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Form 504

U. S. COAST AND GEODETIC SURVEY

DEPARTMENT OF COMMERCE

DESCRIPTIVE REPORT

Type of Survey Planimetric Air Photographic
Shoreline T-8866,8867
Field No. Ph-2 (45) Office No. T-8868,8869

LOCALITY

State Washington

General locality P. D. Roosevelt Lake

Locality From Kettle Falls to Fifteen
Mile Creek.

1946-'47

CHIEF OF PARTY

J. T. Jarman

LIBRARY & ARCHIVES

DATE November 10, 1949

DATA RECORD

T-8866

Quadrangle (II): Marcus, Wash. (USGS)
30 Minute 1:125,000

Project No. (II): Ph-2 (45)

Field Office: Coulee Dam, Wash. Chief of Party: J. T. Jarman

Compilation Office: Portland, Ore Chief of Party: R. A. Earle

Instructions dated (II III): 4/3/47
5/15/47

Copy filed in *Division of*
~~Descriptive~~
~~Report No. T-~~ (VI)
Photogrammetry Office Files.

Completed survey received in office: 7-27-48

Reported to Nautical Chart Section: 7-30-48

Reviewed: 31 March 1949 Applied to chart No. Date:

Redrafting Completed: _____

Registered: 19 Oct. 1949

Published:

Compilation Scale: 1:10,000

Published Scale:

Scale Factor (III): None

Geographic Datum (III): N. A. 1927

Datum Plane (III): *Normal Pool Elevation*
1290' above
Mean Sea Level (USBR, 1933)
1288.5 ± USC & GS, 1927

Reference Station (III): NEST S.S. 1936 (USBR)

Lat.: 48 36' 13.850" (427.8m) Long.: 118 06' 21.344" (437.2m) Adjusted X
Unadjusted

State Plane Coordinates (VI): *Washington, North Zone*

X = 2,659,798.30

Y = 596,743.83

Military Grid Zone (VI)

PHOTOGRAPHS (III)

<u>Number</u>	<u>Date</u>	<u>Time</u>	<u>Scale</u>	<u>STAGE WATER LEVEL</u> Water Level of Lake.
9 Lens				
17534 to 17537 Inc.	8/22/46	1:28 PST	1:10,000	1289.65 ft. above M.S.L.
17651 to 17653 Inc.	8/27/46	10:12 PST	1:10,000	1289.61 ft. above M.S.L.
U. S. Army single lens				
32-6 to 36-6 Inc.	8/12/43	Unknown	1:20,000	Unknown
48-6 to 52-6 Inc.	8/12/43	"	"	"
116-6 to 119-6 Inc.	8/12/43	"	"	"

Tide from (III): None

Mean Range: None

Spring Range: None

Camera: (Kind or source) USC&GS, 9 lens, focal length 8.25 inches
U. S. Army; single lens, focal length 8.25 inches

Field Inspection by: See remarks page 3

date: Summer 1947

Field Edit by: None

date:

Date of Mean High-Water Line Location (III): 8/27/46

Projection and Grids ruled by (III) Washington Office date: January 1948

" " " checked by: " " date: " "

Control plotted by: James L. Harris date: March 3, 1948

Control checked by: Frank Elrod date: March 9, 1948

Radial Plot by: J. L. Harris & J. E. Deal date: May 10, 1948

Detailed by: Helen Laube date: July 16, 1948

Reviewed in compilation office by: Ree H. Barron date: July 1948

Manuscript
Elevations on ~~Field Edit Sheet~~
checked by:

date:

None

STATISTICS (III)

Land Area (Sq. Statute Miles): 46.0 (Complete detail along shoreline)
(Skeleton detail interior)

Shoreline (More than 200 meters to opposite shore): 20.6 Statute miles

Shoreline (Less than 200 meters to opposite shore): 4.0 statute miles

Number of Recoverable Topographic Stations established: 3

Number of Temporary Hydrographic Stations located by radial
plot: 44

Leveling (to control contours) - miles:

Roman numerals indicate whether the item is to be entered
by, (II) Field Party, (III) Compilation Party, or, (VI) the
Washington Office.

When entering names of personnel on this record give the
surname and initials (not initials only).

Remarks:

Recovery of horizontal control	Date
C. Hanavich, J. C. Lajoie, J. H. Winniford	9/11/47 to 10/3/47
Shoreline Inspection	
J. C. Lajoie, J. H. Winniford, R. W. Sherwood	9/24/47 to 10/7/47
Interior field inspection & Geographic Names	11/5/47 to 11/7/47
J. H. Winniford	
Recovery of Vertical Control	
C. Hanavich	8/4/47 to 10/15/47

DATA RECORD

T-8867

Quadrangle (II): Marcus, Wash. (USGS)
30 minute 1:125000

Project No. (II): Ph-2 (45)

Field Office: Coulee Dam, Wash, Chief of Party: J. T. Jarman

Compilation Office: Portland, Ore. Chief of Party: R. A. Earle

Instructions dated (II III): 4/3/47
5/15/47

Copy filed in *Division of*
~~Descriptive~~
~~Report No. T~~ (VI)
Photogrammetry Office Files

Completed survey received in office: 8-2-48

Reported to Nautical Chart Section: 8-6-48

Reviewed: 5 April 1949 Applied to chart No. Date:

Redrafting Completed: —

Registered: 14 Oct. 1949

Published:

Compilation Scale: 1:10,000

Published Scale:

Scale Factor (III): None

Geographic Datum (III): N. A. 1927

Datum Plane (III): Mean Sea Level (USBR, 1933)
Normal Pool Elevation
1290' above
1288.5 ± USCGS, 1927

Reference Station (III): NAPOLEON (USBR) 1936 r 1947

Lat.: 48 43' 45.198" (1396.2m) Long.: 118 06' 29.831 (609.6m) Adjusted X
Unadjusted

State Plane Coordinates (VI): *Washington, North Zone*

X = 2,657,608.86

Y = 642,435.92

Military Grid Zone (VI)

PHOTOGRAPHS (III)

<u>Number</u>	<u>Date</u>	<u>Time</u>	<u>Scale</u>	<u>Stage of Tide</u>	<u>Water Level of Lake.</u>
9 Lens					
17538 to 17543 Inc.	8/22/46	11:32 PST	1:10,000		1289.65 ft. above M.S.L.
U. S. Army single lens					
37-6 to 47-6 Inc.	8/12/43	Unkown	1:20,000	Unkown	

Tide from (III): None

Mean Range: None

Spring Range: None

Camera: (Kind or source) USC&GS 9 lens, focal length 8.25 inches
U.S. Army, single lens, focal length 8.25 inches

Field Inspection by: See remarks page 3 date: Summer 1947

Field Edit by: None date:

Date of Mean High-Water Line Location (III): 8/27/46

Projection and Grids ruled by (III) Washington Office date: January 1948

" " " checked by: " " date: " "

Control plotted by: James L. Harris date: March 4, 1948

Control checked by: Roy A. Davidson date: March 11, 1948

Radial Plot by: J. L. Harris & J. E. Deal date: May 10, 1948

Detailed by: C. Wiebe date: July 20, 1948

Reviewed in compilation office by: Ree H. Barron date: July 1948

Map Manuscript
Elevations on ~~Field Edit Sheet~~
checked by: None date:

STATISTICS (III)

Land Area (Sq. Statute Miles): 47.0 sq. mi. (Complete detail along shoreline)
(Skeleton detail interior)

Shoreline (More than 200 meters to opposite shore): 8.9 Statute miles

Shoreline (Less than 200 meters to opposite shore): 9.8 Statute Miles

Number of Recoverable Topographic Stations established: None

Number of Temporary Hydrographic Stations located by radial
plot: 47

Leveling (to control contours) - miles:

Roman numerals indicate whether the item is to be entered
by, (II) Field Party, (III) Compilation Party, or, (VI) the
Washington Office.

When entering names of personnel on this record give the
surname and initials (not initials only).

