

Summary Table

UPALCO UNIT DAMS

DAM NAME	DATE	BUILDER	DAM TYPE	LENGTH	HEIGHT	WIDTH	COMMENTS
Kidney Lake Dam HAER No. UT-42-J	1918	Farnsworth Canal and Reservoir Company	Earth fill	630'	24'	14'	NRHP eligible under criteria B and C
Brown Duck Lake Dam HAER No. UT-42-B	1919	Farnsworth Canal and Reservoir Company	Earth fill	220'	15'	20'	NRHP noneligible
Island Lake Dam HAER No. UT-42-I	1919	Farnsworth Canal and Reservoir Company	Earth fill	250'	20'	18'	NRHP eligible under criteria B and C
* Farmers Lake Tunnel HAER No. UT-42-G	1920	Farmers Irrigation Company	Rock-cut tunnel	300'		18'	NRHP eligible under criteria B and C
Water Lily Lake Dam HAER No. UT-42-N	1920	Farmers Irrigation Company	Earth fill	64'	10'	4'	NRHP eligible under criteria B and C
Deer Lake Dam HAER No. UT-42-D	c1925	Farmers Irrigation Company	Earth fill	140'	18'	7'	NRHP noneligible
* Clements Lake Dam HAER No. UT-42-C	1926	Dry Gulch Irrigation Company	Earth fill	680'	13'	8'	NRHP eligible under criteria B and C
White Miller Lake Dam HAER No. UT-42-O	c1926	Farmers Irrigation Company	Rock and sod fill	105'	3'	2'	NRHP noneligible
Drift Lake Dam HAER No. UT-42-E	1928	Farmers Irrigation Company	Earth fill	235'	12'	5'	NRHP noneligible
Five Point Lake Dam HAER No. UT-42-H	1929	Farmers Irrigation Company	Earth fill	970'	41'	10'	NRHP noneligible
Bluebell Lake Dam HAER No. UT-42-A	1930	Farmers Irrigation Company	Earth fill	230'	8'	7'	NRHP noneligible
Superior Lake Dam HAER No. UT-42-L	1930	Farmers Irrigation Company	Earth fill	235'	17'	5'	NRHP noneligible
* Twin Pots Dam HAER No. UT-42-M	1931	Farnsworth Canal and Reservoir Company	Earth fill				NRHP eligible under criteria B and C
* Milk Lake Dam HAER No. UT-42-K	1935	Chester Hartman et al.	Grouted stone masonry	218'	12'	7'	NRHP eligible under criteria B and C
East Timothy Lake Dam HAER No. UT-42-F	1951	Moon Lake Water Users Association	Earth fill	1,390'	34'	15'	NRHP noneligible

* indicates NRHP eligible structure

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO

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2. NAME(S) OF STRUCTURE

Kidney Lake Dam

5. ORIGINAL USE

dam

7. CLASSIFICATION

SPEC STRUC: DAM: EARTHFILL

9	7	9	1
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9. RATING

10. DATE

1920

3. SITE ADDRESS (STREET & NO)

Upalco Unit, Central Utah Project
Ashley National Forest
4.7 miles north of Miners Gulch Campground

6. PRESENT USE

dam

8	UTM ZONE		EASTING				NORTHING				11. REGION					
	1	2	5	3	2	4	4	0	4	4	9	4	2	6	0	RMRO

4. CITY/VICINITY

Hanna vicinity

COUNTY

Duchesne

STATE

Utah

SCALE

1:24

1:62.5

OTHER

QUAD

NAME

Kidney Lake

12. OWNER/ADMIN ADDRESS

Moon Lake Water Users Association Roosevelt Utah 84066

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

dam length: 630 ft. construct: earth fill dam with stone riprap facing
dam height: 24 ft. lake area: 194.2 acres; 3,288 acre-foot maximum capacity; 20 vertical foot maximum drawdown
dam width : 14 ft. outlet : gated steel pipe

The Farnsworth Canal and Reservoir Company filed for irrigation water storage rights on three high mountain lakes - Kidney, Island and Brown Duck - in the Lake Fork River drainage in July 1915. The permits were approved by the State Engineer the following April and by November 1920 small-scale earth-fill dams had been constructed at all three lakes to raise and control the water levels. Located on a small tributary of the Lake Fork River, Kidney Lake is by far the largest of the reservoirs in the Brown Duck Basin. Its 630-foot dam is the longest of the three and is built using typical earth fill construction with sloped, riprap-covered faces. In 1977 the original outlet works, with a cribbed log support structure, were replaced with the current inclined steel pipe outlet and screw. It is proposed that the dam be breached to lower the lake to within three feet of its natural level.

14. CONDITION

EXCELLENT

GOOD

FAIR

DETERIORATED

RUINS

15. DANGER OF DEMOLITION?
(SPECIFY THREAT)

YES

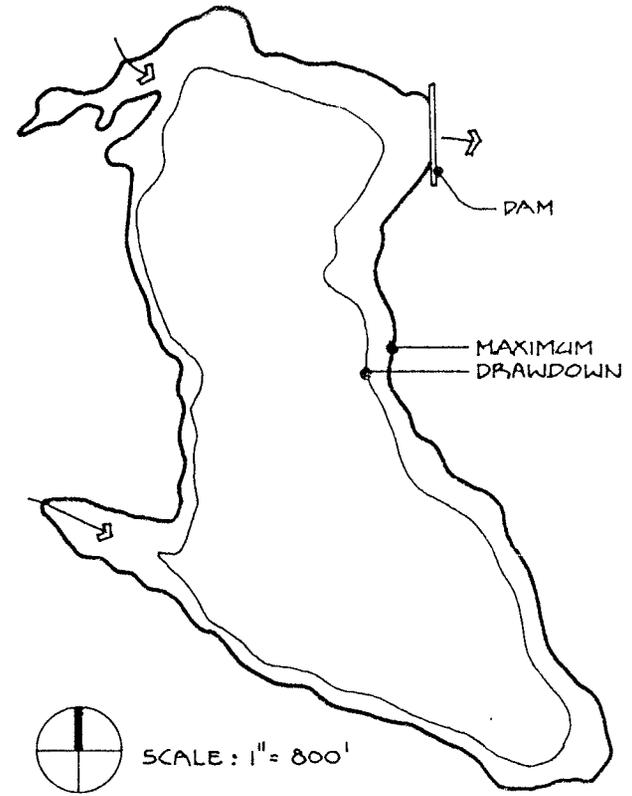
NO

UNKNOWN

16. SIGNIFICANCE

Kidney Lake is by far the largest of the reservoired high mountain lakes in the Upalco Unit of the Central Utah Project. One of three lakes in the Brown Duck Basin dammed by the Farnsworth Irrigation Company in 1920, its 630-foot dam is among the largest built in the Unit. The dam itself is representative and relatively well-preserved, but the recent replacement of the outlet mechanism has compromised its historical integrity.

17. PHOTOS AND SKETCH MAP OF LOCATION



18. LOCATED IN AN HISTORIC DISTRICT? YES NO NAME

19. PUBLIC ACCESSIBILITY YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

21. REFERENCES--HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1970), page 20.

William F. Gettleman, "Report on the Lakes and Reservoir on the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 20.

Field inspection by Clayton Fraser, 22 July 1985.

22. INVENTORIED BY
Clayton Fraser and James Jurale

AFFILIATION
Fraserdesign Loveland Colorado

DATE
20 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO													
2. NAME(S) OF STRUCTURE Farmers Lake Tunnel				5. ORIGINAL USE dam				7. CLASSIFICATION SPEC STRUC: TUNLS: ROCK-CUT				9. RATING 9 8 0 1	
3. SITE ADDRESS (STREET & NO) Upalco Unit, Central Utah Project Ashley National Forest 5.7 miles north of Swift Creek Campground				6. PRESENT USE dam				10. DATE				11. REGION RMRO	
4. CITY/VICINITY Mountain Home vicinity				COUNTY Duchesne				STATE Utah				SCALE 1:24 OTHER: 1:62.5	
12. OWNER/ADMIN ADDRESS Moon Lake Water Users Association				Roosevelt Utah 84066								QUAD NAME Mount Emmons Garfield Basin	

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

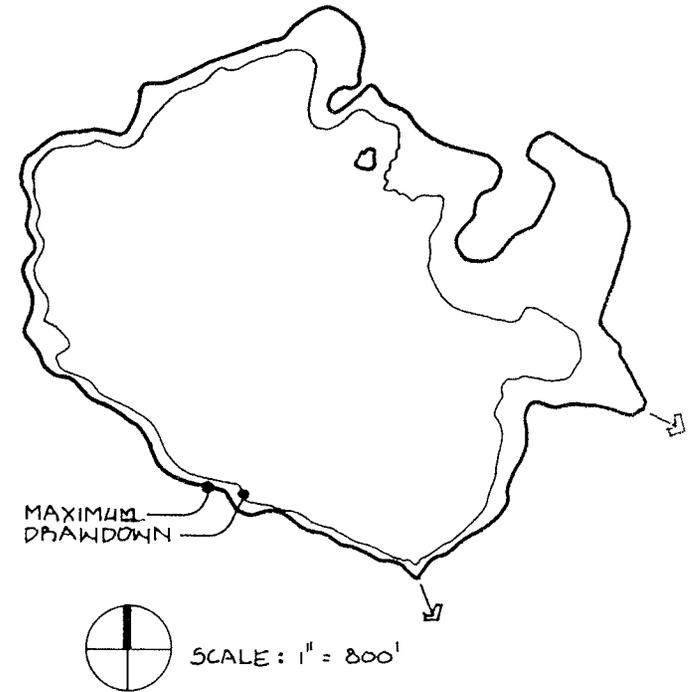
tunnel length: 300 ft. construct: rock-cut tunnel
tunnel width : 3 ft. lake size: 73 acres; 1327 acre-feet maximum capacity; 12.5 vertical feet maximum draw
outlet : 30" slide gate on outlet side of tunnel

On October 10, 1917, representatives of the Farmers Irrigation Company applied for 803 acre-feet of water from Farmers Lake, the largest in the Swift Creek drainage. The application was approved by the State Engineer in April 1919, and in September the Forest Service granted a special use permit to impound the water. Rather than build a typical earth-fill dam, the irrigation company drifted a tunnel through the rock of the terminal morrain on the southeast corner of the lake. Approximately 300 feet long and three feet wide, the tunnel lowered the natural lake level by 12.5 feet. The original shaft completed in 1920 later collapsed, and the access holes were filled and a second tunnel cut nearby. Although the shaft through solid stone remains in good condition, the outlet tunnel has been inoperable for several years, and the surface structures have been allowed to deteriorate. It is proposed that the tunnel be blocked to return the lake to its natural level.

14. CONDITION						15. DANGER OF DEMOLITION? (SPECIFY THREAT)					
<input type="checkbox"/> EXCELLENT	<input checked="" type="checkbox"/> GOOD	<input type="checkbox"/> FAIR	<input type="checkbox"/> DETERIORATED	<input type="checkbox"/> RUINS		<input type="checkbox"/> YES	<input checked="" type="checkbox"/> NO	<input type="checkbox"/> UNKNOWN			

16. SIGNIFICANCE

On the majority of the reservoirs in the Upalco Unit, the irrigation companies created storage by building dams to raise the natural high-water level of the lakes and cut drainage channels below the natural outlets. On only one reservoir - Farmers - no dam was built and the lake drawn down by tunnel. For this reason, the Farmers Lake tunnel is unique among the structures in the Unit. With a log grizzly at the inlet and a control gate at the outlet, the tunnel is a picturesque and technologically interesting structure.



18. LOCATED IN AN HISTORIC DISTRICT? YES NO NAME

19. PUBLIC ACCESSIBILITY YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

21. REFERENCES—HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1968), n.p.

William F. Gettleman, "Report on the Lakes and Reservoir of the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 27.

Farmers Lake Reservoir File, Ashley National Forest Roosevelt District Ranger Office, Roosevelt Utah.

Field inspection by Robert Righter, 29 July 1985.

22. INVENTORIED BY
Clayton Fraser and James Jurale

AFFILIATION
Fraserdesign Loveland Colorado

DATE
19 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO

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2. NAME(S) OF STRUCTURE

Superior Lake Dam

5. ORIGINAL USE

dam

7. CLASSIFICATION

SPEC STRUC: DAM: EARTHFILL

9	7	9	1
10. DATE			
1930			

9. RATING

10. DATE

1930

3. SITE ADDRESS (STREET & NO)

Upalco Unit, Central Utah Project
Ashley National Forest
12.4 miles northwest of Swift Creek Campgrd.

