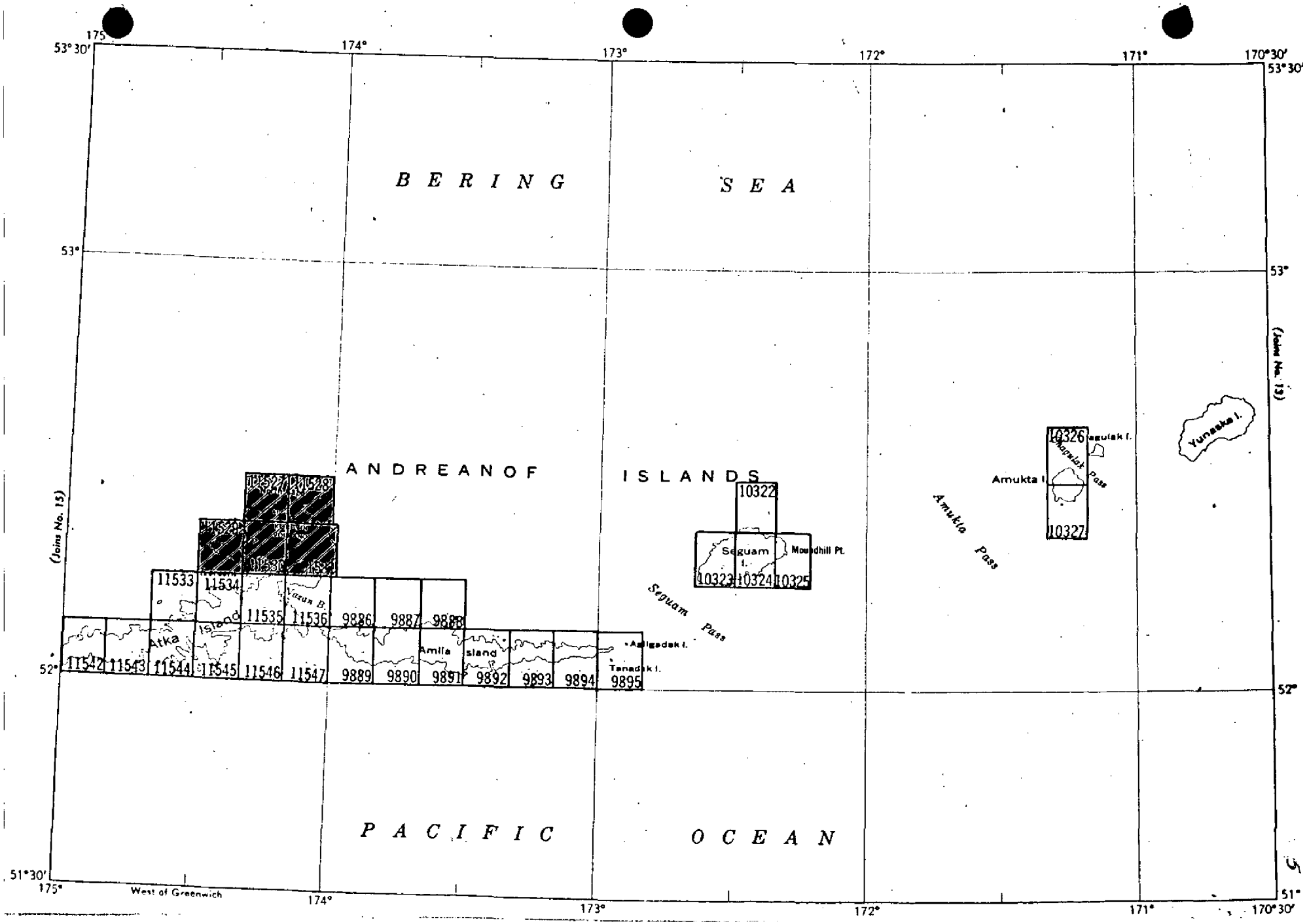
Drafting verified for reproduction by (IV): Date:

Proof Edit by (IV): Date:

Land Area (Sq. Statute Miles) (III):
Shoreline (More than 200 meters to opposite shore) (III):
Shoreline (Less than 200 meters to opposite shore) (III):
Control Leveling - Miles (II):
Number of Triangulation Stations searched for (II): Recovered: Identified:
Number of BMs searched for (II): Recovered: Identified:
Number of Recoverable Photo Stations established (III):
Number of Temporary Photo Hydro Stations established (III):

