№ 15596

APPLICATION FOR PERMIT
TO APPROPRIATE THE PUBLIC WATERS OF THE STATE OF IDAHO

Application No. 22060
Permit No. 15596
District No. 5-E

1. Name of Applicant: Utah Power & Light Company,

Postoffice address: Salt Lake City, County: Salt Lake, State: Utah.

I. If applicant is a corporation, give:
(a) Date and place of incorporation: September 6, 1912, Augusta, Kennebec Co., Maine.
(b) Amount of capital stock: $60,000,000.00.
(c) Amount paid in: $43,637,000.00. (4/30/22)
(d) Names and addresses of directors: See Remarks "A"

II. The financial resources of the applicant are:
(a) Cash on hand: $588,604.29-April 30, 1922.
(b) Treasury stock: None
(c) Bonds to be issued: $69,997,000.00
(d) Other resources: See Remarks "B"

2. Quantity of water claimed: One thousand five hundred cubic feet per second.

3. Source of water supply: Bear River which is a tributary of Great Salt Lake.

4. Location of point of diversion: See Remarks "C" feet distant from the corner of Section , T. , R. , B. M., and is in the of Section , T. , R. , B. M., County of

5. Water is to be used for: power purposes.

6. If for mining, milling, power or manufacturing purposes, give:

(a) Point of use of water: See Remarks "D" feet distant from corner of Section T. , R. , B. M., in the of Section , T. , R. , B. M.

(b) Amount of power generated: See Remarks H. P., under feet head.

(c) Water is to be returned to Bear River at a point See Remarks "D" feet distant from the corner of Section , T. , R. , B. M., in the of Section , T. , R. , B. M.

7. Estimated cost of works: $ 10,000,000.00.

8. Kind of works: See Remarks "E"

9. Height of dam Remarks "E" feet; length of dam at top feet; length of dam at bottom feet; material used in dam Remarks "E"

10. Size of headgate: width Remarks "E" feet; height feet

11. Ditch: Width at bottom Rem."E" feet; width at water line feet; depth of water feet; dimensions of flume
Diameter of pipe inches; length of conduit miles.
Average grade per mile feet

12. The time required for the completion of such work is five years.

13. The time required for the complete application of the water to the proposed use is six additional years.

14. The land to be irrigated is described in the following tabulation: See Remarks.

15596

15. (a) Is reservoir to be used? If so, fill in (b) and (c) below.
(b) Name of reservoir and number of Storage Permit:
(c) Date of filing of Application for Storage Permit and Name of Applicant:
Equalizing Reservoirs only, not for primary storage.

BE IT KNOWN THAT the undersigned hereby makes application for permit to appropriate the public waters of the State of Idaho as herein set forth.

Utah Power & Light Company Applicant.

By Markham Cheever *Agent.*
General Supt. and Chief Engineer.

Date of first receipt at Department of Reclamation. 9 A. M. June 12, 1922.

Returned to applicant for correction. July 12, 1922.

Corrected application received. September 11, 1922.

APPROVAL OF COMMISSIONER OF RECLAMATION

The number of this permit is 15596
Recorded in Book 55 Page 15596 Approved October 5, 1922.
This is to certify that I have examined the within application for a permit to appropriate the public waters of the State of Idaho, and hereby approve the same, subject to the following limitations and conditions:
Bond in the sum of $ 3000.00 to be filed on or before December 4, 1922.
Work to begin on or before and to continue diligently and uninterruptedly to completion, unless temporarily interrupted by circumstances over which permit holder has no control.
One-fifth of the work above specified to be completed on or before April 5, 1925.
The whole of said work to be completed on or before October 5, 1927.
Beneficial use of water appropriated in accordance herewith, to be made on or before October 5, 1933.

Witness my hand this 5th day of October, 1922.

W. G. SWENDSEN.
Commissioner of Reclamation.

Remarks:

14 Twp.	Range	Sec.	NE¼				NW¼				SW¼				SE¼				Totals
			NE¼	NW¼	SW¼	SE¼	NE¼	NW¼	SW¼	SE¼	NE¼	NW¼	SW¼	SE¼	NE¼	NW¼	SW¼	SE¼	

REMARKS
"A"

Names and Addresses of Directors:

Herbert S. Auerbach,
Auerbach Company,
Salt Lake City, Utah.

H. S. Browing,
First National Bank
Ogden, Utah

L. H. Farnsworth,
Walker Brothers Bankers,
Salt Lake City, Utah.

C. E. Groesbeck,
71 Broadway,
New York City, New York

Lafayette Hanchett,
983 Third Avenue,
Salt Lake City, Utah.

J. C. Howard,
Utah Oil Refining Company
Salt Lake City, Utah.

Charles Hayden,
25 Broad Street,
New York City, New York.

S. R. Inch,
Kearns Building,
Salt Lake City, Utah.

Stephen H. Love,
Salt Lake City,
Utah.

S. Z. Mitchell,
71 Broadway,
New York City, New York.

P. J. Moran,
Salt Lake City,
Utah.

C. W. Nibley,
40 North Main Street,
Salt Lake City, Utah.

Geo. B. Thomas,
Kearns Building,
Salt Lake City, Utah.

Bulkeley Wells,
318 - 14th street,
Denver, Colorado.

G. C. Wright,
Salt Lake City,
Utah.

C. E. Loose,
Provo Com'l & Savings Co.,
Provo, Utah.

"B"

Hydro-electric plants, transmission system, substations, distribution systems and other electrical facilities, and other property in Idaho and Utah; necessary construction funds to be provided from sale of notes, bonds and stock.

"C"

Location of Points of Diversion:

(1) From Bear River in Caribou County, Idaho, into Soda Reservoir, at a point South 8 degrees 45 minutes West 1600 feet from the quarter corner on the East boundary line of Section 13, Township 9 South, Range 41 East, B. M., in the Southeast quarter of said Section 13. A continuous flow of 1500 cubic feet per second will be diverted at this point.

(2) From Bear River in Caribou County, Idaho, and Soda Reservoir into penstocks by means of a dam located in the channel of said river at a point South 31 degrees 30 minutes West 830 feet from the Northeast corner of Section 18, Township 9 South, Range 41 East, B. M.

(3) From Bear River in Caribou County, Idaho, into Lava Reservoir at a point South 31 degrees 30 minutes West 830 feet from the Northeast corner of Section 18, Township 9 South, Range 41 East, B. M. The 1500 second feet continuous flow diverted at the points described in paragraphs (1) and (2) above and returned to the river at the point described in paragraph (1) of "D" will not be abandoned by the applicant, but will be carried in the natural channel of the stream and re-diverted at the points described in this and paragraph (4) hereof and, less such amount as may be lost by percolation and evaporation in transit, will again be used at the point described in paragraph (2) of "D".

(4) From Bear River in Bannock County, Idaho, and Lava Reservoir into penstocks by means of a dam located in the channel of Bear River at a point South 12 degrees 45 minutes East 2090 feet from the quarter corner on the North boundary line of Section 31, Township 9 South, Range 41 East, B. M.

(5) From Bear River in Franklin County, Idaho, into Narrows Reservoir at a point South 74 degrees 01 minutes East 3173 feet from the Northwest corner of Section 26, Township 13 South, Range 40 East, B. M., in the Northeast quarter of said Section 26. The 1500 second feet continuous flow diverted at the points described in paragraphs (1) and (2) above and returned to the river at the point described in paragraph (1) of "D" and re-diverted, used and returned to the river as described in paragraphs (3) and (4) above and paragraph (2) of "D", will not be abandoned by the applicant, but will be carried in the natural channel of the stream and re-diverted at the points described in this and paragraph (6) below and, less such amount as may be lost by percolation and evaporation in transit, will again be used at the point described in paragraph (3) of "D".

(6) From Bear River in Franklin County, Idaho, and Narrows Reservoir into penstocks by means of a dam located in the channel of said river at a point South 31 degrees 55 minutes East 3260 feet from the quarter corner on the North boundary line of Section 3, Township 14 South, Range 40 East, B. M.

(7) From Bear River in Franklin County, Idaho, into Mink Reservoir at a point South 31 degrees 55 minutes East 3260 feet from the quarter corner on the North boundary line of Section 3, Township 14 South, Range 40 East, B. M. The 1500 second feet continuous flow diverted at the points described in paragraphs (1), (2), (3), (4), (5) and (6) above and returned to the river at the points described in paragraphs (1), (2) and (3) of "D" will not be abandoned by the applicant, but will be carried in the natural channel of the stream and re-diverted at the points described in this and paragraph (8) below and, less such amount as may be lost by percolation and evaporation in transit, will again be used at the point described in paragraph (4) of "D".

(8) From Bear River in Franklin County, Idaho, and Mink Reservoir into penstocks, by means of a dam located in the channel of said river at a point North 51 degrees 30 minutes West 2120 feet from the Southeast corner of Section 16, Township 14 South, Range 40 East, B. M., in the southeast quarter of said Section 16.

"D"

Location of Point of Use for Power and Point of Return:

(1) The Point of use and return of the water diverted at point of diversion from Soda Reservoir, as hereinabove set out in paragraph (2), Remarks "C", is at a power house located in the dam, the center of which is located in the channel of Bear River at a point South 31 degrees 30 minutes West 830 feet from the Northeast corner of Section 18, Township 9 South, Range 41 East, B. M. The equivalent of a continuous flow of 1500 cubic feet per second will be used through the said power house for the generation of electrical energy.

(2) The point of use and return of the water diverted at point of diversion from Lava Reservoir, as herinabove set out in paragraph (4), Remarks "C", is at a power house located in the dam, the center of which is located in the channel of Bear River at a point South 13 degrees 30 minutes East 8113 feet from the quarter corner on the North boundary line of Section 31, Township 9 South, Range 41 East, B. M. The equivalent of a continuous flow of 1500 cubic feet per second will be diverted and used for the generation of electrical energy at said power plant.

(3) The point of use and return of the water diverted from Narrows Reservoir, as hereinbefore set out in paragraph (6), Remarks "C", is at a power house to be built in the dam located in the channel of Bear River at a point South 31 degrees 55 minutes East 3260 feet from the quarter corner on the North boundary line of Section 3, Township 14 South, Range 40 East, B. M. The equivalent of a continuous flow of 1500 cubic feet per second will be diverted and used for the generation of electrical energy through the said plant.

(4) The point of use and return of the water diverted at the point of diversion from Bear River and the Mink Reservoir, as hereinbefore set out in paragraph (8), Remarks "C", is at a power plant to be built in the dam, which is located in the channel of Bear River at a point North 51 degrees 30 minutes West 2120 feet from the Southeast corner of Section 16, Township 14 South, Range 40 East, B. M. The equivalent of a continuous flow of 1500 cubic feet per second will be diverted and used for the generation of electrical energy at this plant.

"E"

(1) The water to be diverted at the place designated under Remarks "C", subdivision (2) will be diverted by means of a re-inforced concrete and masonry dam, located in the channel of Bear River at the point described in said paragraph (2). Said dam will be 92 feet high, 525 feet long on top, 100 feet long on the bottom, with openings for three penstocks through the dam, which will convey the water to generating machinery located at the dam and there used under a head of 90 feet to generate 12,500 horsepower of electrical energy.

(2) The water to be diverted at the place designated under Remarks "C", subdivision (4), will be diverted by means of a re-inforced concrete and masonry dam, located in the channel of Bear River at a point described in said paragraph (4). Said dam will be 80 feet high, 300 feet long on top, 100 feet long on the bottom, with openings for three penstocks through the dam which will convey the water to generating machinery located at the dam and there used under a head of 80 feet to generate 11,000 horsepower of electrical energy.

(3) The water to be diverted at the place designated under Remarks "C", subdivision (6), will be diverted by means of a re-inforced concrete and masonry dam, located in the channel of Bear River at a point designated in said paragraph (6). Said dam will be 60 feet high, 320 feet long on top and 120 feet long on the bottom, with openings for three penstocks through the dam which will convey the water to generating machinery located at the dam and there used under a head of 60 feet to generate 8500 horsepower of electrical energy.

(4) The water to be diverted at the place designated under Remarks "C", subdivision (8) will be diverted by means of a re-inforced concrete and masonry dam, located in the channel of Bear River at the place designated in said paragraph (8). Said dam will be 70 feet high, 450 feet long on top, 120 feet long on the bottom, with openings for three penstocks through the dam which will convey the water to generating machinery located at the dam and there used under a head of 70 feet to generate 9500 horsepower electrical energy.

"F"

The reservoirs indicated in this application will be used to equalize the flow of water to the generating machinery and will not be used primarily as storage reservoirs. Released stored water from Bear Lake Reservoir will be retained in the above mentioned reservoirs for use through the power plants during the hours of maximum demand for power.

In addition to the natural flow that may be available at the points of use hereinabove set forth, said applicant is entitled to divert and use at these various sites all released stored water from Bear Lake Reservoir which it shall hereafter divert and impound in said reservoir from Bear River, Bear Lake and North or Mud Lake, under and by virtue of its rights as decreed in the Final Decree in that certain suit in equity, in the District Court of the United States for the District of Idaho, Eastern Division, No. 203, wherein applicant Utah Power & Light Co. was plaintiff and Last Chance Canal Company, Ltd., et. al. defendants.

STATE OF UTAH)
) ss.
COUNTY OF SALT LAKE)

Markham Cheever, being first duly sworn, upon his oath deposes and says:

That he is the Chief Engineer and General Superintendent of UTAH POWER & LIGHT COMPANY, a Corporation of Maine, doing business in the State of Idaho, with its principal place of business therein at Idaho Falls, Bonneville County;

That this affidavit is made by him, for and on behalf of said Utah Power & Light Company, as its Chief Engineer and General Superintendent;

That said Utah Power & Light Company is the owner and holder of Permit No. 15596, approved by the Commissioner of Reclamation of the State of Idaho, on the fifth day of October, 1922;

That the owner and holder intends to change the point of diversion from the Soda Reservoir, and the point of Use and Return of Soda Plant as set out in Remarks "C", paragraph two, Remarks "D", paragraph one, and Remarks "E", paragraph one, of the above mentioned permit to the following points:

The water will be diverted from Bear River, in Caribou County, Idaho, and Soda Reservoir, into penstocks by means of a dam located in the channel of said river at a point, which bears South 36° 23' East, 2154.6 feet from the Northeast Corner of Section 18, Township 9 South, Range 41 East, B.B.& M. The water will be used for generating electrical energy and power at a power house located in the above mentioned dam and will be returned to the channel of Bear River at a point which bears South 33° 28' East, 2035.0 feet from the Northeast corner of said Section 18. The point of diversion from the channel of Bear River into the Equalizing Reservoir created by this dam, as set out in the original application has not been changed.

That the proposed change is made for the following reason: In the above mentioned permit the diversion and storage dam was described as being located at a point South 31° 30' West, 830 feet from the Northeast Corner of Section 18, Township 9 South, Range 41 East. Subsequent investigation shows that a preferable dam site is located about one-half mile upstream, hence it becomes desirable to use the last mentioned site which is located at the point above described, and the amended point of Use and Return;

That no one will be injured by such change and that deponent makes such change at its own risk.

Further deponent saith not.

MARKHAM CHEEVER
Chief Engineer & General Superintendent
UTAH POWER & LIGHT COMPANY

Subscribed and sworn to before me this 10th day of November, 1924.

J. W. TWELVES
Notary public
Residing at Salt Lake City.

(SEAL)

My Commission expires January 15, 1926.

Received and filed for record in the Department of Reclamation at Boise, Idaho, at 9:00 A.M., November 13, 1924.

W. G. SWENDSEN
Commissioner of Reclamation

Proof of Completion of Works Made December 11, 1924.
Certificate of Completion of Works issued January 9, 1925.

15596

Permit No. 15596

CERTIFICATE OF COMPLETION OF WORKS

To All Whom It May Concern:

This is to ceritfy that Utah Power & Light Company, a corporation of Maine, doing business in the State of Idaho, with its principal place of of business therein at Idaho Falls, Bonneville County, the holder of Permit No. 15596, issued by the Commissioner of Reclamation under application No. 22060, bearing date of priority of October 5, 1922, authorzing the diversion of 1,500 second feet of the waters of Bear River at certain points therein described, for power purposes, has fully complied with the provisions of the laws of the State of Idaho, relating to Proof of Completion of Works of diversion at the Soda Power Plant, set out and described in said application in subdivisions 1 and 2, of paragraph "C" of remarks, and subdivision 1 of paragraph "D" of remarks in said application; that the point of diversion from Soda Reservoir into penstocks, and the point of return to the channel of Bear River, at the Soda Unit of the project contemplated under this permit have been changed by affidavits filed in this office, November 13, 1924, and are nowlocated as follows:

a. Point of diversion into penstocks, at a point which bears South 36° 23' East 2,154.6 feet from the Northeast corner of Section 18, Township 9 South Range 41 East, B. B. & M.

b. Point of return of the waters to the channel of Bear River located at a point which bears South 33° 28' East 2,035 feet from the Northeast Corner of said Section 18:

That said works are fully completed and are adequate for diverting and conveying to the place of use and return last above described, 1,500 second feet of the waters of Bear River.

Witness my hand this 9th day of January, 1925.

W. G. SWENDSEN
Commissioner of Reclamation.

LICENSE ISSUED FOR 1500 SEC. FT.
Lic. Bk. 6 - Pg. 3231

Appl. no. 7206

UTAH POWER & LIGHT COMPANY

KEARNS BUILDING

SALT LAKE CITY, UTAH

June 5th 1922. 15596

Mr. W. G. Swendsen, State Engineer,

Boise, Idaho.

Dear Sir:

July 12

I hand you herewith application of Utah Power & Light Company for permission to divert1500 second feet of water from Bear River for power purposes.

Will you please acknowledge receipt of same, and advise,

Very truly yours,

Geo R Corey

Assistant Attorney.

GRC/EF

15596

June 16, 1922.

Re: Permit Application 22060.

Mr. George R. Corey, Assistant Attorney,
Utah Power & Light Company,
Salt Lake City, Utah.

Dear Sir:

This will acknowledge receipt of application for permit to appropriate 1500 second feet of water, made by the Utah Power and Light Company.

This application is in proper form and will be held in this office thirty days from date of this receipt and then returned to yourself for completion during a period of sixty days additional.

Very truly yours,

W. G. SWENDSEN,
Commissioner of Reclamation

By

GNC:E Assistant.

15596

July 12, 1922.

Re: Application No. 22060.

Mr. Geo. R. Corey,
Assistant Attorney,
Utah Power and Light Company,
Salt Lake City, Utah.

Dear Sir:

There is being returned herewith the above mentioned application for permit standing in the name of the Utah Power and Light Company.

This application appears to be complete with the exception of the required maps. It is presumed that you are familiar with the requirements in this connection.

You will be allowed sixty days from this date in which to return application, together with the required maps in order that the same may pass to permit under the terms of the original application.

Very truly yours,

W. G. SWENDSEN
Commissioner of Reclamation

By

Assistant

GNC:P

15596

UTAH POWER & LIGHT COMPANY
KEARNS BUILDING
SALT LAKE CITY, UTAH

July 18th 1922.

Mr. W. G. Swendsen,
Commissioner of Reclamation,
Boise, Idaho.

Dear Mr. Swendsen:

RE APPLICATION NO. 22060

This is to acknowledge receipt of your letter of July 12th and enclosure.

In the preparation of map to be submitted to you in connection with the above application your rules provide that it be made on rather a large scale. Inasmuch as this application covers a considerable length of Bear River we would like permission from you to submit a map on the scale not smaller than two miles to one inch. This would enable us to show the whole layout on one map. Would also call your attention to the fact that in submitting map in connection with application No. 20970 you permitted us to use the scale above mentioned.

Trusting that you will be able to comply with our request, I am,

Very truly yours,

Geo. R. Corey

Assistant Attorney.

GRC/EF

15596

July 21, 1922

In re: Application No 22060

Mr. George R. Corey, Ass't
Utah Power & Light Co.
Salt Lake, Utah

Dear Sir:

Reference is made to the above mentioned application.

It will be entirely proper for your company to present the maps required in connection with your pending application on a scale of two miles to an inch.

Maps prepared on this scale will be accepted by this department.

Yours very truly,

W. G. SWENDSEN
Commissioner of Reclamation

By

Assistant

GNC.H

15596

UTAH POWER & LIGHT COMPANY

KEARNS BUILDING

SALT LAKE CITY, UTAH

No. 22060

September 7th 1922.

Mr. W. G. Swendsen,
Commissioner of Reclamation,
Boise, Idaho.

Dear Sir:

I return to you herewith application No. 22060, which was returned to applicant, Utah Power & Light Company, for correction.

I also enclose herewith one tracing and blue line print as required by the rules of your office.

Very truly yours,

Grant Crum

Assistant Attorney.

GRC/EF

DEPARTMENT OF RECLAMATION
SEP 11 1922
RECEIVED

15596

Form No. 18

State of Idaho

DEPARTMENT OF RECLAMATION

BOISE

Utah Power & Light Co.,
Attention Mr. Corey,
Salt Lake City, Utah.

Boise, Idaho, October 11, 1922.

Dear Sir:

Re: Permit No. 15596
Utah Power & Light Co.

I enclose herewith above numbered permit. BE SURE AND NOTE LIMITATIONS AND CONDITIONS OF SAME as given under approval of State Engineer on the third page.

W. G. SWENDSEN.
Commissioner of Reclamation.

15596

FORM NO. 150

State of Idaho

ENGINEERING DEPARTMENT

BOISE

Re: Permit No. 15596
Utah Power & Light Co.

NOTE

That in order to keep this permit in force a bond in the sum of $ 3000.00 must be filed in the office of the ~~State Engineer~~ Commissioner of Reclamation on or before December 4, 1922, conditioned upon faithfully carrying to completion the works of diversion as specified in said permit and in the application therefor.

W. G. SWENDSEN,
~~I. H. SMITH,~~
Commissioner of Reclamation
~~State Engineer.~~

15596

UTAH POWER & LIGHT COMPANY
KEARNS BUILDING
SALT LAKE CITY, UTAH

October 17, 1922

W. G. Swendsen,
Commissioner of Reclamation,
Boise, Idaho.

Dear Sir:

I hand you herewith bond of Utah Power and Light Company, in the sum of $3,000.00, as required by law, to be filed under application No. 22060, permit No. 15596 to divert 1500 second feet of the waters of Bear River.

Will you please acknowledge receipt of this bond, and advise if it is in proper form.

Very truly yours,

Geo. R. Rowe

Assistant Attorney

GRC:DE

Enc.

15596

Bond

Know all Men by these Presents:

THAT Utah Power and Light Company, , of Salt Lake City, Utah, as principal, and the UNITED STATES FIDELITY AND GUARANTY COMPANY, of Baltimore, Maryland, as surety, are held and firmly bound unto the State of Idaho in the full and just sum of Three Thousand ---------- ($ 3,000) Dollars, lawful money of the United States, to the payment of which sum, well and truly to be made, said principal binds himself, his heirs, administrators, executors and assigns, and said surety binds itself, its successors and assigns, jointly and severally, under the terms and conditions hereinafter set forth.

The terms of this obligation are such that, whereas the above-named principal on the 12th, day of June, 1922 filed in the office of the State Engineer in Boise, Idaho, a certain application for permit to appropriate the public waters of the State of Idaho, the said application being thereupon numbered No. 22060, in accordance with which said application the State Engineer granted and issued to the said principal herein a certain permit numbered No. 15596, a full, true and complete copy of which application No. 22060 and permit No. 15596, is of record in the office of the State Engineer, in Book 55 of Permits, at page 15596

Now, if the above bounden principal shall faithfully carry to completion the said works of diversion as specified in said application No. 22060 and permit No. 15596, in the manner and form prescribed therein and within the time therein allowed, then the above obligation to be void, otherwise to remain in full force and effect.

In Witness Whereof, The said principal has hereunto set his hand and affixed his seal, and the said surety has caused these presents to be signed by its attorney-in-fact, and its corporate seal to be affixed, this 16th, day of October, 1922

UTAH POWER & LIGHT COMPANY

Witnesses:

Vice-Pres. & Gen'l Mgr. [SEAL]

United States Fidelity and Guaranty Company

By

Attorney-in-fact.

STATE OF Utah,
COUNTY OF Salt Lake } ss:

J. E. Hatch, being duly sworn, deposes and says: That the UNITED STATES FIDELITY AND GUARANTY COMPANY, the surety on the foregoing bond, is a corporation of the State of Maryland, duly and legally carrying on the business of a Surety Company in the State of Idaho. That said Surety Company has fully complied with the laws of the State of Idaho relating to foreign corporations doing business in said State. That affiant is attorney-in-fact of said Company. That said Surety Company is authorized by its articles of incorporation and by-laws to execute the bond hereto annexed, and that said Company has assets, consisting of capital stock, paid-up cash and surplus, over and above all of its liabilities, exceeding the sum of one million, five hundred thousand dollars, and has on deposit with the Treasurer of the State of Maryland, in trust for the benefit of all bondholders, two hundred thousand dollars ($200,000) in available assets.

Subscribed and sworn to before me this 16th, day of October, A. D. 1922.

My commission expires October 31, 1923.

Salt Lake City, Ut. *Notary Public.*

15596

October 20, 1922.

Re: Permit No. 15596- Utah Power & Light Co.,

Mr. George E. Corey,
Kearns Building,
Salt Lake City, Utah.

Dear Sir:-

Surety bond in the sum of $5,000, for completion of works under the above numbered permit, has today been approved and filed in this office.

Very truly yours,

W. G. SWENDSEN,

Commissioner of Reclamation.

By

Chief Clerk.

15596

August 20, 1923.

Re: Permit No. 15596

Mr. Markham Cheever,
Chief Engineer,
Utah Power and Light Co.
Salt Lake City, Utah.

Dear Sir:

Reference is made to your letter of August 6th enclosing plans for the dam to be built at Soda point in connection with Permit No. 15596.

We are pleased to mail you under seperate cover one set of prints bearing the approval of the Commissioner of Reclamation.

Very truly yours,

Assistant Commissioner

GNC:F

15596

UTAH POWER & LIGHT COMPANY

KEARNS BUILDING

SALT LAKE CITY, UTAH

October 20,
1 9 2 4

Mr. W. G. Swendsen,
Commissioner of Reclamation,
Boise, Idaho.

Dear Mr. Swendsen:

We desire to make proof of completion of works and proof of beneficial use on that part of the project contemplated under permit No. 15596, which is now completed, that is to say, the plant recently constructed at Soda Point near Alexander.

For that purpose I am enclosing herewith notice for publication covering each proof which we would be pleased to have you order published in "The Soda Springs Chieftan," a newspaper published at Soda Springs.