6. PRESENT USE

dam

8	UTM ZONE				EASTING				NORTHING				11. REGION				
1	2			5	4	4	5	4	0	4	5	0	8	5	4	0	RMRQ

4. CITY/VICINITY

Mountain Home vicinity

COUNTY

Duchesne

STATE

Utah

SCALE

1:24

1:62.5

OTHER

QUAD NAME

Garfield Basin

12. OWNER/ADMIN ADDRESS

Moon Lake Water Users Association Roosevelt Utah 84066

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

dam length: 235 ft. construct: earth fill dam with stone riprap facing
dam height: 17 ft. lake size: 42.4 acres; 359 acre-foot maximum capacity; 16 vertical foot maximum drawdown
dam width : 5 ft. outlet : gated steel pipe

On February 2, 1927, special use permits were issued by the National Forest Service to the Farmers Irrigation Company for the purpose of water storage on Superior and Five Point Lakes, two high mountain lakes in the Yellowstone River drainage. Located at an elevation of 11,160 feet, Superior was the higher of the two. It was composed of two shallow bodies of water in its natural state, with an outlet stream flowing east. The dam that the irrigation company built in 1930 along the southern edge effectively doubled the lake's surface area and diverted its outlet flow south into Five Point Lake. The dam is a small-scale earth-fill structure with sloped faces covered by stone riprap. In 1977, the Moon Lake Water Users Association rehabilitated the original cribbed log support structure for the outlet gate. The dam and gate remain. It is proposed to breach the dam by excavating a spillway through it, remove the timber crib and block the outlet pipe to lower the water to within five feet of its natural level.

14. CONDITION

EXCELLENT

GOOD

FAIR

DETERIORATED

RUINS

15. DANGER OF DEMOLITION?
(SPECIFY THREAT)

YES

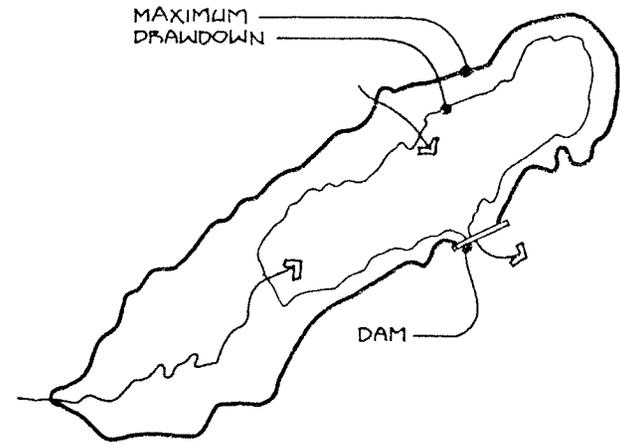
NO

UNKNOWN

16. SIGNIFICANCE

Superior Lake is one of several natural high mountain lakes in the Swift Creek and Yellowstone River drainages dammed by the Farmers Irrigation Company in the 1920s and 1930s to store water for irrigation. The dam is a representative example of small-scale earth-fill construction in the Upalco Unit of the Central Utah Project.

17. PHOTOS AND SKETCH MAP OF LOCATION



SCALE: 1" = 1000'

18. LOCATED IN AN HISTORIC DISTRICT? YES NO NAME

19. PUBLIC ACCESSIBILITY YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

21. REFERENCES—HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1970), page 40.

William F. Gettleman, "Report on the Lakes and Reservoir of the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 19.

Superior Lake Reservoir File, Ashley National Forest Roosevelt District Ranger Office, Roosevelt Utah.

Field inspection by Robert Righter, 28 July 1985.

22. INVENTORIED BY
Clayton Fraser and James Jurale

AFFILIATION
Fraserdesign Loveland Colorado

DATE
21 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO		5. ORIGINAL USE		7. CLASSIFICATION				9. RATING																													
Drift Lake Dam		dam		SPEC STRUC: DAM: EARTHFILL				9	7																												
3. SITE ADDRESS (STREET & NO)		6. PRESENT USE						10. DATE																													
Upalco Unit, Central Utah Project Ashley National Forest 11.4 miles northwest of Swift Creek Campgrd.		dam						1928																													
4. CITY/VICINITY		COUNTY		STATE		8. UTM ZONE				EASTING		NORTHING		11. REGION																							
Mountain Home vicinity		Duchesne		Utah		1		2		5		4		3		1		8		0		4		5		0		5		6		6		0		RMRO	
12. OWNER/ADMIN ADDRESS		SCALE		1:24		1:62.5		OTHER		QUAD NAME		Garfield Basin																									
Moon Lake Water Users Association		Roosevelt		Utah		84066																															

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

dam length: 235 ft. construct: earth fill dam with stone riprap facing
dam height: 12 ft. lake size: 24.8 acres; 197 acre-foot maximum capacity; 9 vertical foot maximum drawdown
dam width : 5 ft. outlet : gated steel pipe

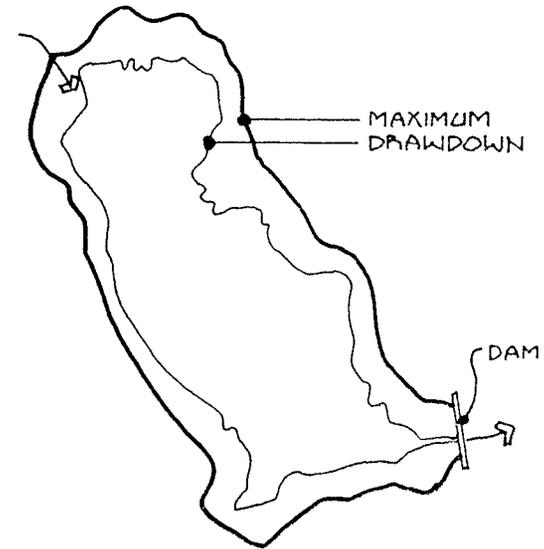
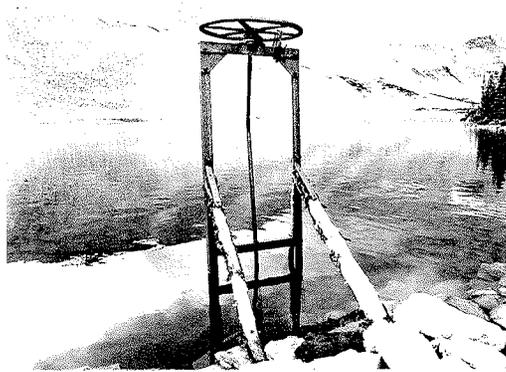
On July 21, 1926, the National Forest Service granted special use permits to the Farmers Irrigation Company for water storage rights on Bluebell and Drift Lakes, two high mountain lakes in the Yellowstone River drainage. Drift Lake, the smaller of the two, was an elongated natural pool, ¼ mile long and 300 yards at its widest point, located in a cirque at the base of a rock slide ridge. The Forest Service recommended that a 100-foot long by 7-foot high dam across the southeastern outlet of the lake would greatly increase its active storage capacity. The structure that the irrigation company completed in 1928 was over twice as long and 12 feet high, substantially increasing the lake's volume. The dam featured standard earth-fill construction, with a variable-slope upstream face covered with a layer of handplaced riprap stone. Its outlet was a 24" corrugated steel pipe with an upright screw-type gate. The original dam and outlet remain. It is proposed that the dam be breached and a spillway built through it to lower the water to within four feet of its natural level.

14. CONDITION	<input type="checkbox"/> EXCELLENT	<input checked="" type="checkbox"/> GOOD	<input type="checkbox"/> FAIR	<input type="checkbox"/> DETERIORATED	<input type="checkbox"/> RUINS	15. DANGER OF DEMOLITION? (SPECIFY THREAT)	<input type="checkbox"/> YES	<input checked="" type="checkbox"/> NO	<input type="checkbox"/> UNKNOWN
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16. SIGNIFICANCE

Drift Lake is one of several natural high mountain lakes in the Swift Creek and Yellowstone River drainages dammed by the Farmers Irrigation Company in the 1920s and 1930s to store water for irrigation. The dam is a representative example of small-scale earth-fill construction in the Upalco Unit of the Central Utah Project.

17. PHOTOS AND SKETCH MAP OF LOCATION



18. LOCATED IN AN HISTORIC DISTRICT? YES NO NAME

19. PUBLIC ACCESSIBILITY YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

21. REFERENCES—HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1970), page 29.

William F. Gettleman, "Report on the Lakes and Reservoir on the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 21.

Drift Lake Reservoir File (#5155), Ashley National Forest Roosevelt District Ranger Office, Roosevelt Utah.

Field inspection by Robert Righter, 28 July 1985.

22. INVENTORIED BY
Clayton Fraser and James Jurale

AFFILIATION
Fraserdesign Loveland Colorado

DATE
21 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO																																			
2. NAME(S) OF STRUCTURE Five Point Lake Dam										5. ORIGINAL USE dam					7. CLASSIFICATION SPEC STRUC: DAM: EARTHFILL					9. RATING															
3. SITE ADDRESS (STREET & NO) Upalco Unit, Central Utah Project Ashley National Forest 12.0 miles northwest of Swift Creek Campgrd.										6. PRESENT USE dam					9		7		9		1		10. DATE 1929												
4. CITY/VICINITY Mountain Home vicinity										COUNTY Duchesne					STATE Utah					8		UTM ZONE		EASTING					NORTHING					11. REGION RMRO	
12. OWNER/ADMIN ADDRESS Moon Lake Water Users Association										Roosevelt Utah 84066										SCALE 1:24 OTHER:					1:62.5					QUAD NAME Garfield Basin					

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

dam length: 970 ft. construct: earth fill dam with stone riprap facing
dam height: 14 ft. lake size: 82.6 acres; 607 acre-foot maximum capacity; 11 vertical foot maximum drawdown
dam width : 10 ft. outlet : gated steel pipe

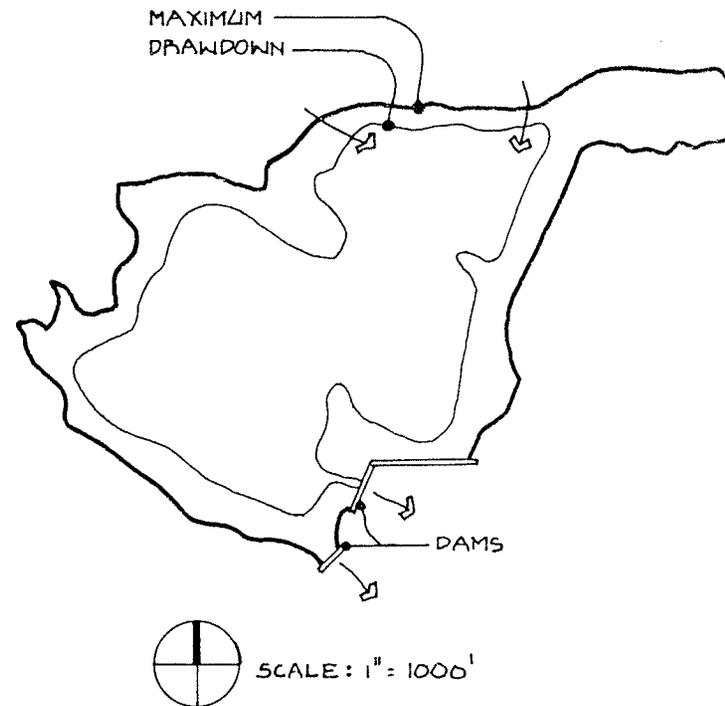
On February 2, 1927, special use permits were issued by the National Forest Service to the Farmers Irrigation Company for the purpose of water storage on Five Point and Superior Lakes, two high mountain lakes in the Yellowstone River drainage. On Five Point Lake, the company built two dams, a long V-shaped primary structure with a steel pipe outlet and a much smaller secondary dike, in 1929. The dams are earth fill, with sloped and riprapped upstream and downstream faces. The spillway is a natural rock saddle 300 feet south of the main outlet, with a concrete crest poured to minimize erosion. With a surface area of over 82 acres, Five Point is the largest reservoir in the Yellowstone drainage. With an aggregate crest length of almost 1,000 feet, the two dams in the lake's southeast corner constitute the longest retention structure in the basin. It is proposed to excavate a spillway through the dam and block the existing outlet to lower the water to within two feet of its natural level.