Remarks:

Recovery of horizontal control	Date
C. Hanavich, J. C. Lajoie, J. H. Winniford	9/23/47 to 12/4/47
Shoreline Inspection	
J. C. Lajoie, J. H. Winniford, R. W. Sherwood	10/16/47 to 11/5/47
Interior field inspection & Geographic Names	
J. H. Winniford	10/27/47 to 11/4/47
Recovery of Vertical Control	
C. Hanavich	8/4/47 to 10/15/47

DATA RECORD

T- 8868

Marcus, Wash. (USGS)
 Quadrangle (II): Colville, Wash. (USGS)
 30 minute 1:125000

Project No. (II): Ph-2 (45)

Field Office: Coulee Dam, Wash. Chief of Party: J. T. Jarman

Compilation Office: Portland, Ore. Chief of Party: R. A. Earle

Instructions dated (II III): 4/3/47
 5/15/47

Copy filed in *Division of*
~~Report No. T-~~ *Descriptive*
Photogrammetry Office Files. (VI)

Completed survey received in office: 7-27-48

Reported to Nautical Chart Section: 7-30-48

Reviewed: 12 April, 1949

Applied to chart No.

Date:

Redrafting Completed: —

Registered: 19 Oct. 1949

Published:

Compilation Scale: 1:10,000

Published Scale:

Scale Factor (III): None

Geographic Datum (III): N. A. 1927

Datum Plane (III): Mean Sea Level ^(USBR/1927)
 1288.5 ± USC & GS, 1927

Reference Station (III): BEAR (USBR) 1936 r 1947

Lat.: 48 42' 39.776" (1228.7m) Long.: 118 02' 36.534" (746.9m) Adjusted X
 Unadjusted

State Plane Coordinates (VI): *Washington, North Zone*

X = 2,673,481.09

Y = 636,370.44

Military Grid Zone (VI)

PHOTOGRAPHS (III)

<u>Number</u>	<u>Date</u>	<u>Time</u>	<u>Scale</u>	<u>Stage of Tide</u>	<u>Water Level of Lake</u>
9 Lens 17548 to 17554 Inc.	8/22/46	13:58 PST	1:10,000		1289.65 ft. above M.S.L.
17654 to 17657	8/27/46	10:18 PST	1:10,000		1289.61 ft. above M.S.L.
U. S. Army single lens					
120-6 to 128-6 Inc.	8/12/43	Unknown	1:20,000		Unknown

Tide from (III): None

Mean Range: None Spring Range: None

Camera: (Kind or source) USC&GS 9 lens, focal length 8.25 inches
U. S. Army, single lens, focal length 8.25 inches

Field Inspection by: See Remarks Page 3 date: Summer 1947

Field Edit by: None date:

Date of Mean High-Water Line Location (III): 8/27/46

Projection and Grids ruled by (III) Washington Office date: January 1948

" " " checked by: " " date: " "

Control plotted by: James L. Harris date: March 5, 1948

Control checked by: Roy A. Davidson date: March 8, 1948

Radial Plot by: J. L. Harris & J. E. Deal date: May 11, 1948

Detailed by: Marie B. Elrod date: July 7, 1948

Reviewed in compilation office by: Ree H. Barron date: July 23, 1948

Map Manuscript
Elevations on ~~Field Edit Sheet~~
checked by: None

date:

STATISTICS (III)

Land Area (Sq. Statute Miles): 46.0 (Complete detail along shoreline)
(Skeleton detail interior)

Shoreline (More than 200 meters to opposite shore): 20.5 statute miles

Shoreline (Less than 200 meters to opposite shore): 2.0 statute miles

Number of Recoverable Topographic Stations established: 1

Number of Temporary Hydrographic Stations located by radial
plot: 59

Leveling (to control contours) - miles:

Roman numerals indicate whether the item is to be entered
by, (II) Field Party, (III) Compilation Party, or, (VI) the
Washington Office.

When entering names of personnel on this record give the
surname and initials (not initials only).

Remarks:

Recovery of Horizontal Control	Date
C. Hanavich, J. C. Lajoie, J. H. Winniford	9/25/47 to 12/4/47
Shoreline Inspection	
J. C. Lajoie, J. H. Winniford, R. W. Sherwood	10/9/47 to 10/13/47
Interior field inspection and Geographic Names	
J. H. Winniford	10/23/47 to 10/27/47
Recovery of Vertical Control	
C. Hanavich	8/4/47 to 10/15/47

DATA RECORD

T- 8869

Quadrangle (II): Marcus, Wash. (USGS)
Colville, Wash. (USGS)
(30 minute 1:125000)

Project No. (II): Ph-2 (45)

Field Office: Coulee Dam, Wash. Chief of Party: J. T. Jarman

Compilation Office: Portland, Ore. Chief of Party: R. A. Earle

Instructions dated (II III): 4/3/47
5/15/47

Copy filed in *Division of*
~~Report No. T~~ *(VI)*
Photogrammetry Office Files

Completed survey received in office: 7-27-48

Reported to Nautical Chart Section: 7-30-48

Reviewed: 21 April, 1949 Applied to chart No. Date:

Redrafting Completed: —

Registered: 19 Oct, 1949

Published:

Compilation Scale: 1:10,000

Published Scale:

Scale Factor (III): None

Geographic Datum (III): N. A. 1927

Datum Plane (III):

Normal Pool Elevation
1290' above
Mean Sea Level (USBR, 1932)
1288.5 ± USCGS, 1927

Reference Station (III): LANE (USBR) 1936 r 1947

Lat.: 48 49' 11.777" (363.8m) Long.: 117 59' 34.398" (701.7m) Adjusted X
Unadjusted

State Plane Coordinates (VI): *Washington, North Zone*

X = 2, 684, 223.01

Y = 676, 518.13

Military Grid Zone (VI)

PHOTOGRAPHS (III)

<u>Number</u>	<u>Date</u>	<u>Time</u>	<u>Scale</u>	<u>Stage of Tide</u>
9 Lens				
17556 to 17560 Inc.	8/22/46	14:08 PST	1:10,000	12899 above M.S.L.
17658 to 17660 Inc.	8/27/46	10:20 PST	1:10,000	1289.9 above M.S.L.

Water Level Gradient between
~~XXX~~ Tide from (III): guage at Bossburg, Wash. & gauge at Little Dalles, Wash.
 (See Profile attached to Descriptive Report T-8870 to T-8872
 Mean Range: Spring Range: Inc.

Camera: (Kind or source) U. S. C. & G. S., 9 lens, focal length 8.25 inches.

Field Inspection by: See remarks page 3 date: Summer 1947

Field Edit by: *Name* date:

Date of Mean High-Water Line Location (III): 8/27/46.

Projection and Grids ruled by (III) Washington Office date: January 1948

" " " checked by: " " date: " "

Control plotted by: James L. Harris date: March 8, 1948

Control checked by: Roy A. Davidson date: March 11, 1948

Radial Plot by: James L. Harris & J. E. Deal date: May 11, 1948

Detailed by: Roy A. Davidson date: July 22, 1948

Reviewed in compilation office by: Ree H. Barron date: July 26, 1948

Map Manuscript
 Elevations on ~~Field Edit Sheet~~
 checked by: date:
 None

STATISTICS (III)

Land Area (Sq. Statute Miles): 56.0 (Complete detail along shoreline)
(Skeleton detail interior)

Shoreline (More than 200 meters to opposite shore): 15.0

Shoreline (Less than 200 meters to opposite shore): None

Number of Recoverable Topographic Stations established: None

Number of Temporary Hydrographic Stations located by radial
plot: 56

Leveling (to control contours) - miles:

Roman numerals indicate whether the item is to be entered
by, (II) Field Party, (III) Compilation Party, or, (VI) the
Washington Office.

When entering names of personnel on this record give the
surname and initials (not initials only).