In making this proof we will furnish affidavits from two engineers, showing the data necessary to prove the facts requisite to issuing license. We will take these gentlemen to the plant in the very near future and demonstrate the quantity of water applied to beneficial use, etc. In this connection, it occurs to us that it would save time and expense if you would appoint Mr. E. J. Baird, now located at Soda Springs, to make the examination for your office. He could be present at the time we take the engineers to the plant as above outlined, and could make his report coincident with the submission of our proof.

You will note that proof will be submitted before S. E. Mathews, a Notary Public at Soda Springs, Caribou County. Will you please send the usual blanks to him so that he can forward them to us for preparation in the near future?

Yours very truly,

Geo K Corey

Assistant Attorney.

GRC:JP

15596

Form No. 11

NOTICE TO ACCOMPANY THIS LETTER MUST BE MADE IN DUPLICATE

(Date) October 20, 1924.

(P. O.) Salt Lake City, Utah.

TO THE COMMISSIONER OF RECLAMATION:

Boise, Idaho.

Dear Sir:

You are hereby authorized to have the attached notice published at my expense in the Soda Springs Chieftan of Soda Springs Idaho, published in the county in which the works are situated.

Utah Power & Light Company.

By Geo. L. Carey
Asst Atty

(In case of canals or other works designed to divert and carry more than 50 cubic feet of water per second, the following certificate must be signed by a well-known and competent engineer.)

I hereby certify that the facts set forth in the attached notice are true.

J. A. Hale

Engineer.

15596

Form No. 11

NOTICE TO ACCOMPANY THIS LETTER MUST BE MADE IN DUPLICATE

(Date) October 20, 1924.

(P. O.) Salt Lake City, Utah.

TO THE COMMISSIONER OF RECLAMATION:

Boise, Idaho.

Dear Sir:

You are hereby authorized to have the attached notice published at my expense in the Soda Springs Chieftan of Soda Springs Idaho, published in the county in which the works are situated.

Utah Power & Light Company.
By Geo. McCarey
Asst Atty

(In case of canals or other works designed to divert and carry more than 50 cubic feet of water per second, the following certificate must be signed by a well-known and competent engineer.)

I hereby certify that the facts set forth in the attached notice are true.

J. A. Hale
Engineer.

15596

Form 10

NOTICE FOR PUBLICATION

Notice of Proof of Application of Water to Beneficial Use

Notice is hereby given that at 11:15 a. m. on the 22nd day of December, 1924, at Soda Springs, County of Caribou, State of Idaho, before S. E. Mathews, Notary Public, proof will be submitted of the application to beneficial use of One Thousand Five Hundred cubic feet per second of the waters of Bear River, in accordance with the terms and conditions of Permit No. 15596 heretofore issued by the State Engineer of the State of Idaho.

1. The name and postoffice address of the person or corporation holding said permit are Utah Power & Light Company, Salt Lake City, Utah

2. The use to which said water has been applied is The generation of electrical power and energy

3. The amount applied to beneficial use is One Thousand Five Hundred cubic feet per second.

4. The place where said water is used is ~~(if for irrigation, give full and accurate description of the lands irrigated)~~ At the Hydro Electric Power Plant of Utah Power & Light Company located in the Channel of Bear River at Soda Point near Alexander, Idaho.

5. The name of the canal or ditch or other works by which said water is conducted to such place of use is This Plant is known as the "Soda Development."

6. The right to take the water from such works is based upon Permit No. 15596.

7. The source of supply from which such water is diverted is Bear River

8. The date of the priority which said user is prepared to establish is June 12, 1922.

State Engineer.

15596

FORM 8

Notice for Publication

Notice is hereby given that at 11:00 A. M., on the 22nd day of December 192 4, at Soda Springs, County of Caribou, State of Idaho, before S. E. Mathews, Notary Public proof will be submitted of the completion of works for the diversion of 1500 cubic feet per second of the waters of Bear River in accordance with the terms and conditions of a certain permit heretofore issued by the State Engineer of the State of Idaho.

1. The name of the person or corporation holding said permit is Utah Power & Light Company

2. The postoffice address of such person or principal place of business of such corporation in Idaho is Idaho Falls, County of Bonneville, State of Idaho.

3. The number of such Permit is 15596, and the date set for the completion of such work is October 5, 1927.

4. Said water is to be used for Power purposes.

5. Said works of diversion will be fully completed on the date set for such completion, and the amount of water which said works are capable of conducting to the place of intended use, in accordance with the plans accompanying the application for such permit, is in excess of 1500 cubic feet per second.

~~6. The amount of lands for which said water is available is _____ acres, particularly described as follows:~~

_____

_____

_____

_____

Commissioner of Reclamation.

15596

October 24, 1924.

Re: Permit No. 15596-
Utah Power & Light Co.

Mr. George R. Corey,
Assistant Attorney,
Utah Power & Light Co.,
Salt Lake City, Utah.

Dear Sir:-

Referring to your letter of the 20th inst. would say that the two proofs under the above permit, notices for which were enclosed in your letter, have been combined into one publication notice and a copy of the combined notice will be mailed to the Soda Springs Chieftain in time for the required four weeks publication prior to December 22nd, the date set for proof.

Per your request, we are authorizing Mr. Baird to make the required examination and report and are sending him our report blank.

Deposition blanks will be mailed to the notary public within the next few days to Mr. S. E. Mathews, the notary public before whom proof is to be made.

Very truly yours,
W. G. SWENDSEN,
Commissioner of Reclamation.

By_____
Chief Clerk.

15596

October 24, 1924.

Re: Permit No. 15596
UTAH POWER & LIGHT CO.

Mr. E. J. Baird,
Soda Springs, Idaho.

Dear Sir:-

At the request of Mr. Geo. R. Corey, you are hereby authorized to make the report for proof of completion of works and beneficial use of water under the above numbered permit and you will find enclosed our regular report form.

Very truly yours,
W. G. SWENDSEN,
Commissioner of Reclamation.

By_____
Chief Clerk.

15596

STATE OF IDAHO

DEPARTMENT OF RECLAMATION

BOISE, IDAHO

DATE November 8,1924

Soda Springs Chieftain

Soda Springs, Idaho.

DEAR SIR:

Enclosed you will find notice for publication once a week for four consecutive weeks prior to December 22,1924, the date set for proof, the expense of the publication to be paid by the applicant, by its attorney, Mr.Geo. R. Corey, Kearns Building, Salt Lake City, to whom you should furnish proof of publication on or prior to the date set for proof.

Please acknowledge receipt of the notice and furnish this office with a copy of the first publication.

Very truly yours,

W. G. SWENDSEN,

Commissioner of Reclamation.

15596

UTAH POWER & LIGHT COMPANY

KEARNS BUILDING

SALT LAKE CITY, UTAH

November 11,
1924

Mr. W. F. Swendsen,
Commissioner of Reclamation,
Boise, Idaho.

Dear Sir:

We recently submitted to you a notice of our intention to make proof of Completion of works and proof of beneficial use under permit No. 15596, on December 22, 1924. In making the examination of the property, we find that the location of the dam has been moved up stream approximately one-half mile but within the reservoir limits as described in the application.

I hand you herewith an application to change the location of the dam or the point of diversion from the reservoir into pipes as set out in the application and the point of use and return thereunder. Also a small map showing the point of diversion into the reservoir, the original location of the point of use and return and the present location of the dam and point of return.

For your information, I may say there are no users of water diverting water from the river between the location of the dam site as constructed and the location of the point of return given in the original filing. This change will not affect any user of water other than the Company. It will, of course, be necessary for us to have this change authorized by your office before we made proof on December 22nd, and will appreciate it if you will have it attended to as soon as possible.

Yours very truly,

Geo K Corey

Assistant Attorney.

GKC:JP

15596

Form No. 0

1596

NAME OF APPLICANT....UTAH POWER & LIGHT COMPANY.....

SEC. 7 | SEC. 8 | SEC. 9 | SEC. 10 | SEC. 11 | SEC. 12

SEC. 18 | SEC. 17 | SEC. 16 | SEC. 15 | SEC. 14 | SEC. 13

ORIGINAL LOCATION OF DAM

830.0'

S.31°30'W.

2154.6'

2055'

POINT OF RETURN

CENTER OF DAM

N.36°29'W.

N.33°28'W.

N

BEAR RIVER

1800.0'

S.8°45'W.

POINT OF DIVERSION INTO RESERVOIR

T. 9 S. R. 41 E. S.L.B.&M.

SEC. | SEC. | SEC. | SEC. | SEC. | SEC.

I hereby certify that this map was prepared from an actual survey made under my direction on the 15th day of October, 1924, and correctly shows position of points indicated thereon.

William Adam Lewis

CHIEF ENGINEER

P.O. Salt Lake City, Utah

Date Nov 10. 1924

SCALE: 2 INCHES EQUAL 1 MILE. DRAW PLAN IN INK.

November 14, 1924

Re: Permit No. 15596-Utah Power & Light Co.

Mr. George R. Corey,
Attorney at Law,
Kearns Building
Salt Lake City, Utah

Dear Sir:

Your letter of the 11th instant received together with affidavit for change of point of diversion under the above numbered permit, also the two maps. This affidavit has been recorded under the permit in this office and the original is herewith returned to you, together with one copy of the map.

Very truly yours,

W. G. SWENDSEN
Commissioner of Reclamation

By_____
Chief Clerk

Encl.

15596

Soda Springs Idaho
Nov. 18 1924

Mr. W.G.Swendsen
Commissioner of Reclamation
Boise Idaho.

Dear Sir,

Enclosed you will find the results of my examination for Proof of Beneficial Use and completion of works, of the Soda Point Unit of Permit No. 15596.

This examination was made in company with Geo, R.Corey of the Utah Power and Light Co. and G.Clyde Baldwin and Myron Swendsen as witnesses, on Nov. 3 1924.

Very truly yours

C. J. Baird

15596

Form 23

STATE OF IDAHO
DEPARTMENT OF RECLAMATION
BOISE, IDAHO

REPORT OF ENGINEER

Permit No. 15596
Completion Works and
This proof is for Beneficial Use In Water District No. 5-E

1. Name of applicant: Utah Power & Light Co.
2. Source of water supply: Bear River
3. Location of point of diversion: Is in the Northwest Quarter of Section 17
   T 9 S, R 41 E. B.M. County of Carribou
4. Describe works as they exist, giving dimensions and capacities of same: Soda Point Unit;
   Per attached slip;

Gravity type, Concrete Dam with reinforcement.

Length of dam, Concrete dam 463 Ft, Earth fill 63 Ft.
Total length over all 526 Ft.

Height of Dam 99 Ft., Width at bottom 109 Ft.

Overflow Spillway in three sections of 30 Ft. each,
controlled by radial gates.

Water control by four circular conduits, or penstocks,
through base of dam, fitted with four
electrically controlled gates.
Conduits lead to two units which consist of two Turbine
Water wheels, which turn two Alternating
Current Generators of the following
rated capacities;

Amp. 718	Speed 150 R.P.M.
P.F. .855	K.W. 7000
Cycles 60	Volts 6600

15596

11:20 - Flow - 1600)
11:40 - Flow - 1609)

Water flow determined from rateing ga
down river from plant. River measurem
examiner at different intervals durin
found correct.

1559(

15596

This examination was made on the 3 day of November 19 24

(Signed) E. Clark
Examiner.

5. Water is used for: Electric Power Generation

6. State whether or not water has been turned into works of diversion: About Aug.1 1924

Test run for proof of beneficial use, Nov.3 1924

WATER TEST - SODA STATION - NOVEMBER

Time	#1 Unit Integrating	#2 Unit Integrating	#1 Unit Indicating	#2 Unit Indicating	Excite Volts	
10:50	2317200	8919700	5000	3000	190	
11:00			5000	3000	190	
11:10	2318900	8920500	5000	3000	190	
11:20			5000	3000	195	
11:30	2320400	8921600	5000	3000	195	
11:40			5000	3000	190	
11:50	2322200	8922700	5000	3000	195	

Mean operating head d

NOTE- Ratio potential transformers on A. C. Voltmeters is 60 to 1.

11:10 - Flow - 1600)
11:20 - Flow - 1600)
11:40 - Flow - 1609)

Water flow determined from rateing ga
down river from plant. River measurem
examiner at different intervals durin
found correct.

15596

15596

This examination was made on the 3 day of November 19 24

(Signed) [signature]

Examiner.

5. Water is used for: Electric Power Generation

6. State whether or not water has been turned into works of diversion: About Aug.1 1924

Test run for proof of beneficial use, Nov.3 1924

WATER TEST - SODA STATION - NOVEMBER. 3, 1924.

Time	#1 Unit Integrating	#2 Unit Integrating	#1 Unit Indicating	#2 Unit Indicating	Exciter Volts	Exciter Amps	Pond. Elev.	Tail El	P.F. - 1.0 #1 Unit Volt.	#1 Unit Amp.	#2 Unit Volt.	#2 Unit Amp.
10:50	2317200	8919700	5000	3000	190	370	5719.53	5641.35	105	450	107	260
11:00			5000	3000	190	370			105	450	107	260
11:10	2318900	8920500	5000	3000	190	370	19.52	5641.37	105	450	107	260
11:20			5000	3000	195	370		41.35	105	440	107	260
11:30	2320400	8921600	5000	3000	195	370	19.50	41.37	105	440	107	260
11:40			5000	3000	190	365		41.37	105	440	107	260
11:50	2322200	8922700	5000	3000	195	370	19.49	41.37	105	440	107	260

Mean operating head during run, 78,15 Ft.

NOTE- Ratio potential transformers on A. C. Voltmeters is 60 to 1.

11:10 - Flow - 1600)
11:20 - Flow - 1600)
11:40 - Flow - 1609)

Water flow determined from rateing gage about one fourth mile down river from plant. River measurements had been made by examiner at different intervals during this season and rateing found correct.

15596

15596

This examination was made on the 3 day of November 19 24

(Signed) E. Lamb
Examiner.

tion): Electric power to be transmitted through the system of the Utah Power and Light Co., the principle place of business of which is at Idaho Falls, Idaho.

(Submit map on attached plat, showing location and details of above description.)

8. What large stream would the water here appropriated finally reach?

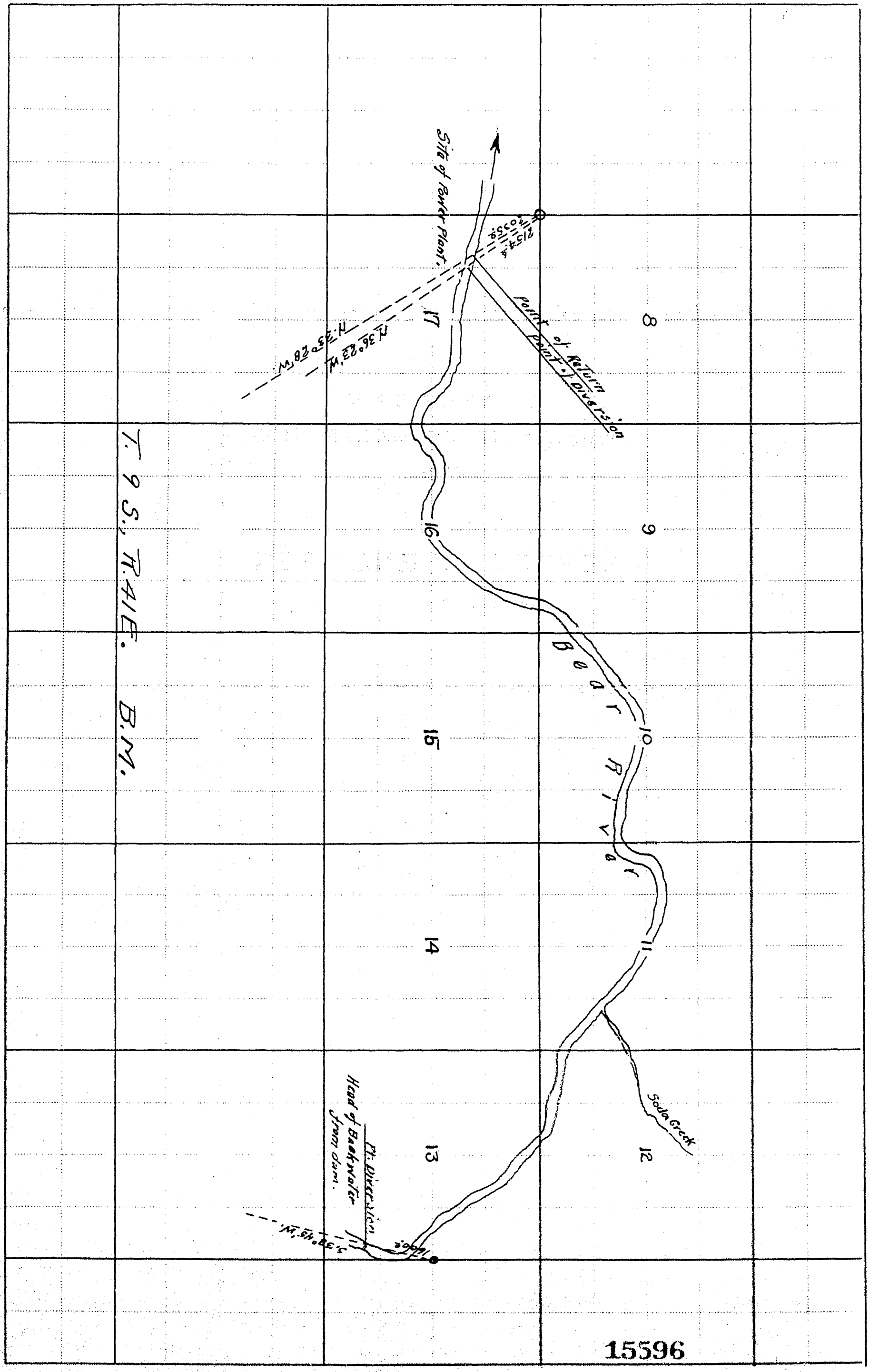
Remarks:

15596

This examination was made on the 3 day of November 19 24

(Signed) [signature]

Examiner.



SCALE: 2 INCHES EQUALS 1 MILE. DRAW MAP IN INK.

Form No. 22-B

State of Idaho

DEPARTMENT OF RECLAMATION

BOISE

INSTRUCTIONS

PROOF OF COMPLETION OF WORKS
AND
PROOF OF BENEFICIAL USE OF WATER

BOISE, IDAHO, December 4,1924

Utah Power & Light Co.
c/o S. E. Mathews,
Soda Springs, Idaho.

DEAR SIR:

I enclose herewith the following forms to be used in connection with proof of completion of works and beneficial use of water under Permit No. 15595

DEPOSITION OF PERMIT HOLDER.
DEPOSITIONS OF TWO WITNESSES.

In submitting this proof the following instructions should be CAREFULLY followed out, since failure to do so may result in the loss of rights:

1. On December 22,1924, the date set for proof, the enclosed forms (two for permit holder and two each for two disinterested witnesses) should be filled out and sworn to, at Soda Springs before S. E. Mathews, notary public.

2. When the depositions have been taken they should be mailed to this office, together with affidavit of publication of notice.

When these have been received, together with report of the examining engineer, if everything is properly executed, you will be further advised as to fees due, etc., before certificate is issued.

Yours truly,
W. G. SWENDSEN,
Commissioner of Reclamation.

15596

Soda Springs, Idaho.
December 22, 1924.

Mr. W. G. Swendsen,
Commissioner of Reclamation,
Boise, Idaho.

Dear Sir:

On December 22, 1924, at 11:15 o'clock A. M., George R. Corey, Assistant Attorney of Utah Power & Light Company, appeared at my office in Soda Springs, Caribou County, Idaho, and submitted Proof of Completion of Works and Proof of Beneficial Use covering the Utah Power & Light Company's Soda Power Plant under its Permit No. 15596.

No one appeared at the above time and place to protest and no protest was filed in this matter.

I hand you herewith the following documents which are submitted in connection with the making of this proof:

1. Certified copy of Resolution of Board of Directors of Utah Power & Light Company, authorizing Jubal A. Hale to make Deposition of Holder, both as to Proof of Completion ofWorks and Proof of Application to Beneficial Use under this permit.

2. Deposition of Holder covering Proof of Completion of Works.

3. Deposition of Witness, Myron Swendsen as to Proof of Completion of Works.

4. Deposition of Witness, G. Clyde Baldwin as to Proof of Completion of Works.

5. Deposition of Holder as to Proof of Application to Beneficial Use.

6. Deposition of Witness, Myron Swendsen as to Proof of Application to Beneficial Use.

7. Deposition of Witness G. Clyde Baldwin as to Proof of Application to Beneficial Use.

I also hand you herewith Utah Power & Light Company's check No. A-9587, in the sum of Four Hundred Fifty-five ($455.00) Dollars, in payment of the following statutory fees:

a. Making Proof of Completion of Works, 1,500 second feet at 30¢ per second foot	$450.00
b. Making Proof of Beneficial Use	5.00
Total	455.00

Yours very truly,

S. Matthews

Notary Public.

15596

The Chairman pointed out that proof of Completion of Works and Proof of Beneficial Use of water should be made at the Company's new Hydro-Electrical Plant at Soda Point, Idaho, being the completed part of the project contemplated under permit No. 15596, granted by the Commissioner of Reclamation of the State of Idaho.

The following resolution was presented and unanimously adopted:

RESOLVED: That Jubal A. Hale, a Civil and Hydraulic Engineer, in the employ of this Company, be and he is, hereby authorized and empowered for and on behalf of this corporation to make the necessary statements under oath to all questions put under the form "Deposition of Holder," in making Proof of Completion of Works and Proof of Application to Beneficial Use of the waters of Bear River at the Company's new Hydro-Electric Power Plant located at Soda Point, Idaho, being the completed part of the project contemplated under permit No. 15596, granted by the Commissioner of Reclamation of the State of Idaho. Such proof to be submitted on the 22nd day of December, 1924, at the office of S. E. Mathews, Soda Springs, Idaho.

I, George B. Thomas, the duly elected and qualified Secretary of Utah Power & Light Company, a Corporation of Maine, hereby certify that the foregoing is a full, true and correct copy of a resolution passed by the Board of Directors of said Company, at a meeting duly held in Salt Lake City, on the 5th day of December, 1924.

IN WITNESS WHEREOF, I have hereunto set my hand and affixed the Corporate Seal of this Company, this 8th day of December, 1924.

Secretary.

15596

PERMIT NO. 15596

Proof of Application of Water to Beneficial Use

DEPOSITION OF HOLDER

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. J. A. Hale; 37 yrs; Salt Lake City, Utah; Civil and Hydraulic Engineer; Kearns Building, Salt Lake City, Utah.

Ques. 2. If acting in behalf of a corporation, state its name, principal place of business (if a foreign corporation, give name and postoffice of statutory agent), your position with reference to same, and your authority for appearing in its behalf.

Ans. Utah Power & Light Company; with its Statutory Agent, Clency St. Clair and principal place of business in Idaho, located at Idaho Falls, Bonneville, County; Assistant to the Company's Chief Engineer and General Superintendent; Resolution of its Board of Directors.

Ques. 3. State number and date of permit, and date of priority you propose to establish under the permit.

Ans. Permit No. 15596; 9 A. M. June 12th, 1922.

Ques. 4. State source of water supply and give exact location of point of diversion.

4.

The source of water supply and location of exact points of diversion to supply this unit of the project contemplated by said permit are as follows:

Source--Bear River and its tributaries.
Points of Diversion:

(1) From Bear River in Caribou County, Idaho, into Soda Reservoir, at a point South 8° 45' West 1,600 feet from the quarter corner on the East Boundary line of Section 13, Township 9 South, Range 41 East, B. M., in the Southeast quarter of said Section 13. A continuous flow of 1,500 cubic feet per second will be diverted at this point.

(2) From Bear River in Caribou County, Idaho, and Soda Reservoir into penstocks by means of a dam located in the channel of said river at a point South 36° 23' East, 2,154.6 feet from the Northeast corner of Section 18, Township 9 South, Range 41 East, B. M., in the Northwest quarter of Section 17, said Township and Range. The equivalent of a continuous flow of 1,500 cubic feet per second will be diverted at this point.

the water is returned to the channel of Bear River at a point which bears South 33° 38' East, 2035.0 feet from the Northeast Corner of Section 18, Township 9 South, Range 41 East, B. B. & M. The works are capable of carrying more than One Thousand Five Hundred cubic feet per second of water. The name of this unit of the development is "Soda Power Plant."

Ques. 7. If for other than irrigation purposes, state how applied, amount of horse power generated, etc.

Ans.

Ques. 8. What is the minimum amount of water required for the use specified above?

Ans. One Thousand Five Hundred Cubic Feet per second.

Ques. 9. If you are not the person or representative of the corporation to whom above mentioned permit was originally issued, please state how ownership was acquired by present holder.

Ans. Permit originally issued to Utah Power & Light Company.

PERMIT NO. 15596

Proof of Application of Water to Beneficial Use

DEPOSITION OF HOLDER

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. J. L. Hale; 37 yrs; Salt Lake City, Utah; Civil and Hydraulic Engineer; Kearns Building, Salt Lake City, Utah.

Ques. 2. If acting in behalf of a corporation, state its name, principal place of business (if a

Ques. 5. Describe your works of diversion, and state amount of water they are capable of conveying from point of diversion to place of use, and give name of canal or ditch or other works by which water is conducted to such place of use.

5.

The diversion works, at this unit of the project contemplated by said permit, consist of a reinforced concrete and masonry diversion and storage dam, of gravity overflow type, 463 feet long at top, maximum height 99 feet, maximum width 109 feet and an earth fill 65 feet long, maximum height 30 feet, located at the south end of the concrete dam. This dam creates an Equalizing Reservoir in the channel of Bear River, having a capacity in excess of 10,000 acre feet. The water passes from the reservoir, through the dam to a power house located in the dam, on the downstream side by means of four reinforced concrete conduits or penstocks, where it is used to turn two Hydro-Electric Generators, each with a capacity of 7,000 K. W.; the flow is controlled by four electrically operated steel gates; after being used as above mentioned the water is returned to the channel of Bear River at a point which bears South 33° 28' East, 2035.0 feet from the Northeast Corner of Section 18, Township 9 South, Range 41 East, S. L. B. & M. The works are capable of carrying more than One Thousand Five Hundred cubic feet per second of water. The name of this unit of the development is "Soda Power Plant."

Ques. 7. If for other than irrigation purposes, state how applied, amount of horse power generated, etc.

Ans.

Ques. 8. What is the minimum amount of water required for the use specified above?