14. CONDITION										<input type="checkbox"/> EXCELLENT					<input checked="" type="checkbox"/> GOOD					<input type="checkbox"/> FAIR					<input type="checkbox"/> DETERIORATED					<input type="checkbox"/> RUINS					15. DANGER OF DEMOLITION? (SPECIFY THREAT)					<input type="checkbox"/> YES					<input checked="" type="checkbox"/> NO					<input type="checkbox"/> UNKNOWN				
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16. SIGNIFICANCE

Five Point Lake is the largest reservoir body of water in the Yellowstone drainage, and with a crest length of 970 feet, Five Point Lake dam is the second longest of the earthen dams in the Upalco Unit. A representative earth-fill structure with stone riprap facing, the dam is additionally notable because of the original construction equipment left on-site. Essentially unaltered and well-preserved, the Five Point Lake dam with its natural stone spillway is one of the most picturesque in the Unit.

17. PHOTOS AND SKETCH MAP OF LOCATION



18. LOCATED IN AN HISTORIC DISTRICT? YES NO NAME

19. PUBLIC ACCESSIBILITY YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

21. REFERENCES—HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1970), page 34.

William F. Gettleman, "Report on the Lakes and Reservoir of the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 23.

Five Point Lake Reservoir File (#5157), Ashley National Forest Roosevelt District Ranger Office, Roosevelt Utah.

Field inspection by Robert Righter, 27 July 1985.

22. INVENTORIED BY Clayton Fraser and James Jurale

AFFILIATION Fraserdesign Loveland Colorado

DATE 21 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO															
2. NAME(S) OF STRUCTURE Water Lily Lake Dam				5. ORIGINAL USE dam		7. CLASSIFICATION SPEC STRUC: DAM: EARTHFILL						9. RATING 9 7 9 1			
3. SITE ADDRESS (STREET & NO) Upalco Unit, Central Utah Project Ashley National Forest 1.1 mile northeast of Swift Creek Campgrd.				6. PRESENT USE dam								10. DATE 1920			
4. CITY/VICINITY Mountain Home vicinity				COUNTY Duchesne		STATE Utah		8. UTM ZONE 1 2		EASTING 5 5 7 6 4 0		NORTHING 4 4 8 8 0 4 0		11. REGION RMRO	
12. OWNER/ADMIN ADDRESS Moon Lake Water Users Association				Roosevelt Utah 84066				SCALE 1:24 OTHER: _____		1:62.5		QUAD NAME Burnt Mill Spring			

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

dam length: 64 ft. construct: earth fill dam with stone riprap facing
dam height: 10 ft. lake size: 22.2 acres; 470 acre-foot maximum capacity; 3 vertical foot maximum drawdown
dam width : 4 ft. outlet : gated pipe

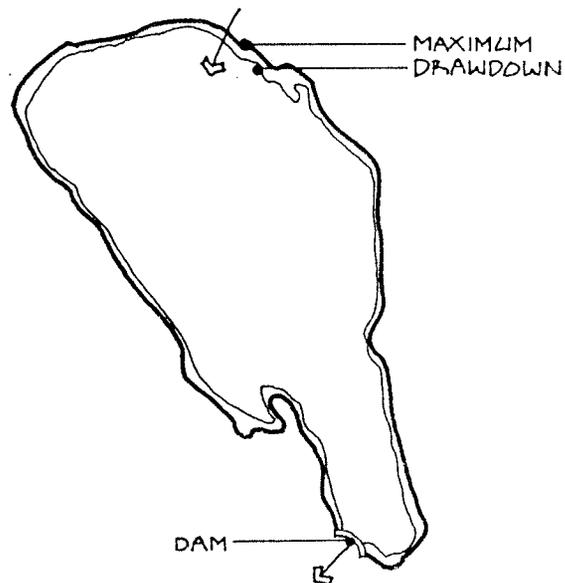
Located at the head of a small creek at an altitude of approximately 9600 feet, Water Lily Lake is the lowest of the impounded lakes in the Swift Creek drainage. Its outlet tumbles down 1300 feet of descent to Swift Creek about one-half mile north of its confluence with the Yellowstone River. On January 25, 1918, the Farmers Irrigation Company filed for irrigation water storage rights totaling 723 acre-feet from Water Lily Lake. The permit was approved by the State Engineer the following April, but the National Forest Service had already granted a special use permit to build a dam in November 1918. By 1920, the company had completed the small-scale earth-fill dam over the outlet at the south point of the lake. Fed by an extremely small drainage area, Water Lily was limited in its active storage capacity. It was reported unused in 1932 and again in 1954. Today the lake is drained by a 24" diameter concrete outlet pipe with an upright (and inoperable) upright headgate. The dam is choked with debris by beavers, which have repaired a partial breach in the wall. It is proposed that the breach be further repaired and the outlet be blocked to return the lake to its natural state.

14. CONDITION						15. DANGER OF DEMOLITION? (SPECIFY THREAT)									
<input type="checkbox"/> EXCELLENT		<input type="checkbox"/> GOOD		<input type="checkbox"/> FAIR		<input checked="" type="checkbox"/> DETERIORATED		<input type="checkbox"/> RUINS		<input type="checkbox"/> YES		<input checked="" type="checkbox"/> NO		<input type="checkbox"/> UNKNOWN	

16. SIGNIFICANCE

The Water Lily Lake dam is the oldest man-made structure to reservoir a natural lake in the Swift Creek drainage. With a crest length of 64 feet, it is the smallest of the dams in the Upalco Unit of the Central Utah Project. The reservoir was never a water storage success and has reverted to near a natural state. Long left unused, the dam on Water Lily Lake has deteriorated significantly and no longer functions to impound water for active storage.

17. PHOTOS AND SKETCH MAP OF LOCATION



18. LOCATED IN AN HISTORIC DISTRICT? YES NO NAME

19. PUBLIC ACCESSIBILITY YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

21. REFERENCES—HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1968), n.p.

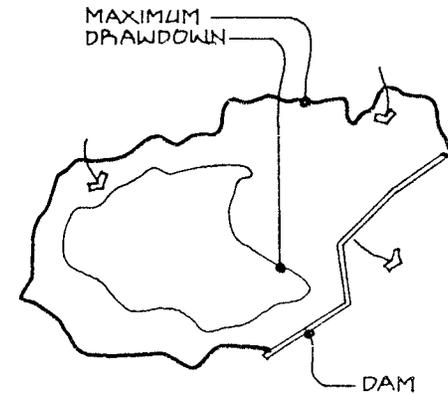
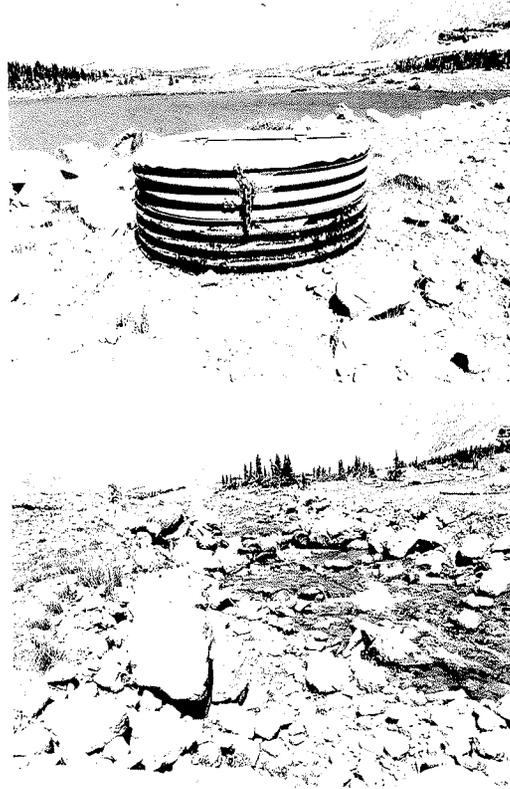
William F. Gettleman, "Report on the Lakes and Reservoir of the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 24.

Water Lily Lake Reservoir File (#5163), Ashley National Forest Roosevelt District Ranger Office, Roosevelt Utah. Field inspection by Robert Righter, 27 July 1985.

22. INVENTORIED BY
Clayton Fraser and James Jurale

AFFILIATION
Fraserdesign Loveland Colorado

DATE
19 October 1985



18 LOCATED IN AN HISTORIC DISTRICT?

 YES NO NAME

19 PUBLIC ACCESSIBILITY

 YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS

 NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

21 REFERENCES—HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1968), n.p.

William F. Gettleman, "Report on the Lakes and Reservoir of the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 25.

East Timothy Lake Reservoir File (#5161), Ashley National Forest Roosevelt District Ranger Office, Roosevelt Utah. Field inspection by Robert Righter, 29 July 1985.

22. INVENTORIED BY

Clayton Fraser and James Jurale

AFFILIATION

Fraserdesign Loveland Colorado

DATE

19 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO		5. ORIGINAL USE dam		7. CLASSIFICATION SPEC STRUC: DAM: EARTHFILL				9	7	9	1	9. RATING
2. NAME(S) OF STRUCTURE Bluebell Lake Dam		6. PRESENT USE dam										10. DATE 1930
3. SITE ADDRESS (STREET & NO) Upalco Unit, Central Utah Project Ashley National Forest 11.2 miles northwest of Swift Creek Campgrd.				8. UTM ZONE EASTING NORTHING				11. REGION RMRO				
4. CITY/VICINITY Mountain Home vicinity		COUNTY Duchesne		STATE Utah		SCALE 1:24 OTHER:		QUAD NAME Garfield Basin				
12. OWNER/ADMIN ADDRESS Moon Lake Water Users Association Roosevelt Utah 84066												

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

dam length: 230 ft. construct: earth fill dam with stone riprap facing
dam height: 8 ft. lake size: 47.2 acres; 258 acre-foot maximum capacity; 6 vertical foot maximum drawdown
dam width : 7 ft. outlet : gated steel pipe

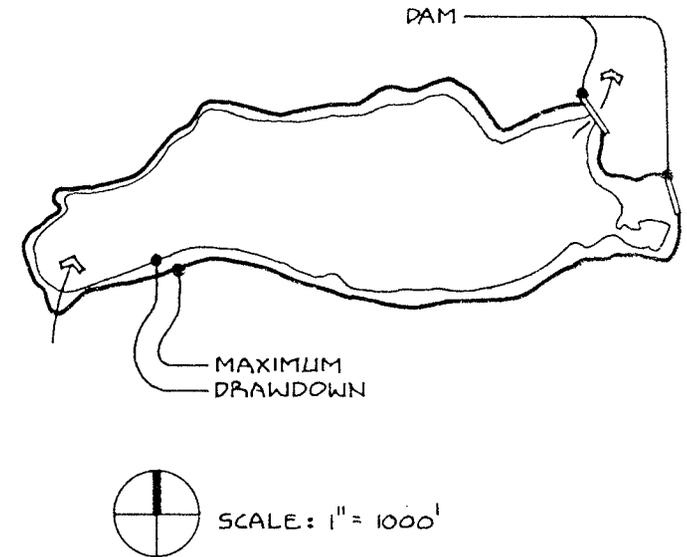
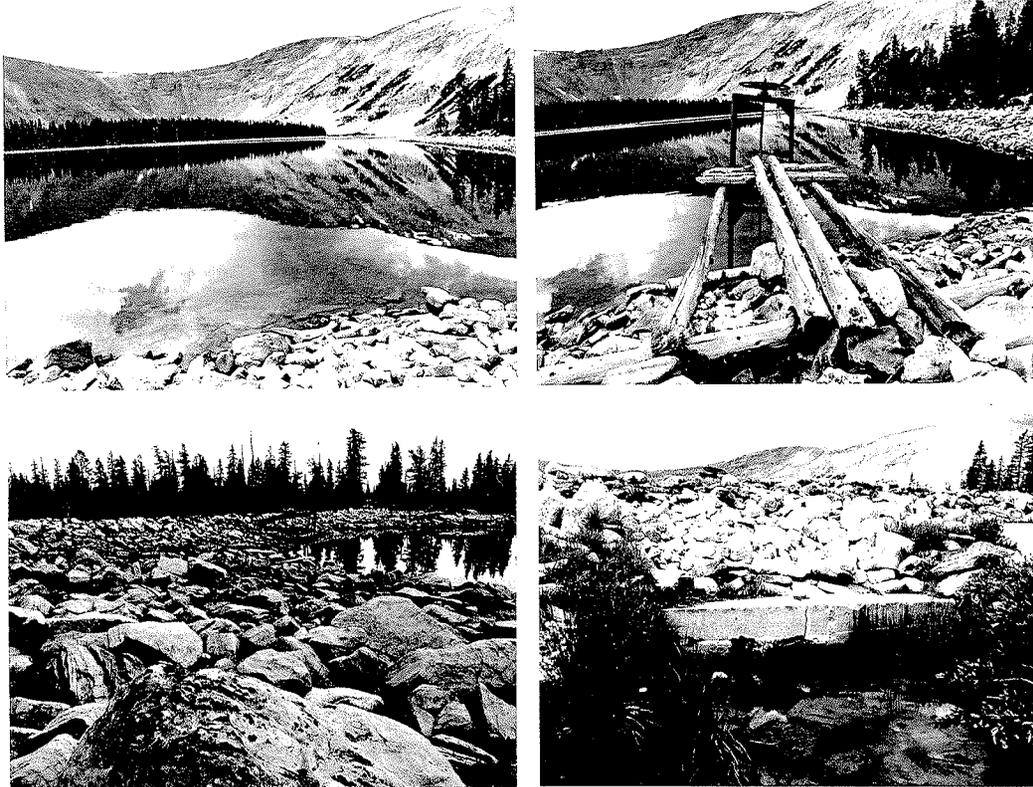
On July 21, 1926, the National Forest Service granted special use permits to the Farmers Irrigation Company for the water storage rights on Bluebell and Drift Lakes, two high mountain lakes in the Yellowstone River drainage. Both were natural pools located at the base of a rock slide ridge which forms the western wall of the Garfield Basin. The Forest Service recommended that a 200-foot long by 2-foot high dam across the northeastern outlet of Bluebell Lake would greatly increase its active storage capacity. The structure that the irrigation company completed in 1930 was similar in length, though taller than the recommended size, substantially increasing the lake's volume. The dam featured standard earth-fill construction, with a sloped upstream face covered with riprap stone and a steel pipe outlet with upright screw-type gate. The original dam and outlet remain. It is proposed that the dam be breached, a spillway built through it and the outlet blocked to return the water to its natural level.