Remarks:

Aleutian Islands ALASKA Part C



Summary to Accompany Descriptive Report
T-11527 through T-11531

Topographic maps T-11527 through T-11531 are a series of five maps covering a part of PH-34, Part C, Andreanof Island group, Aleutian Islands, Alaska. These five maps cover the area of Atka Island from latitude 52° 15' to latitude 52° 30' and include the island's northernmost extremity of North Cape. East-west coverage extends from longitude 173° 59', Cape Shaw to longitude 174° 30', Cape Korovin.

The field operations preceding compilation were limited to the recovery of horizontal control and the determination of elevations to control the nine-lens stereoplotter project vertically. The few field inspection notes were restricted to general descriptions of foreshore and beach characteristics.

The nine-lens compilation of contours was preceded by a graphic compilation of shoreline, foreshore and offshore features for hydrographic survey needs based on the field recovery of horizontal control with little or no field inspection of shoreline and related features.

Contours were compiled, for the most part, on the Reading nine-lens stereoplotter. Several areas on T-11531 that were left uncontoured after the dismantling of the last or second Reading nine-lens stereoplotter were completed on the Wild A-7 Autograph. The contour interval is 50 feet with a first 25 foot contour where contour spacing permitted and where better expression of near shore terrain configuration could be obtained.

The registered copies under T-11527 through T-11531 will consist of one cronaflex positive of each of the five maps and a single combined Descriptive Report.

Photogrammetric Plot Report
Project 24050 (Aleutian Island)
Atka Island

21. Area Covered.

This report discusses the photogrammetric plot for five surveys numbered T-11527 through T-11531 all at a scale of 1:20,000. These surveys cover the Northeastern part of Atka Island. The five manuscripts are incomplete pending field inspection of details.

22. Method.

The plot was laid on vinylite manuscripts ruled with polyconic projection and UTM 1000-meter grid. The grid lines were used to junction the manuscripts.

Metal-mounted nine-lens photographs taken in 1953 and 1954 were used in the plot. Master calibration templets. A paper print for each photograph in the plot was prepared with pass points and radial lines for field use.

The attached sketch shows photographs, control stations and tolerances in positions for the plot. The plot is considered accurate in position in its entirety and junctioned satisfactory with a previous plot to the South.

23. Adequacy of control.

Triangulation stations were identified in the field in 1953 on U. S. Navy single-lens photographs at an approximate scale of 1:25,000 taken in 1951. The distribution of control is shown on the appended sketch.

Eighteen field-identified control stations were used to control the plot. Of these, 16 held within 0.3 mm and two could not be held and are discussed below:

Spot 1943 sub. sta. (0.35 mm E of plotted position). This station fell 0.4 mm S.E. of plotted position in the previous plot. With the additional control and stronger fix the station held closer in this plot but was still considered doubtful in identification. Other better identified control held nearby.

Razor 1953 sub. sta. (0.6 mm N.W. of plotted position). The position of this station was determined by traverse computations. The field notes were not available but either an error in the field data or in the field photograph identification is suspected as numerous nearby well-defined stations held.

24. Supplemental Data.

None

25. Photography

The photography was considered adequate as to coverage and overlap. A few of the photographs were tilted, but only one photograph, 42014, was tilted enough to necessitate computing a new center. There were not enough points of known elevation to determine the tilt. A good radial intersection was obtained in the plot for this center, and was drilled and rung up on the manuscript. Field-identification of vertical control should furnish enough positions to determine the tilt and the photograph could then be added to the plot.

Submitted by:

J.P. Battley Jr.
Cartographer

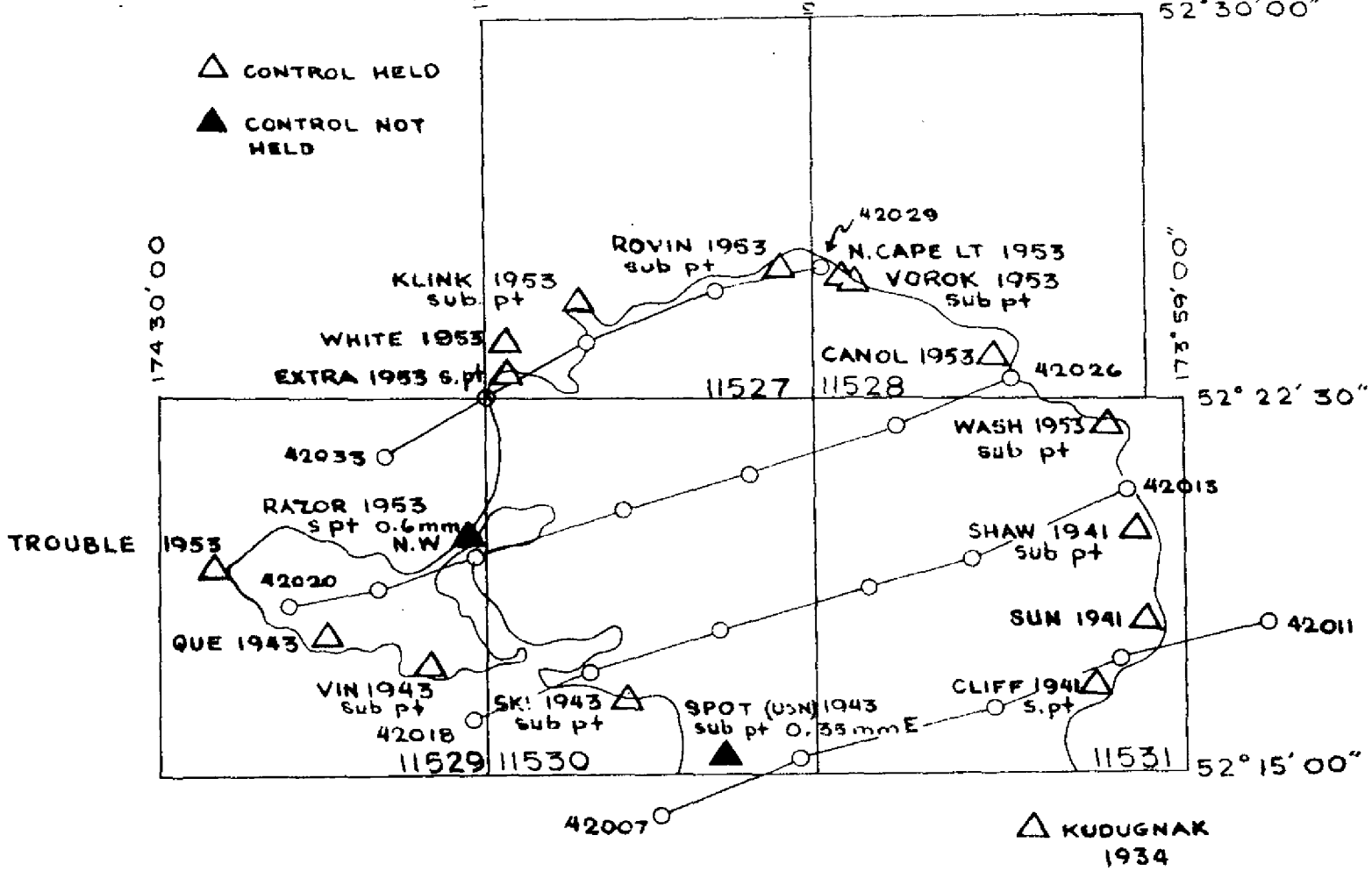
Approved by:

E. Ramey
Supervisory Catographer

Project 24050

NE section of ATKA ISLAND

Photogrammetric Plot Sketch



MAP T-11527 PROJECT NO. PH-34 SCALE OF MAP 1:20,000 SCALE FACTOR

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR y-COORDINATE / LONGITUDE OR x-COORDINATE	DISTANCE FROM GRID IN FEET, OR PROJECTION LINE IN METERS FORWARD	(BACK)	DATUM CORRECTION	N.A. 1927-DATUM DISTANCE FROM GRID OR PROJECTION LINE IN METERS FORWARD	(BACK)	FACTOR DISTANCE FROM GRID OR PROJECTION LINE IN METERS FORWARD	(BACK)
	V	N.A.	52-22-37.868				1170.5	684.1		
Extra, 1953	816	1927	174-19-51.597				976.1	159.0		
	"	"	52-24-20.084				620.8	1233.8		
Klink, 1953			174-16-47.419				896.5	237.8		
	"	"	52-25-02.508				77.5	1777.1		
Rovin, 1953			174-11-00.110				2.1	1131.9		
White (Outer 1953	V	"	52-23-02.144				66.3	1788.3		
Rock Off Extra)	817		174-19-53.789				1017.4	117.5		
		"	52-22				1191.3	663.3		
Extra S.S. 1953			174-19				996.5	138.6		
		"	52-25				80.2	1774.4		
Rovin S.S. 1953			174-11				55.0	1079.0		
		"	52-24				620.4	1234.2		
Klink S.S. 1953			174-16				902.1	232.1		