Ans. One Thousand Five Hundred Cubic Feet per second.

Ques. 9. If you are not the person or representative of the corporation to whom above mentioned permit was originally issued, please state how ownership was acquired by present holder.

Ans. Permit originally issued to Utah Power & Light Company.

PERMIT No. 15596

Proof of Application of Water to Beneficial Use

DEPOSITION OF HOLDER

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. J. A. Hale; 37 yrs; Salt Lake City, Utah; Civil and Hydraulic Engineer; Kearns Building, Salt Lake City, Utah.

Ques. 2. If acting in behalf of a corporation, state its name, principal place of business (if a

Ques. 6. State for what purpose water is used and describe place of use. (If for irrigation, name each subdivision in which used, and number of acres in each subdivision that have actually been irrigated with said water.) State whether cultivated or natural meadow land and the nature of all improvements which have been made as a direct result of said use.

Ans. The water is used for the generating of electrical energy at the Company's "Soda Power Plant" above mentioned.

Ques. 7. If for other than irrigation purposes, state how applied, amount of horse power generated, etc.

Ans.

Ques. 8. What is the minimum amount of water required for the use specified above?

Ans. One Thousand Five Hundred Cubic Feet per second.

Ques. 9. If you are not the person or representative of the corporation to whom above mentioned permit was originally issued, please state how ownership was acquired by present holder.

Ans. Permit originally issued to Utah Power & Light Company.

Ques. 10. State when, how, in what amount and to what extent the water diverted under above mentioned permit has been used.

10.

Continuously since August 1st, 1924, except for short intervals when the plant was shut down for repairs. By and through the pressure conduit and on the water wheels hereinbefore mentioned. To the extent of more than One Thousand Five Hundred (1,500) cubic feet per second.

herein described. Give full particulars regarding such other appropriations and rights claimed thereunder.

Ans. I take it this applies to use for Irrigation Purposes.

(Sign) J. A. Hale

I hereby certify that the foregoing testimony was read to the above subscribed before its signing, that I believe him to be the person he represents himself to be, and that said testimony was subscribed and sworn to before me, at my office in Salt Lake City, County of Salt Lake, State of ~~Idaho~~ Utah, on this 11 day of December A. D. 1926

H. Wright

Notary Public

Residing at Salt Lake City

15596

Form 17 The deposition of two witnesses, on this form, taken separately required in each case

Permit No. 15596

Proof of Application of Water to Beneficial Use

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. G. Clyde Baldwin; 40 yrs; Idaho Falls, Idaho; Civil and Hydraulic Engineer; Idaho Falls, Idaho;

Ques. 2. Are you acquainted with Utah Power & Light Company, the

2..

Yes. I have known of such Company, and have been familiar with its operations for more than five years last past. Its principal place of business in Idaho is located at Idaho Falls, Bonneville County.

visions and conditions?

Ans. Yes

Ques. 4. State source of water supply, place of diversion, and describe works for conveying water from point of diversion to place of use.

The water supply for the use contemplated by this permit, is Bear River and its tributaries. The place of diversion is in Section 17, Township 8 South, Range 41 East B.B.&M., Caribou County, Idaho.

The diversion works, at this unit, consist of a reinforced concrete and masonry diversion and storage dam, of gravity overflow type, which creates an Equalizing Reservoir in the channel of Bear River. The water passes from the Reservoir, through the dam, to a power house located in the dam, by means of four reinforced concrete conduits or penstocks, the flow to the penstocks being controlled by electrically operated steel gates.

Ques. 6. State for what purpose water is used and at what place. (If for irrigation, give each subdivision in which water has been used and number of acres irrigated in each subdivision.) State whether cultivated or natural meadow land and the nature of all improvements which have been made as a direct result of said use.

Ans. Water is used for the generation of electrical power and energy at the "Soda Point Power Plant," near Alexander, Idaho.

Ques. 7. If for power or other purposes than irrigation, state how water has been applied and to what extent.

Ans. Water has been applied through the works hereinabove mentioned to two Hydro-electric Units to the extent of more than One Thousand Five Hundred cubic feet per second.

Ques. 8. (If for irrigation) state character of land that has been reclaimed, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Not used for irrigation.

Form 17 The deposition of two witnesses, on this form, taken separately, required in each case

Permit No. 15596

Proof of Application of Water to Beneficial Use

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. G. Clyde Baldwin; 40 yrs; Idaho Falls, Idaho; Civil and Hydraulic Engineer; Idaho Falls, Idaho;

Ans.

Ques. 3. Have you read or heard read said Permit No. 15596, and are you familiar with its provisions and conditions?

Ans. Yes

Ques. 4. State source of water supply, place of diversion, and describe works for conveying water from point of diversion to place of use.

The water supply for the use contemplated by this permit, is Bear River and its tributaries. The place of diversion is in Section 17, Township 8 South, Range 41 East B.B.&M., Caribou County, Idaho.

The diversion works, at this unit, consist of a reinforced concrete and masonry diversion and storage dam, of gravity overflow type, which creates an Equalizing Reservoir in the channel of Bear River. The water passes from the Reservoir, through the dam, to a power house located in the dam, by means of four reinforced concrete conduits or penstocks, the flow to the penstocks being controlled by electrically operated steel gates.

Ques. 6. State for what purpose water is used and at what place. (If for irrigation, give each subdivision in which water has been used and number of acres irrigated in each subdivision.) State whether cultivated or natural meadow land and the nature of all improvements which have been made as a direct result of said use.

Ans. Water is used for the generation of electrical power and energy at the "Soda Point Power Plant," near Alexander, Idaho.

Ques. 7. If for power or other purposes than irrigation, state how water has been applied and to what extent.

Ans. Water has been applied through the works hereinabove mentioned to two Hydro-electric Units to the extent of more than One Thousand Five Hundred cubic feet per second.

Ques. 8. (If for irrigation) state character of land that has been reclaimed, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Not used for irrigation.

Form 17 The deposition of two witnesses, on this form, taken separately, required in each case

Permit No. 15596

Proof of Application of Water to Beneficial Use

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. G. Clyde Baldwin; 40 yrs; Idaho Falls, Idaho; Civil and Hydraulic Engineer; Idaho Falls, Idaho;

Ans.

Ques. 3. Have you read or heard read said Permit No. 15596, and are you familiar with its pro-

Ques. 5. How many second-feet of water do you estimate said works will safely conduct to place of use, and how much water have you seen being so conveyed?

Ans. More than One Thousand Five Hundred cubic feet per second.

Ques. 6. State for what purpose water is used and at what place. (If for irrigation, give each subdivision in which water has been used and number of acres irrigated in each subdivision.) State whether cultivated or natural meadow land and the nature of all improvements which have been made as a direct result of said use.

Ans. Water is used for the generation of electrical power and energy at the "Soda Point Power Plant," near Alexander, Idaho.

Ques. 7. If for power or other purposes than irrigation, state how water has been applied and to what extent.

Ans. Water has been applied through the works hereinabove mentioned to two Hydro-electric Units to the extent of more than One Thousand Five Hundred cubic feet per second.

Ques. 8. (If for irrigation) state character of land that has been reclaimed, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Not used for irrigation.

Ques. 9. Have you any interest in the works, water or lands above mentioned? If so, in what way and to what extent?

Ans. None whatever.

Ques. 10. State when, how, in what amount and to what extent you have witnessed the application to beneficial use of water diverted under said permit.

Ans. On November 3, 1924, by personal observation and examination I witnessed the application to beneficial use, at this plant of more than One Thousand Five Hundred cubic feet per second of the flow of Bear River, and fully satisfied myself of the correctness of all the foregoing answers.

(Sign) G. Clyde Baldwin

I hereby certify that the foregoing testimony was read to the above subscriber before its signing, that I believe him to be the person he represents himself to be, and that said testimony was subscribed and sworn to before me in Idaho Falls, County of Bonneville, State of Idaho, on this 8 day of Dec A. D. 1924

Otto Van Cutchen
Notary Public.

My commission expires 4/24/27

15596

Permit No. 15596

Proof of Application of Water to Beneficial Use

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. Myron A. Swendsen; 33 years; Pocatello, Idaho; Civil and Hydraulic Engineer; c/o Elks Club, Pocatello, Idaho.

Ques. 2. Are you acquainted with UTAH POWER & LIGHT COMPANY, the holder of Permit No. 15596? How long have you known him and where does he reside?

2.

Yes. I have known of such Company, and have been familiar with its operations for more than five years last past. Its principal place of business in Idaho is located at Idaho Falls, Bonneville County.

Ans. Yes.

Ques. 4. State source of water supply, place of diversion, and describe works for conveying water from point of diversion to place of use.

4.

The water supply for the use contemplated by this permit, is Bear River and its tributaries. The place of diversion is in Section 17, Township 9 South, Range 41 East B. B. & M., Caribou County, Idaho.

The diversion works, at this unit, consist of a reinforced concrete and masonry diversion and storage dam, of gravity overflow type, which creates an Equalizing Reservoir in the channel of Bear River. The water passes from the Reservoir, through the dam, to a power house located in the dam, by means of four reinforced concrete conduits or penstocks, the flow to the penstocks being controlled by electrically operated steel gates.

division in which water has been used and number of acres irrigated in each subdivision.) State whether cultivated or natural meadow land and the nature of all improvements which have been made as a direct result of said use.

Ans. Water is used for the generation of electrical power and energy at the "Soda Point Power Plant," near Alexander, Idaho.

Ques. 7. If for power or other purposes than irrigation, state how water has been applied and to what extent.

Ans. Water has been applied through the works hereinabove mentioned to two Hydro-Electric Units to the extent of more than One Thousand Five Hundred (1,500) cubic feet per second.

Ques. 8. (If for irrigation) state character of land that has been reclaimed, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Not used for irrigation.

Form 17 — The deposition of two witnesses, on this form, taken separately, required in each case

Permit No. 15596

Proof of Application of Water to Beneficial Use

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. Myron . Svendsen; 33 years; Pocatello, Idaho; Civil and Hydraulic Engineer; C/O Elks Club, Pocatello, Idaho.

Ques. 2. Are you acquainted with UTAH POWER & LIGHT COMPANY, the

Ques. 3. Have you read or heard read said Permit No. 15596, and are you familiar with its provisions and conditions?

Ans. Yes.

Ques. 4. State source of water supply, place of diversion, and describe works for conveying water from point of diversion to place of use.

4.

The water supply for the use contemplated by this permit, is Bear River and its tributaries. The place of diversion is in Section 17, Township 9 South, Range 41 East B. B. & M., Caribou County, Idaho.

The diversion works, at this unit, consist of a reinforced concrete and masonry diversion and storage dam, of gravity overflow type, which creates an Equalizing Reservoir in the channel of Bear River. The water passes from the Reservoir, through the dam, to a power house located in the dam, by means of four reinforced concrete conduits or penstocks, the flow to the penstocks being controlled by electrically operated steel gates.

division in which water has been used and number of acres irrigated in each subdivision.) State whether cultivated or natural meadow land and the nature of all improvements which have been made as a direct result of said use.

Ans. Water is used for the generation of electrical power and energy at the "Soda Point Power Plant," near Alexander, Idaho.

Ques. 7. If for power or other purposes than irrigation, state how water has been applied and to what extent.

Ans. Water has been applied through the works hereinabove mentioned to two Hydro-Electric Units to the extent of more than One Thousand Five Hundred (1,500) cubic feet per second.

Ques. 8. (If for irrigation) state character of land that has been reclaimed, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Not used for irrigation.

Form 17 The deposition of two witnesses, on this form, taken separately, required in each case

Permit No. 15596

Proof of Application of Water to Beneficial Use

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. Myron . Dwendsen; 33 years; Pocatello, Idaho; Civil and Hydraulic Engineer; C/O Elks Club, Pocatello, Idaho.

Ques. 2. Are you acquainted with UTAH POWER & LIGHT COMPANY the

Ques. 5. How many second-feet of water do you estimate said works will safely conduct to place of use, and how much water have you seen being so conveyed?

Ans. More than 1,500 cubic feet per second.

Ques. 6. State for what purpose water is used and at what place. (If for irrigation, give each subdivision in which water has been used and number of acres irrigated in each subdivision.) State whether cultivated or natural meadow land and the nature of all improvements which have been made as a direct result of said use.

Ans. Water is used for the generation of electrical power and energy at the "Soda Point Power Plant," near Alexander, Idaho.

Ques. 7. If for power or other purposes than irrigation, state how water has been applied and to what extent.

Ans. Water has been applied through the works hereinabove mentioned to two Hydro-Electric Units to the extent of more than One Thousand Five Hundred (1,500) cubic feet per second.

Ques. 8. (If for irrigation) state character of land that has been reclaimed, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Not used for irrigation.

Ques. 9. Have you any interest in the works, water or lands above mentioned? If so, in what way and to what extent?

Ans. None whatever.

Ques. 10. State when, how, in what amount and to what extent you have witnessed the application to beneficial use of water diverted under said permit.

Ans. On November 3, 1924, by personal observation and examination I witnessed the application to beneficial use, at this plant of more than One Thousand Five Hundred (1,500) cubic feet per second of the flow of Bear River, and fully satisfied myself of the correctness of all the foregoing answers.

(Sign) Myron Bowden

I hereby certify that the foregoing testimony was read to the above subscriber before its signing, that I believe him to be the person he represents himself to be, and that said testimony was subscribed and sworn to before me in Pocatello, County of Bannock, State of Idaho, on this 5th day of December A. D. 1924

B. Rebecca Hays
Notary Public.

My commission expires Oct 20, 1924

15596

Form 15

PERMIT NO. 15596

Proof of Completion of Works

DEPOSITION OF HOLDER

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. J. A. Hale; 37 yrs; Civil and Hydraulic Engineer; Salt Lake City, Utah.

Ques. 2. If acting in behalf of a corporation, state its name, principal place of business, your position with reference to same, and your authority for appearing in its behalf.

Ans. Utah Power & Light Company. In Idaho, at IdahoFalls, Bonneville County. Assistant to the Company's Chief Engineer and General Superintendent. Resolution of its Board of Directors.

Ques. 3. State number and date of permit, amount of water you are authorized to divert, source, and [illegible] of diversion.

3.

Application No. 22060, filed in the office of the Commissioner of Reclamation at Idaho, June 12, 1922; approved by said Commissioner October 6, 1922, as Permit No. 15596. The amount of water which applicant is authorized to divert, the source and point of diversion to supply this unit of the project contemplated by said permit as follows:

Amount--1,500 cubic feet per second;
Source--Bear River and its tributaries;
Points of Diversion:

(1) From Bear River in Caribou County, Idaho, into Soda Reservoir, at a point South 8° 45' West 1,600 feet from the quarter corner on the East Boundary line of Section 13, Township 9 South, Range 41 East, B. M., in the Southeast quarter of said Section 13. A continuous flow of 1,500 cubic feet per second will be diverted at this point.

(2) From Bear River in Caribou County, Idaho, and Soda Reservoir into penstocks by means of a dam located in the channel of said river at a point South 36° 23' East, 2,134.6 feet from the Northeast corner of Section 18, Township 9 South, Range 41 East, B. M., in the Northwest quarter of Section 17, said Township and Range. The equivalent of a continuous flow of 1,500 cubic feet per second will be diverted at this point.

Ques. 8. Give description of works, state dimensions and capacity of each part, and give cost of same.

8.

The diversion works, at this unit of the project contemplated by said permit, consist of a reinforced concrete and masonry diversionand storage dam, of gravity overflow type, 463 feet long at top, maximum height 99 feet, maximum width 109 feet and an earth fill 66 feet long, maximum height 30 feet, located at the South end of the concrete dam. This dam creates an Equalizing Reservoir in the channel of Bear River, having a capacity in excess of 10,000 acre feet. The water passes from the Reservoir, through the dam to a power house located in the dam, on the downstream side, by means of four reinforced concrete conduits or penstocks; the flow through these penstocks being controlled by electrically operated steel gates. All of such works are completed and are of sufficient capacityto divert and carry from the river to the place of use and return thence to the channel of Bear River more than One Thousand Five Hundred (1,500) cubic feet per second, of water. The works were constructed at a cost of more than One Million Dollars.

My Commission expires January 15/926

Notary Public
Residing at Salt Lake City

15596

Form 15

PERMIT NO. 15596

Proof of Completion of Works

Ques. 4. State purpose for which water is to be used, and, if for irrigation, state the number of acres and give description of the land you intend to reclaim.

Ans. For generating electrical power for gereral commercial purposes.

Ques. 5. State whether or not the water has been turned into your works of diversion, and, if so, when and to what extent.

Ans. Yes. On or about August 1st , 1924. Continuously since that time in varying quantities with a maximum use of more than 1,500 c.f.s.

Ques. 6. State whether or not the works of diversion are fully completed, and whether or not they comply in all respects with the terms of the permit.

6.

The works of diversion at this unit of the project contemplated by this permit are fully completed and comply with the plans filed with and approved by the Commissioner of Reclamation of the State of Idaho.

Ques. 8. Give description of works, state dimensions and capacity of each part, and give cost of same.

8.

The diversion works, at this unit of the project contemplated by said permit, consist of a reinforced concrete and masonry diversionand storage dam, of gravity overflow type, 403 feet long at top, maximum height 99 feet, maximum width 109 feet and an earth fill 66 feet long, maximum height 30 feet, located at the South end of the concrete dam. This dam creates an Equalizing Reservoir in the channel of Bear River, having a capacity in excess of 10,000 acre feet. The water passes from the Reservoir, through the dam to a power house located in the dam, on the downstream side, by means of four reinforced concrete conduits or penstocks; the flow through these penstocks being controlled by electrically operated steel gates. All of such works are completed and are of sufficient capacityto divert and carry from the river to the place of use and return thence to the channel of Bear River more than One Thousand Five Hundred (1,500) cubic feet per second, of water. The works were constructed at a cost of more than One Million Dollars.

My Commission expires January 15/926

Notary Public
Residing at Salt Lake City

15596

Form 15

PERMIT NO. 15596

Proof of Completion of Works

Ques. 4. State purpose for which water is to be used, and, if for irrigation, state the number of acres and give description of the land you intend to reclaim.

Ans. For generating electrical power for general commercial purposes.

Ques. 5. State whether or not the water has been turned into your works of diversion, and, if so, when and to what extent.

Ans. Yes. On or about August 1st , 1924. Continuously since that time in varying quantities with a maximum use of more than 1,500 c.f.s.

Ques. 7. If the works of diversion do not comply with all the terms of your permit, state fully those particulars in which there is any variance.

Ans.

Ques. 8. Give description of works, state dimensions and capacity of each part, and give cost of same.

The diversion works, at this unit of the project contemplated by said permit, consist of a reinforced concrete and masonry diversion and storage dam, of gravity overflow type, 463 feet long at top, maximum height 99 feet, maximum width 109 feet and an earth fill 66 feet long, maximum height 30 feet, located at the South end of the concrete dam. This dam creates an Equalizing Reservoir in the channel of Bear River, having a capacity in excess of 10,000 acre feet. The water passes from the Reservoir, through the dam to a power house located in the dam, on the downstream side, by means of four reinforced concrete conduits or penstocks; the flow through these penstocks being controlled by electrically operated steel gates. All of such works are completed and are of sufficient capacityto divert and carry from the river to the place of use and return thence to the channel of Bear River more than One Thousand Five Hundred (1,500) cubic feet per second, of water. The works were constructed at a cost of more than One Million Dollars.

My Commission expires January 15/1926

Notary Public.
Residing at Salt Lake City

15596

Form 15

PERMIT NO. 15596

Proof of Completion of Works

Ques. 4. State purpose for which water is to be used, and, if for irrigation, state the number of acres and give description of the land you intend to reclaim.

Ans. For generating electrical power for general commercial purposes.

Ques. 5. State whether or not the water has been turned into your works of diversion, and, if so, when and to what extent.

Ans. Yes. On or about August 1st, 1924. Continuously since that time in varying quantities with a maximum use of more than 1,500 c.f.s.

(Sign here.) L. A. Hale

I hereby certify that the foregoing testimony was read to the above subscriber before its signing, that I believe him to be the person he represents himself to be, and that said testimony was subscribed and sworn to before me, in Salt Lake City, County of Salt Lake, State of ~~Idaho~~ Utah, on this 11 day of December A. D. 1924

J. H. Moore

Notary Public.
Residing at Salt Lake City

My Commission expires January 15/926

15596

Form 1-4

The Depositions of two Witnesses, in this form, taken separately, required in each case.

PERMIT NO. 15596

Proof of Completion of Works

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. Myron . Swendsen; 33 years; Pocatello, Idaho; Civil and Hydraulic Engineer; C/O Elks Club, Pocatello, Idaho.

Ques. 2. Are you acquainted with UTAH POWER & LIGHT COMPANY, the holder of Permit No. 15596, authorizing the diversion of 1,500 second-feet of the waters of Bear River, at Soda Point Power House for Power purposes? How long have you known him, and where does he reside?

2.

Yes. I have known of such Company, and have been familiar with its operations for more than five years last past. Its principal place of business in Idaho is located at Idaho Falls, Bonneville County.

Ques. 4. (If for irrigation purposes). Are you acquainted with the land proposed to be irrigated under said permit? If so, describe same, state its character, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Water is to be used under this permit for Power Purposes.

Ques. 5. Are the works of diversion fully completed and of sufficient capacity to convey the entire amount of water set out in the permit from point of diversion to place of use?

5.

The works of diversion at this unit of the project contemplated by this permit are fully completed and of sufficient capacity to carry more than One Thousand Five Hundred cubic feet per second of water from the point of diversion to the place of use.

The diversion works, at this unit consist of a reinforced concrete and masonry diversion and storage dam, of gravity overflow type, which create an Equalizing Reservoir in the channel of Bear River. The water passes from the Reservoir, through the dam, to a power house located in the dam, by means of four reinforced concrete conduits or penstocks, the flow to the penstocks being controlled by electrically operated steel gates. All of such works are completed and are of capacity sufficient to divert and carry to the place of use and return thence to the Channel of Bear River, more than One Thousand Five Hundred (1,500) cubic feet per second of water.

I believe him to be the person he represents himself to be, and that said testimony was subscribed and sworn to before me, at my office in Pocatello, County of Bannock, State of Idaho, on this 5th day of December A. D. 1924.

D. Rebecca Nayd
Notary Public

15596

Form 14

The Depositions of two Witnesses, in this form, taken separately, required in each case.

PERMIT NO. 15596

Proof of Completion of Works

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. Myron A. Swendsen; 33 years; Pocatello, Idaho; Civil and Hydraulic Engineer; C/O Elks Club, Pocatello, Idaho.

Ques. 2. Are you acquainted with UTAH POWER & LIGHT COMPANY, the holder of Permit No. 15596, authorizing the diversion of 1,500 second-feet of the waters of Bear River, at Soda Point Power House

Ques. 3. Have you read or heard read said Permit No. 15596, and are you familiar with its terms and conditions?

Ans. Yes.

Ques. 4. (If for irrigation purposes). Are you acquainted with the land proposed to be irrigated under said permit? If so, describe same, state its character, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Water is to be used under this permit for Power Purposes.

Ques. 5. Are the works of diversion fully completed and of sufficient capacity to convey the entire amount of water set out in the permit from point of diversion to place of use?

5.

The works of diversion at this unit of the project contemplated by this permit are fully completed and of sufficient capacity to carry more than One Thousand Five Hundred cubic feet per second of water from the point of diversion to the place of use.

The diversion works, at this unit consist of a reinforced concrete and masonry diversion and storage dam, of gravity overflow type, which create an Equalizing Reservoir in the channel of Bear River. The water passes from the Reservoir, through the dam, to a power house located in the dam, by means of four reinforced concrete conduits or penstocks, the flow to the penstocks being controlled by electrically operated steel gates. All of such works are completed and are of capacity sufficient to divert and carry to the place of use and return thence to the Channel of Bear River, more than One Thousand Five Hundred (1,500) cubic feet per second of water.

I believe him to be the person he represents himself to be, and that said testimony was subscribed and sworn to before me, at my office in Pocatello, County of Bannock, State of Idaho, on this 5th day of December A. D. 1924.

D. Rebecca Hayes
Notary Public

15596

Form 14

The Depositions of two Witnesses, in this form, taken separately, required in each case.

PERMIT NO. 15596

Proof of Completion of Works

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. Myron . . Swendsen; 33 years; Pocatello, Idaho; Civil and Hydraulic Engineer; C/O Elks Club, Pocatello, Idaho.

Ques. 2. Are you acquainted with UTAH POWER & LIGHT COMPANY, the holder of Permit No. 15596, authorizing the diversion of 1,500 second-feet of the waters of Bear River, at Soda Point Power House

Ques. 3. Have you read or heard read said Permit No. 15596, and are you familiar with its terms and conditions?

Ans. Yes.

Ques. 4. (If for irrigation purposes). Are you acquainted with the land proposed to be irrigated under said permit? If so, describe same, state its character, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Water is to be used under this permit for Power Purposes.

Ques. 6. Describe the works of diversion as they now exist, and give your estimate of their capac y

6.

The diversion works, at this unit consist of a reinforced concrete and masonry diversion and storage dam, of gravity overflow type, which create an Equalizing Reservoir in the channel of Bear River. The water passes from the Reservoir, through the dam, to a power house located in the dam, by means of four reinforced concrete conduits or penstocks, the flow to the penstocks being controlled by electrically operated steel gates. All of such works are completed and are of capacity sufficient to divert and carry to the place of use and return thence to the Channel of Bear River, more than One Thousand Five Hundred (1,500) cubic feet per second of water.

I believe him to be the person he represents himself to be, and that said testimony was subscribed and sworn to before me, at my office in Pocatello, County of Bannock, State of Idaho, on this 5th day of December A. D. 1924.

D. Rebecca Hayes
Notary Public

15596

Form 14

The Depositions of two Witnesses, in this form, taken separately, required in each case.

PERMIT NO. 15596

Proof of Completion of Works

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. Myron L. Swendsen; 33 years; Pocatello, Idaho; Civil and Hydraulic Engineer; C/O Elks Club, Pocatello, Idaho.

Ques. 2. Are you acquainted with UTAH POWER & LIGHT COMPANY, the holder of Permit No. 15596, authorizing the diversion of 1,500 second-feet of the waters of Bear River, at Soda Point Power House

Ques. 3. Have you read or heard read said Permit No. 15596, and are you familiar with its terms and conditions?

Ans. Yes.

Ques. 4. (If for irrigation purposes). Are you acquainted with the land proposed to be irrigated under said permit? If so, describe same, state its character, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Water is to be used under this permit for Power Purposes.