14. CONDITION	<input type="checkbox"/> EXCELLENT	<input type="checkbox"/> GOOD	<input checked="" type="checkbox"/> FAIR	<input type="checkbox"/> DETERIORATED	<input type="checkbox"/> RUINS	15. DANGER OF DEMOLITION? (SPECIFY THREAT)	<input type="checkbox"/> YES	<input checked="" type="checkbox"/> NO	<input type="checkbox"/> UNKNOWN
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16. SIGNIFICANCE

Bluebell Lake is one of several natural high mountain lakes in the Swift Creek and Yellowstone River drainages dammed by the Farmers Irrigation Company in the 1920s and 1930s to store water for irrigation. The dam is a representative example of small-scale earth-fill construction in the Upalco Unit of the Central Utah Project.

17 PHOTOS AND SKETCH MAP OF LOCATION



18. LOCATED IN AN HISTORIC DISTRICT? YES NO NAME

19. PUBLIC ACCESSIBILITY YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

21. REFERENCES—HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1970), page 25.

William F. Gettleman, "Report on the Lakes and Reservoir of the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 22.

Bluebell Lake Reservoir File (#5151), Ashley National Forest Roosevelt District Ranger Office, Roosevelt Utah.

Field inspection by Robert Righter, 28 July 1985.

22. INVENTORIED BY Clayton Fraser and James Jurale

AFFILIATION Fraserdesign Loveland Colorado

DATE 21 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO																
2. NAME(S) OF STRUCTURE Twin Pots Dam				5. ORIGINAL USE dam		7. CLASSIFICATION SPEC STRUC: DAM: EARTHFILL				9	7	9	1	9	1	eligible
3. SITE ADDRESS (STREET & NO) Upalco Unit, Central Utah Project Uintah and Ouray Indian Reservation 10.1 miles north of Mountain Home				6. PRESENT USE dam												
4. CITY/VICINITY Mountain Home vicinity				COUNTY Duchesne		STATE Utah		SCALE 1:24 OTHER:		1:62.5		QUAD NAME Lake Fork Mtn.				
12. OWNER/ADMIN ADDRESS Moon Lake Water Users Association Roosevelt Utah 84066																

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

Following the drought years of 1919 and 1920, stockholders of the Farnsworth Canal and Reservoir Company approved the construction of the Twin Pots Dam to store water for irrigation. The reservoir, located on the west bank of the Lake Fork River about four miles downstream from Moon Lake, was situated in a large grassy natural bowl. This was not an existing lake like the other water storage reservoirs in the Upalco Unit, but a reservoir which was created by building an earth-fill dam across the natural outlet on the bowl's north end. The land occupied by the reservoir was purchased from the U.S. Bureau of Indian Affairs, and the Utah State Engineer approved filings to store water on it. Farnsworth contracted with Austin G. Burton, a shareholder in the company, to engineer the dam. The small structure completed in 1921 was constructed of dirt-fill with sorted rock. Without a compacted clay core, it was too porous, however, and burst in 1927. A new clay-core dam was completed on the site in 1931 for a reported cost of \$40,000. Still leaking, the Twin Pots Dam remains in functional condition today.

14. CONDITION						15. DANGER OF DEMOLITION? (SPECIFY THREAT)					
<input type="checkbox"/> EXCELLENT	<input checked="" type="checkbox"/> GOOD	<input type="checkbox"/> FAIR	<input type="checkbox"/> DETERIORATED	<input type="checkbox"/> RUINS		<input type="checkbox"/> YES	<input checked="" type="checkbox"/> NO	<input type="checkbox"/> UNKNOWN			

16. SIGNIFICANCE

At the time of its initial construction in 1921, the Twin Pots Dam not only held the largest body of impounded water in the Upalco Unit, it was the first successful attempt to impound running water and create a man-made reservoir. The Twin Pots Reservoir produced a significant increase of irrigation water storage for the Farnsworth Company and allowed the expansion of farming in the Mountain Home area, served by the Farnsworth Canal. The reconstructed dam is an undistinguished, but representative, example of the relatively unsophisticated earth-fill dam technology found in the Uinta Mountains.

17. PHOTOS AND SKETCH MAP OF LOCATION



18. LOCATED IN AN HISTORIC DISTRICT?

YES NO NAME

19. PUBLIC ACCESSIBILITY

YES, LIMITED YES, UNLIMITED
 NO UNKNOWN

20. EXISTING SURVEYS

NR NHL HABS HAER-1 HAER NPS STATE
 COUNTY LOCAL OTHER

21. REFERENCES—HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

Albert E. Blood, "Report on Application for Special Use Permit," dated 17 June 1921, Twin Pots Overflow File, ANFRDRO, Roosevelt, Utah.

Planning Support Group for the BIA, "The Uintah and Ouray Indian Reservation; Its Resources, Development Potential," Billings Montana, 4 February 1974, "Report No. 214," Miscellaneous files, UIP Warehouse, Fort Duchesne, Utah, page 82.

Field inspection by Clayton Fraser, 22 July 1985.

22. INVENTORIED BY

Clayton Fraser and James Jurale

AFFILIATION

Fraserdesign

DATE

20 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO																					
2. NAME(S) OF STRUCTURE White Miller Lake Dam										5. ORIGINAL USE dam					7. CLASSIFICATION SPEC STRUC: DAM: ROCKFILL					9. RATING 9 7 9 2	
3. SITE ADDRESS (STREET & NO) Upalco Unit, Central Utah Project Ashley National Forest 6.9 miles north of Swift Creek Campground										6. PRESENT USE dam										10. DATE c1926	
4. CITY/VICINITY Mountain Home vicinity										COUNTY Duchesne					STATE Utah					11. REGION RMRO	
12. OWNER/ADMIN ADDRESS Moon Lake Water Users Association										Roosevelt					Utah 84066						

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

dam length: 105 ft. construct: stacked fieldstone rockfill dam
dam height: 3 ft. lake size: 10.0 acres; 77 acre-foot maximum capacity; 1.7 vertical foot maximum drawdown
dam width: 2 ft. outlet: log weir

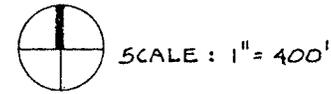
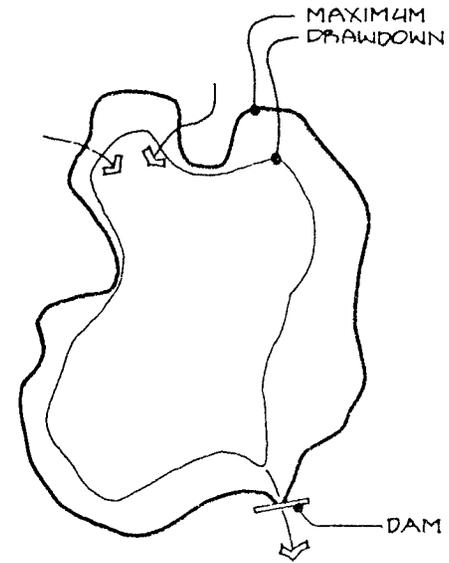
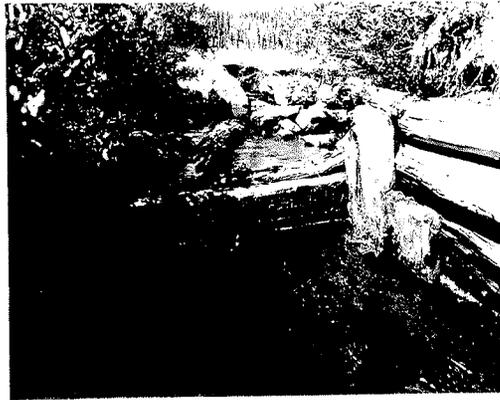
On September 4, 1926, the National Forest Service issued a special use permit to the Farmers Irrigation Company for "constructing and maintaining a dam and storing water for irrigation purposes" on White Miller Lake in the Swift Creek drainage. A small - approximately 10 acres - shallow lake, White Miller receives flow from Farmers Lake and drains into Deer Lake, two other Farmers Irrigation Company reservoirs. The 105-foot dam built across the natural outlet on the south point of the lake was a rudimentary structure consisting of stacked fieldstones and sod, with a cribbed log outlet weir. Only three feet high, the dam is the least substantial among those in the Upalco Unit. In 1959 it was abandoned. Today, dam and outlet are deteriorated and overgrown; the lake's size has been reduced by encroachment from the peat meadow which surrounds it. It is proposed that the original outlet works be removed and the lake be returned to its natural level.

14. CONDITION										15. DANGER OF DEMOLITION? (SPECIFY THREAT)									
<input type="checkbox"/> EXCELLENT <input type="checkbox"/> GOOD <input type="checkbox"/> FAIR <input checked="" type="checkbox"/> DETERIORATED <input type="checkbox"/> RUINS										<input type="checkbox"/> YES <input checked="" type="checkbox"/> NO <input type="checkbox"/> UNKNOWN									

16. SIGNIFICANCE

White Miller Lake is one of several natural high mountain lakes dammed by the Farmers Irrigation Company in the 1920s and 1930s to store water for irrigation. The dam is a representative example of small-scale, unsophisticated construction in the Upalco Unit of the Central Utah Project.

17 PHOTOS AND SKETCH MAP OF LOCATION



18. LOCATED IN AN HISTORIC DISTRICT? YES NO NAME

19. PUBLIC ACCESSIBILITY YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

21. REFERENCES - HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1968), n.p.

William F. Gittleman, "Report on the Lakes and Reservoir of the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 23.

White Miller Lake Reservoir File (#5163), Ashley National Forest Roosevelt District Ranger Office, Roosevelt Utah. Field inspection by Robert Righter, 31 July 1985.