Remarks:

Recovery of Horizontal Control	Date
C. Hanavich, J. C. Lajoie, J. H. Winniford	10/3/47 to 12/5/47
Shoreline Inspection	
J. C. Lajoie, J. H. Winniford, R. W. Sherwood	10/13/47 to 10/16/47
Interior field inspection and Geographic Names	
J. H. Winniford	10/20/47 to 10/23/47
Recovery of Vertical Control	
C. Hanavich	8/4/47 to 10/15/47

MAP T. 8866

PROJECT NO. FH2(45)

SCALE OF MAP 1:10,000

SCALE FACTOR None

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR ν -COORDINATE LONGITUDE OR κ -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)
SEWARD (USBR) r. 1947 1936	G-6760 1055	NA 1927	48° 39' 10.641"	328.7 (1524.7)			Used in Radial
NEST S.S. (USBR) r. 1947 1936	G-6760 1075	"	118° 06' 57.925"	1185.6 (42.5)			Plot
JESSEE (USBR) r. 1947 1936	G-6760 1055	"	48° 36' 13.850"	427.8 (1425.5)			"
BISBEE (USBR) r. 1947 1936	G-6760 1055	"	118° 06' 21.344"	437.2 (791.9)			"
BEN (USBR) r. 1947 1936	G-6760 1054	"	48° 38' 20.806"	642.7 (1210.7)			"
G.P. 166 (UL 60.59+51.98) r. 1947 1936	G-6760 1055	"	118° 04' 32.766"	670.8 (557.6)			"
G.P. 168 (UL 61.57 70.31) r. 1947 1936	G-6760 1055	"	48° 37' 56.623"	1749.0 (104.3)			"
G.P. 217 (UL 79.50 33.78) r. 1947 1936	G-6760 1055	"	118° 07' 58.595"	1199.7 (28.8)			"
G.P. 211 (UL 77.13 38.79) r. 1947 1936	G-6760 1054	"	48° 34' 48.924"	1511.2 (342.1)			"
G.P. 164 (UL 59.70 10.88) r. 1947 1936	G-6760 1055	"	118° 08' 34.142"	699.8 (530.0)			"
G.P. 172 (UL 63.69 48.96) r. 1947 1936	G-6760 1055	"	593.105.87	946.7 (577.3)			Recovered, Not used in Radial Plot
G.P. 207 (UL 74.79 39.66) r. 1947 1936	G-6760 1055	"	2,652.089.58	636.9 (887.1)			"
			600.443.33	135.1 (1388.9)			"
			2,654.123.28	1256.8 (267.2)			"
			601.978.65	603.1 (920.9)			"
			2,657.349.90	716.2 (807.8)			"
			586.843.01	561.7 (962.3)			"
			2,660.589.35	179.6 (1344.4)			"
			589.694.20	1430.8 (093.2)			"
			2,653.786.47	1154.1 (369.9)			"
			613.844.29	1171.7 (352.3)			"
			2,658.182.29	970.0 (554.0)			"
			584.312.33	1314.4 (209.6)			Lost-Plotted at Request of Hydrographic Party
			2,659.641.03	1414.6 (109.4)			

1 FT. = 3048006 METER

COMPUTED BY: C. Hanavich

DATE 2/3/48

CHECKED BY: F.H. Elrod

DATE 2/3/48

M-2388-12

9

MAP T. 8866

PROJECT NO. PH2(45)

SCALE OF MAP 1:10,000

SCALE FACTOR None

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR y -COORDINATE LONGITUDE OR x -COORDINATE		DISTANCE FROM GRID IN FEET, OR PROJECTION LINE IN METERS		DATUM CORRECTION	N.A. 1927 - DATUM DISTANCE FROM GRID OR PROJECTION LINE IN METERS		FACTOR DISTANCE FROM GRID OR PROJECTION LINE IN METERS	
					FORWARD	(BACK)		FORWARD	(BACK)	FORWARD	(BACK)
C.P. 209 (UR 76.14+70.73) 1936	Field Comp. P 17	N.A. 1927	586,435.46		437.5	(1086.5)				Not searched for Plotted at request of hydrographic party.	
C.P. 213 (UR 77.77+66.33) 1936	"	"	2,668,179.14		969.0	(555.0)					
C.P. 215 (UR 78.43+42.31) 1936	"	"	591,492.70		455.0	(1069.0)				"	
C.P. 221 (UR 80.59+80.17) 1936	"	"	2,659,034.31		1229.7	(294.3)				"	
C.P. 223 (UR 81.32+25.39) 1936	"	"	596,859.60		566.8	(957.2)				"	
C.P. 225 (UR 82.06+58.53) 1936	"	"	2,657,038.12		621.2	(902.8)				"	
C.P. 227 (UR 83.04+84.96) 1936	"	"	602,183.16		665.4	(858.6)				"	
C.P. 229 (UR 84.12+42.26) 1936	"	"	2,663,050.84		929.9	(594.1)				"	
C.P. 231 (UR 85.12+42.26) 1936	"	"	602,143.79		653.4	(870.6)				"	
C.P. 233 (UR 86.12+42.26) 1936	"	"	2,667,531.22		771.5	(752.5)				"	
C.P. 235 (UR 87.12+42.26) 1936	"	"	607,654.73		809.2	(714.8)				"	
C.P. 237 (UR 88.12+42.26) 1936	"	"	2,665,641.90		195.7	(1328.3)				"	
C.P. 239 (UR 89.12+42.26) 1936	"	"	615,929.33		283.3	(1240.7)				"	
C.P. 241 (UR 90.12+42.26) 1936	"	"	2,664,274.67		1302.9	(221.1)				"	
C.P. 243 (UR 91.12+42.26) 1936	"	"	585,805.77		245.6	(1278.4)				"	
C.P. 245 (UR 92.12+42.26) 1936	"	"	2,652,019.87		615.7	(908.3)				"	
C.P. 247 (UR 93.12+42.26) 1936	"	"	606,532.04		467.0	(1057.0)				"	
C.P. 249 (UR 94.12+42.26) 1936	"	"	2,655,993.40		302.8	(1221.2)				"	
C.P. 251 (UR 95.12+42.26) 1936	"	"	617,385.52		727.1	(796.9)				"	
C.P. 253 (UR 96.12+42.26) 1936	"	"	2,657,832.09		863.2	(660.8)				"	
C.P. 255 (UR 97.12+42.26) 1936	"	"	48° 36' 28.22"		871.8	(981.5)				Not searched for.	
C.P. 257 (UR 98.12+42.26) 1936	"	"	118° 05' 50.52"		1034.9	(194.2)					
C.P. 259 (UR 99.12+42.26) 1936	"	"	48° 36' 26.76"		826.7	(1026.6)				Not searched for.	
C.P. 261 (UR 100.12+42.26) 1936	"	"	118° 08' 46.92"		961.2	(267.9)					

1 FT. = 3048006 METER

COMPUTED BY: J.H. Winniford

DATE 3/3/48

CHECKED BY: J.L. Harric

DATE 3/4/48

M-2388-12

(11)

MAP T. 8867

PROJECT NO. FH2(45)

SCALE OF MAP 1:10,000

SCALE FACTOR None

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR ψ -COORDINATE LONGITUDE OR α -COORDINATE		DISTANCE FROM GRID IN FEET, OR PROJECTION LINE IN METERS		DATUM CORRECTION	N.A. 1927 - DATUM DISTANCE FROM GRID OR PROJECTION LINE IN METERS		FACTOR DISTANCE FROM GRID OR PROJECTION LINE IN METERS	
					FORWARD	(BACK)		FORWARD	(BACK)	FORWARD	(BACK)
NANCY (USER) 1936 <i>r. 1947</i>	G-6760 1056	N.A. 1927	48° 41'	04.252	131.3	(1722.1)				Used in Radial Plot	
ARNOLD (USER) 1936 <i>r. 1947</i>	G-6760 1057	"	118° 07'	51.405	1051.5	(175.8)				"	
MYERS (USER) 1936 <i>r. 1947</i>	G-6760 1057	"	48° 45'	54.440	1681.7	(171.7)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1057	"	118° 06'	42.366	865.2	(360.1)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1056	"	48° 47'	34.386	1062.2	(791.2)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1057	"	118° 06'	03.778	77.1	(1147.5)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1056	"	48° 43'	54.861	1694.7	(158.7)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1056	"	118° 08'	50.809	1038.3	(187.8)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1056	"	48° 43'	45.198	1396.2	(457.2)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1056	"	118° 06'	29.831	609.6	(616.5)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1057	"	48° 47'	37.145	1147.4	(706.0)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1057	"	118° 08'	30.677	626.1	(598.5)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1057	"	48° 45'	31.860	984.2	(869.2)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1057	"	118° 08'	01.854	37.9	(1187.6)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1035	"	48° 42'	02.742	84.7	(1768.7)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1035	"	118° 05'	25.390	519.2	(707.7)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1077	"	48° 47'	50.259	1552.5	(300.9)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1077	"	118° 06'	33.496	683.6	(540.9)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1077	"	621.503.61		458.3	(1065.7)				Not searched for Plotted at request of hydro party.	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1077	"	2656831.80		558.3	(965.7)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1077	"	629.771.66		1454.4	(69.6)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1077	"	2,655,427.20		130.2	(1393.8)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1077	"	634,251.12		1295.8	(228.2)				"	
TURNBULL (USER) 1936 <i>r. 1947</i>	G-6760 1077	"	2,654,921.28		1500.0	(24.0)				"	