(Sign here.) Myron L. Swendsen

I hereby certify that the foregoing testimony was read to the above subscriber before its signing, that I believe him to be the person he represents himself to be, and that said testimony was subscribed and sworn to before me, at my office in Pocatello, County of Bannock, State of Idaho, on this 5th day of December A. D. 1924.

D. Rebecca Mayo
Notary Public

15596

Form 14

The Depositions of two Witnesses, in this form, taken separately, required in each case.

PERMIT NO. 15596

Proof of Completion of Works

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. G. Clyde Baldwin; 40 yrs; Idaho Falls, Idaho; Civil and Hydraulic Engineer; Idaho Falls, Idaho.

Ques. 2. Are you acquainted with UTAH POWER & LIGHT COMPANY, the holder of Permit No. 15596, authorizing the diversion of 1,500 second-feet of the waters of Bear River, at Soda Point Power House, for Power purposes? How long have you known him, and where does he reside?

Yes. I have known of such Company, and have been familiar with its operations for more than five years last past. Its principal place of business in Idaho is located at Idaho Falls, Bonneville County.

Ans. Yes

Ques. 4. (If for irrigation purposes). Are you acquainted with the land proposed to be irrigated under said permit? If so, describe same, state its character, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Water is to be used under this permit for Power purposes.

Ques. 5. Are the works of diversion fully completed and of sufficient capacity to convey the entire amount of water set out in the permit from point of diversion to place of use?

5.

The works of diversion at this unit of the project contemplated by this permit are fully completed and of sufficient capacity to carry more than One Thousand Five Hundred cubic feet per second of water from the point of diversion to the place of use.

6.

The diversion works, at this unit consist of a reinforced concrete and masonry diversion and storage dam, of gravity overflow type, which create an Equalizing Reservoir in the channel of Bear River. The water passes from the Reservoir, through the dam, to a power house located in the dam, by means of four reinforced concrete conduits or penstocks, the flow to the penstocks being controlled by electrically operated steel gates. All of such works are completed and are of capacity sufficient to divert and carry to the place of use and return thence to the Channel of Bear River, more than One Thousand Five Hundred (1,500) cubic feet per second of water.

[illegible] A. D. 19[illegible]

[illegible]
Notary Public

15596

Form 14

The Depositions of two Witnesses, in this form, taken separately, required in each case.

PERMIT NO. 15596

Proof of Completion of Works

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. G. Clyde Baldwin; 40 yrs; Idaho Falls, Idaho; Civil and Hydraulic Engineer; Idaho Falls, Idaho.

Ques. 2. Are you acquainted with UTAH POWER & LIGHT COMPANY, the holder of Permit No. 15596, authorizing the diversion of 1,500 second-feet of the waters of Bear River, at Soda Point Power House.

Ques. 3. Have you read or heard read said Permit No. 15596, and are you familiar with its terms and conditions?

Ans. Yes

Ques. 4. (If for irrigation purposes). Are you acquainted with the land proposed to be irrigated under said permit? If so, describe same, state its character, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Water is to be used under this permit for Power purposes.

Ques. 5. Are the works of diversion fully completed and of sufficient capacity to convey the entire amount of water set out in the permit from point of diversion to place of use?

5.

The works of diversion at this unit of the project contemplated by this permit are fully completed and of sufficient capacity to carry more than One Thousand Five Hundred cubic feet per second of water from the point of diversion to the place of use.

6.

The diversion works, at this unit consist of a reinforced concrete and masonry diversion and storage dam, of gravity overflow type, which create an Equalizing Reservoir in the channel of Bear River. The water passes from the Reservoir, through the dam, to a power house located in the dam, by means of four reinforced concrete conduits or penstocks, the flow to the penstocks being controlled by electrically operated steel gates. All of such works are completed and are of capacity sufficient to divert and carry to the place of use and return thence to the Channel of Bear River, more than One Thousand Five Hundred (1,500) cubic feet per second of water.

Dec A. D. 1924

Notary Public

15596

Form 14

The Depositions of two Witnesses, in this form, taken separately, required in each case.

PERMIT NO. 15596

Proof of Completion of Works

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. G. Clyde Baldwin; 40 yrs; Idaho Falls, Idaho; Civil and Hydraulic Engineer; Idaho Falls, Idaho.

Ques. 2. Are you acquainted with UTAH POWER & LIGHT COMPANY, the holder of Permit No. 15596, authorizing the diversion of 1,500 second-feet of the waters of Bear River, at Soda Point Power House.

Ques. 3. Have you read or heard read said Permit No. 15596, and are you familiar with its terms and conditions?

Ans. Yes

Ques. 4. (If for irrigation purposes). Are you acquainted with the land proposed to be irrigated under said permit? If so, describe same, state its character, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Water is to be used under this permit for Power purposes.

Ques. 5. Are the works of diversion fully completed and of sufficient capacity to convey the entire

Ques. 6. Describe the works of diversion as they now exist, and give your estimate of their capacity.

Ans.

6.

The diversion works, at this unit consist of a reinforced concrete and masonry diversion and storage dam, of gravity overflow type, which create an Equalizing Reservoir in the channel of Bear River. The water passes from the Reservoir, through the dam, to a power house located in the dam, by means of four reinforced concrete conduits or penstocks, the flow to the penstocks being controlled by electrically operated steel gates. All of such works are completed and are of capacity sufficient to divert and carry to the place of use and return thence to the Channel of Bear River, more than One Thousand Five Hundred (1,500) cubic feet per second of water.

Dec A. D. 1924

Notary Public

15596

Form 14

The Depositions of two Witnesses, in this form, taken separately, required in each case.

PERMIT NO. 15596

Proof of Completion of Works

DEPOSITION OF WITNESS

Ques. 1. State your name, age, residence, occupation and postoffice address.

Ans. G. Clyde Baldwin; 40 yrs; Idaho Falls, Idaho; Civil and Hydraulic Engineer; Idaho Falls, Idaho.

Ques. 2. Are you acquainted with UTAH POWER & LIGHT COMPANY, the holder of Permit No. 15596, authorizing the diversion of 1,500 second-feet of the waters of Bear River, at Soda Point Power House.

Ques. 3. Have you read or heard read said Permit No. 15596, and are you familiar with its terms and conditions?

Ans. Yes

Ques. 4. (If for irrigation purposes). Are you acquainted with the land proposed to be irrigated under said permit? If so, describe same, state its character, and give your estimate of the amount of water required for its profitable cultivation.

Ans. Water is to be used under this permit for Power purposes.

Ques. 5. Are the works of diversion fully completed and of sufficient capacity to convey the entire

(Sign here.) G. Clyde Baldwin

I hereby certify that the foregoing testimony was read to the above subscriber before its signing, that I believe him to be the person he represents himself to be, and that said testimony was subscribed and sworn to before me, at my office in Idaho Falls, County of Bonneville, State of Idaho, on this 8th day of Dec A. D. 1927

Otto M. Luthey
Notary Public

15596

December 26, 1924.

Re: Permit 15596-Utah Power & Light Co.

Mr. George R. Corey,
Assistant Attorney,
Utah Power & Light Co.,
Salt Lake City, Utah.

Dear Sir:

This will acknowledge receipt of depositions of holder and witnesses in the matter of proofs of completion of works and beneficial use of water under Permit 15596, together with check for $455.00

In looking through the files of this Permit, it is noted that the affidavit of publication from the Soda Springs Chieftain has not yet been filed.

As soon as this has been received, the matter of issuing certificate of completion of works and license will be taken up.

Very truly yours,

W. G. SWENDSEN

Commissioner of Reclamation

By

E. Chief Clerk.

15596

UTAH POWER & LIGHT COMPANY

KEARNS BUILDING

SALT LAKE CITY, UTAH

December 23,

1924

Mr. W. G. Swendsen,

Commissioner of Reclamation,

Boise, Idaho.

Dear Sir:

On December 22, 1924, we submitted Proof of Completion of Works and Proof of Application to Beneficial Use covering the Soda Power Plant, being one unit contemplated under Permit No. 15596. In order that the Certificate and License which will be issued by your office under this permit will show that only the Soda Plant is covered by this Proof, I have prepared and submit herewith a form of Certificate of Completion of Works and a License of Water Right and will appreciate it if you will have the certificate and license to be issued by you conform substantially with the form submitted.

Thanking you for your courtesy in this matter, I am

Yours very truly,

Assistant Attorney.

GRC:JP

15596

STATE OF IDAHO

LICENSE AND CERTIFICATE OF WATER RIGHT

WHEREAS, on the 12th day of June, 1922, Utah Power & Light Company, a corporation of Maine, doing business in the State of Idaho, with its principal place of business therein at Idaho Falls, Bonneville County, duly made application, designated No. 22060, to the Commissioner of Reclamation of the State of Idaho for a permit to divert and use for power purposes, the equivalent of a continuous flow of 1,500 cubic feet per second of the waters of Bear River, at the places designated in paragraphs "C" and "D" of remarks in said application; and

WHEREAS, on the 5th day of October, 1922, permit No. 15596 was issued under the above mentioned application to said applicant for the diversion and use of water at the places designated in said application; and

WHEREAS, said permit provided that the works of diversion therein designated should be completed on or before the 5th day of October, 1927, and that water should be applied to beneficial use thereunder on or before the 5th day of October, 1933; and

WHEREAS, on the 13th day of November, 1924, applicant filed in this office an affidavit by its Chief Engineer and General Superintendent, showing the corrected location of its Soda Dam, and the point of diversion into the penstocks, to be at a point which bears South 36° 23' East 2,154.6 feet from the Northeast corner of Section 18, Township 9 South Range 41 East, B. B. & M., and the corrected point of return of the waters used at said Soda Power Plant to be at a point which bears South 33° 28' East, 2035 feet from the Northeast corner of said Section 18, which change in location was duly approved by me, as Commissioner of Reclamation; and

15596

WHEREAS, on the 22nd day of December, 1924, applicant duly made Proof of Completion of Works for that unit of the development contemplated under Permit No. 15596, designated as "Soda Power Plant" (the point of diversion and place of use and return for said unit being set out in paragraphs denominated 1 and 2 of remarks "C", and paragraph denominated 1 of remarks "D" of said permit) as evidenced by the certificate of the Commissioner of Reclamation, No. 15596, dated January 9 -, 1925, approving and confirming the Completion of Works, at this unit of the project, of sufficient capacity for diverting and conveying to place of intended use, the quantity of water therein applied for; and - all blanks - and - whereas

WHEREAS, on the 22nd day of December, 1924, said applicant duly made Proof of Application to Beneficial Use of 1,500 cubic feet per second of the waters of Bear River at its "Soda Power Plant" above mentioned.

NOW THEREFORE, by virtue of authority, vested in me by the laws of the State of Idaho, I hereby grant and confirm unto said Utah Power & Light Company, the holder and owner of said permit No. 15596, a perpetual right, with priority as of the 12th day of June, 1922, to divert and use for power purposes at its "Soda Power Plant" at the point of diversion, use and return hereinabove set out, the equivalent of a continuous flow of 1,500 cubic feet per second of the waters of Bear River.

Witness my hand this ____ day of _____, 1924.

_____

Commissioner of Reclamation.

PERMIT NO. 15596.

CERTIFICATE OF COMPLETION OF WORKS.

This is to certify that Utah Power & Light Company, a corporation of Maine, doing business in the State of Idaho, with its principal place of business therein at Idaho Falls, Bonneville County, the holder of Permit No. 15596, issued by the Commissioner of Reclamation under application No. 22060, bearing date of priority of October 5, 1922, authorizing the diversion of 1,500 second feet of the waters of Bear River at certain points therein described, for power purposes, has fully complied with the provisions of the laws of the State of Idaho, relating to Proof of Completion of Works of diversion at the Soda Power Plant, set out and described in said application in sub-divisions 1 and 2, of paragraph "C" of remarks, and subdivision 1 of paragraph "D" of remarks in said application; that the point of diversion from Soda Reservoir into penstocks, and the point of return to the channel of Bear River, at the Soda Unit of the project contemplated under this permit have been changed by affidavits filed in this office, November 13, 1924, and are now located as follows:

a. Point of diversion into penstocks, at a point which bears South 36° 23' East 2,154.6 feet from the Northeast corner of Section 18, Township 9 South, Range 41 East, B. B. & M.

b. Point of return of the waters to the channel of Bear River located at a point which bears South 33° 28' East 2,035 feet from the Northeast Corner of said Section 18;

That said works are fully completed and are adequate for diverting and conveying to the place of use and return last above described, 1,500 second feet of the waters of Bear River.

Witness my hand this _____ day of _____, 192___.

15596

_____
Commissioner of Reclamation.

UTAH POWER & LIGHT COMPANY

KEARNS BUILDING

SALT LAKE CITY, UTAH

December 29, 1924

Commissioner of Reclamation,

Boise, Idaho.

Attention C. M. Brown

Dear Sir:

This is to acknowledge receipt of your letter of December 26th, and to advise that I am requesting the editor of the Chieftan to furnish your office with proof of publication as soon as he can.

Yours very truly,

Geo. R. Corey

Assistant Attorney

GRC-C

RECEIVED

DEC 31 1924

DEPARTMENT OF RECLAMATION

15596

Affidavit of Publication

Soda Springs Chieftain

STATE OF IDAHO. }
COUNTY OF CARIBOU. } ss

Ralph H. Kelley, being first duly sworn deposes and says that he is the publisher of THE SODA SPRINGS CHIEFTAIN, a newspaper published every week in Soda Springs, County of Caribou, State of Idaho; that said newspaper has a general circulation in Caribou County; and said newspaper has been so published continuously and uninterruptedly in said Caribou County, Idaho, during a period of seventy-eight (78) consecutive weeks next prior to the first publication of said notice.

That the annexed notice or advertisement was published once each week for 5 successive issues in said newspaper proper and not in a supplement; that the date of the first pulication of said advertisement was on the 13th day of November, 1924 and the date of the last publication was on the 11th day of December, 1924

Ralph H. Kelley

Subscribed and sworn to before me this 15th day of January, 1925

Herbert Hurston
Notary Public.

NOTICE OF PROOF OF COMPLETION OF WORKS AND APPLICATON OF WATER TO BENEFICIAL USE

Notice is hereby given that at 11:15 a. m. on the 22nd day of December, 1924, at Soda Springs, County of Caribou, State of Idaho, before S. E. Matthews, Notary Public, proof will be submitted of the completion of works for the diversion of 1500 cubic feet per second of the waters of Bear River, and of the application to beneficial use of said water in accordance with the terms and conditions of Permit No. 15596, heretofore issued by the Commissioner of Reclamation of the State of Idaho.

1. The name and postoffice address of the person or corporation, holding said permit, are Utah Power & Light Company, Salt Lake City, Utah.

2. Said works of diversion will be fully completed on the date set for such completion, and the amount of water which said works are capable of conducting to the place of use, in accordance with the plans accompanying the application for such permit, is 1500 cubic feet per second.

3. The use to which said water has been applied is generation of electrical power and energy and the amount applied to beneficial use is 1500 cubic feet per second.

4. The place where said water is used is At the Hydro Electric Power Plant of Utah Power & Light Company located in the channel of Bear River at Soda Springs near Alexander, Idaho.

5. The date of priority which said user is prepared to establish is June 12, 1922.

W. G. SWENDSEN,
Commissioner of Reclamation

15596

DETACH THIS SLIP BEFORE DEPOSITING THIS CHECK

U. P. & L. CO. FORM NO.J

UTAH POWER & LIGHT COMPANY,

DATE	DESCRIPTION	INVOICE NO.	ORDER NO.	AMOUNT	DISCOUNT	BALANCE
12/9	Statutory fees to be paid to the State Engineer, Permit No. 15596.					455.00
				15596		

PAYEE'S ADDRESS MR. COREY * LEGAL DEPARTMENT HFL

January 9, 19 5

Re: Permit No. 15596

Mr. George R. Corey,
Assistant Attorney,
Utah Power & Light Co.,
Salt Lake City, Utah.

Dear Sir:

We enclose herewith Certificate of Completion of Works and Water License, issued under the above numbered permit, together with receipt for fees.

Very truly yours,

W. G. SWENDSEN
Commissioner of Reclamation

By_____
Chief Clerk

15596

15596

UTAH POWER & LIGHT COMPANY

KEARNS BUILDING

SALT LAKE CITY, UTAH

January 16,

1 9 2 5

1536

Mr. W. G. Swendsen,

Commissioner of Reclamation,

Boise, Idaho.

Attention: Mr. S.C. Brown.

Dear Sir:

I return to you herewith Certificate of Completion of Works under permit No. 15596, issued by the Commissioner on January 9, 1925, Will you please affix the seal of the State Engineer and return the certificate to me?

Yours very truly,

Assistant Attorney.

GRC:JP

RECEIVED
JAN 19 1925

15596

UTAH POWER & LIGHT COMPANY

KEARNS BUILDING

SALT LAKE CITY, UTAH

November 25, 1931.

Mr. R. W. Faris,
Commissioner of Reclamation,
Boise, Idaho.

Dear Sir:

Permit No. 15596 issued to Utah Power & Light Company covered three power sites on Bear River. Proof of construction of works, and application of water to beneficial use has heretofore been issued on one site (the plant near Alexander, Idaho) and license covering the same was issued by your office.

Up until the present time we have kept in effect the bond required by statute, but inasmuch as it has been some nine years since the application was filed, we desire to cancel this bond.

Before the bond people will cancel the bond they require a formal release from your office, releasing them from obligation of the bond.

Will you be good enough to give us a letter releasing the principal and the bonding company.

Yours very truly,

GEO. R. COREY

Attorney.

GRC-c

RECEIVED
NOV 27 1931
DEPARTMENT OF RECLAMATION

15596

November 28th
1 9 3 1

Re: Permit No. 15596

Utah Power & Light Company
Kearns Building
Salt Lake City

Gentlemen:

In reply to your letter of November 25th pertaining to Permit No. 15596, we quote the following opinion of the Attorney General's office:

> "May the Department of Reclamation release sureties from liability under bonds written pursuant to the provisions of Section 5570, C. S.?
>
> "By the provisions of Section 5570, Compiled Statutes, bond is required conditioned upon the completion of the works of diversion as specified in the permit. Upon the completion of the works of diversion, no further liability exists and the bond is automatically void.
>
> "I find no reason, therefore, why a release should be given. I find no authority in the statutes permitting a release of bond given under this section. If the principal refuses to pay the premium fee, the surety has the right to cancel the bond as to subsequent liability, but the Commissioner of Reclamation could not release the surety."

Very truly yours,

R. W. FARIS
Commissioner of Reclamation

By_____

PH/LP

15596

Salt Lake 54 10 7-31 2m

CARBON COPY FROM
UNITED STATES FIDELITY AND GUARANTY COMPANY
SALT LAKE CITY, UTAH

December 3rd, 1931

United States Fidelity and Guaranty Company
Salt Lake City,
Utah

Attention Mr. M. R. Christensen

Gentlemen:-

Under date of October 14 we wrote you returning statement covering premium on bond No. 46-12-763-22. This was returned with the statement that we did not desire to renew the bond.

Subsequently you have written us two letters requesting that we endeavor to precure release of this bond through the Bureau of Reclamation at Boise.

I took this matter up with Mr. Faris, Commissioner of Reclamation and am in receipt of the attached letter from the deputy in his office. You will note the Attorney General has ruled that the Commissioner of Reclamation has no authority to terminate these bonds, but that if the principal refuses to pay the premium fee, the surety has the right to cancel the bond as to subsequent liability.

This is to advise you we will not pay any further premium fee under this bond.

Yours very truly,

(Signed) George R. Corey

Attorney

GRC-c
Copied
EAB:c

15596

SALT LAKE 4 11-6-29 20M

R. HOWARD BLAND, PRESIDENT

UNITED STATES FIDELITY AND GUARANTY COMPANY

E. A. BJORKLUND
MANAGER

R. T. HARBACH
ASST. MANAGER

CLAIM DEPARTMENT
M. C. FAUX
SUPERINTENDENT

810 CONTINENTAL NATIONAL BANK BUILDING
P. O. BOX 2048

SALT LAKE CITY, UTAH.

IN REPLY PLEASE REFER TO E.A.Bjorklund ALSO QUOTE OUR FILE No

December 22nd, 1931

Mr. R. W. Faris
Commissioner of Reclamation
Boise, Idaho

Attention: Mr. Paul L. Henry

Re: Utah Power & Light Company - 46-12-763-22
Water Permit Bond covering Permit #15596

Dear Sir:-

Mr. George R. Corey, attorney for the Utah Power & Light Company wrote us under date of December 3rd enclosing copy of your letter of November 28th in which you state that in the event the principal refuses to pay the premium fee that the surety company has the right to cancel the bond as to subsequent liability. With this idea in mind, Mr. Corey has written us that they will pay no further premiums under this bond. I enclose herewith copy of his letter.

Under these circumstances, will you kindly cancel this bond and advise us of your action.

Thanking you, I am

Yours very truly,

Manager.

EAB:c

RECEIVED
DEC 24 1931
DEPARTMENT OF RECLAMATION

15596

December 29, 1931

Re: Permit No. 15596 and Water
Permit Bond 46-12-763-22.

Mr. E. A. Bjorklund
U.S. Fidelity & Guaranty Co.
Postoffice Box 2048
Salt Lake City

Dear Sir:

In reply to yours of the 22nd inst., would say that the Commissioner of Reclamation is not empowered to cancel the permit bond. However, if the principal refuses to pay the premium fee, the surety company has the right to cancel the bond as to subsequent liability.

Very truly yours,

R. W. FARIS
Commissioner of Reclamation

By_____

PH/LP

15596 15596

FEDERAL POWER COMMISSION
WASHINGTON 25

FEB 5 1951
Department of Reclamation

FEB -1 1951

Project No. 20-Idaho
Utah Power & Light Company

Mr. Mark R. Kulp, State Reclamation Engineer
Department of Reclamation
State of Idaho
Boise, Idaho

Dear Mr. Kulp:

Thank you for your letter of January 17, 1951, informing the Commission that Application No. 22060 was given Permit No. 15596, and a license was issued to the Utah Power & Light Company for 1500 cubic feet per second, with a priority of June 6, 1922, for use in connection with its operation of project No. 20.

Very truly yours,

Leon M. Fuquay

Leon M. Fuquay
Secretary

15596

STATE OF IDAHO

LICENSE AND CERTIFICATE OF WATER RIGHT

Water License No. 15596 — Amount 1500 sec. ft.
Water District No. 5-E — Priority 6-12-22

WHEREAS, On the 12th day of June, 1922, Utah Power & Light Company, a corporation of Maine, doing business in the State of Idaho, with its principal place of business therein at Idaho Falls, Bonneville County, duly made application, designated No. 22060, to the Commissioner of Reclamation of the State of Idaho for a permit to divert and use for power purposes, the equivalent of a continuous flow of 1,500 cubic feet per second of the waters of Bear River, at the places designated in paragraphs "C" and "D" of remarks in said application; and

WHEREAS, On the 5th day of October, 1922, Permit No. 15596 was issued under the above mentioned application to said applicant for the diversion and use of water at the places designated in said application; and,

WHEREAS, Said permit provided that the works of diversion therein designated should be completed on or before the 5th day of October, 1927, and that water should be applied to beneficial use thereunder on or before the 5th day of October, 1935; and

WHEREAS, On the 13th day of November, 1924, applicant filed in this office an affidavit by its Chief Engineer and General Superintendent, showing the corrected location of its Soda Dam, and the point of diversion into the penstocks, to be at a point which bears South 36° 23' East 2,154.6 feet from the Northeast corner of Section 18, Township 9 South, Range 41 East, B. B. & M., and the corrected point of return of the waters used at said Soda Power Plant to be at a point which bears South 33° 28' East, 2035 feet from the Northeast corner of said Section 18, which change in location was duly approved by me as Commissioner of Reclamation; and

WHEREAS, On the 22nd day of December, 1924, applicant duly made Proof of Completion of Works for that unit of the development contemplated under Permit No. 15596, designated as "Soda Power Plant" (the point of diversion and place of use and return for said unit being set out in paragraphs designated 1 and 2 of remarks "C", and paragraph designated "1" of remarks "D" of said permit) as evidenced by the Certificate of the Commissioner of Reclamation, No. 15596, dated January 9, 1925, approving and confirming the Completion of Works, at this unit of the project, of sufficient capacity for diverting and conveying to place of intended use, the quantity of water therein applied for; and

WHEREAS, Said applicant duly made proof to the satisfaction of the Commissioner of Reclamation of Idaho, of a right to the use of the waters of Bear River, a tributary of Great Salt Lake, for power purposes, under Use Permit No. 15596, of the Commissioner of Reclamation, and that said right to the use of said waters has been perfected in accordance with the laws of Idaho, and is hereby confirmed by the Commissioner of Reclamation of Idaho and entered of record in Volume 6 of Licenses, at page 3231, on the 9th day of January, 1925.

NOW, THEREFORE, by virtue of authority, vested in me by the laws of the State of Idaho, I hereby grant and confirm unto said Utah Power & Light Company, the holder and owner of said Permit No. 15596, a perpetual right, with priority as of the 12th day of June, 1922, to divert and use for power purposes at its "Soda Power Plant", at the point of diversion, use and return hereinabove set out, the equivalent of a continuous flow of 1,500 cubic feet per second of the waters of Bear River.

The right to the use of the water aforesaid hereby confirmed is restricted to the place of use herein described, as provided by the laws of Idaho.

WITNESS the seal and signature of the Commissioner of Reclamation, affixed at Boise, Idaho, this 9th day of January, 1925.

E. C. SWENSEN
Commissioner of Reclamation

(SEAL)

15596

15596

UNITED STATES OF AMERICA
FEDERAL POWER COMMISSION

RECEIVED
AUG 17 1971
Department of Water Administration

Utah Power and Light Company) Project No. 472

NOTICE OF ISSUANCE OF ANNUAL LICENSE

(August 13, 1971)

On June 5, 1969, Utah Power and Light Company, Licensee for Oneida Project No. 472 located in Franklin County, Idaho, on the Bear River filed an application for a new license under Section 15 of the Federal Power Act and Commission regulations thereunder (Sections 16.1 - 16.6). Licensee also made a supplemental filing pursuant to Commission Order No. 384 on February 27, 1970.

The License for Project No. 472 was issued effective June 1, 1927 for a period ending June 30, 1970. An annual license was issued from the original date of expiration until June 30, 1971. In order to authorize the continued operation of the project pursuant to Section 15 of the Act pending completion of licensee's application and Commission action thereon it is appropriate and in the public interest to issue an annual license to Utah Power and Light Company for continued operation and maintenance of Project No. 472.