22. INVENTORIED BY
Clayton Fraser and James Jurale

AFFILIATION
Fraserdesign Loveland Colorado

DATE
19 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO								5. ORIGINAL USE	7. CLASSIFICATION	9. RATING			
2. NAME(S) OF STRUCTURE	Milk Lake Dam	5. ORIGINAL USE	dam	7. CLASSIFICATION	SPEC STRUC: DAM: MASONRY	9	7	9	0	9. RATING			
3. SITE ADDRESS (STREET & NO)	Upalco Unit, Central Utah Project Ashley National Forest 9.4 miles northwest of Swift Creek Campgrd.	6. PRESENT USE	dam	8. UTM ZONE	EASTING	NORTHING	10. DATE	1935	11. REGION	RMRO			
4. CITY/VICINITY	Mountain Home vicinity	COUNTY	Duchesne	STATE	Utah	SCALE	1:24	1:62.5	QUAD NAME	Garfield Basin			
12. OWNER/ADMIN ADDRESS	Moon Lake Water Users Association	Roosevelt Utah	84066										

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

dam length: 218 ft. construct: grouted fieldstone dam with stone riprap facing on downstream side
dam height: 12 ft. lake size: 21.9 acres; 195 acre-foot maximum capacity; 9 vertical foot maximum drawdown
dam width : 7 ft. outlet : gated steel pipe

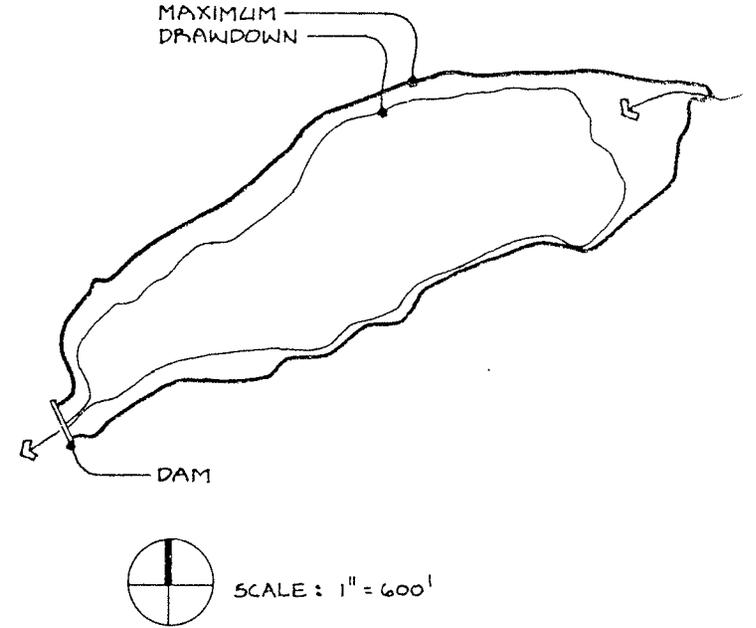
Milk Lake, an isolated body of water in the Yellowstone River drainage, is situated in a glacial cirque on the west side of the divide that separates the Yellowstone from the Swift Creek drainage. In August 1931, Chester Hartman, George Rogers and S.K. Daniels filed an application for a special use permit to store irrigation water on Milk Lake. Despite warnings by National Forest Service staff, the partners had by then already begun construction on a small-scale dam at the west end of the lake, and by 1935 it was completed. The permit was finally granted by the Forest Service in July 1938. Once described as "one of the best projects in the district," the Milk Lake dam was a grouted masonry structure with a sloped and riprapped downstream face. It began to leak in 1939 and burst in 1940. The breach repaired, the dam functioned until 1973, when continual structural and administrative problems prompted the Forest Service to withdraw the permit. The structure has begun to leak again, and it is proposed to demolish it to lower the water to its natural level.

14. CONDITION	<input type="checkbox"/> EXCELLENT	<input type="checkbox"/> GOOD	<input checked="" type="checkbox"/> FAIR	<input type="checkbox"/> DETERIORATED	<input type="checkbox"/> RUINS	15. DANGER OF DEMOLITION? (SPECIFY THREAT)	<input checked="" type="checkbox"/> YES	<input type="checkbox"/> NO	<input type="checkbox"/> UNKNOWN
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16. SIGNIFICANCE

Situated picturesquely on the western tip of Milk Lake at the base of a steep mountainside, the Milk Lake dam is perhaps the most visually striking of the Upalco Unit dams. It is technologically significant as the only grouted stone masonry dam in the Unit. Beset by structural problems since its completion and the subject of numerous Forst Service complaints, the dam's checkered history makes it appropriate as a symbol of Forest Service leniency and permittee noncompliance.

17 PHOTOS AND SKETCH MAP OF LOCATION



18 LOCATED IN AN HISTORIC DISTRICT? YES NO NAME

19 PUBLIC ACCESSIBILITY YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

21 REFERENCES—HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1968), n.p.

Milk Lake Reservoir File, Ashley National Forest Roosevelt District Ranger Office, Roosevelt Utah.

Field inspection by Robert Richter, 29 July 1985.

22 INVENTORIED BY Clayton Fraser and James Jurale

AFFILIATION Fraserdesign Loveland Colorado

DATE 19 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO		5. ORIGINAL USE dam		7. CLASSIFICATION SPEC STRUC: DAM: EARTHFILL				9	7	9	1	9. RATING																									
2. NAME(S) OF STRUCTURE Island Lake Dam		6. PRESENT USE dam										10. DATE 1920																									
3. SITE ADDRESS (STREET & NO) Upalco Unit, Central Utah Project Ashley National Forest 4.8 miles north of Miners Gulch Campground				8. UTM ZONE				EASTING				NORTHING				11. REGION																					
4. CITY/VICINITY Hanna vicinity		COUNTY Duchesne		STATE Utah		SCALE				1:24				1:62.5				QUAD NAME Kidney Lake																			
12. OWNER/ADMIN ADDRESS Moon Lake Water Users Association		Roosevelt		Utah		1		2		5		3		3		6		4		0		4		4		9		4		3		4		0		RMRO	

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

dam length: 250 ft. construct: earth fill dam with stone riprap facing
dam height: 20 ft. lake size: 60.7 acres; 757 acre-foot maximum capacity; 14 vertical foot maximum drawdown
dam width : 18 ft. outlet : gated steel pipe

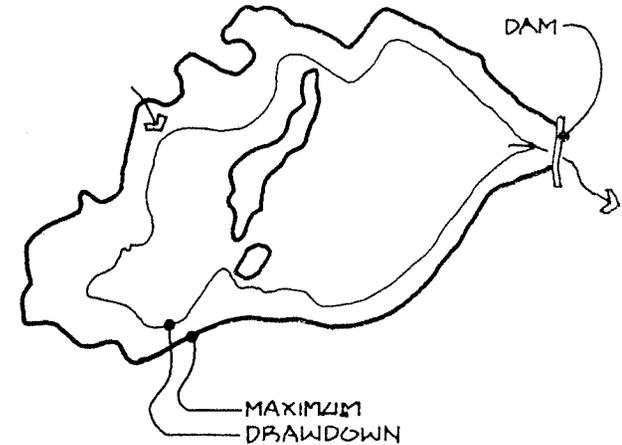
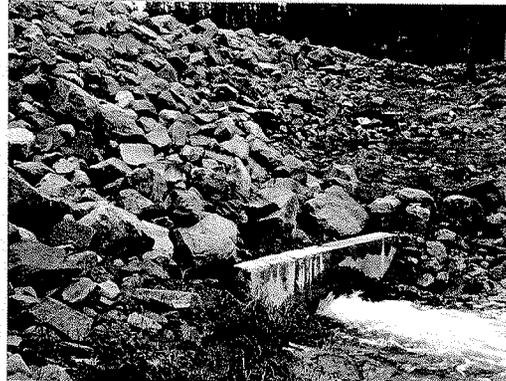
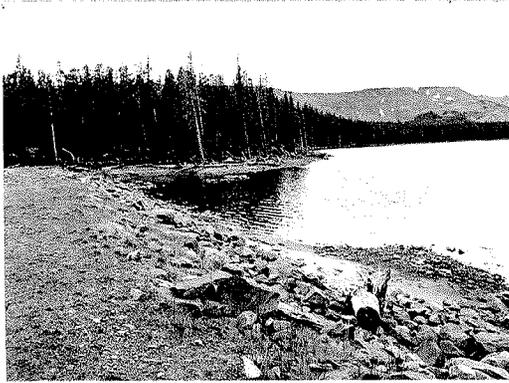
The Farnsworth Canal and Reservoir Company filed for irrigation water storage rights on three high mountain lakes - Island, Kidney and Brown Duck - in the Lake Fork River drainage in July 1915. The permits were approved by the State Engineer the following April and by November 1920 small-scale earth-fill dams had been completed at all three lakes to raise and control the water levels. Damming Island Lake changed its character significantly. Originally two smaller natural lakes located on a tributary of the Lake Fork River, these were joined into a single reservoir with an island near the center by the higher water. The dam featured typical earth-fill construction, with sloped, riprap-covered faces and an inclined steel gate over a 40" corrugated steel outlet pipe. The outlet works were replaced in 1977 with the current inclined steel outlet pipe and screw. It is proposed that the dam be breached to lower the lake to within two feet of its natural level.

14. CONDITION	<input type="checkbox"/> EXCELLENT	<input checked="" type="checkbox"/> GOOD	<input type="checkbox"/> FAIR	<input type="checkbox"/> DETERIORATED	<input type="checkbox"/> RUINS	15. DANGER OF DEMOLITION? (SPECIFY THREAT)	<input type="checkbox"/> YES	<input checked="" type="checkbox"/> NO	<input type="checkbox"/> UNKNOWN
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16. SIGNIFICANCE

Island Lake is one of three high mountain lakes in the Brown Duck Basin dammed by the Farnsworth Canal and Reservoir Company in 1920. The dam itself is representative and relatively well-preserved, but the replacement of the outlet mechanism has compromised its historical integrity.

17. PHOTOS AND SKETCH MAP OF LOCATION



18. LOCATED IN AN HISTORIC DISTRICT? YES NO NAME

19. PUBLIC ACCESSIBILITY YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

21. REFERENCES—HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1970), page 15.

William F. Gettleman, "Report on the Lakes and Reservoir on the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 20.

Field inspection by Clayton Fraser, 22 July 1985.

22. INVENTORIED BY
Clayton Fraser and James Jurale

AFFILIATION
Fraserdesign Loveland Colorado

DATE
20 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO

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2. NAME(S) OF STRUCTURE

Clements Lake Dam

5. ORIGINAL USE

dam

7. CLASSIFICATION

SPEC STRUC: DAM: EARTHFILL

9. RATING

eligible

10. DATE

1926

3. SITE ADDRESS (STREET & NO)

Upalco Unit, Central Utah Project
Ashley National Forest
6.5 miles north of Miners Gulch Campground

6. PRESENT USE

dam

8.	UTM ZONE	EASTING	NORTHING	11. REGION
	1 2	5 3 4 9 2 0	4 4 9 7 2 8 0	

4. CITY/VICINITY

Hanna vicinity

COUNTY

Duchesne

STATE

Utah

SCALE

1:24

1:62.5

OTHER

QUAD NAME

Oweep Creek

12. OWNER/ADMIN ADDRESS

Moon Lake Water Users Association Roosevelt Utah 84066

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

dam length: 680 ft. construct: earth fill dam with stone riprap facing
dam height: 13 ft. lake size: 80.5 acres; 649 acre-foot maximum capacity; 10 vertical foot maximum drawdown
dam width: 8 ft. outlet : gated steel pipe

Located at an elevation of 10,440 feet, approximately 3½ miles north of Brown Duck Lake, Clements Lake is the highest of the four Lake Fork River reservoirs and is located closest to the headwaters of the watershed in the Brown Duck Basin. The lake draws from a densely forested drainage of 1,273 acres. In 1921, the Forest Service granted the Dry Gulch Irrigation Company a special use permit to impound water for irrigation on the lake. Later that year, the company built a small log dam across the lake's natural outlet on its east side to prove up on the water. In 1926, Dry Gulch employed engineer Louis Galloway to survey the dam site and blaze a pack trail from the trailhead at Moon Lake. Using equipment packed on horseback, the Dry Gulch crew built the dam that year. With a crest length of 680 feet, the Clements Lake Dam is the longest in the basin. It displays typical clay core/earth fill construction, with its upstream face covered with a single layer of flat stones and the lower face with stone riprap. It is proposed that the dam be breached, a spillway formed at its center, and the outlet pipe blocked to lower the lake to its natural level.