1 FT. = .3048006 METER

M-2388-12

COMPUTED BY: G. Amburn DATE February 1957 CHECKED BY: G. B. Willey DATE February 1957

MAP T-11528 PROJECT NO. PH-34 SCALE OF MAP 1:20,000 SCALE FACTOR

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR y-COORDINATE / LONGITUDE OR x-COORDINATE	DISTANCE FROM GRID IN FEET, OR PROJECTION LINE IN METERS FORWARD	(BACK)	DATUM CORRECTION	N.A. 1927 - DATUM DISTANCE FROM GRID OR PROJECTION LINE IN METERS FORWARD	(BACK)	FACTOR DISTANCE FROM GRID OR PROJECTION LINE IN METERS FORWARD	(BACK)
North Cape Light, 1953	V 817	N. A. 1927	52-25-08.64				267.1	1587.5		
			174-08-58.05				1097.1	36.8		
Vorok TP No.1 1953	V 816	"	52-25-09.70				299.8	1554.8		
			174-08-39.12				739.3	394.6		
Vorok, 1953	"	"	52-25-00.725				22.4	1832.2		
			174-08-45.605				861.9	272.1		
Canol, 1953		"	52-23-25.319				782.6	1072.0		
			174-04-11.707				221.4	913.3		
Vorok, 1953 Sub. Pt.		"	52.25				48.2	1806.4		
			174-08				882.3	251.7		

1 FT. = .3048006 METER

M-2388-12

COMPUTED BY G. Amburn DATE February 1957 CHECKED BY G. B. Willey DATE February 1957

FORM 164
(4-23-54)

U.S. DEPARTMENT OF COMMERCE
DESCRIPTIVE REPORT

COAST AND GEODETIC SURVEY
CONTROL RECORD

MAP T-11529 PROJECT NO. PH-34 SCALE OF MAP 1:20,000 SCALE FACTOR

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR y-COORDINATE / LONGITUDE OR x-COORDINATE	DISTANCE FROM GRID IN FEET, OR PROJECTION LINE IN METERS FORWARD	(BACK)	DATUM CORRECTION	N.A. 1927-DATUM DISTANCE FROM GRID OR PROJECTION LINE IN METERS FORWARD	(BACK)	FACTOR DISTANCE FROM GRID OR PROJECTION LINE IN METERS FORWARD	(BACK)
Vin, 1943	V 145	N.A.	52-16-51.962				1606.1	248.4		
		1927	174-22-03.537				67.1	1070.4		
We, 1943	V 152	"	52-17-03.880				119.9	1734.7		
			174-22-34.792				659.6	477.8		
Korovin, 1943	V 145	"	52-17-39.632				1225.0	629.6		
			174-25-01.282				24.3	1112.9		
Que, 1943	V 152	"	52-17-33.427				1033.2	821.4		
			174-25-23.033				436.5	700.7		
Miss 1943	"	"	52 18 11.121				343.7			
		"	174 26 38.702				733.4			
Nivor, 1953	V 816	"	52-19-07.850				242.6	1612.0		
			174-27-21.762				412.2	724.3		
Outer Rock off Cape Korovin 1953	V 817	"	52-19-25.75				795.9	1058.7		
			174-27-21.97				461.1	720.3		
Trouble, 1953	V816	"	52-19-18.738				579.2	1275.4		
			174-27-15.559				294.7	841.7		
Razor, 1953	"	"	52-19-27.69				855.9	998.7		
			174-20-01.89				35.8	1100.6		
Vin, 1943 Sub. Sta.		"	52-16				1570.3			
			174-22				47.9			
Trouble, 1953 Sub. Sta.		"	52-19				579.0	1275.6		
			174-27				293.4	8~~30~~43.0		
Razor, 1953 Sub. Pt.	Traverse Comp.	"	52-19				1321.9	532.7		
			174-19				672.9	463.4		

