

T-12339

ORIGINAL

T-12339

FORM C&GS-504	
U.S. DEPARTMENT OF COMMERCE ENVIRONMENTAL SCIENCE SERVICES ADMINISTRATION COAST AND GEODETIC SURVEY	
<b>DESCRIPTIVE REPORT</b>	
Type of Survey <u>Shoreline (Photogrammetric)</u>	
Job No. <u>PH-6301</u>	
Field No. <u>Class. FINAL</u>	Office No. <u>T-12339</u>
<u>Field Edited Map</u>	<u>Edition 1</u>
LOCALITY	
State <u>Alaska</u>	
General locality <u>Kamishak Bay - Cook Inlet</u>	
Locality <u>Akunwarvik Bay</u>	
<u>1962 - 1968</u>	
CHIEF OF PARTY	
<u>J. Bull, RADM, Director, Atlantic Marine Center</u>	
LIBRARY & ARCHIVES	
DATE .....	

1

DESCRIPTIVE REPORT - DATA RECORD

T- 12339

PROJECT NO. (II):

PH-6301

FIELD OFFICE (II):

None

CHIEF OF PARTY

PHOTOGRAMMETRIC OFFICE (III):

Atlantic Marine Center, Norfolk, Virginia

OFFICER-IN-CHARGE

J. Bull, RADM, USESSA Director

INSTRUCTIONS DATED (II) (III):

OFFICE	March 18, 1965	Part I
OFFICE	February 10, 1966	Supplement I
	May 5, 1967	" II
	Dec. 27, 1967	" III
	April 2, 1968	" IV
	April 9, 1968	" V

METHOD OF COMPILATION (III):

Wild B-8

MUSCRIPT SCALE (III):

1:20,000

STEREOSCOPIC PLOTTING INSTRUMENT SCALE (III):

1:8,333 pantographed to 1:20,000

DATE RECEIVED IN WASHINGTON OFFICE (IV):

DATE REPORTED TO NAUTICAL CHART BRANCH (IV):

APPLIED TO CHART NO.

DATE:

DATE REGISTERED (IV):

GEOGRAPHIC DATUM (III):

N. A. 1927

VERTICAL DATUM (III):

MHW

~~MSL~~ EXCEPT AS FOLLOWS:

Elevations shown as (25) refer to mean high water

Elevations shown as (5) refer to sounding datum

i.e., ~~MLLW~~ mean lower low water

REFERENCE STATION (III):

SHAK 1964 ✓

LAT.:

59° 00' 49.3720" (1527.7M)

LONG.:

154° 09' 55.3194" (882.8M)

ADJUSTED

UNADJUSTED

PLANE COORDINATES (IV):

STATE

ZONE

507.09 ✓  
1,831.51-01

x =

831.70 ✓  
468,826-97

Alaska ✓

5 ✓

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 (III):

DATE:

None

MEAN HIGH WATER LOCATION (III) (STATE DATE AND METHOD OF LOCATION):

Air Photo Compilation - June 18, 1962, June 29, 1962 (dates of photography)

PROJECTION AND GRIDS RULED BY (IV):

DATE

A. E. Roundtree

2-8-66

PROJECTION AND GRIDS CHECKED BY (IV):

DATE

R. C. Westphall

2-9-66

CONTROL PLOTTED BY (III):

DATE

K. G. Boyle

6-3-66

CONTROL CHECKED BY (III):

DATE

A. I. Shands

6-3-66

RADIAL PLOT OR STEREOSCOPIC CONTROL EXTENSION BY (III):

DATE

STEREOSCOPIC INSTRUMENT COMPILATION (III):

PLANIMETRY

DATE

K. G. Boyle

July 1966

CONTOURS

DATE

MANUSCRIPT DELINEATED BY (III):

DATE

L. O. Neterer

July 1966

SCRIBING BY (III):

DATE

PHOTOGRAMMETRIC OFFICE REVIEW BY (III):

DATE

C. H. Bishop

July 1966

REMARKS:

Field edit by W. R. Cameron August 1968

DESCRIPTIVE REPORT - DATA RECORD

CAMERA (KIND OR SOURCE) (III):

C&GS "M" and "W" Cameras

PHOTOGRAPHS (III)