14. CONDITION

EXCELLENT

GOOD

FAIR

DETERIORATED

RUINS

15. DANGER OF DEMOLITION?
(SPECIFY THREAT)

YES

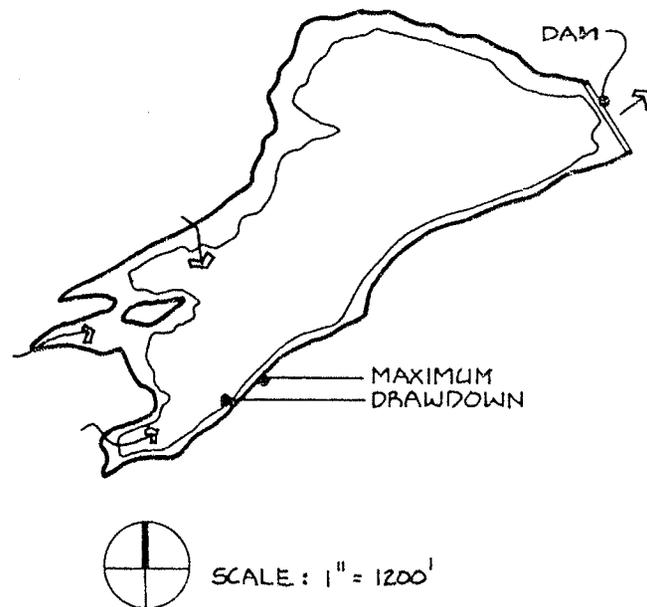
NO

UNKNOWN

16. SIGNIFICANCE

The largest of the Brown Duck Basin dams, the Clements Lake is a representative, though undistinguished, example of clay core/earth fill dam technology found in the Upalco Unit. Its principal significance derives from its association with the Dry Gulch Irrigation Company. With by far the most extensive network of canals and laterals, Dry Gulch was the largest and most important irrigation company in the Uinta Basin. The company impounded five lakes in the Uintah Unit of the Central Utah Project, but Clements lake is the only Dry Gulch reservoir in the Lake Fork drainage. As such, it is an integral component of an historically important irrigation system.

17. PHOTOS AND SKETCH MAP OF LOCATION



18. LOCATED IN AN HISTORIC DISTRICT?

YES NO NAME

19. PUBLIC ACCESSIBILITY

YES, LIMITED YES, UNLIMITED
 NO UNKNOWN

20. EXISTING SURVEYS

NR NHL HABS HAER-1 HAER NPS STATE
 COUNTY LOCAL OTHER

21. REFERENCES--HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1970), page 10.

William F. Gettleman, "Report on the Lakes and Reservoir on the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 18.

Clements Lake Reservoir File (#5153), Ashley National Forest Roosevelt District Ranger Office, Roosevelt Utah.

Field inspection by Clayton Fraser, 22 July 1985.

22. INVENTORIED BY

Clayton Fraser and James Jurale

AFFILIATION

Fraserdesign

DATE

20 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO

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2. NAME(S) OF STRUCTURE

Deer Lake Dam

5. ORIGINAL USE

dam

7. CLASSIFICATION

SPEC STRUC: DAM: EARTHFILL

9. RATING

9	7	9	1
---	---	---	---

10. DATE

c1925

3. SITE ADDRESS (STREET & NO)

Upalco Unit, Central Utah Project
Ashley National Forest
5.8 miles north of Swift Creek Campground

6. PRESENT USE

dam

8.	UTM ZONE	EASTING	NORTHING
1	2	5 5 3 8 6 0	4 5 0 2 / 3 5 0

11. REGION

RMRO

4. CITY/VICINITY

Mountain Home vicinity

COUNTY

Duchesne

STATE

Utah

SCALE

1:24

1:62.5

OTHER

QUAD NAME

Mount Emmons

12. OWNER/ADMIN ADDRESS

Moon Lake Water Users Association Roosevelt Utah 84066

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXSTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

dam length: 140 ft. construct: earth fill dam with stone riprap facing
dam height: 18 ft. lake size: 11.0 acres; 249 acre-foot maximum capacity; 14 vertical foot maximum drawdown
dam width : 7 ft. outlet : gated pipe; timber weir spillway

On June 25, 1925, The National Forest Service issued a special use permit to the Farmers Irrigation Company for "constructing and maintaining a dam and storing water for irrigation purposes" on Deer Lake in the Swift Creek drainage. A small - approximately 8 acres - but relatively deep lake, Deer was limited in littoral area because of its narrow confines between two ridges. The lake receives flows from both White Miller and Farmers lakes - two other Farmers Irrigation Company reservoirs - and now acts as a regulating reservoir. The 140-foot long, 18-foot high dam is an earth-fill structure, with stone riprap on both the sloped upstream and downstream faces. It is drained by a 30" diameter gated steel pipe outlet, with a small timber weir for an overflow spillway. It is proposed that the dam be altered somewhat to return the lake to its natural level.

14. CONDITION

EXCELLENT

GOOD

FAIR

DETERIORATED

RUINS

15. DANGER OF DEMOLITION?
(SPECIFY THREAT)

YES

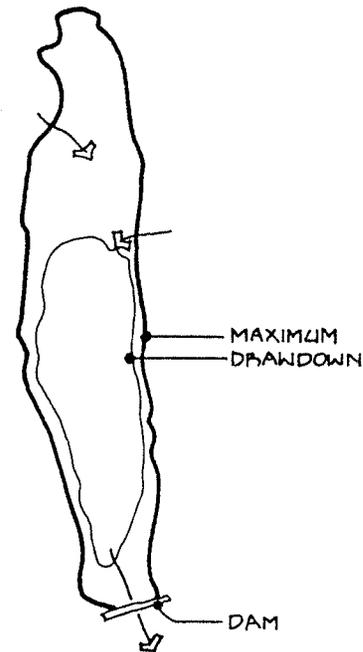
NO

UNKNOWN

16. SIGNIFICANCE

Deer Lake is one of several natural high mountain lakes in the Swift Creek and Yellowstone River drainages dammed by the Farmers Irrigation Company in the 1920s and 1930s to store water for irrigation. The dam is a representative example of small-scale earth-fill construction in the Upalco Unit of the Central Utah Project.

17. PHOTOS AND SKETCH MAP OF LOCATION



SCALE: 1" = 600'

18. LOCATED IN AN HISTORIC DISTRICT? YES NO NAME

19. PUBLIC ACCESSIBILITY YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

21. REFERENCES--HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1968), n.p.

William F. Gettleman, "Report on the Lakes and Reservoir of the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 20.

Deer Lake Reservoir File (#5154), Ashley National Forest Roosevelt District Ranger Office, Roosevelt Utah.

Field inspection by Robert Righter, 31 July 1985.

22. INVENTORIED BY
Clayton Fraser and James Jurale

AFFILIATION
Fraserdesign Loveland Colorado

DATE
19 October 1985

HABS/HAER INVENTORY

U.S. Department of the Interior
National Park Service
Washington, DC 20240

1. SITE I.D. NO		5. ORIGINAL USE	7. CLASSIFICATION	9. RATING
2. NAME(S) OF STRUCTURE Brown Duck Lake Dam		dam	SPEC STRUC: DAM: EARTHFILL	9 7 9 1
3. SITE ADDRESS (STREET & NO) Upalco Unit, Central Utah Project Ashley National Forest 4.4 miles north of Miners Gulch Campground		6. PRESENT USE dam		10. DATE 1920
4. CITY/VICINITY Hanna vicinity		COUNTY Duchesne	STATE Utah	11. REGION RMRO
12. OWNER/ADMIN ADDRESS Moon Lake Water Users Association Roosevelt Utah 84066		8. UTM ZONE 1 2	EASTING 5 3 4 0 5 0	NORTHING 4 4 9 3 5 8 0
		SCALE 1:24 OTHER	1:62.5	QUAD NAME Kidney Lake

13. DESCRIPTION AND BACKGROUND HISTORY INCLUDING CONSTRUCTION DATE(S), PHYSICAL DIMENSIONS, MATERIALS, MAJOR ALTERATIONS, EXTANT EQUIPMENT, AND IMPORTANT BUILDERS, ARCHITECTS, ENGINEERS, ETC.

dam length: 220 ft. construct: earth fill dam with stone riprap facing
dam height: 15 ft. lake size: 36.1 acres; 268 acre-foot maximum capacity
dam width : 20 ft. outlet : gated steel pipe; concrete spillway

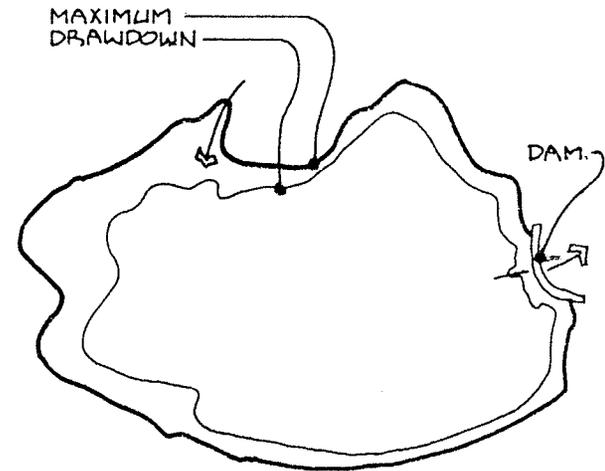
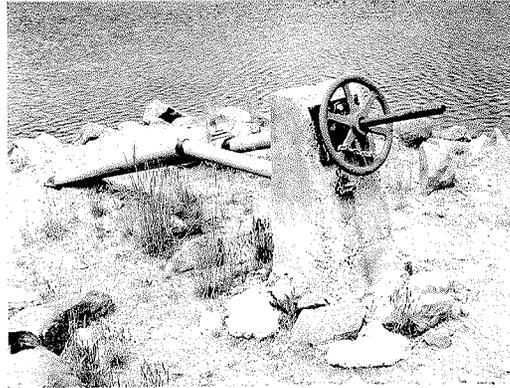
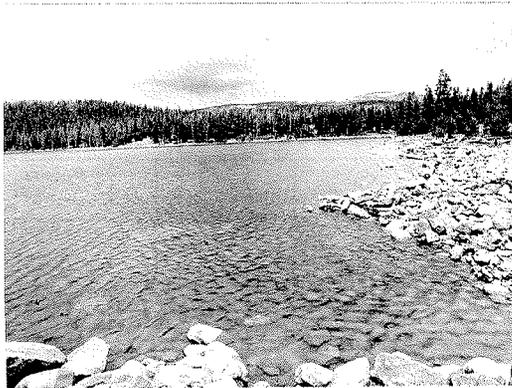
The Farnsworth Canal and Reservoir Company filed for irrigation water storage rights on three high mountain lakes - Brown Duck, Island and Kidney - in the Lake Fork River drainage in July 1915. The permits were approved by the State Engineer the following April and the small-scale earth-fill dams completed by November 1920. The lowest of the three lakes in the Brown Duck Basin, this reservoir receives water from the other two. With a surface area of 36 acres, Brown Duck is the smallest of the three lakes, and with a crest length of 220 feet, the retention structure is the shortest. The dam was partially breached in 1967; it has not functioned for agricultural water storage since. It remains in damaged and uncertain condition.

14. CONDITION	<input type="checkbox"/> EXCELLENT	<input type="checkbox"/> GOOD	<input checked="" type="checkbox"/> FAIR	<input type="checkbox"/> DETERIORATED	<input type="checkbox"/> RUINS	15. DANGER OF DEMOLITION? (SPECIFY THREAT)	<input type="checkbox"/> YES	<input checked="" type="checkbox"/> NO	<input type="checkbox"/> UNKNOWN
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16. SIGNIFICANCE

Brown Duck Lake is one of three high mountain lakes in the Brown Duck Basin dammed by the Farnsworth Canal and Reservoir Company in 1920. The dam itself is representative, though structurally damaged, and the recent replacement of the outlet mechanism has compromised its historical integrity.