Take notice that an annual license is issued to Utah Power and Light Company (Licensee) under Section 15 of the Federal Power Act for the period July 1, 1971 to June 30, 1972 or until Federal takeover, or the issuance of a new license for the project, whichever comes first, for the

DC--12

11 2081

continued operation and maintenance of the Oneida Project No. 472, subject to the terms and conditions of its license.

Kenneth F. Plumb

Secretary

11 2081

decreed

S T A T E O F I D A H O

LICENSE AND CERTIFICATE OF WATER RIGHT

Water License No. 15596
Water District No. 5-E

Amount 1500 sec. ft.
Priority 6-12-22

WHEREAS, On the 12th day of June, 1922, Utah Power & Light Company, a [illegible] of Maine, doing business in the State of Idaho, with its principal place of business therein at Idaho Falls, Bonneville, County, duly made application, designated No. 22060, to the Commissioner of Reclamation of the State of Idaho for a permit to divert and use for power purposes, the equivalent of a continous flow of 1,500 cubic feet per second of the waters of Bear River, at the places designated in paragraphs "C" and "D" of remarks in said application; and

WHEREAS, On the 5th day of October, 1922, permit No. 15596 was issued under the above mentioned application to said applicant for the diversion and use of water at the places designated in said application; and

WHEREAS, Said permit provided that the works of diversion therein designated should be completed on or before the 5th day of October, 1927, and that water should be applied to beneficial use thereunder on or before the 5th day of October, 1933; and

WHEREAS, On the 13th day of November, 1924, applicant filed in this office an affidavit by its Chief Engineer and General Superintendent, showing the corrected location of its Soda Dam, and the point of diversion into the penstocks, to be at a point which bears South 36° 23' East 2,154.6 feet from the Northeast Corner of Section 18, Township 9 South Range 41 East, B. B. & M., and the corrected point of return of the waters used at said Soda Power Plant to be at a point which bears South 33° 28' East, 2035 feet from the Northeast corner of said Section 18, which change in location was duly approved by me as Commissioner of Reclamation; and

WHEREAS, On the 22nd day of December, 1924, applicant duly made Proof of Completion of Works for that unit of the development contemplated under Permit No. 15596, designated as "Soda Power Plant" (the point of diversion and place of use and return for said unit being set out in paragraphs denominated 1 and 2 of remarks "C", and paragraph denominated 1 of remarks "D" of said permit) as evidenced by the certificate of the Commissioner of Reclamation, No. 15596, dated January 9, 1925, approving and confirming the Completion of Works, at this unit of the project, of sufficient capacity for diverting and conveying to place of intended use, the quantity of water therein applied for; and

WHEREAS, Said applicant duly made proof to the satisfaction of the Commissioner of Reclamation of Idaho, of a right to the use of the waters of Bear River, a tributary of Great Salt Lake for power purposes, under Use Permit No. 15596, of the Commissioner of Reclamation, and that said right to the use of said waters has been perfected in accordance with the laws of Idaho, and is hereby confirmed by the Commissioner of Reclamation of Idaho and entered of record in Volume 6 of Licenses, at page 3231, on the 9th day of January, 1925.

NOW THEREFORE, By virtue of authority, vested in me by the laws of the State of Idaho, I hereby grant and confirm unto said Utah Power & Light Company, the holder and owner of said permit No. 15596, a perpetual right, with priority as of the 12th day of June, 1922, to divert and use for power purposes at its "Soda PoweyPlant" at the point ofdiversion, use and return hereinabove set out, the equivalent of a continuous flow of 1,500 cubic feet per second of the waters of Bear River.

The right to the use of the water aforesaid hereby confirmed is restricted to the place of use herein described, as provided by the laws of Idaho.

WITNESS the seal and signature of the Commissioner of Reclamation, affixed at Boise, Idaho, this 9th day of January, 1925.

W. G. SWENDSEN
Commissioner of Reclamation

(SEAL)

11 20[illegible]

Soda powerplant - Original Application

Soda Powerplant - Original Application
For water right # 11-2081

Soda Powerplant

RECEIVED
JAN 14 1987
Department of Water Resources

FEDERAL POWER COMMISSION
WASHINGTON, D.C. 20426

INSTRUMENT NO. 7
IN REPLY REFER TO:

PWR-LP
Project No. 20-Idaho
Utah Power & Light Company

Mr. K. J. Stott
Vice President
Utah Power & Light Company
1407 West North Temple Street
Salt Lake City, Utah 84110

FEB 4 1977

Subject: Amendment of License Article No. 17
and Addition of Article No. 22
to the License for Project No. 20.

Dear Mr. Stott:

Pursuant to the authority vested in me by Commission Order No. 550, issued June 24, 1976, and your Application for Amendment of License filed December 30, 1976, you are hereby advised that your license for Project No. 20 is amended to the following extent.

1. License Article No. 17 is amended by adding the following sentence to the end of the Article.

This Article is effective through December 29, 1976.

2. The following new Article is added to your license effective December 30, 1976, through the remaining term of the license.

Article No. 22. Pursuant to Section 10(d) of the Act, a specified reasonable rate of return upon the net investment in the project shall be used for determining surplus earnings of the project for the establishment and maintenance of amortization reserves. One half of the project surplus earnings, if any, accumulated under the license, in excess of the specified rate of return per annum on the net investment, shall be set aside in a project amortization reserve account as of the end of each fiscal year: Provided, that, if and to the extent that there is a deficiency of project earnings below the specified rate of return per annum for any fiscal year under the license, the amount of such deficiency shall be deducted from the amount of any surplus

AMERICAN REVOLUTION BICENTENNIAL 1776-1976

earnings accumulated thereafter until absorbed, and one-half of the remaining surplus earnings, if any, thus cumulatively computed, shall be set aside in the project amortization reserve account; and the amounts thus established in the project amortization reserve account shall be maintained until further order of the Commission.

The annual specified reasonable rate of return shall be the sum of the weighted cost components of long-term debt, preferred stock, and the cost of common equity, as defined herein. The weighted cost component for each element of the reasonable rate of return is the product of its capital ratios and cost rate. The current capital ratios for each of the above elements of the rate of return shall be calculated annually based on an average of 13 monthly balances of amounts properly includable in the Licensee's long-term debt and proprietary capital accounts as listed in the Commission's Uniform System of Accounts. The cost rates for such ratios shall be the weighted average cost of long-term debt and preferred stock for the year, and the cost of common equity shall be the interest rate on 10-year government bonds (reported as the Treasury Department's 10 year constant maturity series) computed on the monthly average for the year in question plus four percentage points (400 basis points).

This document should be regarded as an official license instrument and be filed accordingly.

Very truly yours,

Kenneth F. Plumb

Secretary

FP-14

FEDERAL POWER COMMISSION

INSTRUMENT FOLDER

20

FORMAL FILE COPY

VAULT COPY

COMPTROLLER COPY

PROJECT NO. 20

UTAH POWER & LIGHT COMPANY

AMENDMENT NO. 5, INSTRUMENT NO. 6

THIS IS AN EXECUTED LICENSED PROJECT INSTRUMENT

RETURN TO RECORDS CLASSIFICATION AND FILES

INSTRUMENT NO.

FP-11b

UNITED STATES OF AMERICA
FEDERAL POWER COMMISSION

Before Commissioners: Jerome K. Kuykendall, Chairman; Frederick Stueck and Arthur Kline.

Utah Power & Light Company	)	Project Nos.
	)	20, 472, 486,
	)	597, 665, 671,
	)	696, 703, and 713

ORDER AMENDING LICENSES

(Issued June 12, 1961)

Application was filed April 24, 1961 by Utah Power & Light Company for amendment of its licenses for the following designated projects to eliminate from the licenses the amortization reserve article and to render inapplicable to such licenses amortization reserve Regulation 17 in effect when the licenses were issued under the Federal Water Power Act:

Project Nos.

___ 20	___ 597	___ 696
___ 472	___ 665	___ 703
___ 486	___ 671	___ 713

Secretary's
JUN 23 1961

The purpose of the amendment is to make the licenses subject to the current regulations of the Commission with respect to the establishment and maintenance of a reserve for amortization.

The Commission finds:

The licenses for the above-designated projects, amended as hereinafter provided, are in the public interest.

The Commission orders:

(A) The license for Project No. 20 is further amended, effective as of July 5, 1923, the effective date of the License, as follows:

PARAGRAPH I. The paragraph of the license beginning "NOW, THEREFORE" is amended, by inserting the words "except Regulation 17," after the phrase "being subject to all the terms and conditions of the Act and of the rules and regulations of the Commission pursuant thereto in force on the 6th day of June, 1921,".

PARAGRAPH II. Article 17 of the license is amended to read as follows:

Article 17. After the first twenty (20) years of operation of said project under this license, namely, after October 30, 1941, six (6) per cent per annum shall be the specified rate of return on the net investment in the project for determining surplus earnings of the project for the establishment and maintenance of amortization reserves, pursuant to Section 10 (d) of the Act; one-half of the project surplus earnings, if any, accumulated after the first twenty years of operation under the license, in excess of six (6) per cent per annum on the net investment, shall be set aside in a project amortization reserve account as of the end of each fiscal year, provided that, if and to the extent that there is a deficiency of project earnings below six (6) per cent per annum for any fiscal year or years after the first twenty years of operation under the license, the amount of such deficiency shall be deducted from the amount of any surplus earnings accumulated thereafter until absorbed, and one-half of the remaining surplus earnings, if any, thus cumulatively computed, shall be set aside in the project amortization reserve account; and the amounts thus established in the project amortization reserve account shall be maintained therein until further order of the Commission.

(B) The licenses for Project Nos. 472, 486, 597, 665, 671, 696, 703 and 713, respectively, are amended, effective as of June 1, 1927, the effective date of such licenses, as follows:

PARAGRAPH I. The paragraph of the respective licenses beginning "NOW, THEREFORE" is amended by inserting the words "except Regulation 17," after the phrase "being subject to all the terms and conditions of the Act and of the rules and regulations of the Commission pursuant thereto as amended and made effective on the 1st day of April, 1924,".

PARAGRAPH II. Article 18 of the respective licenses is amended to read as follows:

Article 18. After the first twenty (20) years of operation of said project under this license, namely, after May 31, 1947, six (6) per cent per annum shall be the specified rate of return on the net investment in the project for determining surplus earnings of the project for the establishment and maintenance of amortization reserves, pursuant to Section 10 (d) of the Act; one-half of the project surplus earnings, if any, accumulated after the first twenty years of operation under the license, in excess of six (6) per cent per annum on the net investment, shall be set aside in a project amortization reserve account as of the end of each fiscal year, provided that, if and to the extent that there is a deficiency of project earnings below six (6) per cent per annum for any fiscal year or years after the first twenty years of operation under the license, the amount of such deficiency shall be deducted from the amount of any surplus earnings accumulated thereafter until absorbed,

and one-half of the remaining surplus earnings, if any, thus cumulatively computed, shall be set aside in the project amortization reserve account; and the amounts thus established in the project amortization reserve account shall be maintained therein until further order of the Commission.

(C) This amendment in the manner set out above shall not operate to alter or amend the licenses designated herein in any other respect, and shall not in any way constitute a waiver of any other part, provision or condition of such licenses.

(D) This order shall become final 30 days from the date of its issuance unless application for rehearing shall be filed as provided in Section 313 (a) of the Federal Power Act and failure to file such an application shall constitute acceptance of this amendment of the licenses designated herein. In acknowledgment of the acceptance of this amendment of such licenses, it shall be signed for the licensee and returned to the Commission within 60 days from the date of issuance of this order.

By the Commission.

Joseph H. Gutride,
Secretary.

R E S O L U T I O N

Upon motion duly made and seconded it was unanimously

RESOLVED, that the Resolution of June 19, 1940, authorizing the officers of the Company to apply for and to accept, for and on behalf of this Company, Preliminary Permits and Licenses tendered by the Federal Power Commission be, and hereby is amended, so as,when amended, it will read as follows:

RESOLVED, that the President or any Vice President of this Company be, and hereby is authorized and empowered to make application for and to accept, for and on behalf of this Company, subject to the terms and conditions of the Federal Water Power Act of June 10, 1920, and the modifications thereof, Preliminary Permits and Licenses tendered by the Federal Power Commission pertaining to the construction, operation, and maintenance of project works necessary or convenient for the development, transmission and utilization of electrical power and such other applications relating to amendment, withdrawal, retirement, or surrender of part or all of any project or project works, which said President or Vice President may deem proper and for the best interests of this Company; further, said President or Vice President is likewise authorized and empowered to execute an endorsement upon such Preliminary Permits or Licenses, indicating the acceptance of the same for and on behalf of this Company.

RESOLVED FURTHER: That the President or any Vice President of this Company be, and hereby is, authorized and empowered to execute any and all contracts, affidavits, certificates or other instruments in writing necessary or required in connection with the issuance or acceptance of such Permits or Licenses, and/or the construction, maintenance, or operation of the project works thereunder, and to make and enter into agreements with the Federal Power Commission or its representative pertaining to the adjustment, establishment, and keeping of project accounts thereunder, which said President or Vice President may deem proper and for the best interests of this Company.

RESOLVED FURTHER: That the Secretary or an Assistant Secretary of this Company be, and hereby is authorized and empowered to affix and attest the Company's corporate seal to such Application, Permits, Licenses, or

other documents, and is hereby authorized and empowered to certify the foregoing resolutions to the Secretary of the Federal Power Commission or other officer of the United States having authority in the premises.

- - - - - - - - - - - - - - - - - -

I, Fred L. Mickelsen, Assistant Secretary of Utah Power & Light Company, do hereby certify that the foregoing is a true and correct copy of resolutions adopted by the Board of Directors of this Company at a meeting held in Salt Lake City, Utah, March 16, 1960, and that the same is still in full force and effect as of this date.

Assistant Secretary

Dated at Salt Lake City, Utah
this 21st day of June, 1961.

POOR QUALITY
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ACCESSION
NO: 8403070358
REQUEST
FROM
CENTRAL
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NUMBER OF
PAGES 6

FP-114

FEDERAL POWER COMMISSION

WASHINGTON, D. C.

LICENSE ON GOVERNMENT LANDS

Project No. 20, Idaho (Soda Unit)

Utah Power & Light Company.

I, [illegible], Chief Clerk of the Federal Power Commission, do hereby certify that the following is a true and correct copy from the record of the proceedings of the Commission in my custody of that portion of the minutes of the fifty-sixth meeting of the Commission, held on the 15th day of August, 1923, which refers to license of the Utah Power & Light Company, care Parkhill G. Leighton, Mclachlen Building, Washington, D. C. (Project No. 20, Soda Unit).

"The Chief Engineer presented a list of licenses, amendments of licenses and transfer of license executed since the meeting of June 15, 1923, recommending that the action of the Executive Secretary, or the Chief Engineer in the absence of the Executive Secretary, in issuing these instruments, pursuant to authority in each case given by the Commission, be approved. Action was taken by the Commission upon this recommendation as follows:

"In order that the minutes of the Commission may contain record of the formal approval by the Commission of all licenses, amendments and transfers thereof, executed and issued by the Executive Secretary, or the Chief Engineer in the absence of the Executive Secretary, under authority of Paragraph 8 of the Commission's Orders, No. 2, of August 23, 1920, No. 12, of October 6, 1921, and No. 15 of June 15, 1923; it was voted that the following licenses, amendments of licenses and transfer of license accepted and, or issued, on the dates respectively named, be and the same are hereby approved by the Commission:

"Licenses.

"Project No. 20 (Soda Unit)

Utah Power & Light Company
Bear River
Public Lands
Bannock and Caribou counties, Idaho
Authorized August 17, 1922
Accepted by Licensee June 13, 1923
Issued July 5, 1923."

Witness my hand and seal of the Federal Power Commission at Washington, D. C., this 27th day of August, 1923.

[signature]
Chief Engineer,
In the Absence of the
Executive Secretary.

I, O. C. Merrill, Executive Secretary of the Federal Power Commission, do hereby certify that the following is a true and correct copy from the record of the proceedings of the Commission in my custody of that portion of the minutes of the forty-seventh meeting of the Commission, held on the 5th day of February, 1923, which refers to the action of the Commission on the application of the Utah Power and Light Company, of Augusta, Maine (Project No. 20, Soda Unit).

> "In the matter of the application of the Utah Power and Light Company of Augusta, Maine (Project No. 20, Soda Unit), for an amendment of plans heretofore submitted to permit the relocation of its Soda Unit so-called: It appearing that said amendment of plans and relocation of project works are desirable and that any increased cost of construction caused thereby would be justified: It was voted that the amended plans and the relocation be approved and that the authorization for issuance of license as set forth in the minutes of the Commission's meeting of August 17, 1922, be modified accordingly."

Witness my hand and seal of the Federal Power Commission at Washington, D. C., this 26th day of February, 1923.

O. C. Merrill

Executive Secretary.

I, [illegible], Chief Engineer of the Federal Power Commission, do hereby certify that the following is a true and correct copy from the record of the proceedings of the Commission in my custody of that portion of the minutes of the thirty-eighth meeting of the Commission, held on the 17th day of August, 1922, which refers to the action of the Commission on the application of the Utah Power & Light Co., of Augusta, Maine (Project No. 20).

"In the matter of the application of the Utah Power & Light Company of Augusta, Maine (Project No. 20), for a license for a power project on the Bear River and on lands of the United States in Bannock and Caribou counties, Idaho: said company having submitted satisfactory evidence of its compliance with the laws of the State of Idaho as required by Section 9, subsection (b), of the Federal Water Power Act and of its ability to finance the construction of the project works proposed: notice of said application having been given and published as required by Section 4 of said Act, full opportunity having been given for all interested parties to be heard, and no application for said project or in conflict therewith having been filed by any State or municipality: the maps, plans, and specifications of the proposed project works having been approved by the Commission: and the Commission finding that said project will be best adapted to a comprehensive scheme of improvement and utilization for the purposes of water-power development and of other beneficial public uses, and that the license will not interfere or be inconsistent with the purpose for which any reservation affected thereby was created or acquired: it was voted that license be issued for a period of fifty (50) years, subject to the provisions of said Act, and to the rules and regulations of the Commission pursuant thereto."

Witness my hand and seal of the Federal Power Commission at Washington, D. C., this 26th day of October, 1922.

[signature]
Chief Engineer.
In the absence of the Executive Secretary.

F:

THE FEDERAL POWER COMMISSION

License on Government Lands

Project No. 20, Idaho, (Soda Unit.)

Utah Power & Light Company.

JAN 30 1922
MAILS AND FILES

WHEREAS, by Act of Congress, approved June 10, 1920 (41 Stat., 1063) designated therein as "The Federal Water Power Act", and hereinafter called "the Act", the Federal Power Commission, hereinafter called "the Commission", is authorized and empowered, inter alia, to issue licenses for the purpose of constructing, operating, and maintaining dams, water conduits, reservoirs, power houses, transmission lines, or other project works necessary or convenient for the development, transmission and utilization of power across, along, from or in any of the navigable waters of the United States, or upon any part of the public lands and reservations of the United States, or for the purpose of utilizing the surplus water or water power from any Government dam; and

WHEREAS, The Utah Power and Light Company, hereinafter called "the Licensee, a public utility corporation organized and existing under the laws of the State of Maine, and having its office and principal place of business in the city of Augusta in said State, has in pursuance of the provisions of a preliminary permit issued on the 19th day of July, 1921, made application in due and proper form to the Commission for a license for a power project designated as Project No. 20, (Soda Unit), on the records of the Commission, and for authority to construct, maintain and

operate, at Soda Point, in the vicinity of Alexander, in the counties of Bannock and Caribou, State of Idaho, certain project works, as hereinafter described, necessary or convenient for the development, transmission and utilization of power, and to occupy and use therefor certain lands of the United States, as hereinafter described; and

WHEREAS, the Licensee has submitted to the Commission satisfactory evidence of its compliance with the laws of the State of Idaho as required by Section 9, sub-section (b) of the Act, and of its ability to finance the construction of said project works; and

WHEREAS, the maps, plans, and specifications of said project and of said project works, as hereinafter described, have been approved by the Commission, and the Commission finds that said project, as hereinafter described, will be best adapted to a comprehensive scheme of improvement and utilization for the purposes of water-power development and of other beneficial public uses, and that the license will not interfere or be inconsistent with the purpose for which any reservation affected thereby was created or acquired; and

WHEREAS, the Licensee, on the 12th day of June, 1923, pursuant to an authorization of its Board of Directors, hereto attached, accepted in writing all the terms and conditions of the Act and of this license;

NOW, THEREFORE, the Commission hereby issues this license to the Licensee for the purpose of constructing, operating and maintaining upon the lands of the United States hereinafter named the project works hereinafter described, necessary or convenient for the development, transmission and utilization of power; said license, including the period thereof, being

subject to all the terms and conditions of the Act and of the rules and regulations of the Commission pursuant thereto in force on the 6th day of June, 1921, as though fully set forth herein, which said rules and regulations are attached hereto and made a part hereof, and being subject also to the following express conditions and limitations, to wit:

Article 1. This license is issued for a period of fifty (50) years from the date hereof and for the following described project:

> Concrete dam about 90 feet high in Bear River, and power-house with two (2) 10,500 horsepower turbo-generator units;

which said project includes, in whole or in part, the following described lands of the United States:

Boise Meridian, Idaho
T9S, R41E
Sec. 10, S 1/2 NW 1/4
Sec. 15, E 1/2 SE 1/4
Sec. 17, S 1/2 NW 1/4 E 1/2 SE 1/4
Sec. 18, NE 1/4 NE 1/4

all as more particularly located and described by the field notes, maps, plans and specifications, designated and described as follows:

Exhibit J. General map of entire project (P-13792), in two (2) sheets as follows:-

Sheet 1, (Revised)
Signed by R. W. Hill, Vice Pres.,
Jan. 9, 1923.

Sheet 2
Signed by R. W. Hill, Vice Pres.,
Aug. 10, 1922.

Exhibit K. Detailed map as follows:-

General plan of development (P-13795)
General contour map and character of foundations (P-13796).
Revised and signed by R. W. Hill, Vice Pres.,
Jan. 9, 1923.

Exhibit L. Plans of Power House and Dam in 2 drawings, as follows:

No. 1. Elevation and Sections (F-13797)
No. 2. Plan, Sectional Plans and Section H-H (F-13796)
revised and signed by E. W. Hill, Vice Pres., Jan. 9, 1923.

Exhibit M. Specifications as follows:

Two typewritten sheets, filed with original application for license and signed by E. W. Hill, Vice Pres., Aug. 10, 1922, as modified by paragraphs 1 to 5, pages 1 and 2, of instrument designated "Application for Amendment to License * * * Soda Project, Bear River, Idaho, Utah Power & Light Company." Signed by E. W. Hill, Vice Pres., Jan. 9, 1923.

which said maps, plans and specifications, approved by the Commission through its Executive Secretary on August 17, 1922, and amended plans approved February 5, 1923, are hereby made a part of this license, and no substantial change shall hereafter be made in said maps, plans and specifications until such change shall have been approved by the Commission, and incorporated in this license by appropriate amendment hereof.

Article 2. Subject to the provisions of Section 13 of the Act, the Licensee shall begin the construction of said project works on or before Au- , 1923, shall thereafter in good faith and with due diligence prosecute such construction, and shall complete the same on or before July 1, 1926.

Article 3. Said project works shall be constructed in substantial conformity with said maps, plans and specifications, or changes therein, approved as hereinbefore provided, and made a part of this license. Minor changes in or divergence from the approved plans may be made in the course of construction if such changes will not result in decrease in efficiency, in material increase in cost, or in impairment of the general scheme of development. Any changes made without the prior approval of the Commission or of its authorized

representative which, in the judgment of the Commission, have produced or will produce such results shall be subject to such alteration as the Commission may direct.

Article 4. The work of construction under this license, whether or not conducted upon lands of the United States, shall be subject to the inspection and approval of the District Forester at Ogden, Utah, or of such other officer or agent as the Commission may designate, who shall be the authorized representative of the Commission for such purposes. The Licensee shall notify such representative of the date upon which work will begin, and so far in advance thereof as said representative may reasonably specify, and shall notify him promptly in writing of any suspension of construction for a period of more than one week, and of its resumption and completion.

Article 5. The Licensee shall clear all trees from the bottoms and margins of the reservoir up to high-water level, shall clear and keep clear to an adequate width lands of the United States along open conduits and along transmission lines, and shall dispose to the satisfaction of said representative of the Commission of all temporary structures, brush, refuse or unused timber on lands of the United States resulting from the clearing of lands or from the construction and maintenance of said project works.

Article 6. In the construction and maintenance of the project works herein specified, the Licensee shall place and maintain suitable structures to reduce to a reasonable degree the liability of contact between its transmission lines and telegraph, telephone and other signal wires or power transmission lines not owned by the Licensee, and shall also place and maintain suitable structures and devices to reduce to a reasonable degree the liability of any structures or wires falling and obstructing traffic and endangering life on highways, streets or railroads.

Article 7. For the purpose of determining the stage and flow of the stream from which water is to be diverted for the operation of said project works and of the amount of water held in and drawn from storage, the Licensee shall install a gage to indicate the level of water in the pool created by said dam and a second gage to indicate tailwater elevations, and shall provide for periodic readings of such gages. The Licensee shall also install and maintain standard meters adequate for the determination of the amount of electric energy generated by said project works. The number, character, and location of gages, meters or other measuring devices, and the method of operation thereof may be altered from time to time if necessary to secure adequate determinations, but such alteration shall not be made except with the approval of the Commission or its authorized representative or upon the specific direction of the Commission. The Licensee shall keep accurate and sufficient record of the foregoing determinations to the satisfaction of the Commission, shall make return of such records at the end of each calendar year, and at such other times as the Commission may require, and in such form as the Commission may prescribe.

Article 8. The Licensee shall allow officers and employees of the United States free and unrestricted access in, through and across the said project and project works in the performance of their official duties.

Article 9. The Licensee shall be liable for injury to, or destruction of, any buildings, bridges, roads, trails, lands, or other property of the United States, occasioned by the construction, maintenance, or operation of the project works or of the works appurtenant or accessory thereto constructed under the license. Arrangements to meet such liability, either by

compensation for such injury or destruction, reconstruction or repair of damaged property, or otherwise, shall be made with the appropriate Department or agency of the United States.

Article 10. The Licensee will interpose no objections to, and will in no way prevent, the lawful use of water for domestic purposes by persons or corporations occupying lands of the United States under permit along or near any stream or body of water, natural or artificial, used by the Licensee in the operation of the project works covered by this license.