NUMBER	DATE	TIME	SCALE	STAGE OF TIDE
62W(c) 7438 thru 7441	29 June 1962	16:30	1:50,000	3.9 ft. MLLW
62W 6428 thru 6436	18 June 1962	13:33 PST	1:15,000	7.7 ft. "
62W 6610 thru 6615	18 June 1962	17:00 "	1:30,000	13.8 ft. "

PREDICTED TIDE (III) Diurnal

	RATIO OF RANGES	MEAN RANGE	<del>XXXXXX</del> RANGE
REFERENCE STATION: SELDOVIA		15.4	17.8
COORDINATE STATION: Iliamna		12.3	14.5
SUBORDINATE STATION:			

WASHINGTON OFFICE REVIEW BY (IV):

*J. B. Phillips*

DATE: *May 1976*

PROOF EDIT BY (IV):

DATE:

NUMBER OF TRIANGULATION STATIONS SEARCHED FOR (II):

RECOVERED:

IDENTIFIED:

NUMBER OF BM(S) SEARCHED FOR (II):

RECOVERED:

IDENTIFIED:

NUMBER OF RECOVERABLE PHOTO STATIONS ESTABLISHED (III):

None

NUMBER OF TEMPORARY PHOTO HYDRO STATIONS ESTABLISHED (III):

None

REMARKS:





SUMMARY

T-12339 is one of 40 shoreline maps comprising Job PH-6301 (Part 1) compiled for use in contemporary hydrographic survey and nautical charting operations.

Field work, prior to compilation, consisted of the recovery and identification of horizontal control.

Compilation was by Wild B-8 stereoplotter, using 1:30,000 scale color photography. Cronaflex positives and ozalids of the manuscript were forwarded for the use of the field editor and the preparation of the hydrographer's boat sheets. Accompanying these were specially prepared ratio photographs to aid in the location of hydrographic signals.

Final edit was accomplished during August 1968

Final review was accomplished at the Rockville Office in May 1976

A cronaflex positive copy of the map and a Descriptive Report will be registered in the NOS Archives.

T-12339

COMPILATION RECORD	COMPLETION DATE	REMARKS
Alongshore area for Hydro	July 1966	Superseded
Shoreline revised from reduction of 1:10,000 scale compilation of T-13283 (NW quarter)	June 1968	Superseded
Field Edit applied	Nov. 1968	

FIELD INSPECTION REPORT  
Map Manuscript T-12339  
Project PH-6301

There was no field inspection prior to compilation.



PHOTOGRAMMETRIC PLOT REPORT  
Kamishak Bay, Alaska  
Job PH-6301  
May 1966

21. Area Covered

This report covers an area of Alaska, in the western portion of Kamishak Bay to be mapped on five T-sheets (T-12334, T-12336, T-12337, T-12338 and T-12339).

22. Method

Analytic aerotriangulation methods were used to bridge one strip of "M" photography at the scale of 1:50,000. The attached sketch shows the placement of and closure to the triangulation points used in the final adjustment. Due to the excessive forward overlap in the strip, numerous photographs were omitted from the bridge.

23. Adequacy of Control

Horizontal control identified and required to adjust this strip was adequate. Neither CHENIK SS-A, which could not be positively identified, nor KAMAK SS-A, which was not visible, were used in the final adjustment. The results of the bridge, which is void of common tie points, should comply to the National Standards of Map Accuracy for these five shoreline manuscripts.

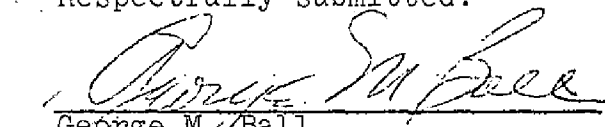
24. Supplemental Data

Numerous U.S.G.S. quads were used to obtain elevations required for the final horizontal and vertical adjustment.