1 FT. = .3048006 METER

COMPUTED BY G. Amburn DATE February 1957 CHECKED BY G. B. Willey DATE February 1957

COMM-DC-57843

Photogrammetry 7

MAP T- 11530 PROJECT NO. PH-34 SCALE OF MAP 1:20,000 SCALE FACTOR

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR y-COORDINATE / LONGITUDE OR x-COORDINATE	DISTANCE FROM GRID IN FEET, OR PROJECTION LINE IN METERS FORWARD	(BACK)	DATUM CORRECTION	N.A. 1927 - DATUM DISTANCE FROM GRID OR PROJECTION LINE IN METERS FORWARD	(BACK)	FACTOR DISTANCE FROM GRID OR PROJECTION LINE IN METERS FORWARD	(BACK)
Peak 1, 1934	V 144A	N.A. 1927	52-16-43.99				1359.7	494.8		
			174-10-50.39				955.0	182.6		
Peak 2, 1934	"	"	52-16-46.45				1435.7	418.8		
			174-10-31.04				588.5	549.1		
Peak 12, 1934	"	"	52-16-45.60				1409.5	445.0		
			174-10-42.99				815.0	322.6		
Ski, 1943	V 145	"	52-16-29.213				902.9	951.6		
			174-15-53.760				1019.3	118.3		
Spot, 1943	"	"	52-15-24.314				751.5	1103.0		
			174-12-22.427				425.4	712.7		
Dan, 1943	V 150	"	52-15-10.998				339.9	1514.6		
			174-16-52.604				997.9	140.3		
Ski, 1943 Sub. Sta.		"	52-16				903.1	951.4		
			174-15				1048.1	89.5		
Spot, 1943 Sub. Sta.		"	52-15				760.2	1094.3		
			174-12				427.8	710.3		

1 FT. = .3048006 METER

COMPUTED BY: Amburn DATE February 1957 CHECKED BY: G. B. Willey DATE February 1957

M-2388-12

Photogrammetry

MAP T- 11531 PROJECT NO. PH-34 SCALE OF MAP 1:20,000 SCALE FACTOR

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR y-COORDINATE / LONGITUDE OR x-COORDINATE	DISTANCE FROM GRID IN FEET. OR PROJECTION LINE IN METERS FORWARD	(BACK)	DATUM CORRECTION	N.A. 1927-DATUM DISTANCE FROM GRID OR PROJECTION LINE IN METERS FORWARD	(BACK)	FACTOR DISTANCE FROM GRID OR PROJECTION LINE IN METERS FORWARD	(BACK)
Sun, 1941	V 76	N.A. 1927	52-18-03.955				122.2	1732.4		
			173-59-26.574				503.6	633.4		
Cliff, 1941	"	"	52-16-23.849				737.1	1117.4		
			174-01-28.488				540.2	597.0		
Peak 4, 1934	V 144A	"	52-17-03.11				96.1	1758.5		
			174-09-53.76				1019.1	118.3		
Peak 6, 1934	"	"	52-17-54.21				1675.6	179.0		
			174-06-55.19				1045.9	91.1		
Peak 7, 1934	"	"	52-16-25.23				779.8	1074.8		
			174-07-46.09				874.0	263.7		
Peak 8, 1934	"	"	52-17-10.62				328.3	1526.3		
			174-06-39.87				755.8	381.5		
Peak 9, 1934	"	"	52-16-31.55				975.2	879.4		
			174-05-49.00				929.0	208.7		
Peak 10, 1934	"	"	52-15-56.97				1760.9	93.7		
			174-05-34.79				659.8	477.4		
Peak 11, 1934	"	"	52-15-38.17				1179.8	674.8		
			174-05-11.95				226.7	911.2		
Wash, 1953	V 816	"	52-21-36.326				1122.8	731.8		
			174-00-31.611				598.2	537.3		

1 FT. = .3048006 METER

M-2388-12

COMPUTED BY: G. Amburn DATE February 1957 CHECKED BY: G. B. Willey DATE February 1957