Article 11. The Licensee shall do everything reasonably within its power and shall require its employees, contractors, and employees of contractors to do everything reasonably within their power, both independently and upon request of officers of the Forest Service, or other agents of the United States, to prevent and suppress fires on or near the lands to be occupied under this license.

Article 12. Timber upon lands of the United States, to be used or destroyed in the construction of the project works, shall be paid for in accordance with the requirements and estimates of the Department concerned.

Article 13. The Licensee shall be liable for all damages occasioned to the property of others by the construction, maintenance or operation of said project works, or of the works appurtenant or necessary thereto, and in no event shall the United States be liable therefor.

Article 14. Upon the completion of the construction of said project the Licensee shall file with the Commission a statement, under oath in duplicate, showing the actual legitimate cost of construction thereof as

specified in Regulation 20, section 2 of said rules and regulations of the Commission. Such statement shall include all proper and legitimate costs, whether incurred prior to date of issuance of license or on and after such date; and the Licensee shall, if requested by the Commission, show separately on such statement the items and amounts of cost incurred prior to the date of issuance of license, with such other details with respect thereto as the Commission may require. Each and every item of cost included in such statement shall be supported by proper voucher or other evidence; and any such voucher or evidence or certified copy thereof, in support of any item properly includible in said cost shall become a part of the permanent records of said project and shall be kept and retained by the Licensee in the manner required by the Commission.

Article 15. The Licensee shall pay to the United States reasonable annual charges for the purpose of reimbursing the United States for the costs of the administration of the Act and for recompensing it for the use, occupancy and enjoyment of its lands or other property hereinbefore described. The payment by the Licensee of such annual charges for any calendar year shall be made to the United States at the end of the year, or within thirty days thereafter, upon bills rendered or approved by the Commission. Such charges shall be determined in accordance with the provisions of Regulation 14 of said rules and regulations of the Commission, and for the purposes of such determination, the power capacity upon which shall be based the charges for reimbursing the United States for the costs of administration of the Act, and for recompensing it for the use, occupancy and enjoyment of lands of the United States, shall, subject to the provisions of Section 5 of said regulation 14, be taken as 5,120 horsepower.

Article 16. Whenever the Licensee is directly benefitted by the construction work of another licensee, a permittee, or of the United States

of a storage reservoir or other headwater improvement, the Licensee shall reimburse the owner of such reservoir or other improvement for such part of the annual charges for interest, maintenance and depreciation thereon as the Commission may deem equitable. The proportion of such charges to be paid by the Licensee shall be determined from time to time by the Commission. Whenever such reservoir or other improvement is constructed by the United States the Licensee shall pay similar charges into the Treasury of the United States upon bills rendered by the Commission.

Article 17. After the first twenty years of operation of said project under this license, out of surplus earned thereafter, if any, accumulated in excess of a specified reasonable rate of return upon the actual, legitimate investment of the Licensee in said project, all as defined in and determined by the provisions of Regulation 17 of said rules and regulations of the Commission, the Licensee shall establish and maintain amortization reserves, which reserves shall, in the discretion of the Commission, be held until the termination of the license or be applied from time to time in reduction of the net investment. Such specified rate of return shall, subject to the proviso of Paragraph A, Section 3 of said regulation, be one and one-half (1½) times the weighted average annual interest rate payable on the par value of the bona fide interest-bearing debt of the Licensee actually outstanding, in whole or in part, on account of project property at the beginning of the period of amortization and of each calendar year thereafter; such weighted average annual interest rate being determined as provided in Paragraphs B and C of Section 3 of said Regulation 17; Provided, That, if at the beginning of the period of amortization or of any calendar year thereafter, the outstanding interest-bearing debt of the Licensee on account of the project or projects under license, together with any other works or property operated in connection therewith, is less than 25 per

ount of the actual, legitimate investment of the Licensee in said project or projects, then and in such event for the calendar year next following the specified rate of return shall be two (2) times the legal rate of interest in the State of Idaho.

Subject to the provisions of Section 6 of said regulation, the following proportions of such surplus earnings shall be paid into and held in such amortization reserves: Of all surplus earnings up to and including 2 per cent upon the actual, legitimate investment, 30 per cent thereof shall be so paid; of all surplus earnings in excess of 2 per cent and not in excess of 4 per cent upon such investment, 50 per cent thereof shall be so paid; of all surplus earnings in excess of 4 per cent and not in excess of 6 per cent, 70 per cent thereof shall be so paid; and of all surplus earnings in excess of 6 per cent, 90 per cent thereof shall be so paid; Provided, That if at the end of any calendar year of the amortization period the Commission shall find that the accumulated earnings of the Licensee during the period of operation, including the first twenty (20) years thereof, have not yielded a fair return upon the actual, legitimate investment in the project or projects under license, the proportion of such surplus earnings for such calendar year and for succeeding calendar years to be paid into such amortization reserves shall be ten (10) per cent thereof until such time as the accumulated earnings of the Licensee represent, in the judgment of the Commission, a fair return upon such investment for such period of operation.

Article 18. That no lease of said project or part thereof whereby the lessee is granted the exclusive occupancy, possession or use of project works for purposes of generating, transmitting or distributing power shall be made without the prior written approval of the Commission; and the Commission may,

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if in its judgment the situation warrants, require that all the conditions of this license, of the Act, and of said rules and regulations of the Commission shall be applicable to such lease and to such property so leased to the same extent as if the lessee were the licensee hereunder, Provided, That the provisions of this article shall not apply to parts of the project or project works which may be used by another jointly with the Licensee under a contract or agreement whereby the Licensee retains the occupancy, possession, and control of the property so used and receives adequate consideration for such joint use, or to leases of land while not required for purposes of generating, transmitting, or distributing power, or to buildings or other property not built or used for said purposes, or to minor parts of the project or project works the leasing of which will not interfere with the usefulness or efficient operation of the project by the Licensee for said purposes.

Article 19. The Licensee shall abide by such reasonable regulation of the services to be rendered to customers or consumers of power, and of rates and charges of payment therefor, as may from time to time be prescribed by any duly constituted agency of the State in which the service is rendered or the rate charged; and in case of the development, transmission, distribution, sale, or use of power in public service by the Licensee or by its customers engaged in public service within a State which has not authorized and empowered a commission or other agency or agencies within said State to regulate and control the services to be rendered by the Licensee or by its customers engaged in public service, or the rates and charges of payment therefor, or the amount or character of securities to be issued by any of said parties, it is agreed as a condition of this license that jurisdiction is hereby conferred upon the Commission, upon complaint of any person aggrieved or upon its own initiative,

to exercise such regulation and control until such time as the State shall have provided a commission or other authority for such regulation and control: Provided, That the jurisdiction of the Commission shall cease and determine as to each specific matter of regulation and control prescribed in this Article as soon as the State shall have provided a Commission or other authority for the regulation and control of that specific matter.

Article 20. With the written consent of the Licensee, the Commission may, by order made under its seal, and after the public notice required by Section 6 of the Act, modify, alter, enlarge or omit, in so far as authorized by law, any one or more of the conditions or provisions of this license.

Article 21. The enumeration herein of any rights reserved to the United States or to any State or municipality under the Act, or of any requirement of the Act or of said rules and regulations of the Commission shall not be construed in any degree as impairing any other rights so reserved by the Act or as limiting the force of any other requirement of said Act or of said regulations.

IN WITNESS WHEREOF, the Federal Power Commission has caused its name and seal to be hereto signed and affixed by its Executive Secretary, this 5th day of July, 1923.

FEDERAL POWER COMMISSION

By: O. C. Merrell
Executive Secretary.



In testimony of acceptance of all the terms and conditions of the Federal Water Power Act of June 10, 1920, and of the further conditions imposed in the foregoing license, the Licensee, this 12th day of June, 1923, has caused its name and corporate seal to be hereto signed and affixed by L R Duch its Vice Pres & Gen'l Mgr, pursuant to a resolution of its Board of Directors, passed on the 12th day of June, 1923, a certified copy of the record thereof being hereto attached.

Utah Power & Light Company

By- L R Duch
Vice Pres & Gen'l Mgr

Attest:
E E Williams
Secretary.

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Fee

THIS IS TO CERTIFY that the Board of Directors of Utah Power & Light Company at a meeting thereof duly and regularly called and held at that Company's office in Salt Lake City, Utah, on Tuesday the 12th day of June, 1923, adopted a Resolution with its preamble, of which the following is a true and accurate copy:

> WHEREAS, in pursuance of the provisions of a preliminary permit issued on the 19th day of July, 1921, the Company made application to the Federal Power Commission for a license for a power project designated as Project No. 20 Idaho (Soda Unit) on the records of that commission, and for authority to construct, maintain and operate at Soda point in the vicinity of Alexander in the Counties of Bannock and Caribou, State of Idaho, certain project works necessary or convenient for the development, transmission and utilization of power, and to occupy and use therefor certain lands of the United States in said application described; and the Federal Power Commission has tendered to the Company the license so applied for, the terms and conditions whereof have been noted and considered.
>
> NOW THEREFORE, BE IT RESOLVED: that all the terms and conditions of the Federal Water Power Act of June 10, 1920, and the further terms and conditions imposed by said license be and the same are hereby accepted by this Company and in evidence of such acceptance the Vice-President and General Manager of this Company be and he is hereby authorized and directed on this Company's behalf to execute an endorsement upon said license to that effect, to which the Secretary shall affix and attest the Company's seal, and the Secretary be and he is hereby further directed to certify and deliver to said Commission a copy of this resolution.

E. B. Kelly
Secretary.

Dated at Salt Lake City, Utah, June 18. 1923.

ATTEST:

(SEAL)

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A-

FEDERAL POWER COMMISSION

RULES AND REGULATIONS

AS AMENDED BY ORDER No. 11
OF JUNE 6, 1921

GOVERNING THE ADMINISTRATION OF THE FEDERAL WATER POWER ACT

WITH COPIES OF THE ACT, OF
AMENDMENT THERETO, AND OF
ORDERS Nos. 1 TO 11, INCLUSIVE

FIRST REVISED ISSUE
EFFECTIVE JUNE 6, 1921

WASHINGTON
GOVERNMENT PRINTING OFFICE
1921

FEDERAL POWER COMMISSION.

The SECRETARY OF WAR, *Chairman*,
The SECRETARY OF THE INTERIOR, The SECRETARY OF AGRICULTURE.

O. C. MERRILL, *Executive Secretary*.

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JURISDICTION OF THE FEDERAL POWER COMMISSION.

A. The commission has jurisdiction over all projects involving the construction, operation, and maintenance of dams, water conduits, reservoirs, power houses, transmission lines, or other project works for the development, transmission, and utilization of power (except as noted in paragraph B below) which affect—

(*a*) Navigable waters of the United States, as defined in the Federal Water Power Act and in these regulations.

(*b*) Other waters of the United States over which Congress has jurisdiction under its authority to regulate commerce with foreign nations or among the several States, when the commission finds that the interests of interstate or foreign commerce will be affected. Anyone proposing to build a project on waters over which he considers the jurisdiction of the commission doubtful should file a Declaration of Intention under Regulation 7. The commission will thereupon make an investigation and determine whether the proposed project will affect the interests of interstate or foreign commerce. If the commission finds that such interests will be affected, the project comes under its jurisdiction and can not lawfully proceed except under permit or license issued by the commission. If the commission does not so find, the act authorizes the project to proceed upon compliance with State laws.

(*c*) Public lands or reservations,[1] including lands for which patent has been issued with an express reservation therein under section 24 of the act, or for which locations, entries, selections, or filings have proceeded to approval or patent under and subject to the limitations and conditions contained in section 24 of the act.

B. Permits or valid rights of way granted prior to and existing on June 10, 1920, remain in force unaffected by the provisions of the Federal Water Power Act, but any person, association, corporation, State, or municipality holding or possessing any such permit, right of way, or authority may apply for a license under said act, and thereupon the provisions of the act will apply to the applicant as a licensee thereunder.

[1] Except national monuments and national parks. See amendment to The Federal Water Power Act, page 18.

RULES AND REGULATIONS.

REGULATION 1.—GENERAL DEFINITIONS.

[As amended June 6, 1921.]

The words defined in this regulation shall have the following meaning for the purposes of these rules and regulations:

SECTION 1. "The Federal Water Power Act" and "act" mean the act of Congress, entitled "An act to create a Federal Power Commission; to provide for the improvement of navigation; the development of water power; the use of the public lands in relation thereto; and to repeal section 18 of the River and Harbor Appropriation Act, approved August 8, 1917, and for other purposes," approved June 10, 1920 (41 Stat., 1063), as amended by the act of March 3, 1921 (41 Stat., 1353).

SEC. 2. "Commission" means the Federal Power Commission created by the Federal Water Power Act, or its successor, or, with respect to any authority or duty prescribed by the act, such officer or agent as it may lawfully designate to assume or perform such authority or duty.

SEC. 3. "Public lands" means such lands and interest in lands owned by the United States as are subject to private appropriation and disposal under public-land laws. It shall not include "reservations," as hereinafter defined.

SEC. 4. "Reservation" means national forests, tribal lands embraced within Indian reservations, military reservations, and other lands and interests in lands, except national monuments and national parks, owned by the United States and withdrawn, reserved, or withheld from private appropriation and disposal under the public-land laws; also lands and interests in lands acquired and held for any public purpose.

SEC. 5. "Corporation" means a corporation organized under the laws of any State or of the United States empowered to develop, transmit, distribute, sell, lease, or utilize power in addition to such other powers as it may possess, and authorized to transact in the State or States in which its project is located all business necessary to effect the purposes of a license under the act. It shall not include "municipalities" as hereinafter defined.

SEC. 6. "State" means a State admitted to the Union, the District of Columbia, and any organized Territory of the United States.

SEC. 7. "Municipality" means a city, county, irrigation district, drainage district, or other political subdivision or agency of a State competent under the laws thereof to carry on the business of developing, transmitting, utilizing, or distributing power.

SEC. 8. "Municipal purposes" means and includes all purposes within municipal powers as defined by the constitution or laws of the State or by the charter of the municipality.

SEC. 9. "Navigable waters" mean those parts of streams or other bodies of water over which Congress has jurisdiction under its authority to regulate commerce with foreign nations and among the several States, and which either in their natural or improved condition, notwithstanding interruptions between the navigable parts of such streams or waters by falls, shallows, or rapids compelling land carriage, are used or suitable for use for the transportation of persons or property in interstate or foreign commerce, including therein all such interrupting falls, shallows, or rapids; together with such other parts of streams as shall have been authorized by Congress for improvement by the United States or shall have been recommended to Congress for such improvement after investigation under its authority.

SEC. 10. "Government dam" means a dam or other work, constructed or owned by the United States for governmental purposes, with or without contribution from others.

SEC. 11. "Project" means complete unit of improvement or development, consisting of a power house, all water conduits, all dams and appurtenant works and structures (including navigation structures) which are a part of said unit, and all storage, diverting, or forebay reservoirs directly connected therewith, the primary line or lines transmitting power therefrom to the point of junction with the distribution system or with the interconnected primary transmission system, all miscellaneous structures used and useful in connection with said unit or any part thereof, and all water rights, rights of way, ditches, dams, reservoirs, lands, or interest in lands, the use and occupancy of which are necessary or appropriate in the maintenance and operation of such unit.

SEC. 12. "Project area" means all lands, without respect to ownership, the use and occupancy of which are or will be valuable and serviceable in the maintenance and operation of a project.

SEC. 13. "Project boundary" means the line or lines inclosing the project area.

SEC. 14. "Project works" means the physical structures of a project.

SEC. 15. The "power capacity" of a project means the continued product of—

A. The factor 0.08;[2]

B. The average static head in feet; and

C. The water supply, in cubic feet per second and not in excess of the hydraulic capacity of the approved project works, estimated to be available from natural flow or from storage, or from both, for 90 per cent of the time.

SEC. 16. "Net investment" in a project means the actual legitimate original cost thereof as defined and interpreted in the "Classification of Investment in Road and equipment of Steam Roads, issue of 1914, Interstate Commerce Commission," plus similar costs of additions thereto and betterments thereof, minus the sum of the following items properly allocated thereto, if and to the extent that such items have been accumulated during the period of the license from earnings in excess of a fair return on such investment: (*a*) Unappropriated surplus, (*b*) aggregate credit balances of current depreciation accounts, and (*c*) aggregate appropriations of surplus or income held in amortization, sinking fund, or similar reserves, or expended for additions or betterments or used for the purposes for which such reserves were created. The term "cost" shall include, in so far as applicable, the elements thereof prescribed in said classification, but shall not include expenditures from funds obtained through donations by States, municipalities, individuals, or others.

REGULATION 2.—APPLICATIONS—GENERAL REQUIREMENTS.

[As amended June 6, 1921.]

SECTION 1. Applications for preliminary permits or licenses may be filed either with the commission at Washington, D. C., or with such office, agent, or agency of the commission as may from time to time be established or authorized to receive applications on behalf of the commission.

SEC. 2. Applications filed with the Departments of War, Interior, or Agriculture, prior to approval of the act, under the provisions of then existing law and accepted as complete by the department with which filed will upon written request of the applicant be received by the commission as an application under the act.

SEC. 3. The date of filing of applications shall be the date of receipt of the latest communication containing information essential for action by the commission on the application.

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[2] The factor 0.08 represents the horsepower at 70 per cent efficiency of one cubic foot of water per second falling through a head of 1 foot.

SEC. 4. All applications for preliminary permits or for licenses shall include:[3]

A. Information relative to the applicant's qualifications to make application as follows:

(1) If the applicant is a corporation:

(*a*) A copy of its charter or articles of incorporation duly certified by the secretary of state of the State where organized or other officer having legal custody of a record of incorporation (one copy only, marked "Exhibit A").

(*b*) Execute Form 1 in triplicate and mark it "Exhibit B."[4]

(2) If the applicant is a State:

A copy of the law or laws, or reference thereto, under authority of which the application is made, duly certified by the governor or secretary of state of the State, under seal, and two uncertified copies marked "Exhibit B."

(3) If the applicant is a municipality:

(*a*) A copy of its charter or other organization papers duly certified by the secretary of state of the State in which it is located, or by the officer having legal custody of the record of municipal incorporations (one copy only, marked "Exhibit A").

(*b*) A certified copy or reference thereto, of the State law or laws authorizing the operations contemplated by the application and two uncertified copies marked "Exhibit B."

(4) If the applicant is an association of citizens:

(*a*) Each member shall make affidavit of citizenship. (See application Forms 3 and 4.)[5] Associations shall submit their articles of association. If there be none, the fact shall be stated over the signature of each member of the association (one copy only, marked "Exhibit A").

(*b*) A complete list of members must be given in an affidavit by one of them (in triplicate, marked "Exhibit B").

(5) If the applicant is an individual:

An affidavit by the applicant that he is a citizen of the United States. (See application Forms 3 and 4.)[5]

B. General data with respect to the project or projects applied for, to be shown on the prescribed application Forms 3 or 4, paragraphs 2 to 6, inclusive.[5]

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[3] If any applicant shall have filed with the commission any of the papers required by this regulation, a specific reference to such filing, accompanied by duly certified statements of changes thereafter made, thereby bringing up to date the information of the previous filing, will be accepted as fulfilling the requirements with respect to such papers.

[4] For Form see p. 50.

[5] For forms see pp. 51 and 54.

C. Maps and drawings as required by Regulations 3, 4, or 5, as the case may be. All maps and drawings:

(1) Shall be on tracing linen cut to uniform size, not smaller than 24 inches by 36 inches and not larger than 28 inches by 40 inches, the latter size being preferred, except that lithographed official maps issued by Federal or State agencies may be used for general maps of the project and, when so used, one copy for permanent record shall be mounted on linen.

(2) Shall have a clear border of one-half inch on three sides, and of 2½ inches on one of the shorter sides, which shall be the left-hand border of the map.

(3) Shall have a numerical scale and a graphical scale, the latter not less than 6 inches in length.

(4) Shall, if a map, have true and magnetic meridians indicated thereon.

(5) Shall have a space 4 inches by 7 inches in the lower right corner, the upper half of which shall bear the title, scale, etc., and the lower half of which shall be left clear.

(6) Shall, if a map including public lands, show location of all official public-land survey lines crossing the project area. If on unsurveyed public lands or reservations, the protractions of township and section lines shall be shown, such protractions whenever available to be those recognized by the agency of the United States having jurisdiction over the lands.

(7) Shall be rolled, not folded, for mailing, etc.

SEC. 5. Applicants may be required upon request of the commission to furnish maps, plans, or other data in addition to the requirements specifically set forth in the regulations, if in the judgment of the commission such additional data are desirable for a full understanding of the project or projects or for the purpose of enabling the commission to review the design thereof, either in whole or in part.

SEC. 6. The names of applicants, the information contained in the application forms (Forms 3 and 4), and general project maps will be available for general public information. Other information concerning applications will not be made public except upon a showing satisfactory to the commission of the public necessity or desirability therefor, or with the consent of the applicant. At public hearings upon any application the commission may require the presentation of such information respecting the application as in its judgment the proper conduct of the hearing or the public interests requires.

REGULATION 3.—APPLICATIONS FOR PRELIMINARY PERMITS.

[As amended June 6, 1921.]

All applications for preliminary permits shall be submitted in triplicate on Form 3,* and shall be accompanied by the documents specified below, each of which shall be dated and signed by the applicant in the manner prescribed in Form 2* and designated "Exhibit A," "Exhibit B," etc., as indicated:

SECTION 1. *Exhibit A.*—Certified copy of charter, articles of incorporation or other organization papers (one copy only). (See Regulation 2, sec. 4.)

SEC. 2. *Exhibit B.*—Other evidence that applicant is qualified to apply for and receive a permit (in triplicate). (See Regulation 2, sec 4.)

SEC. 3. *Exhibit C.*—Statement of nature and amount of data available, such as surveys, maps, plans, stream measurements, foundation explorations, etc., and of work already performed, including preliminary construction, such as clearing, road building, etc. (in triplicate).

SEC. 4. *Exhibit D.*—Statement of nature and amount of work proposed to be performed under preliminary permit, such as surveying, preparation of maps and plans, measurement of streams, explorations of foundations, or preliminary construction, and estimate of cost thereof (in triplicate).

SEC. 5. *Exhibit E.*—Statement of nature, extent, and ownership of water rights and of ownership of lands which applicant contemplates using in the development of each project. Also statements of applicant's plans with reference to perfecting water rights and to acquiring lands (in triplicate).

SEC. 6. *Exhibit F.*—Statement whether project involves the use of a Government dam or other Government structure; and if so, to what extent (in triplicate).

SEC. 7. *Exhibit G.*—Such data as the applicant desires to supply as to his ability to finance the preliminary work as well as the project or projects applied for (in triplicate). The commission may decline to approve the application unless satisfied that the applicant will be able to finance the preliminary work and the project.

SEC. 8. *Exhibit H.*—A general map showing the nature, principal features, and location of the project with reference to some well-known town or stream. On this map shall be placed a line indicating the approximate project boundary (as defined in sec. 13 of regulation 1), exclusive of transmission lines, and the approximate distance and bearing of the upper and lower limits thereof from some

*For forms see pp. 60 and 61.

natural object or permanent monument that can be readily found and recognized from a description thereof noted on the map. If on land covered by official public-land survey, the distances and bearings shall be from the nearest existing corner of the public survey. (One tracing and two blue prints, or lithographed official map with project shown thereon, one copy mounted on linen and four copies not so mounted.) (For size, etc., of map, see Regulation 2, sec. 4, par. C.)

SEC. 9. *Exhibit I* (to be submitted only if public lands or reservations are affected).—A map showing the project area and the location of the principal features of the project. The map shall show as the project boundary the subdivision line of the public-land survey lying next outside the project area, unless the applicant can define it more closely, in which case the boundary shall be so defined.

On the map shall be indicated separately lands patented, lands entered or otherwise embraced in any unperfected claim under the public-land laws, unreserved public lands, and lands of each and every reservation affected. The map shall be on a scale to present this information effectively.

If so desired, a single map may be submitted for Exhibits H and I, provided it shows all the information required for both, and, in that case, one tracing and five blue prints shall be furnished. If separate maps are used, one tracing and three blue prints shall be furnished. (For size, etc., of map, see Regulation 2, sec. 4, par. C.)

SEC. 10. Such additional documents or data as applicant may consider pertinent to submit.

REGULATION 4.—APPLICATIONS FOR LICENSES—MAJOR PROJECTS.

[*As amended June 6, 1921.*]

All applications for licenses, and for additions or betterments to projects already under license (except for projects of not more than 100-horsepower capacity), shall be submitted in triplicate on Form 4,[1] and shall be accompanied by the documents specified below, each of which shall be dated and signed by the applicant in the manner prescribed in Form 2[1] and designated "Exhibit A," "Exhibit B," etc., respectively, as indicated.

SECTION 1. *Exhibit A.*—Certified copy of charter, articles of incorporation, or other organization papers (one copy only). (See Regulation 2, sec. 4.) If already furnished for preliminary permit, reference thereto will suffice.

SEC. 2. *Exhibit B.*—Other evidence that applicant is qualified to proceed with the project applied for (in triplicate). (See Regula-

[1] For forms see pp. 50 and 54.

tion 2, sec. 4.) If already furnished for preliminary permit, reference thereto will suffice.

SEC. 3. *Exhibit C.*—Field notes or a description by metes and bounds of the entire final location survey of the project boundaries and of transmission lines. Field notes need not be submitted as a separate exhibit when they are noted on tracings filed with application (in triplicate).

SEC. 4. *Exhibit D.*—Evidence that the applicant has complied with the requirements of the laws of the State or States within which the project or projects will be located with respect to bed and banks and with respect to the right to engage in the business of developing, transmitting, and distributing power, and in any other business necessary to effect the purposes of the license applied for. This evidence shall be accompanied by a statement of the steps that have been taken and the steps that remain to be taken to acquire franchise or other rights from counties and municipalities before the project or projects can be completed and put into operation (in triplicate).

SEC. 5. *Exhibit E.*—Statement of the nature, extent, and ownership of the water rights and of ownership of lands which the applicant proposes to use in the development of the project or projects applied for, together with satisfactory evidence that the applicant has proceeded as far as practicable in perfecting its rights to use sufficient water for proper operation of the project works. A certified statement from the proper State agency setting forth the extent and validity of the applicant's water rights shall be filed if practicable. Whenever the approval or permission of one or more State agencies is required by State law as a condition precedent to the applicant's right to take or use water for the operation of the project works, duly certified evidence of such approval or permission or a showing of cause why such evidence can not be reasonably submitted shall be filed. Statement of applicant's plans for acquiring lands owned by other parties and which are essential for carrying out the project. If statement submitted with application for preliminary permit gives above information, a reference thereto will suffice (in triplicate). When State certificate is involved, one certified copy and two uncertified copies will suffice.