1 FT. = 3048008 METER

COMPUTED BY: F.H. Elrod

DATE 2/2/48

CHECKED BY: J.L. Harris

DATE 3/4/48

M. 2388-12

MAP T. 8867

PROJECT NO. FH2(45)

SCALE OF MAP 1:10,000

SCALE FACTOR None

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR ψ -COORDINATE LONGITUDE OR x -COORDINATE	DISTANCE FROM GRID IN FEET, OR PROJECTION LINE IN METERS	DATUM CORRECTION	N.A. 1927 - DATUM DISTANCE FROM GRID OR PROJECTION LINE IN METERS	FACTOR DISTANCE FROM GRID OR PROJECTION LINE IN METERS
C.P.K.T. 8 (KTW 229 +97.63) 1936	Field Comp P 17	N.A. 1927	637,144.89	653.8 (870.2)			Not searched for. Plotted at request of hydro party.
C.P.K.T. 10 (KTW 264+08.16) 1936	"	"	2,652,062.69	628.7 (895.3)			"
C.P.K.T. 12 (KTW 347+83) 1937	"	"	640,037.76	11.5 (1512.5)			"
C.P.K.T. 5 (KTE 138+98.18) 1936	"	"	2,653,361.32	1024.5 (499.5)			"
C.P.K.T. 7 (KTE 191+94.57) 1937	"	"	647,214.15	705.4 (818.6)			"
C.P.K.T. 9 (KTE 281+62.54) 1936	"	"	2,652,251.01	686.1 (837.9)			"
C.P.K.T. 3 (KR 83+28.37) 1936	"	"	635,875.98	267.0 (1257.0)			"
C.P.K.T. 14 (KTW 391+77.51) 1936	"	"	2,655,403.97	123.1 (1400.9)			"
C.P.K.T. 16 (KTW 582+97.25) 1937	"	"	641,431.61	436.4 (1087.6)			"
C.P.K.T. 18 (KTW 582+97.25) 1937	"	"	2,655,880.33	268.3 (1255.7)			"
C.P.K.T. 11 (KTE 382+00.68) 1936	"	"	647,380.73	725.6 (798.4)			"
C.P.K.T. 13 (KTE 497+39.07) 1937	"	"	2,654,876.86	1486.5 (37.6)			"
			631,381.99	421.2 (1102.8)			"
			2,655,818.58	249.5 (1274.5)			"
			651,411.97	430.4 (1093.6)			"
			2,651,611.94	491.3 (1032.7)			"
			658,464.34	1055.9 (468.1)			"
			2,650,798.52	243.4 (1280.6)			"
			661,943.43	592.4 (931.6)			"
			2,650,924.09	281.7 (1242.3)			"
			653,816.72	1163.3 (360.7)			"
			2,653,352.88	1022.0 (502.0)			"
			660,848.85	258.7 (1265.3)			"
			2,654,001.75	1219.7 (304.3)			"

1 FT. = 3048006 METER

COMPUTED BY: J.H. Winniford

DATE 3/3/48

CHECKED BY: J.L. Harris

DATE 3/4/48

M-2388-12

12

MAP T. 8868

PROJECT NO. PH2(45)

SCALE OF MAP 1:10,000

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)
BOSSBURG (USER) r. 1947 1936	G-6760 1058	N.A. 1927	48° 45' 58.577 118° 00' 32.265	1809.4 (44.0) 658.9 (566.4)			Used in Radial Plot
KLUTCH (USER) 1936 r. 1947	G-6760 1058	"	48° 45' 22.796 118° 04' 20.371	704.2 (1149.2) 416.1 (809.5)			"
BRUSH S.S. (USER) 1936 r. 1947	G-6760 1077	"	48° 39' 56.417 118° 01' 54.162	1742.7 (110.7) 1108.2 (119.5)			"
EVANS (USER) 1936 r. 1947	G-6760 1058	"	48° 43' 58.171 118° 00' 07.761	1796.9 (56.5) 158.6 (1067.5)			"
BEAR (USER) 1936 r. 1947	G-6760 1057	"	48° 42' 39.776 118° 02' 36.534	1228.7 (624.7) 746.9 (479.7)			"
G.P. 245 (UR 8897+84.08) 1936	Field Comp. P 18	"	656,440.35 2,675,707.45	439.0 (1085.0) 215.6 (1308.4)			Not searched for. Plotted at request or hydrographic party
G.P. 192 (UL 7046+30.90) 1936	"	"	652,250.75 2,670,026.60	990.8 (533.2) 8.1 (1515.9)			"
G.P. 243 (UR 8847+04.20) 1936	"	"	653,151.13 2,672,083.20	960.5 (563.5) 635.0 (889.0)			"
G.P. 229 (UR 8366+05.07) 1936	Field Comp P 20	"	619,471.93 2,668,557.88	1363.0 (161.0) 1084.4 (439.6)			"
G.P. 233 (UR 8495+41.44) 1936	"	"	625,208.96 2,679,617.92	63.7 (1460.3) 1407.5 (116.5)			"
G.P. 231 (UR 8421+43.93) 1936	"	"	621,616.83 2,673,302.96	492.8 (1031.2) 1006.7 (517.3)			"
G.P. 235 (UR 8556+63.63) 1936	"	"	630,109.16 2,681,088.70	33.3 (1490.7) 331.8 (1192.2)			"

meters to grid

1 FT. = 3048006 METER
COMPUTED BY: F.H. Elrod

CHECKED BY: J.L. Harris

DATE 2/3/48

DATE 3/2/48

M-2388-12

MAP T. 8868

PROJECT NO. PH2(45)

SCALE OF MAP 1:10,000

SCALE FACTOR

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR U-COORDINATE LONGITUDE OR X-COORDINATE	DISTANCE FROM GRID IN FEET, OR PROJECTION LINE IN METERS	DATUM CORRECTION	N.A. 1927 - DATUM DISTANCE FROM GRID OR PROJECTION LINE IN METERS	FACTOR DISTANCE FROM GRID OR PROJECTION LINE IN METERS
C.P. 180 (UL 6592+52.50) 1936	Field Comp P 20	N.A. 1927	626,296.23	395.1 (1128.9)			Not searched for
C.P. 182 (UL 6679+43.18) 1936	"	"	2,665,913.34	278.4 (1245.6)			Plotted at request of hydrographic party
C.P. 184 (UL 6751+93.74) 1936	"	"	623,702.16	1128.4 (395.6)			"
C.P. 237 (UR 8607+70.44) 1936	"	"	2,672,952.07	899.8 (624.2)			"
C.P. 239 (UR 8686+88.54) 1936	"	"	627,783.57	848.4 (675.6)			"
C.P. 186 (UL 6838+65.93) 1936	"	"	2,675,037.74	11.5 (1512.5)			"
C.P. 188 (UL 6912+77.70) 1936	"	"	634,866.16	1483.2 (40.8)			"
C.P. 190 (UL 6976+63.99) 1936	"	"	2,679,727.16	1440.8 (83.2)			"
C.P. 241 (UR 8761+73.08) 1936	"	"	638,748.90	1142.7 (381.3)			"
DOTS S.S. (USBR) 1936	G-6760 1077	"	2,674,954.04	1436.9 (87.1)			"
WILLIAMS S.S. (USBR) 1936	G-6760 1077	"	635,373.24	113.7 (1410.2)			"
LIME S.S. (USBR) 1936	G-6760 1077	"	2,671,474.71	1510.0 (14.0)			"
			641,661.02	506.3 (1017.7)			"
			2,671,474.71	449.5 (1074.5)			"
			646,928.40	587.8 (936.2)			"
			2,668,625.00	1104.9 (419.1)			"
			645,276.45	114.7 (1409.3)			"
			2,671,485.65	452.8 (1071.2)			"
			48° 45' 23.794"	735.0 (1118.4)			Not searched for.
			118° 01' 48.776"	996.2 (229.3)			
			48° 43' 27.816"	859.2 (994.2)			
			118° 04' 04.459"	91.1 (1135.1)			
			48° 42' 23.371"	721.9 (1131.5)			
			118° 00' 20.183"	412.6 (814.1)			

1 FT. = 3048006 METER

COMPUTED BY: J.H. WINNIFORD

DATE 3/14/48

CHECKED BY: J.L. Harris

DATE 3/8/48

M-2368-12

94

MAP T. 8862

PROJECT NO. PH2(45)