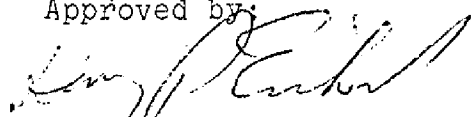
25. Photography

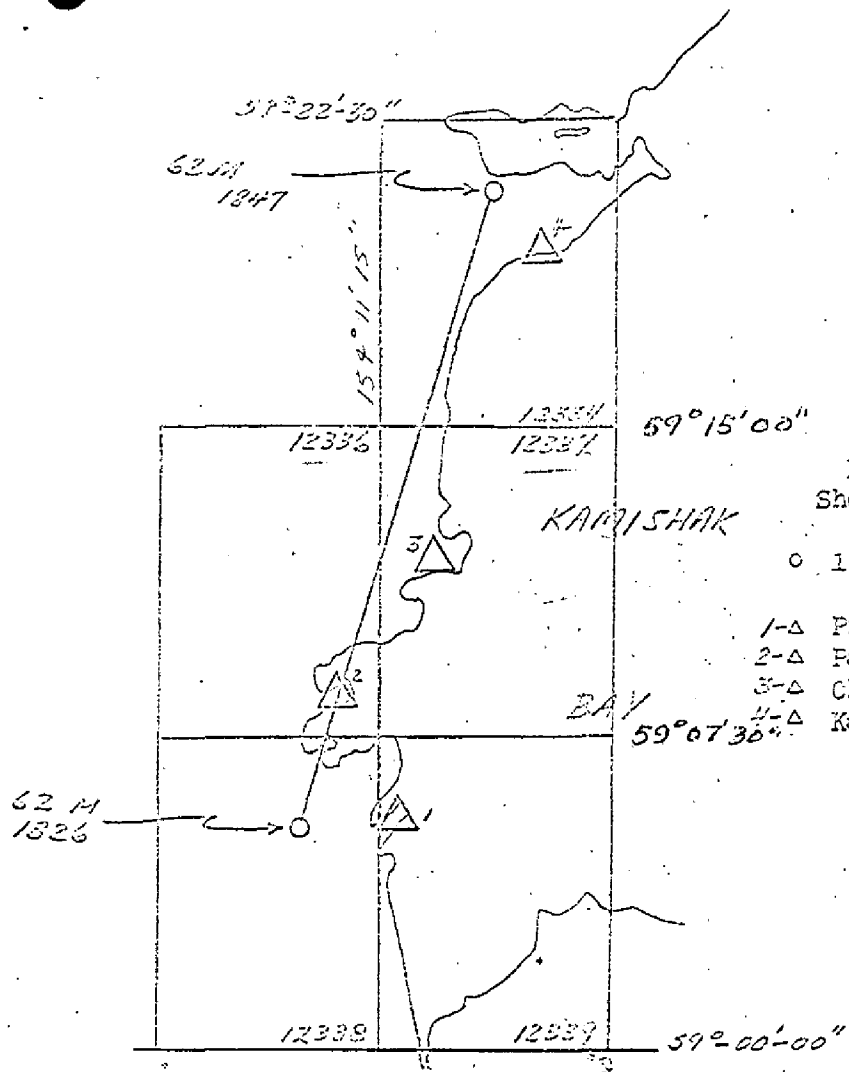
Photography was adequate with regard to coverage, overlap and image definition.

Respectfully submitted:

  
George M. Ball

Approved by:

  
Henry P. Eichert, Acting Chief  
Aerotriangulation Section



PH-6301  
 Alaska  
 Cook Inlet  
 Kamishak Bay  
 Shoreline Mapping  
 1:50,000 RES9

- 1-Δ Pink, 1964
- 2-Δ Paint, 1964
- 3-Δ Chenik, 1964
- 4-Δ Kamak, 1946

CLOSURE TO CONTROL

Pink	SS A	( 0.5)	(-0.2)
	SS B	( 0.4)	( 0.0)
Paint	SS A	(-1.4)	( 0.6)
	SS B	( 0.6)	(-1.5)
Chenik	SS A	Point could not be positively identified	
	SS B	( 1.3)	(-1.0)
Kamak	SS A	Point was not visible	
	SS B	(-0.2)	( 0.1)

COMPILATION REPORT  
T-12339

Statements in this report apply only to that part of this map which lies west of longitude 154° 08' 00". The part east of the above longitude was compiled in the Portland Photogrammetric Office in the spring of 1965 and is covered by a separate report.