SEC. 6. *Exhibit F.*—Statement whether project involves the use of a Government dam or other Government structure; and if so, a detailed description of the proposed use. Information relative to such structure which may be of record in any branch of the United States Government at Washington need not be furnished if appropriate reference thereto is given (in triplicate).

SEC. 7. *Exhibit G.*—Statement showing the financial ability of the applicant to carry out the project or projects applied for (in tripli-

cate). If adequate statement has been furnished with application for preliminary permit, reference thereto will suffice.

SEC. 8. *Exhibit H.*—Statement of the effect of the proposed operation of the project works on the normal flow of the stream, including a statement of the minimum flow proposed to be released during periods of low water and full exposition of the relation of any proposed ponding of the flow to the conservation and utilization in the public interest of the available water resources for the purposes of power, navigation, irrigation, reclamation, flood control, and municipal water supply (in triplicate).

SEC. 9. *Exhibit I.*—Estimate of the power capacity of each project, accompanied by the complete data upon which such estimate is based, including stream flow, evaporation records, static heads, etc. A list of all present and proposed sources of power for the system of which the project or projects will be a part, including the approximate location, water power or steam power, source of water, ultimate capacity of all power plants in use or proposed to be used, and the present installed capacity of constructed plants; also connections, if any, with other power systems (in triplicate). If any of these data are of record in any branch of the United States Government at Washington, appropriate reference thereto will suffice.

SEC. 10. *Exhibit J.*—General map covering the entire project area or areas, showing on a single sheet and to an appropriate scale:

A. Principal structures and other important features.

B. The entire transmission system with which the project or projects may be connected, indicating prominently by appropriate symbol the portions for which application is made.

C. State and county lines, towns, streams, and other features that will aid in arriving at a general comprehension of the project.

D. References to the detail map, indicating by outline the portion shown on each sheet.

E. If all features can not be shown with sufficient distinctness on one sheet, two general maps may be furnished, one for structures and one for the transmission system. (Furnish one tracing and two blue prints, or one lithographed map mounted on linen and four unmounted with project works appropriately marked thereon. For size, etc., of map see Regulations 2, sec. 4, par. C.)

SEC. 11. *Exhibit K.*—Detailed map covering entire project area or areas. Scale in general not more than 400 feet to the inch, except for such portions as will be used only for transmission or telephone lines, where scale of not more than 1 mile to the inch may be used, provided it is accompanied by field notes giving a description of the right of way for the line. Elevations shall be tied to Government bench marks whenever available and shall be referred to mean sea

level, except that, in the case of projects on navigable waters having a datum accepted for local use by the United States Engineer Department, War Department, such local datum shall be used. If more than one sheet is used, the sheets shall be numbered consecutively, and each shall bear a small diagram showing the entire map and indicating the portions shown on each sheet. The map shall show with respect to each project applied for:

A. The project boundary, which shall be a line to include the area within which it is necessary to acquire land or rights of way for the project. It shall include only such lands as are or will be valuable and serviceable in the development, transmission, or distribution of power in connection with the project. The location of the project boundary may or may not follow established land lines. It shall be subject to approval of the commission, and unless satisfactory reasons are given therefor it shall not be more than 200 feet distant from exterior margins of reservoirs, water conduits, transmission lines, and appurtenances, or other project works. The project boundary shall be described in such a way that it can be legally identified, and shall be marked on the ground by existing land lines supplemented by such additional monuments as may be necessary. Such portion of the project area as will be used only for transmission lines, telephone lines, pipe lines, conduits, or canals may be described by lines of survey specifying the distances of the project boundary therefrom.

B. All project works accurately located, such as:

(1) Dams.

(2) *Reservoirs.*—Indicate the flow lines by maximum and minimum water levels and by elevation of spill way crest, and give tables or diagrams of areas and capacities for maximum and minimum water levels and for each contour line.

(3) *Water conduits.*—Indicate center line; type, i. e., flume, ditch, tunnel, pipe, etc.; and grade and elevation of bottom at each change of grade.

(4) Power houses and substations.

(5) Transmission lines and appurtenances and telephone lines.

(6) Navigation structures.

(7) Channel approaches to navigation structures indicating elevations of bottom for distances of not less than 1,000 feet above and below the structures.

C. Contour lines with contour interval of not more than 10 feet for the entire project area, except such portions as will be used only for transmission lines or telephone lines or will be included in reservoirs below the minimum elevation to which the water may be drawn down: *Provided*, That a profile of tunnel lines may be substituted for contours along such lines.

D. If on lands covered by official public-land survey (see Regulation 2, sec. 4, par. C (6)), show distances along land-survey lines from the nearest established corner to all intersections with the project boundary where such distances do not exceed 1 mile.

E. Reference lines to the initial points of project boundaries and of the survey (center lines) of transmission or telephone lines and to their intersections with boundaries of reservations. Such reference lines shall show distances and bearings by a line or lines that can at all times be readily retraced from an established corner of the public survey, if not more than 2 miles distant, or, if such established corner is not available, a permanent mark on a natural object or a permanent monument which can be readily found and recognized from a description thereof noted on a map or in the field notes.

F. The status as to ownership, and the land lines and area of each parcel of land within the project boundaries, designating separately lands owned by the applicant, lands for which the applicant holds rights of use and occupancy for purposes of the project, reservations (indicating separately each reservation), and public lands (indicating separately lands full title to which remains in the United States, and lands in which the United States retains only an interest). (One tracing and two blue prints.)

SEC. 12. *Exhibit L.*—General design drawings showing plans, elevations, and sections of all principal structures and appurtenant works or other features of each project applied for. These drawings shall be in sufficient detail and shall be accompanied by sufficient information relating to controlling factors (such as character of foundations and explorations thereof, materials, types of construction, important elevations, and water levels, etc.) to enable the commission to have a full understanding of the project and to check safety, adequacy, and desirability in the development of the resources involved. (One tracing and two blue prints.) This section applies to:

(*a*) Dams and appurtenances, such as spill ways, fishways, outlet works, etc.

(*b*) Navigation structures and approaches thereto, including locks, lock gates, and operating machinery thereof, etc.

(*c*) Conduits, including forebays, intake works, surge tanks, and other pressure relief devices, etc.

(*d*) Power houses and substations.

SEC. 13. *Exhibit M.*—General descriptions and general specifications of mechanical, electrical, and transmission equipment and their appurtenances in sufficient detail to enable the commission to have a full understanding of the project or projects and to determine safety and adequacy and suitability for the development and utilization of the resources involved (in triplicate).

SEC. 14. *Exhibit N.*—Estimate of the cost of developing each project, segregated by principal features, showing quantities, unit costs, etc., in sufficient detail for a full understanding of the elements of cost of the project (in triplicate).

SEC. 15. *Exhibit O.*—Detailed statement of the time desired for completing preliminary construction and for beginning and completing construction of the project works. If the ultimate development is to be completed and put into operation in two or more parts, the time desired for beginning and completing the construction of each part shall be given (in triplicate).

SEC. 16. Such additional documents or data as applicant may consider pertinent to submit.

REGULATION 5.—APPLICATIONS FOR LICENSES—MINOR PROJECTS.

[*As amended June 6, 1921.*]

All applications for licenses for power projects of not more than 100-horsepower capacity, and for projects which involve transmission lines only, shall be submitted in triplicate on Form 4* and shall be accompanied by the documents specified below, each of which shall be dated and signed by the applicant in the manner prescribed in Form 2* and designated "Exhibit A," "Exhibit B," etc., respectively, as indicated:

SECTION 1. *Exhibit A.*—Copy of charter, articles of incorporation, or other organization papers (one copy only). (See Regulation 2, sec. 4.)

SEC. 2. *Exhibit B.*—Other evidence that applicant is qualified to proceed with the project applied for. Certified copy of list of associates, if an association (in triplicate). (See Regulation 2, sec. 4.)

SEC. 3. *Exhibit C.*—Field notes, or a description by metes and bounds of the entire final location survey of the project boundaries and of transmission lines (in triplicate). Field notes need not be submitted as a separate exhibit when they are noted on tracings filed with application.

SEC. 4. *Exhibit D.*—Statement of the applicant's water rights accompanied by evidence that the State water laws have been complied with to the extent necessary to permit the applicant to proceed with all operations contemplated in the application (in triplicate).

SEC. 5. *Exhibit E.*—Statement of the time desired for beginning and completing the construction of the project (in triplicate).

SEC. 6. *Exhibit F.*—Map of the project area drawn to any convenient scale and showing: (See Regulation 2, sec. 4, par. C, for size of sheets, etc.)

* For forms see pp. 30 and 34.

A. The project boundary, which shall be a line to include the area within which it is necessary to acquire land or rights of way for the project. The location of the project boundary may or may not follow established land lines, should not be more than 200 feet distant from exterior margins of reservoirs, water conduits, transmission lines, and appurtenances of other project works, and should be described in such a way that it can be legally identified. Such portion of the project area as will be used only for transmission lines, telephone lines, pipe lines, conduits, or canals may be described by lines of survey (center lines), specifying the distances of the project boundary therefrom.

B. All project works, such as dams, reservoirs, conduits, power houses, transmission lines, etc.

C. If on lands covered by official public-land survey (see Regulation 2, sec. 4, par. C (6)), show distances along land-survey lines from the nearest established corner to all intersections with the project boundary, where such distances do not exceed 1 mile.

D. Reference lines to the initial points of the survey of dams and of the survey (center line) of transmission or telephone lines and to intersections of all such surveys with boundaries of reservations. Such reference lines shall show distances and bearings from an established corner of the public-land survey, if not more than 1 mile distant, or a permanent mark on a natural object or a permanent monument which can be readily found and recognized from a description thereof noted on the map or in the field notes.

E. Location on the flow line fixed by maximum water level and the area and storage capacity of each reservoir.

F. The status as to ownership and the land lines and area of each parcel of lands within the project boundaries, designating separately lands owned by the applicant, lands for which the applicant holds rights of use and occupancy for purposes of the project, reservations (indicating separately each reservation), and public lands (indicating separately lands, full title to which remains in the United States, and lands in which the United States retains only an interest). (Furnish one tracing and two blue prints. If lands of the United States are involved, furnish two additional blue prints.)

SEC. 7. *Exhibit G* (to be filed with applications for transmission lines only).—General description of the transmission line, giving phase, voltage, etc., and of appurtenant structures and equipment, such as substations, in sufficient detail to enable the commission to have a full understanding of the project and to determine its safety, adequacy and suitability (in triplicate).

SEC. 8. *Exhibit H* (to be filed with applications for transmission lines only).—Estimate of the cost of constructing the transmission line and of appurtenant structures and equipment, segregated by prin-

cipal features, in sufficient detail for a full understanding of the elements of cost of the project (in triplicate).

REGULATION 6.—APPLICATIONS FOR LICENSES—MAJOR PROJECTS ALREADY CONSTRUCTED.

[As amended June 6, 1921.]

All applications for licenses under section 23 of the act (except for projects of not more than 100-horsepower capacity), which include project works already constructed, shall be submitted in triplicate on Form 4,* and shall be accompanied by the documents specified below, each of which shall be dated and signed by the applicant in the manner prescribed in Form 2,* and designed "Exhibit A," "Exhibit B," etc., respectively, as indicated.

SECTION 1. *Exhibits A to M, inclusive.*—All documents prescribed in Regulation 4, Exhibits A to M, inclusive, showing on the maps and plans therein provided for in some appropriate manner what project works or parts thereof have already been constructed.

SEC. 2. *Exhibits N and O.*—If the application covers project works in addition to those already constructed, submit as "Exhibit N" an estimate of the cost of such additional works segregated by principal features, showing quantities, unit costs, etc., in sufficient detail for a full understanding of the elements of cost; and submit also as "Exhibit O" a detailed statement of the time desired for beginning and completing such additional construction. If the additional construction is to be completed and put into operation in two or more parts, the time desired for beginning and completing the construction of each part shall be given.

SEC. 3. *Exhibit P.*—A statement of the nature and character of the permit, right of way, or other authority claimed to be held by the applicant. This statement shall be accompanied by copies of or appropriate references to the legislative authority, if any, by or under which such permit, right of way, or authority was acquired, and if granted by an instrument in writing, certified copy of such instrument, or, in lieu thereof, if such a copy is of record in any department of the United States Government at Washington, a statement to that effect and reference thereto (in triplicate).

SEC. 4. *Exhibit Q.*—A statement setting forth a brief history of the project works already constructed, giving time of commencement and of completion of construction of the several parts thereof, date of commencement of operation, and method of financing (in triplicate).

SEC. 5. *Exhibit R.*—A statement of the amount claimed by applicant as the fair value of the project or projects already constructed, accompanied by such supporting data as the applicant may desire to submit (in triplicate).

* For forms see pp. 50 and 54.

SEC. 6. Such additional documents as applicant may consider pertinent to submit.

REGULATION 7.—DECLARATIONS OF INTENTION.

SECTION 1. Declarations of intention to construct a dam or other project works across, along, over, or in any stream or part thereof, other than those defined in the act and in these regulations as navigable waters and over which Congress has jurisdiction under its authority to regulate commerce between foreign nations and among the several States, filed under the provisions of the second paragraph of section 23 of the act, shall be accompanied by:

A. A sketch map of any convenient size and scale showing the stream or streams to be utilized and the approximate location of the project.

B. A brief description of the project and its purpose, including such data as proposed height of dams, storage capacity of reservoirs, power capacity of the project, and probable effect on present or prospective navigation.

C. A statement as to whether, if the commission finds that the project will affect the interests of interstate or foreign commerce, the applicant proposes to apply for a permit or for a license.

SEC. 2. On receipt of such declaration, the commission will cause immediate investigation of the project to be made, and if it shall find that the interests of interstate or foreign commerce would be affected by the proposed construction, it will so notify the declarant and will inform him of the time within which application for preliminary permit or license should be made. After such finding by the commission it will be unlawful for the declarant to proceed with construction until he shall have applied for and shall have received a license under the provisions of the act. If the commission shall not so find, and if no public lands or reservations are affected, permission is granted by the act to construct such dam or other project works in such stream upon compliance with State laws.

REGULATION 8.—PRIORITIES AND PREFERENCES.

SECTION 1. Priority of application for a license may be initiated either by the filing of such application under the provisions of Regulations 2 and 4 or 2 and 5, or by the filing of an application for preliminary permit under the provisions of Regulations 2 and 3, and will be established either by the issuance of a preliminary permit, or, if no preliminary permit has been issued or applied for, by the approval of the application for license. When two or more applications are filed for the same site, the commission will give full consideration to all pertinent matters, including the relative dates of filing of application, before taking final action upon such applications.

SEC. 2. Priority established by preliminary permit may be lost if there is failure to fulfill the requirements of the permit: if the permit is canceled by order of the commission upon failure of the permittee to comply with the conditions thereof; or if, in the course of consideration by the commission of an application by the permittee for license, such permittee shall not before the expiration of the term of the preliminary permit or such later date as may be fixed by the commission:

A. File data required by the commission in addition to that contained in or furnished with the application; or

B. Present satisfactory evidence of ability to carry out the plan set forth in the application; or

C. Accept the conditions of a proposed license; or

D. Modify its plans as required by the commission if the project adopted by the applicant as disclosed in the plan set forth in the application is not such as in the judgment of the commission will be best adapted to a comprehensive scheme of improvement and utilization for the purposes of navigation, of water-power development, and of other beneficial public uses.

SEC. 3. Priority established by approval of application for license may be lost if the conditions of the proposed license are not accepted within a time fixed by the commission.

SEC. 4. In issuing preliminary permits, or licenses where no preliminary permits have been issued, and in issuing license to new licensees under section 15 of the act, the commission will give preference to applications therefor by States and municipalities, provided the plans of the same are deemed by the commission equally well adapted, or shall within a reasonable time to be fixed by the commission be made equally well adapted to conserve and utilize in the public interest the navigation and water resources of the region; and, as between other applicants, the commission may give preference to the applicant the plans of which it finds and determines are best adapted to develop, conserve, and utilize in the public interest the navigation and water resources of the region, if it be satisfied as to the ability of the applicant to carry out such plans; but such preferences will not be deemed to apply to the issuance of license under the provisions of the first paragraph of section 23 of the act.

REGULATION 2.—PERMITS.

SECTION 1. Except as hereinafter provided, preliminary permits may be issued on the application of citizens, associations, corporations, States, or municipalities desirous of obtaining licenses for the construction, maintenance, or operation of dams, water conduits, reservoirs, power houses, transmission lines, or other project works necessary or convenient for the development and improvement of navigation, and for the development, transmission, and utilization of

power across, along, from, or in any of the navigable waters of the United States, or upon any part of the public lands and reservations of the United States (including the Territories), or for the purpose of utilizing the surplus water or water power from any Government dam.

SEC. 2. Permits will be issued only for the purpose of enabling applicants to maintain their priorities while securing the data required for an application for license and will be for such periods, not exceeding a total of three years, as in the judgment of the commission will be necessary for studying the proper location and design of the project; for making examinations, surveys, maps, plans, specifications, and estimates; for conducting stream measurements; for sinking test pits or making borings to determine foundations for dams or other structures; for securing a market for the power to be developed; for making financial arrangements; or for any other purpose necessary or desirable in the preparation of application for license.

SEC. 3. Permits will not be issued for projects already constructed; for transmission lines alone; for projects of a power capacity of less than 100 horsepower; for projects which, in the judgment of the commission, do not come within the scope of its authority under the act, or should be undertaken by the United States itself, or do not propose adequate schemes of development, or would unreasonably interfere with projects under permit, license, or other authority theretofore granted; or for projects for which data sufficient for filing application for license are already available. Permits affecting any reservation will be issued only after a finding by the commission that the proposed use will not interfere or be inconsistent with the purpose for which such reservation was created or acquired. Permits will not be issued until after the expiration of the publication period prescribed by the act.

SEC. 4. In acting upon applications for preliminary permits, and in determining preferences therefor, the commission may, in its discretion, upon the request of any applicant or upon its own motion, hold hearings, order testimony to be taken by deposition, summon witnesses, or require the production of documentary evidence.

SEC. 5. No charges will be made for permits, but permittees will be required, as a condition of maintenance of priority, to perform such work and to make such studies and investigations, and such reports thereon, as in the judgment of the commission may be necessary or desirable to enable both the applicant and the commission to determine the feasibility, and the character and extent of development which is proposed or which should be undertaken, which requirements will be expressed in the permit.

SEC. 6. Upon a satisfactory showing of reasons therefor the commission may authorize permittees to perform such construction work

as may be necessary to maintain water rights under State law, or as may be desirable in preparation for the construction of project works; but the granting of such authority shall not be deemed to have created any equities or to have established any rights beyond what would have been created or established had such authority not been given.

SEC. 7. Permits will not be transferable and may be canceled by order of the commission for failure to comply with the conditions thereof.

SEC. 8. Each preliminary permit shall set forth the conditions under which priority shall be maintained and a license issued, and shall also set forth the essential terms and conditions of such license.

SEC. 9. Each permittee shall keep accurate and dependable record of all expenditures made under the permit, for the purposes indicated in section 2 of this regulation, and, in the event a license is issued for a project covered in whole or in part by a permit, any and all items properly includible in the actual legitimate cost of the project representing expenditures made under the permit and before the date of the license shall be supported by proper vouchers or other records, the same as would have been required of a licensee had no permit been issued; and any such vouchers or records, or certified copies thereof, in support of an item properly includible in the cost of the project, shall become a part of the records of the project and shall be kept and retained by the licensee in the manner required by the commission.

REGULATION 10.—LICENSES.

SECTION 1. Except as hereinafter provided, licenses may be issued either in accordance with the provisions of preliminary permits or upon direct application therefor by citizens, associations, corporations, States, or municipalities for the purpose of constructing, operating, and maintaining dams, water conduits, reservoirs, power houses, transmission lines, or other project works necessary or convenient for the development and improvement of navigation and for the development, transmission, and utilization of power across, along, from, or in any of the navigable waters of the United States, or upon any part of the public lands and reservations of the United States (including the Territories), or for the purpose of utilizing the surplus water or water power from any Government dam.

SEC. 2. Licenses will be issued for such periods, not exceeding 50 years, as in the judgment of the commission will, in each individual case, allow for the satisfactory development and operation of the project and protect the public interest, and shall remain in full force and effect for such periods, unless surrendered or terminated as provided in these regulations or revoked as provided in the act.

SEC. 3. Licenses will not be issued for projects which, in the judgment of the commission, do not come within the scope of its authority under the act, or should be undertaken by the United States itself, or do not propose adequate schemes of development, or lack satisfactory showing of financial ability, or would unreasonably interfere with projects under permit, license, or other authority heretofore granted, or would be opposed to the public interest. No license affecting the navigable capacity of any navigable waters of the United States will be issued until the plans of the dam or other structures affecting navigation have been approved by the Chief of Engineers and the Secretary of War. Licenses within any reservation will be issued only after a finding by the commission that the license will not interfere or be inconsistent with the purposes for which such reservation was created or acquired. Licenses will not be issued until after the expiration of the publication period prescribed by the act.

SEC. 4. Licenses may be altered only upon mutual agreement between the licensee and the commission. Any such alteration shall be made a part of the license and a substitute for the provision altered, but no such alteration shall operate to alter or amend or in any way whatsoever be a waiver of any other part, condition, or provision of the license.

SEC. 5. Licenses may be surrendered only upon mutual agreement between the licensee and the commission, and upon the fulfillment by the licensee of all obligations under the license, with respect to payment or otherwise, existing at the time of such agreement, and, if the project works authorized under the license are constructed in whole or in part, upon such conditions with respect to the disposition of such works as may be determined by the commission.

SEC. 6. Licenses may be terminated by written order of the commission after such reasonable notice, not exceeding 90 days, as the commission may grant, if there is failure to commence actual construction of the project works within the time prescribed in the license, or as extended by the commission. Under similar conditions and upon like notice the authority granted under a license may be terminated with respect to any project works or separable part thereof covered by the license if there is failure to begin construction of such project works or part thereof within the time prescribed in the license or as extended by the commission; but no part of the project works shall be deemed separable for the purposes of this regulation unless so specified in the license.

SEC. 7. Licenses may be revoked only through proceedings in equity instituted in a district court of the United States for a district in which some part of the project is situated, and in the manner provided in the act:

A. In case construction of the project works covered by the license, or of any specified part thereof, has been begun but not completed within the time prescribed in the license or as extended by the commission; or

B. In case the terms of the license are violated by the licensee.

REGULATION 11.—GENERAL CONSIDERATIONS AFFECTING APPROVAL.

SECTION 1. Only such projects will be approved by the commission as are in its judgment best adapted to a comprehensive scheme of improvement and utilization for the purposes of navigation, of water-power development, and of other beneficial public uses. In deciding these matters the commission will consider:

A. Whether the maps, plans, and specifications are such—

(1) That full, practicable utilization will be made of the water, storage possibilities, and the head at the site to be developed.

(2) That the structures shall be safe and in accordance with good engineering practice.

(3) That all unnecessary energy losses, whether in hydraulic works or in mechanical or electrical equipment, will be avoided.

B. Whether in relation to existing or probable future projects upon the same or adjacent streams, the fullest practicable utilization of the water, storage possibilities, and head available will be made possible.

C. Whether the project will be in general accord with the most beneficial utilization of the water for navigation, water power, irrigation, or other beneficial public uses, and for aiding flood control, reclamation, and similar developments.

D. Whether proper provision is made for present or future electrical interconnection with other projects or systems in order to take advantage of diversity of stream flow and of power demands.

E. Whether the use to which the power will be devoted is, in general, in accord with the needs of the community and of the public welfare.

F. Whether the applicant is financially able to carry out the development.

G. Whether the construction, maintenance, and operation of project works will interfere or be inconsistent with the purpose for which any reservation was created or acquired.

REGULATION 12.—PROJECT WORKS.

[As amended June 6, 1921.]

The following provisions will govern the planning, construction, operation, and maintenance of major projects, but will not apply to

projects of 100-horsepower capacity or less, unless so provided in the licenses therefor:

SECTION 1. Special features of construction and installation:

A. If the dam or other project works are to be constructed across, along, from, or in any of the navigable waters of the United States, the commission may, in so far as it deems the same reasonably necessary to promote the present and future needs of navigation and consistent with a reasonable investment cost to the licensee, include in the license any one or more of the following provisions or requirements:

(1) The licensee shall, to the extent necessary to preserve and improve navigation facilities, construct, in whole or in part, at such time as needs of navigation require, without expense to the United States, in connection with such dam, a lock or locks, booms, sluices, regulating gates, or other structures for navigation purposes, in accordance with plans and specifications approved by the Chief of Engineers and the Secretary of War and made part of such license.

(2) Whenever the commission shall find upon investigation that the needs of navigation require the construction of a lock or locks, regulating gates, or other navigation structures, and that such structures can not, consistent with a reasonable investment cost to the applicant, be provided in the manner specified in subparagraph (1) preceding, the commission may grant the application with the provision to be expressed in the license that the licensee will install necessary navigation structures if the Government fails to make provision therefor within a time to be fixed in the license.

(3) In case such structures for navigation purposes are not made a part of the original construction at the expense of the licensee, then, whenever the United States shall desire to complete such navigation facilities, the licensee shall convey to the United States free of cost such of its lands and its rights of way and such right of passage through its dams or other structures and permit or exercise such control of pools as may be required to complete such navigation facilities, and shall make such provision in the approved design and in the construction of the project works in accordance therewith as will permit such passage through the dams or other structures and such control of pools.

(4) Lights and signals shall be installed as and when directed by the Secretary of War.

(5) The licensee shall construct and install such appliances as are necessary for furnishing power for the operation of navigation facilities, including lights and signals, whether constructed by the licensee or by the United States.

B. Fishways shall be constructed as may be prescribed by the Secretary of Commerce.

C. In the case of projects situated either wholly or partially on lands of the United States the licensee shall clear the reservoir site in the manner and to the extent specified in the license, and shall also clear and keep clear lands of the United States along water conduits and transmission lines. The licensee shall also dispose of all brush, refuse, or unused timber on lands of the United States resulting from the construction and maintenance of the project works to the satisfaction of the commission. In the case of projects on navigable waters, the commission will require such clearing of reservoir sites as may be specified by the Chief of Engineers and the Secretary of War and set forth in the license. The commission may in any case require such clearing of lands and such disposition of brush, refuse, or unused timber as it may deem necessary in the public interest or for the protection of life, health, and property, which requirement shall also be specified in the license.