SCALE OF MAP 1:10,000

SCALE FACTOR

None

STATION	SOURCE OF INFORMATION (INDEX)	DATUM	LATITUDE OR Y-COORDINATE LONGITUDE OR X-COORDINATE	DISTANCE FROM GRID IN FEET. OR PROJECTION LINE IN METERS		DATUM CORRECTION	N.A. 1927 - DATUM DISTANCE FROM GRID OR PROJECTION LINE IN METERS		FACTOR DISTANCE FROM GRID OR PROJECTION LINE IN METERS	
				FORWARD	(BACK)		FORWARD	(BACK)	FORWARD	(BACK)
DIZZY S.S. (USBR) 1936	G-6760 1078	N.A. 1927	48° 49' 04.172"	128.9	(1724.6)				Used in Radial	
r. 1947			117° 57' 08.969"	183.0	(1041.0)				Plot	
DILLY (USBR) 1936	G-6760 1058	"	48° 47' 34.023"	1051.0	(802.4)				"	
r. 1947			118° 01' 51.572"	1052.6	(172.0)				"	
LANE (USBR) 1936	G-6760 1058	"	48° 49' 11.777"	363.8	(1489.7)					
r. 1947			117° 59' 34.398"	701.7	(522.3)					
BILL S.S. (USBR) 1936	G-6760 1078	"	48° 47' 25.861"	798.8	(1054.6)				Recovered not used in radial plot.	
r. 1947			117° 59' 08.848"	180.6	(1044.1)				Used in radial plot	
G.P. 255 (UR 92.52+24.90) 1936	Field Comp	"	673,184.22	970.6	(553.4)				"	
r. 1947			2,694,269.65	1301.4	(222.6)					
G.P. 196 (UR 72.09+65.50) 1936	"	"	663,584.10	1092.4	(431.6)					
r. 1947			2,680,145.68	44.4	(1479.6)				Recovered not used in radial plot.	
W.W.P. AP 760 1936	Field Comp	"	675,238.16	72.6	(1451.4)					
r. 1947			2,689,181.94	1274.7	(249.3)					
G.P. 194 (UL 71.05+89.05) 1936	Field Comp P 18	"	657,985.94	910.1	(613.9)				Not searched for. plotted at request of hydrographic party	
r. 1947			2,673,471.08	1058.0	(466.0)				"	
G.P. 198 (UL 72.78+54.12) 1936	"	"	670,315.89	96.3	(1427.7)				"	
r. 1947			2,679,226.14	1288.1	(235.9)				"	
G.P. 200 (UL 73.41+87.60) 1936	"	"	674,627.05	1410.3	(113.7)				"	
r. 1947			2,682,686.27	818.8	(705.2)				"	
G.P. 240 (UR 90.83+33.57) 1936	"	"	669,967.96	1514.2	(09.7)				"	
r. 1947			2,680,799.75	243.8	(1280.2)				"	
G.P. 253 (UR 91.97+73.10) 1936	"	"	675,207.90	63.4	(1460.6)				"	
r. 1947			2,689,388.29	1337.6	(186.4)					

meters to grid

1 FT. = 3048006 METER
COMPUTED BY: F.H. Elrod

DATE 2/3/48

CHECKED BY: J.L. Harris

DATE 3/1/48

M-2388-12

FIELD INSPECTION REPORT

Map Manuscripts T-8866 to T-8869 Inclusive

Area of the 6th Radial Plot

Project Ph-2 (45)

The field inspection report for the area of these four map

manuscripts is part of a combined report for the area of the fifth,

sixth, and seventh radial plots, sheets T-8863 to T8872 inclusive.

This report was attached to the descriptive report for map manuscripts

T-8863 to T-8865 inclusive, which was forwarded to the Washington

Office on 9 April 1948.

-Filed in Div. of Photogrammetry, General Files.

W Earle

R. A. Earle

Lt. Comdr., USC&GS

Chief of Party

From F. I. Report:

15. Bridges & Cable Crossings

F 8866

1. Three miles west of Kettle Falls, - highway

2. " " " " " " Grl. Northery Ry

Powerline, north side Ry. bridge

T-8867

1. Mouth of Kettle River, - Ort Northern Ry.

2. Kettle River, - highway

3. South of Boyds, - Gt Northern Ry.

4. Napoleon, - highway (head of navigation)

T-8869

1. Northwest of Bossburg. Power line

See Review Report.

COMPILATION REPORT
Map Manuscripts T-8866 to T-8869 Inclusive
Area of the 6th Radial Plot
Project Ph-2 (45)

26: CONTROL:

Twenty-four horizontal control stations were recovered and identified by the field parties for use in controlling the radial plot in the area of these four map manuscripts. All of the objects selected for sub-stations could be identified with certainty on a majority of the photographs. The stations were well spaced over the area and were sufficient to control the radial plot.

T-8866 = 5
T-8867 = 9
T-8868 = 5
T-8869 = 5

Because of insufficient end lap in line of flights, the use of the stereoscope was limited for transferring horizontal control stations and photo hydro signals from one photograph to another. This often made it impossible to obtain stereoscopic vision when viewing a stereoscopic pair. (See paragraph 2 of letter 711-rs, dated 23 September 1947, on the subject of photographs.)

All horizontal control stations, which were recovered by the field party were plotted on the map manuscripts. In addition, at the request of the hydrographic party, all unrecovered USBR 3rd order stations lying along the shore of the lake, which were not found to be destroyed, were plotted. This was done in order to facilitate their recovery by the hydrographic party if they were needed. The original descriptions for this 3rd order control were written prior to the time that the lake was impounded, and were therefore inadequate. These unrecovered stations were indicated by a dashed line triangulation stations symbol, and a note pertaining to same was lettered in the margin of the manuscript.

A complete tabulation of the horizontal control stations shown on these four map manuscripts is contained on several sheets of Form M-2388-12, which are attached to this descriptive report.

The compilation office has no record of the geographic position of WATER TANK SAWMILL, 1936 (USBR) which was recovered by the field party in 1947.

*Further
no search was made for this station's position since it was
not needed and*

27: RADIAL PLOT:

These four map manuscripts, No's. T-8866 to T-8869 inclusive, were combined into one radial plot known as "Radial Plot No. 6, Project Ph-2 (45)". This radial plot was completed in the same manner as "Radial Plot No. 1" which has been fully described under item 27 of the "Descriptive Report" for map manuscripts T-8849 to T-8852 inclusive.

In accordance with instructions, contained in a letter from the Chief Division of Photogrammetry, dated 20 April 1948, calibration photograph No. 16664 was used to apply corrections to radial directions for nine lens photographs used in this radial plot.

28: DETAILING:

These maps were compiled in accordance with instructions for Project Ph-2 (45). Features and symbols were shown as indicated in Photogrammetry Instructions No. 10, 12, and 17.

The transforming printer at the Washington Office was not in proper adjustment at the time the photographs were printed, and they could not be oriented in their entirety at the compilation table when radially plotting various types of pass points. Enough pass points, however, had been established during the radial plot so that each chamber of each photograph could be separately oriented. For at least two of the chambers on each photograph it was found necessary to de-center the photograph radially, to or from the chamber being oriented, so that the radials to the pass points and horizontal control stations in the chamber would pass through their positions on the map manuscript.

Detailing was accomplished in the following manner:

1. All photo hydro signals, and shoreline pass points were radially plotted. Because of difficulties which have arisen on this and other projects, and in order to insure the accuracy of photo hydro signals, the located positions were then verified by a supervisor, and all questionable signals were rejected. (Shoreline pass points of two radial intersections are shown with green, waterproof ink circles on the reverse side of the map manuscripts.)

2. The shoreline was detailed from those photographs on which it was clearly visible and on which the bluffs were displaced outward from the center. (It might be stated that there were cases, particularly at the heads of narrow coves where displaced banks, cliffs and trees, and insufficient photograph coverage made it difficult to delineate the shoreline. In many of these places, stereoscopic vision could not be obtained. The shoreline in these areas was detailed after all photographs had been studied. It is, however, subject to minor changes by the hydrographic party.)

3. Pass points for use in detailing inshore planimetric features were located and the compilation of the sheet was completed.