31. DELINEATION:

Planimetry was compiled by Wild B-8 Instrument, using photographs taken near mean high water. Ledges, offshore rocks and shallow lines were compiled graphically with a vertical projector, using 1:15,000 scale photographs taken at half-tide. Pass points common to both sets of photographs were used for control.

The gap between the 1965 bridge (west side of map) and the 1966 bridge (east side of map) was compiled graphically, using ratio prints.

No difficulty was encountered in tying these two areas at the gap. See item 41.

32. CONTROL:

See Photogrammetric Plot Report, dated February 1, 1965, submitted with previous Descriptive Report for T-12339.

See also Photogrammetric Plot Report, dated May 1966, submitted with this report.

33. SUPPLEMENTAL DATA:

None

34. CONTOURS AND DRAINAGE:

Contours are inapplicable.

Drainage was compiled graphically using ratio photographs.

35. SHORELINE AND ALONGSHORE DETAILS:

Shoreline and alongshore details were delineated from office interpretation of the photographs.

36. OFFSHORE DETAILS:

Ledges, rocks and shallow lines were compiled graphically from 1:15,000 scale photography using the vertical projector and pass points common to the 1:20,000 scale ratio photos and the 1:15,000 scale contact photos. Where the compilation extended too far from the control, verification of position by ground methods was asked for in the NOTES FOR THE HYDROGRAPHER.

T-12339

41. REVISION OF ITEM 31:

The area of this map north of latitude  $59^{\circ} 03' 45''$  and west of longitude  $154^{\circ} 05' 37.5''$  was compiled in April 1968 at 1:10,000 scale as T-13283, which was photographically reduced to 1:20,000. Then T-12339 was revised to agree with T-13283. Refer to the report for T-13283.

37. LANDMARKS AND AIDS:

None

38. CONTROL FOR FUTURE SURVEYS:

None

39. JUNCTIONS:

Satisfactory junctions were made with map manuscripts T-12337 on the north, the east section of T-12339 on the east, and T-12338 on the west. There is no contemporary survey on the south.

40. HORIZONTAL AND VERTICAL ACCURACY:

No statement.

46. COMPARISON WITH EXISTING MAPS:

Comparison has been made with the following maps:

USGS Reconnaissance Map ILIAMNA, ALASKA, scale 1:200,000, 9th edition, dated May 10, 1952.

USGS Quadrangles ILIAMNA (A-4) ALASKA and ILIAMNA (A-3) ALASKA, scale 1:63,360, dated 1964.

47. COMPARISON WITH NAUTICAL CHARTS:

Comparison has been with C&GS Chart 8554, scale 1:200,000, 9th edition, dated May 10, 1965.

ITEMS TO BE APPLIED TO NAUTICAL CHARTS IMMEDIATELY:

None

ITEMS TO BE CARRIED FORWARD:

None

Approved by:

J. Bull, RADM, USESSA  
Director, Atlantic Marine Center

Submitted by:

*Charles H. Bishop*  
Charles H. Bishop  
Cartographer  
Aug 1966

FIELD EDIT REPORT

SHEET T-12339

AKUMWARVIK BAY

PH-6301

AUGUST 1968

USC&GSS PATHFINDER

CDR A. C. HOLMES, CMDG

## 51 Methods

The field edit of this map was done in accordance with photogrammetric instructions and project instructions to the Commanding Officer, Ship PATHFINDER, dated April 3, 1968. Sextant fixes were used to verify and locate objects that could not be seen on the photographs.

All deletions, additions, and corrections to be applied to the manuscript appear on the Field Edit Ozalid. This ozalid is an index and inventory of all field edit work performed. All features marked in green on the ozalid are to be deleted. Red circles on the ozalid indicate the approximate location of signals used in the field edit work.

## 52 Adequacy of Compilation

Compilation of the manuscript was adequate and complete considering the quality of the photographs and the stage of the tide at the time of photography.

## 54 Recommendations

None.

## 56 Additional Information

Alaska Daylight Time, time meridian 135W, was used for the entire survey.

Hydrographic signals used for field edit fixes are listed on a sheet attached to the Field Edit Ozalid. Geographic positions are given for each signal.

All fixes taken during the field edit are identified by number on the Field Edit Ozalid. The control and angles for each fix are listed on an attachment to the ozalid. This data is also a part of this report.