17. PHOTOS AND SKETCH MAP OF LOCATION



SCALE: 1" = 600'

18. LOCATED IN AN HISTORIC DISTRICT? YES NO NAME

19. PUBLIC ACCESSIBILITY YES, LIMITED YES, UNLIMITED NO UNKNOWN

20. EXISTING SURVEYS NR NHL HABS HAER-1 HAER NPS STATE COUNTY LOCAL OTHER

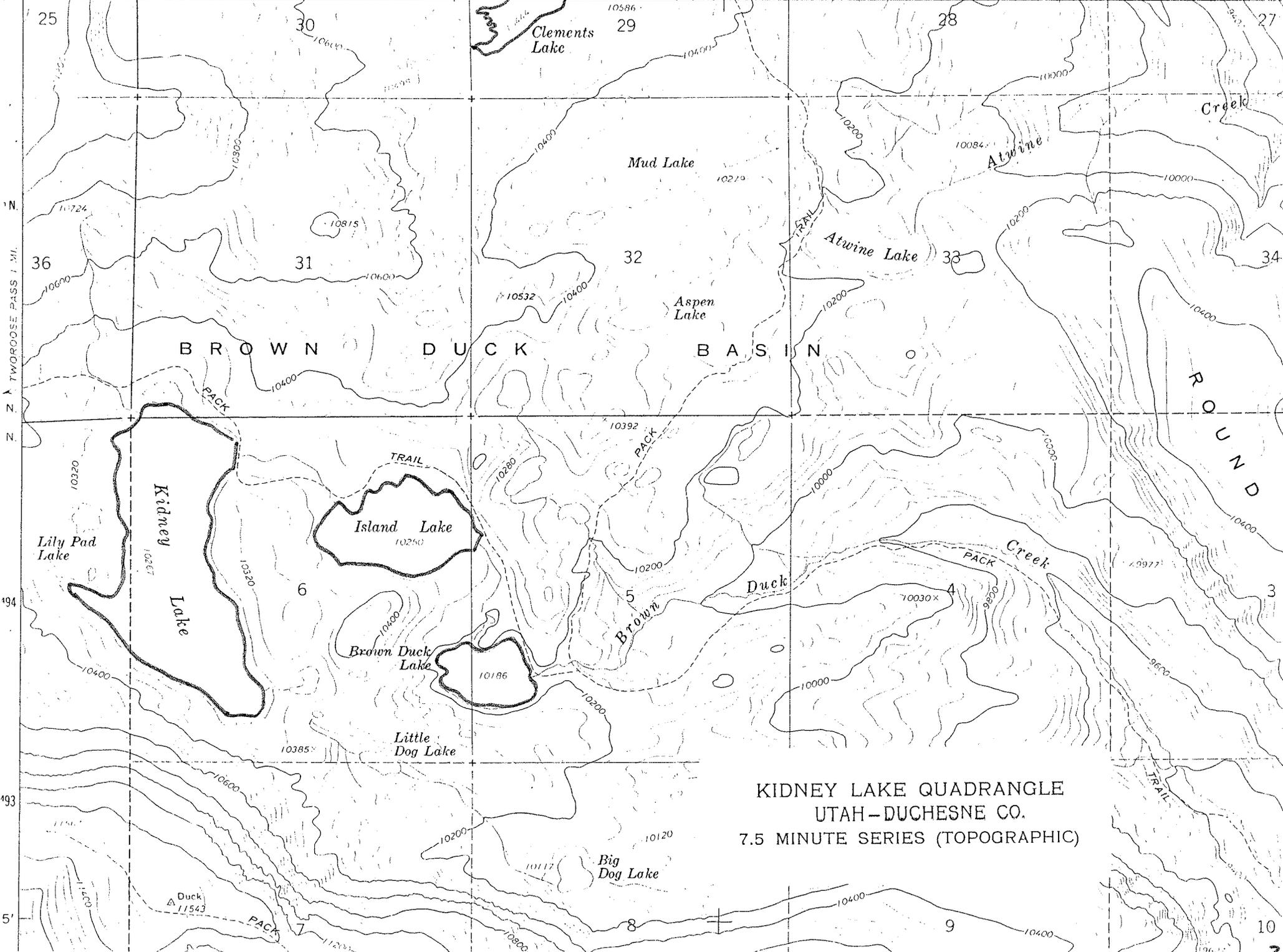
21. REFERENCES—HISTORICAL REFERENCES, PERSONAL CONTACTS, AND/OR OTHER

"Preliminary Engineering Report: Stabilization of High Mountain Lakes, Upalco Unit," (National Forest Service Report, 1970), page 4.

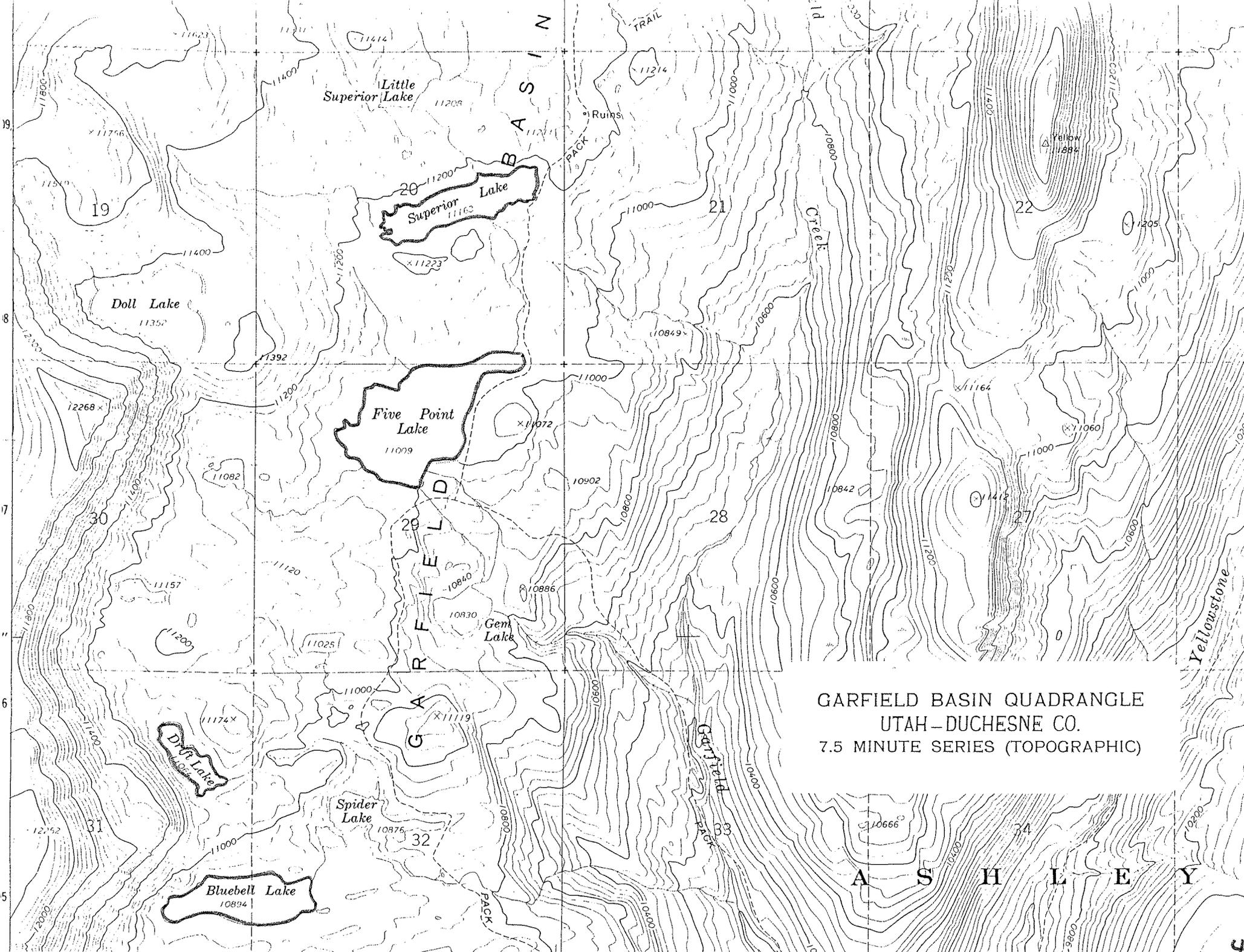
William F. Gettleman, "Report on the Lakes and Reservoir on the Headwaters of the Uintah, Whiterocks and Lakefork Rivers, Uintah Project, Utah: Feb. 1932," page 18.

Field inspection by Clayton Fraser, 22 July 1985.

22. INVENTORIED BY Clayton Fraser and James Jurale AFFILIATION Fraserdesign Loveland Colorado DATE 20 October 1985



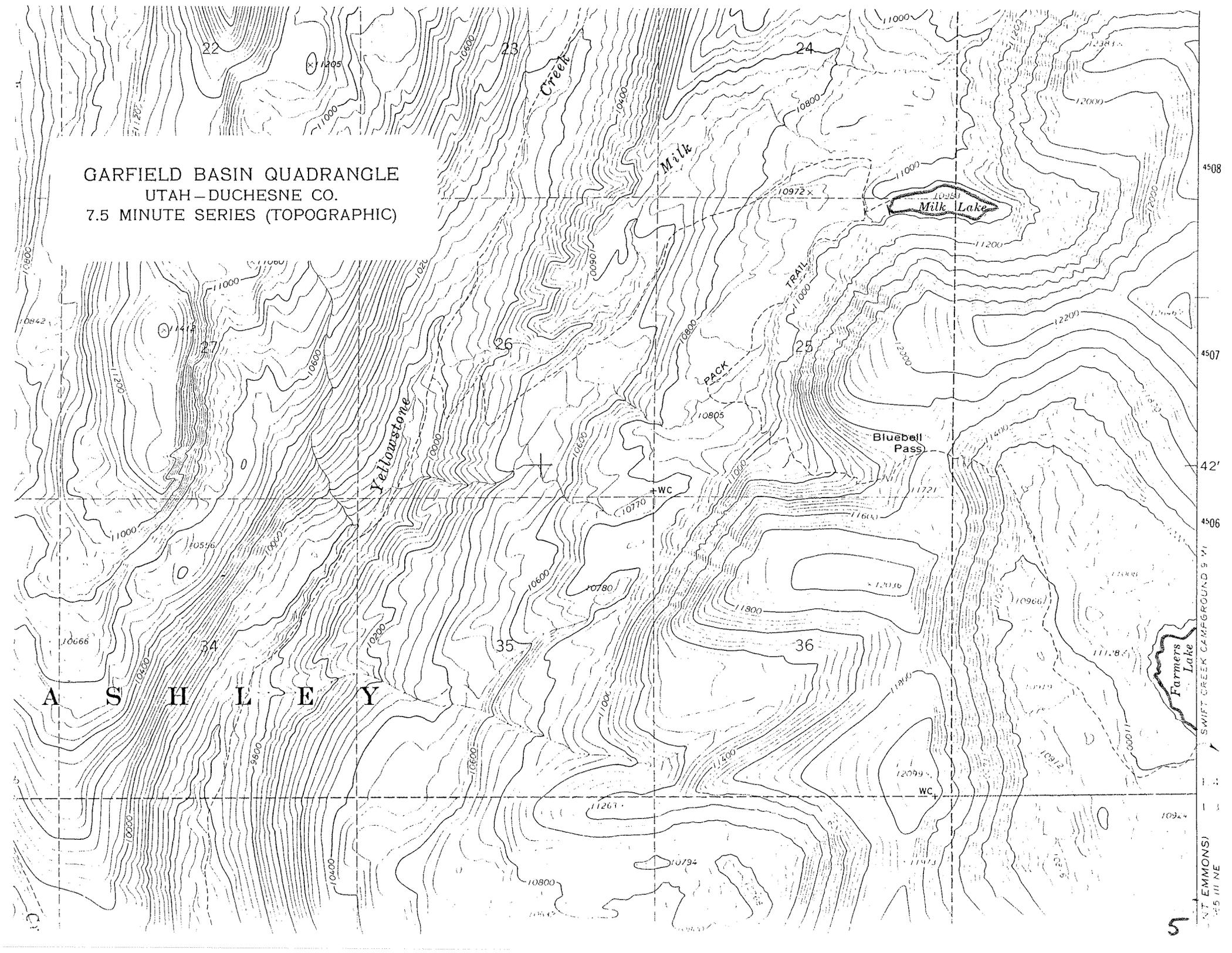
KIDNEY LAKE QUADRANGLE
UTAH-DUCHESNE CO.
7.5 MINUTE SERIES (TOPOGRAPHIC)



GARFIELD BASIN QUADRANGLE
UTAH-DUCHESNE CO.
7.5 MINUTE SERIES (TOPOGRAPHIC)