4. A careful review was made of all radially plotted pass points and planimetric details.

Ozalid prints of the completed map manuscripts were furnished to the hydrographic party; however, it is recommended that they be used for reference purposes only. As many difficulties are encountered when transferring hydrographic signals and shoreline from distorted ozalid prints to boat sheets, it is hoped that the hydrographic party can be furnished boat sheets for their 1948 field work similar to those which were made for the Willamette River Hydrography. (Photogrammetric Project Ph-13 (46) and Hydrographic Project CS-323).

Because of insufficient photograph coverage much of the interior areas could not be completed to the limits of the map manuscripts.

Whenever possible the stereoscope was used in determining the location of the tops of bluffs along the shoreline. The location of these bluffs could be determined more readily from photographs on which they were displaced away from the waterline and principal point of the photograph. Detail pass points were radially plotted near or along the tops of these bluffs so that they could be compiled as accurately as possible.

In many places it was very difficult to identify sufficient pass points for the compilation of roads. This was particularly true in areas of severe changes in relief, and in places where roads wound through dense woods. Similar conditions caused trouble in compiling the drainage, especially since the use of the stereoscope was very limited in interior areas.

Because of the numerous new roads and many changes in road alignment, it was found easier to compile all through roads as they appeared on the photographs rather than to make comparisons with old surveys and quadrangles and to compile only the changes as suggested in the instructions for this project.

It is believed that all provisions of Paragraph 32 of the Instructions relative to drafting have been applied to the map manuscripts.

29: SUPPLEMENTAL DATA:

The following map, which was used to supplement the photographs, will be forwarded when the project is completed:

Black and White Print:---Existing and relocated highways and
railroads, scale 1" = 4 miles.

30: MEAN HIGH-WATER LINE: (Lake Shoreline at the adopted plane of reference)

A complete discussion of this feature may be found in " Paragraph 7 of the "Field Inspection Report, Area of the Fifth, Sixth, and Seventh Radial Plots," which is attached to the Descriptive Report for map manuscripts T-8863 to T-8865, Project Ph-2 (45). *which includes a reservoir profile.*

The Mean High-Water Line (Lake Shoreline at the adopted plane of reference) is shown by a continuous black acid ink line, .008" in thickness, at a plane 1290.0 ft. above Mean Sea Level. There are no marsh areas bordering the shoreline.

31: LOW-WATER AND SHOAL LINES:

The field inspection unit did not indicate any low-water lines within the limits of these map manuscripts.

Approximate shoal lines have been shown by a light, dashed, black acid ink line, as indicated by the field party.

32: DETAILS OFFSHORE FROM THE MEAN HIGH-WATER LINE:

Details offshore from the mean high-water line have been shown as indicated by the field inspection party. (Refer to Paragraph 10 of the Field Inspection Report.)

33: WHARVES AND SHORELINE STRUCTURES:

Refer to Paragraph 9 of the Field Inspection Report.

34: LANDMARKS AND AIDS TO NAVIGATION:

Form 567, recommending the charting of the following non-floating aids to navigation is attached.

Sherman Creek 47 Lt.....T-8866 -
Colville Flats Daybeacon.....T-8866 -

Form 567, recommending the charting of the following objects as landmarks is attached.

STACK, black metal.....T-8866 -
TOWER, concrete.....T-8866 -

35: HYDROGRAPHIC CONTROL:

Statistics on signals in the area of these four map manuscripts are as follows:

<u>Sheet No.</u>	<u>Signals Pricked by Field Party</u>	<u>Signals Rejected</u>	<u>Photo Hydro Sig. Estab.</u>
8866	52	8	44
8867	48	1	47
8868	66	9	57
8869	65	9	56

In most cases, the signals selected by the field party could be identified on a majority of the photographs of the area involved. Most of the signals, which were rejected, were located in dense tree areas, or hidden by displaced cliffs or ridges, and could not be identified with certainty on enough photographs to establish strong positions. (The field party could not determine this point with alternate photographs.) Due to previous difficulties, exceptional care has been taken in pricking and radially plotting the photo hydro signals shown on these three map manuscripts. Their locations were not only verified by the reviewer and the supervisor in charge of compilation, but a final examination of this part of the work also was made by the Chief of Party, who rejected any signal on which a perfect intersection could not be obtained.

These multiple checks should eliminate the difficulties which the hydrographic party encountered in the first sheets in this project.

A list of the photo hydro signals, shown on these four map manuscripts, is attached to this descriptive report.

36: LANDING FIELDS AND AERONAUTICAL AIDS:

There are no landing fields or aeronautical aids in this area.

37: GEOGRAPHIC NAMES: 814A

Geographic Names are the subject of a special report "Investigation of Geographic Names, sheets 8860 to 8872 inclusive, Project Ph-2 (45)", which has been submitted to the Washington Office by the Field Party.

38: RECOVERABLE TOPOGRAPHIC STATIONS:

Copies of Form 524 are being submitted for all stations listed under items 34 "Landmarks and Aids to Navigation". No other recoverable topographic stations were selected by the field party, or radially plotted at the compilation office.

39: JUNCTIONS:

Complete and satisfactory junctions have been made between all map manuscripts in this and adjacent radial plots.

40: F. D. ROOSEVELT LAKE RESERVATION LINE:

Please refer to Item 40 in the Descriptive Report for the 1st Radial Plot, Project Ph-2 (45).

44: COMPARISONS WITH EXISTING TOPOGRAPHIC SURVEYS:

All existing maps of the area were at a much smaller scale, and were made before the waters of the F. D. Roosevelt Lake were impounded. Due to these facts, only a visual comparison could be made.

45: COMPARISONS WITH NAUTICAL CHARTS:

There are no nautical charts of the area.

Approved by:

Robert A. Earle

Robert A. Earle
Chief of Party

Respectfully submitted:

J. Edward Deal, Jr.

J. Edward Deal, Jr.
Photogrammetric Engineer

TO BE CHARTED }
~~TO BE DELETED~~ } STRIKE OUT ONE

LANDMARKS FOR CHARTS

Fixed Aids to Navigation

Coulee Dam, Wash.

Oct. _____, 1984

I recommend that the following objects which have ~~(three been)~~ been inspected from seaward to determine their value as landmarks, be charted on (~~deleted from~~) the charts indicated.

The positions given have been checked after listing. *W.H. East*

J. I. Jayman & R. A. Barle
Chief of Party.

[illegible]

This form shall be prepared in accordance with 1934 Field Memorandum, "LANDMARKS FOR CHARTS." The data should be considered for the charts of the area and not by individual field survey needs. Information under each column heading should be given

TO BE CHARTED }
 TO BE DELETED } STRIKE OUT ONE

LANDMARKS FOR CHARTS

Coulee Dam, Wash.

Oct.

1937

I recommend that the following objects which have *(have not)* been inspected from seaward to determine their value as landmarks, be charted on (*deleted from*) the charts indicated.

The positions given have been checked after listing. *Wm. W. Wood*

J. T. Jarmen

A. R. A. Taylor

Chief of Party.

[illegible]

This form shall be prepared in accordance with 1934 Field Memorandum, "LANDMARKS FOR CHARTS." The data should be considered for the charts of the area and not by individual field survey reports. Information under each column heading should be given.

Hydrographic Signal Sites
8866 - 8867 - 8868 - 8869
6th Radial Plot

- 6601 . White sig. Cl. on lone pine tree
- 6603 Dead tree inshore from live pine on ridge in slide
- 6604 Orange Sig. Cl. on pine
- 6605 Orange Sig. Cl. on small pine .
- 6606 Red Sig. Cl. on tree at H. W. L.
- 6607 Red Sig. Cl. on pine
- 6608 White cloth on fir at end of road
- 6609 White Sig. Cl. on small pine
- ~~6610 Orange Sig. Cl. on tree~~
- 6611 Orange Cloth on pine
- 6612 Red Sig. Cl. on fir
- 6613 Red cloth on stake in hedgerow
- 6614 White cloth on pine
- 6615 White cloth on bushy pine at end of fence
- 6616 Orange cloth on Pine
- 6617 Orange Sig. C. on pine
- 6619 Red Sig. Cl. on D/S pine of 2
- 6620A Small pine tree pricked in office
- 6621 Orange Sig. Cl. on D/S of 2 pines
- 6622 Cupola, yellow barn
- 6623 White Sig. Cl. on twin pine
- 6624 S. E. Cor. of concrete floor of old building
- 6625 Center of W. pier of highway bridge
- 6626 Red Sig. Cl. on bush on point
- 6627 Center of W. pier of R.R. bridge