The field edit of the area north of Lat 59-06N is shown on the Field Edit Ozalid for sheet T-13283.

*William R. Cameron*

William R. Cameron  
LTJG-USESSA  
Photo Officer

Approved:

*A. C. Holmes*  
A. C. Holmes  
CDR-USESSA  
Commanding Officer



FIXES FOR FIELD EDIT, SHEET T-12339

(15)

1/4

Fix No	CONTROL	X's	Fix No	CONTROL	X's
101	36 35 24	23-26 — 68-45	111	36 35 24	39-43 — 94-31
102	36 35 24	25-48 — 71-48	112	35 34 24	46-04 — 47-34
103	36 35 24	25-40 — 72-22	113	43 42 24	137-03 — 64-10
104	36 35 24	23-50 — 71-14	114	043 42 24	78-19 — 125-52
105	36 35 24	23-16 — 70-25	115	43 41 24	108-08 — 95-21
106	36 35 24	40-00 — 89-14	116	36 35 24	27-15 — 93-15
107	36 35 24	45-33 — 84-20	117	36 35 24	25-47 — 91-21
108	36 35 24	44-46 — 88-34	118	36 35 24	24-45 — 92-21
109	36 35 24	43-19 — 90-43	119	36 35 24	24-31 — 89-46
110	36 35 24	40-37 — 95-35	120	34 29 24	42-17 — 23-18

1

FIXES FOR FIELD EDIT, SHEET-12339

2/4 (16)

Fix No.	CONTROL	XS	Fix No.	CONTROL	XS
121	36 35 24	25-45 — 101-09	131	44 43 42	57-20 — 24-55
122	44 43 42	40-17 — 77-13	132	44 43 42	46-19 — 21-07
123	44 43 42	50-28 — 57-43	133	35 34 24	64-06 — 44-49
124	44 43 42	55-07 — 50-31	134	35 34 24	65-05 — 42-52
125	44 43 42	75-09 — 37-38	135	36 35 34	50-01 — 70-48
126	44 43 42	78-58 — 06-56	136	36 35 34	51-32 — 61-24
127	44 43 42	77-29 — 04-47	137	36 35 34	49-05 — 60-18
128	44 43 42	62-19 — 03-12	138	36 35 34	46-57 — 60-24
129	44 43 42	40-07 — 01-39	139	36 35 24	41-18 — 106-12
130	44 43 42	63-36 — 22-54	140	36 35 34	38-42 — 56-06

FIXES FOR FIELD EDIT, SHEET T-12339

3/4 (17)

Fix No.	CONTROL	§ 5
141	36 35 34	36-17 — 62-34
142	36 29 24	63-40 — 41-15
143	36 29 24	62-24 — 40-39
144	36 29 24	59-25 — 40-55
145	36 29 24	36-04 — 41-50
146	35 29 24	36-48 — 43-14
147	35 29 24	33-25 — 95-30
148	35 29 24	66-47 — 67-30
149	35 29 24	118-51 — 27-14
150	35 34 24	15-20 — 134-25

Fix No.	CONTROL	§ 5
151	R	R
152	36 34 24	62-16 — 59-16
153	35 34 29	34-38 — 45-21
154	36 34 24	70-21 — 60-52
155	36 34 24	71-00 — 62-09
156	44 43 41	35-43 — 47-37
157	44 43 41	33-40 — 43-26
158	44 43 41	31-43 — 43-11
159	44 43 41	30-08 — 39-27
160	44 42 24	25-57 — 50-03