A S H L E Y

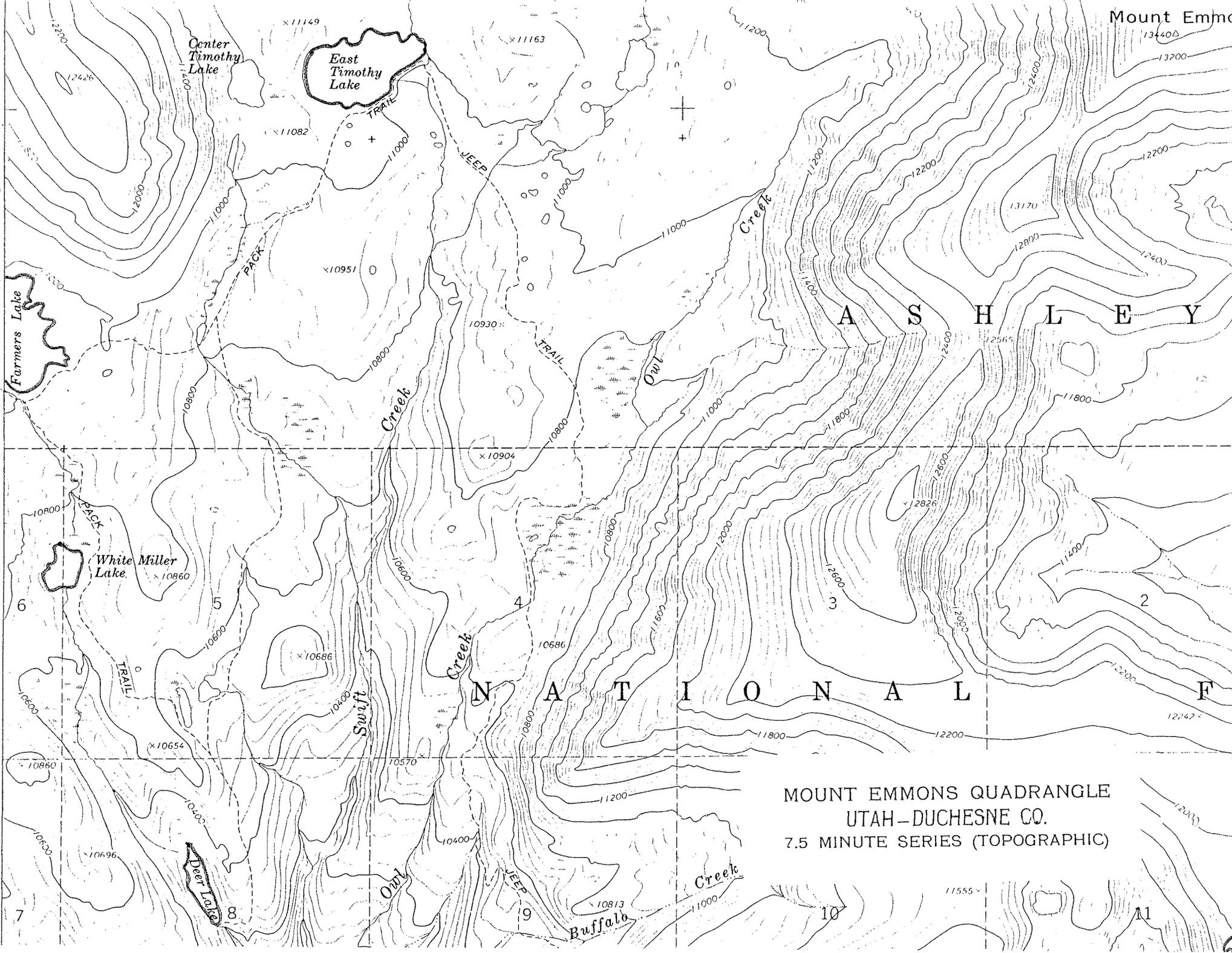
GARFIELD BASIN QUADRANGLE
UTAH-DUCHESNE CO.
7.5 MINUTE SERIES (TOPOGRAPHIC)



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Mount Emmons



MOUNT EMMONS QUADRANGLE
 UTAH-DUCHESNE CO.
 7.5 MINUTE SERIES (TOPOGRAPHIC)

A S H L E Y

N A T I O N A L F

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x11163

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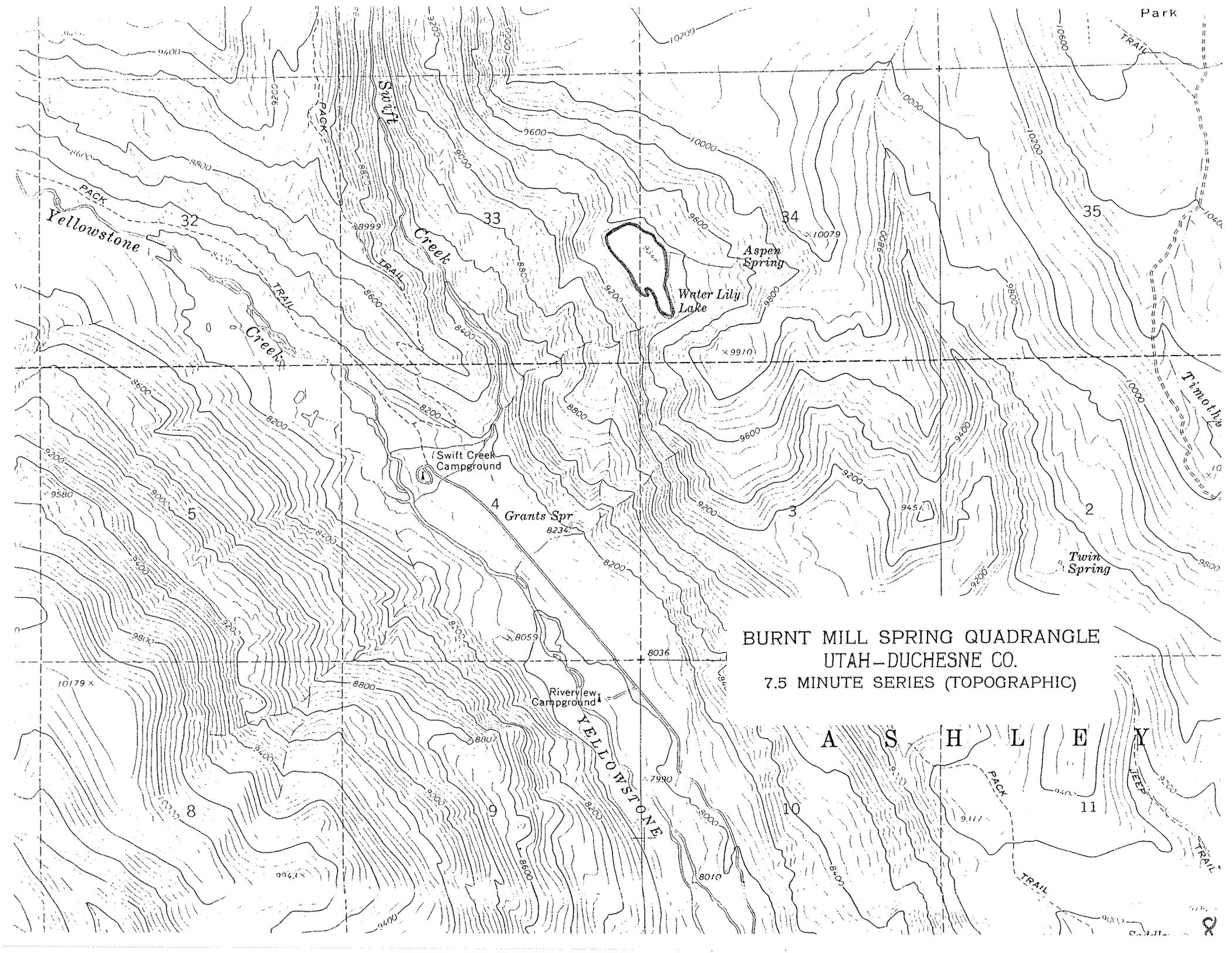
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Park

TRAIL

35

34

33

32

Yellowstone
PACK

TRAIL

Swift
Creek

Water Lily
Lake

Aspen
Spring

TRAIL

Timothy

2

Twin
Spring

3

4

Grants Spr
8234

Swift Creek
Campground

5

BURNT MILL SPRING QUADRANGLE
UTAH-DUCHESNE CO.
7.5 MINUTE SERIES (TOPOGRAPHIC)

A S H L E Y

11

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8

Riverview
Campground

YELLOWSTONE

PACK

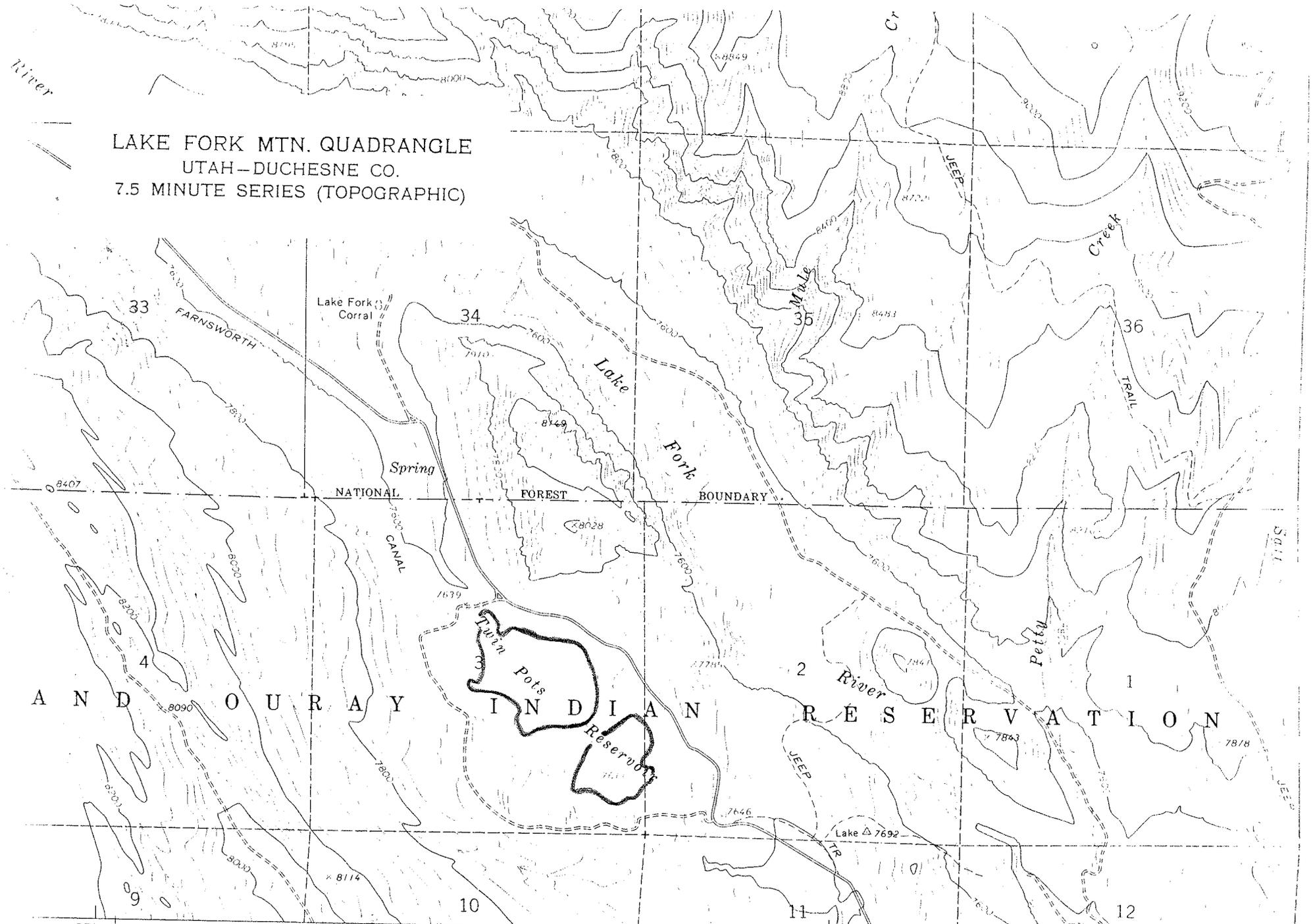
TRAIL

JEEP

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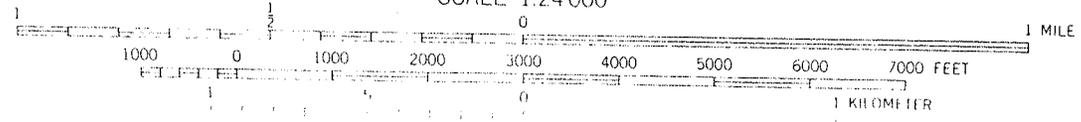
LAKE FORK MTN. QUADRANGLE
 UTAH-DUCHESNE CO.
 7.5 MINUTE SERIES (TOPOGRAPHIC)



A N D O U R A Y I N D I A N R E S E R V A T I O N

27'30" 547 (MOUNTAIN HOME) 3964 IV NW 549 25' MOUNTAIN HOME 8 MI. 551

SCALE 1:24 000



ENTERED IN R 5 W