app. 13.1

6629 E. gable of sawmill
6630 Orange cloth on pine
6631 White Sig. Cl. on D/S tree
6632 Red Sig. Cl on Pine
6633 Orange Sig. Cl. on pine
6634 Vertical shaft of stationary crane
6635 Red Sig. Cl. on U/S of 2 pines on rock outcrop
6636 White Sig. Cl. on D/S tree of 2
6637 White Sig Cl on pine
6638 Center E. pier highway bridge
6639 U/S gable of unpainted barn
6640 Center of E. Pier of RR Bridge
6641 Orange cloth on inshore of 2 firs
6642 Orange Sig. Cl. on double pine
6646 Orange Sig. Cl. on dying pine
6648 West gable of white house, green roof
6650 Red Sig. Cl. on pine N. of highway
6652 White Sig. Cl. on pine tree
6654 Orange Sig. Cl. on D/S of 2 pines
6656 Lone bushy pine at Wedge of highway
6658 Red Sig. Cl. on pine
6701A White Sig. Cl. on pine
6701 Center of S. pier on RR Bridge
6703 S. W. cor. of bridge (Kettle River side)
6704 Orange cloth on small pine
6705 NE cor. of bridge (Kettle River side)
6706 White Sig. Cl. on pine

- 6707 White banner on fir tree
- 6708 Red signal cloth on pine
- 6709 Red banner on tamerack tree
- 6710 Orange cloth on fir end of slide
- 6711 White banner on pine
- 6712 White banner on pine
- 6713 Red banner on pine
- 6714 Red banner on small pine
- 6715 White cloth on pine u/s of 2
- 6716 White banner on bushy pine
- 6717 Red cloth on pine U/S of 2
- 6718 Red banner on pine
- 6719 White cloth on pine
- 6720 White banner on pine
- 6721 Red cloth on pine
- 6722 Red banner on pine, S. of 2
- 6723 White signal on fir
- 6724 White banner on pine
- 6725 Red signal on pine
- 6726 S. end of middle bridge pier
- 6727 White signal on pine
- 6728 Base of prominent dead top pine
- 6729 Red cloth on pine
- 6730 Red cloth on small pine
- 6731 White cloth on small pine
- 6733 S. end of north bridge pier
- 6734 Red cloth on pine
- 6735 Red banner on pine
- 6736 Large fir near pine

- 6737 Red cloth on lone pine
- 6738 White Sig. Cl. on pine
- 6739 White sig. cl. on pine
- 6740 Tip of red roofed cupola of white bldg.
- 6741 U/S gable of red garage
- 6743 NE cor. of old store
- 6745 Red Sig. Cl. on pine
- 6747 Bell tower, school house
- 6749 White Sig. Cl. on pine
- 6751 Red Sig. Cl. on pine
- 6753 White flag in tree top
- 6755 Center bridge pier
- 6801A Red sig. cl. on large fir
- ~~6801 White Sig. Cl. on pine~~
- 6802B Large pine with no trespassing
- 6802 Center of roof of white house, green roof
- 6803 Orange Sig. C. on dec. bush
- 6804 Red Sig. Cl. on Pine
- 6805 Red Sig. Cl. on dec. bush
- 6806 White cloth on large pine
- 6807 White sig. cl. on small pine
- 6808 Orange cloth on pine tree
- 6809 Orange flag on stake on stump
- 6810 Red Sig. Cl. on pine
- 6811 Red sig. cl on pine
- 6813 White sig. cl on pine
- 6815 Orange sig. cl on small double pine
- 6816 Red sig. cl. on small pine

5

6817 Red Sig. Cl. on pine
6818 White Sig. Cl. on pine in row of dec. bushes
6819 White Sig. Cl. on snag
6820 Orange Sig. Cl. on small pine
6821 Orange cloth on pine
6822 Red signal cl. on large pine
6823 Red Sig. Cl. on small pine
6824 White Sig. Cl. on dead pine
6825 White Sig. Cl. on pine
6826 Orange cloth on pine
6828 Red sig. Cl. on small pine
6830 White Sig. Cl. on pine in small draw
6831 White cloth on pine
6832 Orange sig. cl on D/S of 2 pines
6833 U/S gable of house
6834 Red sig. Cl. on small pine on slide
6835 Orange cloth on lyre top pine
6836 White signal cl. on pine tree
6838 Orange cloth on bush on point
6839 White cloth on pine
6840 Red Sig. Cl. on pine
6841 Orange Sig. Cl. on pine
6842 Orange Sig. Cl. on pine
6843 Red sig. cl. on double pine
6845 White ~~Flag~~ on stake at D/S end of "L" shaped brush
6846 Red Sig. Cl. on large pine
6847 Orange Sig. Cl. on pine tree
6848 River gable on unpainted barn

- 6849 Red Sig. Cl. on outer of 2 pines
6850 Chimney, center of house
6851 White Sig. Cl. on pine
6852 White sig. cl. on dec. tree
6853 Orange cloth on pine tree
~~6854 Orange cloth on D/S of 2 pine~~
6855 Red sig. cl. on inner of 2 pines
6856 Red sig. cl. on pine
6857 White sig. cl. on pine in small draw
6858 White sig. cl. on bush
6859 Red banner on pine
6861 White flag on pine, N. of 2
6863 Red flag on sumac bush
6865 White banner on pine
6867 Red banner on pine, S of 2.
6901A White banner on pine
6901B Red banner on small pine
6902 White cl. on small pine
6902A Orange Sig. Cl. on small apple tree
6903 White banner on small bushy pine
6904 Red cl. on tall fir
6905 E. gable of house
6907 Red banner at base of pine
6906 White cl. on lone pine
6908 Red cl on lone pine

- 6911 Red banner at base of pine
- 6912 White cl. on pine, S. of 2
- 6913 White banner at base of pine
- 6914 Red cl. on pine
- 6915 Red banner at base of pine
- 6916 White cl. on tamarack tree
- 6917 White banner on pine
- 6920 White flag on cottonwood
- 6921 S. gable large barn
- 6922 Large lone pine on crest no flag
- 6923 White banner on pine
- 6924 Red on small pine, side of cut
- 6925 Red banner on pine
- 6926 White cl. on pine
- 6927 White banner on small fir
- 6928 Red cl. on pine
- 6929 Red banner on small pine
- 6930 White cl. on fir tree
- 6931 White banner on small pine E. of 2
- 6932 Red cl. on small cottonwood
- 6933 Red banner on pole set in sump hole
- 6934 White cl. on pine
- 6935 White banner on fir tree
- 6936 Red cl. on small fir
- 6937 Red banner on pine, S. of 2
- 6938 White cl. on pine
- 6939 White banner on tall pine
- 6940 Red cl. on pine
- 6941 Red banner on pine

- 6942 White flag on fir tree
- 6943 White banner on fir tree
- 6944 Red cl. on pine
- 6946 White cl. on pine
- 6947 Red cl. on upstream of 2 pines
- 6948 Small lone pine, edge of bank no flag
- 6949 White cl. on pine
- 6950 Red cl. on pine
- 6951 Red cl. on tall pine
- 6952 White cl. on pine
- 6953 White sig. cl. on tallest of 3 pines
- 6955 Red cl. on small pine
- 6957 White cl. on pine
- 6958 White cl. on bushy maple tree
- 6959 Red cl. on pine
- 6960 Red flag on alder bush
- 6962 White flag on bush

GEOGRAPHIC NAMES

Survey No. T-8866

GEOGRAPHIC NAMES											
Survey No. T-8866											
1	Name on Survey	A	B	C	D	E	F	G	H	K	
		On Chart No.	On previous survey No.	On U. S. quadrangle Maps	From local information	On local Maps	P. O. Guide or Map	Rand McNally Atlas	U. S. Light List		
	Washington									USGB	1
	Ferry County										2
	Stevens County										3
	Franklin D. Roosevelt Lake									USGB	4
	U.S. No. 395 State No. 3										5
	Wash. State No. 22										6
	Greet Northern Railway										7
	Republic Kettle Falls Highway										8
											9
	Sherman Creek										10
	Sherman Creek Point										11
	Nancy Creek										12
	Katy Creek										13
	Gold Ledge Mine										14
	Old Catholic Mission										15
	Ry. Great Northern RR. Bridge										16
	Kettle Falls Bridge		(highway)								17
	West Kettle Falls										18
	Hawks Nest		(hill)								19
	Kettle Falls		(town)								20
	Greenwood Grange										21
	Baptist Community Church										22
	Kettle Falls Grade School										23
	Kettle Falls High School										24
	Bible Tabernacle										25
	American Legion Hall										26
	Sacred Heart Church										27