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Photogrammetry

MAP T- 11531 PROJECT NO. PH-34 SCALE OF MAP 1:20,000 SCALE FACTOR

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR y-COORDINATE / LONGITUDE OR x-COORDINATE	DISTANCE FROM GRID IN FEET. OR PROJECTION LINE IN METERS FORWARD	(BACK)	DATUM CORRECTION	N.A. 1927 - DATUM DISTANCE FROM GRID OR PROJECTION LINE IN METERS FORWARD	(BACK)	FACTOR DISTANCE FROM GRID OR PROJECTION LINE IN METERS FORWARD	(BACK)
Cliff, 1941		N.A.	52-16	736.1	1118.4					
Sub. Sta.		1927	174-01	537.5	600.2					
	V	"	52-19 08.126	251.2	1603.4					
Shaw, 1941	75		173-59 43.098	816.4	320.2					
		"	52-19	297.1	1557.5					
Shaw S.S., 1941			173-59	760.0	376.5					
		"	52-21	1108.3	746.3					
Wash S.S., 1941			174-00	669.1	466.4					
		"	52-18	179.4	1675.2					
Sun S.S., 1941			173-59	600.8	536.1					

1 FT.=.3048006 METER

M-2388-12

COMPUTED BY: G. Amburn DATE February 1957 CHECKED BY: G. B. Willey DATE February 1957

COMPILATION REPORT
T-11527 thru T-11531

31. Delineation:

Shoreline and foreshore features were delineated from stereoscopic interpretation of nine-lens photographs at 1:20,000 scale without benefit of field inspection.

32. Control:

See the attached radial plot report.

33. Supplemental Data:

None

34. Contours and Drainage:

Sufficient field determined elevations combined with water level datum were available to control the vertical datum for compilation of contours. Areas not fully visible because of cloud cover are depicted by approximate dashed line contours, on T-11531.

35. Thru 38:

Not applicable

39. Junctions:

Manuscripts junction to the south with T-11534 thru T-11536 and between each other on all east-west junctions and all north-south junctions.

40. Horizontal and Vertical Accuracy:

a. Horizontal - No deficiencies were detected.

b. Vertical -

41. Thru 45:

Not applicable.

46. Comparison with Existing Maps:

No. 9010 scale 1:20,000 first edition 1935, corrected 9/3/51
No. 8862 scale 1:300000 first edition 1943, corrected 10/15/51

Items to be applied to charts immediately. None
Items to be carried forward. None

Submitted by:

Garnett S. Amburn

Garnett S. Amburn

Approved:

Everett H. Ramey

Everett H. Ramey, Chief
Graphic Compilation Unit

48. Geographic Name List

T-11527

Atka Island
Bering Sea

T-11528

Atka Island
Bering Sea
North Cape
Korovin Volcano

T-11529

Atka Island
Bering Sea
Cape Korovin
Korovin Bay

T-11530

Atka Island
Bering Sea
Korovin Bay

T-11531

Atka Island
Bering Sea
Cape Shaw

Names approved
July 22, 1971
Frank W. Pickett

Review Report
T-11527 through T-11531
Topographic Maps
July 1971

61. General Statement

The completion of the five topographic maps, T-11527 through T-11531, was accomplished in 1969. Shoreline compilation was completed in May 1957. Once the need for shoreline topography for support of hydrographic surveys had been fulfilled, work on compilation of contours became intermittant. The dismantling of the last of the two Reading nine-lens stereoplotters in 1965 caused a delay until 1967, when compilation of contours, originally begun and nearly completed with the nine-lens plotter, was resumed with the Wild A-7 Autograph stereoplotter. This was made possible by the photographic reduction of the nine-lens photographs to accommodate the 9 x 9 inch format of the A-7 plotter.

62. through 65. Comparison With Other Surveys

The map manuscripts were compared with all prior registered topographic surveys, maps of other agencies, contemporary hydrographic surveys and nautical charts during compilation. Discrepancies and conflicts between the map manuscripts and the prior surveys were resolved at the time comparisons were made.

66. Adequacy of Results and Future Surveys

Shoreline and related features are considered to be delineated adequately, although field work was limited almost entirely to photo identification of horizontal and vertical control. Note Item 34, p.16 on cloud cover.

Reviewed by:

K. N. Maki

K. N. Maki

Approved by:

Charles Theurer, Chief
Photogrammetric Branch

Jack E. Guth, Chief
Coastal Mapping Division