PHOTOGRAMMETRIC OFFICE REVIEW  
T-12339

1. PROJECTION AND GRIDS <b>CHB</b>		2. TITLE <b>AKUMWARVIK BAY</b>		3. MANUSCRIPT NUMBERS <b>CHB</b>		4. MANUSCRIPT SIZE	
CONTROL STATIONS							
5. HORIZONTAL CONTROL STATIONS OF THIRD-ORDER OR HIGHER ACCURACY <b>CHB</b>				6. RECOVERABLE HORIZONTAL STATIONS OF LESS THAN THIRD-ORDER ACCURACY (Topographic stations) <b>X</b>		7. PHOTO HYDRO STATIONS <b>X</b>	
8. BENCH MARKS <b>X</b>		9. PLOTTING OF SEXTANT FIXES <b>X</b>		10. PHOTOGRAMMETRIC PLOT REPORT <b>CHB</b>		11. DETAIL POINTS <b>X</b>	
ALONGSHORE AREAS (Nautical Chart Data)							
12. SHORELINE <b>CHB</b>		13. LOW-WATER LINE <b>X</b>		14. ROCKS, SHOALS, ETC. <b>CHB</b>		15. BRIDGES <b>X</b>	
16. AIDS TO NAVIGATION <b>X</b>		17. LANDMARKS <b>X</b>		18. OTHER ALONGSHORE PHYSICAL FEATURES <b>CHB</b>		19. OTHER ALONGSHORE CULTURAL FEATURES <b>X</b>	
PHYSICAL FEATURES							
20. WATER FEATURES <b>CHB</b>				21. NATURAL GROUND COVER <b>CHB</b>		22. PLANETABLE CONTOURS <b>X</b>	
23. STEREOSCOPIC INSTRUMENT CONTOURS <b>X</b>		24. CONTOURS IN GENERAL <b>X</b>		25. SPOT ELEVATIONS <b>X</b>		26. OTHER PHYSICAL FEATURES <b>CHB</b>	
CULTURAL FEATURES							
27. ROADS <b>X</b>		28. BUILDINGS <b>X</b>		29. RAILROADS <b>X</b>		30. OTHER CULTURAL FEATURES <b>X</b>	
BOUNDARIES							
31. BOUNDARY LINES				32. PUBLIC LAND LINES <b>X</b>			
MISCELLANEOUS							
33. GEOGRAPHIC NAMES <b>CHB</b>				34. JUNCTIONS <b>CHB</b>		35. LEGIBILITY OF THE MANUSCRIPT <b>CHB</b>	
36. DISCREPANCY OVERLAY <b>CHB</b>		37. DESCRIPTIVE REPORT <b>KGB</b>		38. FIELD INSPECTION PHOTOGRAPHS <b>X</b>		39. FORMS	
40. REVIEWER <i>Charles H Bishop</i> <b>C. H. Bishop</b>				SUPERVISOR, REVIEW SECTION OR UNIT <b>A. C. Rauck, Jr.</b>			
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 <b>C.H. Bishop 11/21/68</b>				SUPERVISOR <i>A.C. Rauck, Jr.</i>			
43. REMARKS Field edit applied from: reduction of T-13283 and field edit ozalid for T-12339.							

Review Report T-12339  
Shoreline Survey  
May 1976

61. General Statement

The northwest corner of this manuscript bounded by latitude 59°03'45" and longitude 154°05'37.5" will not be included in this report, since that area was compiled at 1:10,000 scale on manuscript T-13283. For reference to this area refer to the Descriptive Report for the larger scale map. A note stating this appears on the map.

In the first paragraph of the compilation report, reference was made to a separate report submitted by Portland Photogrammetric Office in 1965. That report was unavailable during the final review of this manuscript, and is not included in the Descriptive Report.

62. Comparison with Registered Topographic Surveys - None

63. Comparison with Maps of Other Agencies

Refer to the Compilation Report, item 46.

64. Comparison with Contemporary Hydrographic Surveys

H-9001 1:20,000 1968-1970

Comparison was made with the final reviewed hydrographic survey and the surveys were found to be in agreement.

65. Comparison with Nautical Charts

Chart 8554 1:200,000, 13th edition, May 1974.

66. Adequacy of Results and Future Surveys

This map meets the Standards of Map Accuracy and complies with Bureau requirements.

Submitted by,

*J. B. Phillips*  
J. B. Phillips

Approved:

*[Signature]*  
Chief, Photogrammetric Branch

*[Signature]*  
Chief, Coastal Mapping Division

T-12339  
Ph-6301

48. GEOGRAPHIC NAME LIST:

AKUMWARVIK BAY  
HORSESHOE COVE  
KAMISHAK BAY  
KAMISHAK RIVER  
LITTLE KAMISHAK RIVER  
MC NEIL HEAD  
PINKIDULIA COVE