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GEOGRAPHIC NAMES

Survey No. T-8766

8

GEOGRAPHIC NAMES											
Survey No. T-8766											
8											
2 Name on Survey		A	B	C	D	E	F	G	H	K	
		On Chart No.	On previous survey No.	On U. S. quadrangle Maps	From local information	On local Maps	P. O. Guide or Map	Rand McNally Atlas	U. S. Light List		
Great Northern <u>Round House</u>											1
<u>Colville River</u>											2
<u>Columbia Lumber Company</u>											3
<u>Colville Flats</u>		is a name used by Light List, but not for a distinct feature.									4
											5
<u>Marcus Flat</u>		Names report for area states that former low ground bearing this name is now flooded, but name continues in local use for a section of the new lake. To be applied only as shown on sheet.									6
											7
											8
											9
		Names underlined in red are approved. 4/1/49 L. Heck									10
											11
											12
											13
											14
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Names underlined in red are approved. 4/1/49 L. Heck

GEOGRAPHIC NAMES

Survey No. T-8867

Name on Survey	A	B	C	D	E	F	G	H	K	
Washington	✓								USGB	1.
Stevens County	✓									2
Ferry County	✓									3
Franklin D. Roosevelt Lake	✓								USGB	4
Great Northern Railway	✓									5
U.S. No. 395/ State No. 3	✓									6
										7
Katy Creek	✓									8
Kettle River	✓									9
Deadman Creek	✓									10
Deadman Creek Road	✓									11
Boys	✓									12
Napoleon	✓									13
Kelly Hill	✓	Also applies to T-8868 (on junction)								14
Mattson Creek	✓									15
Doyle Creek	✓									16
Hedgson Creek	✓									17
Barstow	✓									18
Barstow School (Elem.)	✓									19
										20
										21
										22
										23
										24
										25
										26
										27

Names underlined in red
are approved. 4/5/49

L. Heck

GEOGRAPHIC NAMES

Survey No. T-8868

GEOGRAPHIC NAMES		Survey No. T-8868									
Name on Survey											
	A	B	C	D	E	F	G	H	K		
Washington	✓									USGB	1
Sevens County	✓										2
Franklin D. Roosevelt Lake	✓										3
State Highway No. 22	✓										4
Great Northern Railway	✓										5
											6
Pingston Creek	✓										7
Marcus	✓										8
Marcus Island	✓										9
Seven Devils	✓										10
Powell	✓										11
Powell Landing	✓										12
Currie Schbol (Abandoned)	✓										13
Evans	✓										14
Evans Lime Plant	✓										15
China Creek	✓										16
Bossburg	✓										17
Young America Mine	✓										18
Kelly Hill (see T-8867 (ISC-LTS))	✓										19
Names underlined in red are approved. 4/12/49 Heck.											20
											21
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GEOGRAPHIC NAMES

Survey No. T-8869

Name on Survey	A On Chart No.	B On previous survey No.	C On U. S. quadrangle Maps	D From local information	E On local Maps	F P. O. Guide or Map	G Rand McNally Atlas	H U. S. Light L	K	
<u>Washington</u>									USGB	1
<u>Stevens County</u>										2
<u>Franklin D. Roosevelt Lake</u>									USGB	3
<u>State No. 22</u>										4
<u>Great Northern Railway</u>										5
<u>Glasgo Lakes</u>										6
<u>Fifteenmile Creek</u>										7
<u>Fifteenmile Creek Road</u>										8
<u>Hope Creek</u>										9
<u>Flat Creek</u>										10
<u>Flat Creek Road</u>										11
<u>Ryan Creek</u>				omit: names report stated it is scarcely known and stream is only intermittent						12
										13
										14
										15
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										25
										26
										27

Names underlined in red are approved. 3/22/49 L. H. HICK

H-7693

See shoreline changes shown in red on
H-7693 affecting T-8868.

H-7695

See shoreline changes shown in red on
H-7695 affecting T-8866 + 68

Division of Photogrammetry
 Review Report of 69
 Shoreline Map Manuscripts T-8866 to T-8869
 (Area of the Sixth Radial Plot Ph-2(45))

Subject numbers not used in this review report have been adequately covered in other parts of the Descriptive Report

26. Control

All second-order triangulation stations had been adjusted from Grand Coulee Dam Grid values to Lambert Projection values (N.A. 1927 Datum); and all third-order stations (the CP series) had been adjusted from the same grid to Washington North Zone plane coordinate values.

A list of the recovered and the unrecovered stations appearing on the map manuscripts is attached to the Descriptive Report

The following stations were added to the map manuscripts during review:

<u>T-8866</u>	<u>T-8867</u>	<u>T-8868</u>	<u>T-8869</u>
None	Anderson I.S. (USBR) no date	Denman (USBR) 1936	None

CP-207 (T-8866) was not recovered and the recovery card recommended that the station be considered lost because of excavations made for re-locating the state highway in that vicinity. During review the map manuscript was carefully oriented over the photograph whose center fell near the station, and it was found that the station falls in a brush patch well removed from the highway bank. It is thought that a planned search would probably recover the station.

Bridges:

T-8866

Kettle Falls Highway (US 395; St. 3)
Bridge List (1941) P. 98: Fixed; 1 span; 300' hor. cl.
 59. Vert. cl. (HW) Reservoir Levels)
Descriptive Report (5th Plot) Fixed; 1 span; 301' hor. cl.
 62.6 Vert. cl. (HW) (1289.9 USBR Datum)

Kettle Falls Railway (Gt. Northern)
Bridge List (1941) P. 98: Fixed; 1 span; 456' hor. cl.
 45.5 Vert. cl. (HW) Reservoir Levels)
Descriptive Report (5th Plot) Fixed; 1 span; 450.2' hor. cl.
 47.5 Vert. cl. (HW) (1289.8 USBR Datum)

T-8867

Mouth of Kettle River, Railway (Gt. Northern)

Bridge List (1941) P.238: Fixed; 1 span; 128' hor.cl.; 35 vert.cl.
(Water surf elev. Reservoir 1290')

Descriptive Report 5th Plot: Fixed; 1 span; 137.8 Hor. cl.
37.9 vert. cl. (1289.8 USLR Datum)

Mouth of Kettle River Highway (no number)

Bridge List 1941 (P. 238): Fixed; 1 span; 128 Hor. cl.; 29' v.cl.
(Reservoir Elev. 1290')

Descriptive Report (5th plot): Fixed; 1 span; 127 Hor. Cl.; 33 v.cl.
(1289.8 USLR Datum)

South of Boyds, Railway (Gt. Northern)

Bridge List. (1941) P-238: Fixed; 1 span; 190' H. Cl.; 23 V.cl.
Reservoir Elev. 1292)

Descriptive Report (5th Plot) Fixed; 1 span; 195 H. cl.; 27.4v. cl.
(1289.8 USLR Datum)

37 Geographic Names:

Names added during review:

T-8868: Kelly Hill

A separate list (compiled by the Geographic Names Section) for each map manuscript is attached to this compound descriptive report.

43 Comparison with Previous Surveys

There are no earlier topographic surveys, and the hydrographic survey is in process.

44 Comparison with Existing Topographic Quadrangles

U.S.G.S. Marcus 1:125,000 ed. 1942

U.S.G.S. Colville 1:125,000 ed. 1933 repr. 1942

The rise of the water level in the area of Radial Plot 6 seems to have caused little change in stream width in T-8869, except at tributary entrants, due to the steepness of the original banks. The greatest lateral change is on the east side of the curve approximately three miles north of Bossburg, where it became necessary to move the railroad inland.

The present survey supercedes the quadrangles for shore-line and for near shore roads and railroads in those areas common to this Radial Plot (6th).

Reviewed by:

Lena T. Stevens

Lena T. Stevens

T-8866 31 Mar. 1949

T-8867 5 Apr. 1949

T-8868 12 Apr. 1949

T-8869 21 Apr. 1949

APPROVED BY:

L. V. Griffith

Chief, Review Section
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Chief, Div. of Coastal Surveys

Applied to Ch 6169- JFW 2/5/53