D. The licensee shall place and maintain suitable structures to reduce to a reasonable degree the liability of contact between its transmission lines and telegraph, telephone, and other signal wires or power transmission wires not owned by the licensee. The licensee shall also place and maintain suitable structures and devices to reduce to a reasonable degree the liability of any structures or wires falling and obstructing traffic and endangering life on highways, streets, or railroads.

Sec. 2. Maps, plans, and specifications:

A. Modification of any project and of the plans and specifications of the project works before approval may be required by the commission when such modification is necessary in order to secure a comprehensive scheme of improvement and utilization, as contemplated by Regulation 11.

B. The maps, plans, and specifications, when approved by the commission, shall be made a part of the license, and no license will be issued prior to such approval. Thereafter no substantial change shall be made in said maps, plans, or specifications until such changes shall have been approved by the commission and the license altered accordingly, as required by section 4, paragraph A, of this regulation.

C. No license affecting the navigable capacity of any navigable waters of the United States shall be issued until the plans of the dam or other structures affecting navigation have been approved by the Chief of Engineers and the Secretary of War.

D. After the completion of the project works the licensee shall submit a revised set of maps, plans, and specifications in so far as necessary to show variations, in the project works as constructed, from the original maps, plans, and specifications submitted with

the application for license or from those submitted under the provisions of section 2, paragraph B, of this regulation; shall maintain during the period of the license a complete set of record drawings prepared in conformity with good engineering practice to any convenient size and scale, covering the project works as constructed; and shall from time to time, on request of the commission, furnish such copies of such record drawings as may be required for the information of the commission.

SEC. 3. Construction:

A. The licensee shall commence the construction of the project works within the time fixed in the license, which shall not be more than two years from the date thereof, shall thereafter in good faith and with due diligence prosecute such construction, and shall within the time fixed in the license complete and put into operation such parts of the ultimate development as the commission shall deem necessary to supply the reasonable needs of the then available market, and shall from time to time thereafter construct such portion of the balance of such development as the commission may direct, so as to supply adequately the reasonable market demands until such development shall have been completed. The period for the commencement of construction may be extended once, but not longer than two additional years, and the period for the completion of construction carried on in good faith and with reasonable diligence may be extended by the commission when not incompatible with the public interest.

B. The project works shall be constructed in substantial conformity with the maps, plans, and specifications, or changes therein, approved as hereinbefore provided, and made a part of the license. Minor changes in or divergence from the approved plans may be made in the course of construction, if such changes will not result in decrease in efficiency, in material increase in cost, or in impairment of the general scheme of development. Any changes made without the prior approval of the commission or of its authorized representative which, in the judgment of the commission, have produced or will produce such results shall be subject to such alteration as the commission may direct.

SEC. 4. Alterations and additions:

A. A licensee desiring to make alterations in, or additions or betterments to, his project which will affect materially the cost, the power capacity, or the efficiency of the project, or which will affect materially navigation or other uses of the water, or which will modify the proposed use of the lands or structures of the United States, shall file application therefor, accompanied by such maps, plans, specifications, field notes, and estimates of cost, in the form prescribed in Reg-

ulation 4, as will be necessary to indicate the nature and extent of the change proposed, together with a full statement of the reasons for the proposed change or changes.

B. Except when emergency shall require for the protection of navigation, life, health, or property, no substantial alteration or addition shall be made to any dam or other project works of a capacity in excess of 100 horsepower without the prior approval of the commission, and any emergency alteration or addition so made shall hereafter be subject to such modification and change as the commission may direct.

C. The licensee shall within a reasonable period after any such emergency alteration or addition has been made file with the commission, in the form prescribed by Regulation 4, plans and specifications showing such changes and the reasons therefor, together with an application for the approval thereof. Such plans and specifications, when approved by the commission, shall become a part of the license.

SEC. 5. Maintenance and operation:

A. The licensee shall maintain the project works in a condition of repair adequate for the purposes of navigation and for the efficient operation of said works in the development and transmission of power; shall make all necessary renewals and replacements for such purposes; shall so maintain and operate said works as not to impair navigation; shall assist the authorized representatives of the commission in making inspections of the project works; shall furnish such information and reports as may be required by the commission in connection with such maintenance and operation; and shall comply with such reasonable orders, not inconsistent with any orders issued under the provisions of paragraph B of this section, as the commission may make from time to time with respect to the matters hereinbefore named.

B. Navigation facilities constructed as a part of or in connection with any dam or diversion structure built under the provisions of the act, whether at the expense of the licensee or of the United States, shall at all times be controlled by such reasonable rules and regulations in the interest of navigation, including the control of the level of the pool caused by such dam or diversion structure, as may be made from time to time by the Secretary of War.

C. Lights, signals, regulating gates, and other navigation facilities, which under the terms of the license are to maintained and operated by the licensee, shall be maintained in such state of repair that they can be operated promptly and safely in accordance with rules and regulations established by the Secretary of War, and it shall be the duty of the licensee so to operate them.

D. Unless specifically relieved therefrom by the commission, the licensee shall install and maintain standard meters adequate for the

determination of the amount of electric energy generated by the project works, and shall make adequate provision in conformity with the prevailing standards of the United States Geological Survey for the determination of the stage and flow of the stream or streams from which the water is to be diverted for the operation of the project works and of the amount of water held in and drawn from storage; shall keep accurate and sufficient records of the foregoing determinations to the satisfaction of the commission; and shall make return of such records at such time and in such form as may be required by the commission.

E. The licensee shall furnish free of cost to the United States power for the operation of navigation facilities, including lights and signals, constructed in connection with the project works, whether such facilities are constructed by the licensee or by the United States. (See Regulation 12, sec. 1, par. A (5)).

SEC. 6. Responsibility for damages:

A. Timber upon public lands and reservations of the United States to be used or destroyed in the construction of the project works shall be paid for in accordance with the requirements and estimates of the department concerned.

B. The licensee shall be liable for injury to or destruction of any buildings, bridges, roads, trails, lands, or other property of the United States occasioned by the construction, maintenance, or operation of the project works or of the works appurtenant or accessory thereto constructed under the license. Arrangements to meet such liability, either by compensation for such injury or destruction, or by reconstruction or repair of damaged property, or otherwise, shall be made with the appropriate department or agency of the United States.

C. Each licensee hereunder shall be liable for all damages occasioned to the property of others by the construction, maintenance, or operation of the project works, or of the works appurtenant or accessory thereto, constructed under the license, and in no event shall the United States be liable therefor. When such property consists of crops, buildings, or other improvements upon lands in which the United States has reserved the right of reentry under the provisions of section 24 of the act, the licensee will be required in advance of construction to settle with the owner for such damages or to give a good and sufficient bond to the United States for the use and benefit of the owner to secure the payment of such damages as may be determined and fixed in an action brought upon the bond in a court of competent jurisdiction, such bond to be in the form prescribed by the commission.

REGULATION 13.—LANDS RESERVED OR CLASSIFIED AS POWER SITES.

SECTION 1. All lands of the United States included in any proposed project under the provisions of the act shall, from the date of filing of application therefor (see Regulation 2, sec. 3), be reserved from entry, location, or other disposal under the laws of the United States until otherwise directed by the commission or by Congress.

SEC. 2. Whenever the commission shall determine, on application or otherwise, that the value of any lands of the United States reserved by filing of an application for a permit or license, or heretofore or hereafter reserved or classified as power sites, will not be injured or destroyed for the purposes of power development by location, entry, or selection under the public-land laws, it will file a notice of such determination with the Secretary of the Interior, to the end that such lands, if not otherwise reserved, may be declared open to location, entry, or selection, as provided by the act. Before making such a determination the commission must be satisfied that such location, selection, or entry will not materially interfere with or add to the cost of the occupancy and use of the lands for the purposes of the act.

SEC. 3. All locations, entries, or selections made upon lands of the United States in pursuance of determinations by the commission, as provided in section 2 hereof, shall be subject to a reservation of the right of the United States or of its permittees or licensees to enter upon, occupy, and use any part or all of said lands necessary, in the judgment of the commission, for the purposes of the act, which right shall be expressly reserved in every patent issued for such lands; and no claim or right to compensation shall accrue from the occupation or use of any of said lands for said purposes. The United States or any licensee for any such lands under the act may enter thereupon for the purposes of the act upon payment of any damages to crops, buildings, or other improvements caused thereby to the owner thereof, or upon giving a good and sufficient bond to the United States for the use and benefit of the owner to secure the payment of such damages as may be determined and fixed in an action brought upon the bond in a court of competent jurisdiction, said bond to be in the form prescribed by the commission.

NOTE 1.—The regulations governing applications for determinations by the commission, as specified in section 2 hereof, will be furnished upon request.

NOTE 2.—Notice that application for a permit or license has been made, together with the date of filing thereof and a description of the lands of the United States affected thereby, will be filed by the commission in the General Land Office, Washington, D. C.

REGULATION 14.—ANNUAL CHARGES.

[*As amended June 6, 1928.*]

The basis for assessing annual charges to be paid by the licensee to the United States, and the manner of payment thereof, shall be as follows:

SECTION 1. For reimbursing the United States for the cost of the administration of the act, charges shall be based upon the power capacity of the project and shall be determined according to the following schedule:

A. With respect to each project of more than 100 horsepower, there shall be a preoperation annual charge at the rate of 2 cents per horsepower of power capacity effective during the period between the issuance of the license and the 1st of January immediately following the date of operation of each part or unit. As each separate part or unit goes into operation, the preoperation rate as to such unit shall cease on the 31st of December immediately following, and an operation rate will be substituted, which, for the first calendar year, will be 5 cents per horsepower of installed capacity; for the second calendar year, 10 cents per horsepower of installed capacity; for the third and each succeeding calendar year, 25 cents per horsepower of installed capacity.

B. When the power capacity of the project has been reached, no operating charge will thereafter be made for additional units installed in excess of power capacity. After the maximum rates hereinabove prescribed have become effective with respect to any license, they shall thereafter continue without change with respect to such licenses unless or until the commission or Congress shall make reductions in such rates of charge.

SEC. 2. For recompensing the United States for the use of public lands and reservations (excepting tribal lands within Indian reservations and lands adjoining and pertaining to Government dams) charges shall be based upon the power capacity of the project and in accordance with the schedule of section 1 of this regulation, except as follows:

A. The rate shall be 10 cents per horsepower and the charge shall commence on the 1st of January immediately following the date of operation of the project or of the various parts or units thereof.

B. When any of the land within the project area, exclusive of so much of such area as is occupied and used for transmission lines only, is not public lands or reservations of the United States, the charge determined in accordance with the above-named schedule shall be reduced in the proportion that the land not in public lands or reservations of the United States bears to the total amount of land in

such project area, exclusive of so much thereof as is occupied and used for transmission lines only.

C. The charge for public lands or reservations of the United States used for transmission lines only shall be at the rate of $5 per mile, 100 feet or less wide, per annum, with proportional increase for additional width.

SEC. 3. Horsepower of power capacity shall be determined in sections 1 and 2 preceding from the definition of power capacity given in Regulation 1, section 15, and may be readjusted annually to provide for changes in the average static head or in the water supply, whether from storage or otherwise, which increase or decrease the power capacity 100 horsepower or more: *Provided*, That operation charges on account of storage shall be based upon the amount of such storage available for use.

SEC. 4. For recompensing the United States for the use of Government dams or other structures and the lands adjoining and pertaining thereto owned by the United States, the commission will fix a reasonable annual charge for the use thereof; and in no case will licenses be issued free of charge for development and utilization of power created by Government dams. The amount charged shall be the fair annual value of the power so created as determined by the commission, and shall not be less than the interest at current rates plus maintenance and depreciation upon so much of the cost of such dams, structures, or land as would be justified if built or purchased solely for purposes of power development, together with any expenses incurred by the United States in operating such dams or structures primarily for the benefit of power development. Depreciation charges shall be based upon the rates of depreciation fixed by the commission for similar structures built by licensee or, in the absence of such rates, upon rates fixed by the commission for the case under consideration. The charge shall begin on the 1st of January immediately succeeding commencement of operation.

SEC. 5. When licenses are issued involving the use of tribal lands embraced within Indian reservations the commission will fix a reasonable annual charge for the use thereof, based upon the commercial value of the land for the most profitable purpose for which suitable, including power development. The charge shall commence upon date license is issued.

SEC. 6. The annual charges described in section 4 and 5 of this regulation for the use of Government dams or other structures and of tribal lands embraced within Indian reservations, may be readjusted at the end of 20 years after the beginning of operation and at

periods of not less than 10 years thereafter in a manner to be described in each license.

SEC. 7. No exemption shall be made from payment of annual charges for the use of Government dams or of tribal lands within Indian reservations, but licenses will be issued without charge—

A. For the development, transmission, or distribution of power by States or municipalities, to the extent that the power developed under the project is sold to the public without profit, or is used by such State or municipality for State or municipal purposes. As to all power so developed which is sold for profit, such of the foregoing provisions for charges shall apply as may be applicable.

B. For all projects constructed or to be constructed by States or municipalities primarily designed to provide or improve navigation.

C. For the development, transmission, or distribution of power for domestic, mining, or other beneficial use in projects aggregating not more than 100-horsepower capacity under one license.

SEC. 8. The payment by the licensee of annual charges for any calendar year shall be made to the United States at the end of the year or within thirty days thereafter upon bills rendered or approved by the commission.

REGULATION 15.—BENEFITS FROM HEADWATER IMPROVEMENT.

SECTION 1. Whenever any licensee hereunder is directly benefited by the construction work of another licensee, of a permittee, or of the United States, of a storage reservoir or other headwater improvement, the commission will require as a condition of the license that the licensee so benefited shall reimburse the owner of such reservoir or other improvement for such part of the annual charges for interest, maintenance, and depreciation thereon as the commission may deem equitable. The proportion of such charges to be paid by any licensee shall be determined by the commission and the date when such charges are due shall be fixed by the commission.

SEC. 2. Where such benefit is received from the construction work of another licensee or permittee, payments shall be made to such licensee or permittee, annually, for each preceding year and the commission notified of such payment, and whenever such benefit is received from a reservoir or other improvement constructed by the United States, such payments shall be made annually into the Treasury of the United States to be received and appropriated as a part of the special fund for headwater improvements as provided in section 17 of the act.

REGULATION 16.—DEPRECIATION RESERVES.

[As amended June 6, 1921.]

SECTION 1. *General requirements.*—In order that adequate provision may be made for all necessary renewals and replacements of project works and for the maintenance thereof in a condition of repair adequate for the purposes of navigation and for their efficient operation in the development and transmission of power, the licensee shall establish and maintain adequate depreciation reserves and, except as provided in section 6 hereof and in section 3 of Regulation 30 hereof, shall conform to such rules and regulations as the commission may from time to time prescribe for accounting for depreciation, for the classification of property for such purposes, for determining the rate or amount of depreciation to be accounted for on each unit, class, or group of property, and for the establishment and maintenance of depreciation reserve accounts.

SEC. 2. *Depreciation defined.*—By the term "depreciation" is meant the losses, either temporary or permanent, suffered through the current lessening in service value of tangible physical property due to wear and tear from operation and the action of time and the elements which are not replaced by current repairs, as well as those ordinary losses in capacity for use or service sustained by physical property from obsolescence or inadequacy due either to age, physical change, or supercession resulting from new inventions, discoveries, change in popular demand, or requirements of public authority; also decreases in the service value of intangible property and tangible nonphysical property through lapse of time or other causes. Temporary losses in service value of property, which it is practicable later to replace through repairs or renewals, may be said to represent deferred maintenance. For the purpose of this regulation the term "deferred maintenance" shall be understood to mean physical deterioration through wear and tear due to use, or to the effects of weather or other physical conditions, which accrues currently from the time project property comes into existence or is placed in service, but which does not materially reduce the operating efficiency of the project works and which it is impossible or impracticable to replace by current repairs or renewals.

SEC. 3. *Character of property involved.*—For the purpose of accounting for depreciation as it currently accrues, all property the cost of which is properly includible in the fixed capital account of the project or projects shall be classified as between (A) property not subject to depreciation and (B) property which is subject to depreciation.

A. Under property not subject to depreciation shall be included:

(1) Land held in fee or under perpetual rights.

(2) Perpetual franchises, perpetual water and riparian rights, and other perpetual rights and licenses.

(3) Overhead costs of construction, which pertain to the project as a whole and can not be allocated to definite items of property, such as expenditures for organization, engineering and superintendance, law expenditures during construction, injuries and damages during construction, taxes during construction, interest during construction, miscellaneous construction expenditures; also expenditures on uncompleted units of plant or equipment properly includable in the fixed capital account as "unfinished construction" or other similar designation.

(4) Any other tangible physical property which from the nature of its construction or its inherent characteristics may be considered as permanent and not subject to depreciation.

B. Under property which is subject to depreciation shall be included:

(1) Rights of way and other land rights having a fixed term of life or other than perpetual.

(2) Franchises, patent rights, water and riparian rights, and other rights and licenses having a fixed term of life or other than perpetual.

(3) All buildings, structures, equipment, facilities, and appliances constituting the tangible physical property of the project or projects, except such tangible physical property as from the nature of its construction or its inherent characteristics may be considered as permanent and not subject to depreciation.

SEC. 4. *Method of computing and accounting for depreciation, and rates to be charged.*—A. Charges for depreciation, other than deferred maintenance, shall in all cases be based upon the cost of the property depreciated, and the rate used shall be such that when applied to the cost of a particular structure, unit of equipment, item, or class of depreciable property at regular intervals throughout the estimated service life of such structure, unit of equipment, item, or class of property it will produce an amount equal to the cost thereof plus the cost of dismantling, less salvage. For the purposes of this regulation the cost of any project or projects licensed under the provisions of section 23 of the act and constructed prior to issuance of license thereunder shall be deemed to be the fair value of said project or projects determined as provided in said section. Depreciation representing deferred maintenance shall be estimated, based upon experience and the best sources of information available. Where the loss or exhaustion of capacity for service is dependent upon the use made of certain units or classes of property a rate of depreciation based upon the amount of power generated or other appropriate basis may be employed. If the licensee desires, a composite rate of

depreciation for tangible, physical property described under section 4, paragraph B, subparagraph (3) above, may be ascertained and applied to the cost of such property. The procedure in connection with the accounting for depreciation of the project shall be such that at all times the credit balance in the depreciation reserve account shall fairly reflect, as nearly as it is practicable to estimate, the depreciation that has accrued on the project property remaining in service, or the loss in service value or in the capacity for service that has taken place in such property. All losses in the service value of the property, including, in the absence of negligence of the licensee, extraordinary losses, whether or not provided for currently, shall, except as provided in section 6 hereof, be included in operating expenses as a charge against the earnings from operation.

B. The licensee shall within six months after the date of going into service of any project prepare and submit to the commission a statement showing in detail the plan upon which it is proposed to account for depreciation, including the cost of the project, the property, and the cost thereof on which it is proposed to account for depreciation, and the property and the cost thereof which the licensee considers is not subject to depreciation. Such statement shall further show as to each class of property, or structure, unit, or item when separately estimated, on which it is proposed to account for depreciation, other than deferred maintenance, its cost, its service life (which the licensee may estimate if not known), the estimated value of salvage (if any) recoverable at the time of retirement, and the rate necessary to be applied to the cost of each such class of property, or structure, unit, or item, to produce a reserve equal to the difference between such cost and the value of salvage (if any) recoverable at the time of retirement. A schedule shall also be submitted showing a list of property, if any, and the cost thereof, on which it is proposed to account for depreciation representing deferred maintenance, the annual amount of such depreciation, the basis for determining such amount, and such other details as may be appropriate. Such classification of property and such rates and amounts of depreciation thereon so proposed shall be used by the licensee as a basis for accounting for depreciation, unless and until the commission, after investigation and hearing, shall by order require changes in such classification and in such rates and amounts of depreciation.

SEC. 5. *Investigations and hearings.*—The commission may, when questions arise regarding the sufficiency of the rates and amounts which are being accounted for by licensees for depreciation on project property or of the adequacy of the depreciation reserves which have been established and are being maintained, institute an investigation or hold a hearing, or both, and require the licensee

to present at such hearing evidence regarding such matter or matters for the purpose of determining whether such rates and amounts are sufficient and whether such reserves are adequate for the purposes of the act. In case, after such investigation or hearing, the commission finds that such rates, amounts, or reserves are not sufficient or adequate for said purposes, and the licensee is not subject to regulation by any State authority as provided in section 6 hereof, the licensee shall be subject to and shall comply with any reasonable orders of the commission in relation to such accounting for depreciation and to the creation and maintenance of such depreciation reserves.

Sec. 6. *Conflict with requirements of State commissions.*—When the licensee is a public service corporation or a person, association, or corporation developing, transmitting, or distributing power for sale or use in public service, and such licensee is subject to the jurisdiction of any public utility commission or other commission or regulatory body of the State or States in which the project is located, as to the rates to be charged by such licensee for public service, the licensee may account for depreciation on the project property in the manner required or authorized by such regulatory authority. If, in the judgment of the commission, such accounting for depreciation does not show that adequate depreciation reserves have been created and are being maintained as to the project property, the licensee shall be subject to and shall comply with any reasonable order of the commission in relation to such accounting for depreciation and to the creation and maintenance of such depreciation reserves. The results attained by accounting for depreciation as required or authorized by such State regulatory body, or by complying with any such reasonable order of the commission, shall be shown in the statements and reports of the licensee to the commission made in accordance with the provisions of the act and of Regulation 20 hereof and shall, in so far as applicable, be binding upon the licensee in the administration of the provisions of the act.

Sec. 7. *Review of commission's orders.*—In any proceedings to enforce any order of the commission under sections 5 or 6 hereof there shall be subject to review by the court the reasonableness of the basis of determining as well as the amount of depreciation reserves.

Sec. 8. *Disposition of depreciation reserve account—A. Upon the transfer of license.*—Upon the transfer of any license, whether by voluntary transfer, judicial sale, foreclosure, or otherwise, any successor or assign of the rights under such license shall be required to transfer to his or its account the credit balance in the depreciation reserve account; and the use of such account and balance and the accounting in connection therewith shall be continued by such suc-

cessor or assign in the same manner as required of the original licensee as if there had been no transfer.

B. *Upon revocation of license.*—In the event a decree revoking a license is entered as a result of proceedings in equity in any court of competent jurisdiction and the whole or any part of the project or projects under license is sold by the court the vendee shall be required, unless the court decrees otherwise, to transfer to his or its accounts the credit balance in the depreciation reserve account with respect of such part of the project or projects as may be acquired by such vendee under such sale; and the use of such account and balance and the accounting in connection therewith shall, unless the court decree otherwise, be continued by such vendee in the same manner as required of the original licensee as if there had been no sale: *Provided*, That such transfer of balance shall not be required of the United States in the event it becomes the purchaser of the whole or any part of the project.

C. *Upon the expiration of the license.*—If at the expiration of the original license the United States does not exercise its right to take over, maintain, and operate any project or projects of the licensee, and if at such time a new license is not issued to a new licensee or a new license issued to the original licensee upon such terms and conditions as may be authorized or required under the then existing laws and regulations, but an annual license is issued to the then licensee under the terms and conditions of the original license, then and in the latter event the then licensee shall continue in his or its accounts the credit balance in the depreciation reserve account; and the use of such account and balance and the accounting in connection therewith shall be continued under the rules and regulations in effect with respect thereto at the time of the expiration of the original license until such time as the United States may take over the project or projects or issue a new license. If a new license other than annual is issued by the commission, the foregoing requirements shall apply, unless such new license shall specifically provide otherwise.

D. If and when the United States exercises its right to take over the project or projects under license or to issue a new license to a new licensee any credit balance in the current depreciation reserve account shall be considered in determining the net investment in the project or projects.

SEC. 9. *Separate accounting between project and nonproject property.*—The accounts or records of the licensee shall be kept and maintained in such manner as to show the accounting for depreciation on project property, including the retirements of such property and the balances in depreciation reserve accounts, separate and distinct from the nonproject property.

REGULATION 17.—AMORTIZATION RESERVES.

[*As amended June 6, 1923.*]

SECTION 1. *General requirements.*—After the first 20 years of operation, out of surplus earned thereafter, if any, accumulated in excess of a specified reasonable rate of return upon the actual, legitimate investment of a license in any project or projects under license the licensee shall establish and maintain amortization reserves, which reserves shall, in the discretion of the commission, be held until the termination of the license or be applied from time to time in reduction of the net investment. Such specified rate of return and the proportion of such surplus earnings to be paid into and held in such reserves shall be set forth in the license.

SEC. 2. *Definition of terms.*—For the purposes of this regulation and of section 10 (*d*) of the act the terms "actual, legitimate investment," "earnings," "surplus earnings," and "amortization reserves" shall have the following meanings:

A. *Actual, legitimate investment* means the net debit balance in the fixed capital accounts of a project or projects of items properly includible therein under the accounting rules and regulations of the commission.

B. *Earnings* of a project means the excess of credits over debits of the items of operating revenues, operating expenses, income, and profit and loss named below, or similar items which may be provided for in the accounting rules and regulations prescribed by the commission from time to time, whether such earnings result directly from operations or transactions involving the project only or allocated to the project as a result of joint operations or of transactions involving the project and other property operated in connection therewith:

Debit items.	Credit items.
Operating expenses (including depreciation).	Operating revenues.
Uncollectible bills.	
Taxes assignable to operations.	
Taxes on net income.	
Reimbursement of others for headwater improvements.	Reimbursement from others for headwater improvements.
Amounts paid or accrued for reimbursing the United States for the cost of administration of the act and for recompensing it for the use, occupancy, and enjoyment of its lands or other property.	
Rents paid or accrued for property used or useful in operation, including annual or more frequent payments or assessments for land rights, water rights, riparian rights, or other rights or licenses.	Rent received or accrued for the use or occupancy by others of operating property the cost of which is properly includible in investment or fixed capital account.
Delayed income debits.	Delayed income credits.
Cancellation of balance sheet accounts, the balances of which were created by credits to operating expenses or income accounts appearing as a credit item herein.	Cancellation of balance sheet accounts representing unclaimed wages and vouchered accounts written off because of licensee's inability to locate the creditor, and other like items.
Loss on land sold.	Profit on land sold.

If the total of the debit items exceeds the total of the credit items such excess of debits shall be known as *Earnings—Dr.*

When the licensee is not a public-service corporation or a person, association, or corporation developing, transmitting, or distributing power for sale or use in public service, but such power is developed, transmitted, distributed, or used for manufacturing, industrial, or other nonpublic-service purposes by the licensee or by any subsidiary corporation the stock of which is owned or controlled directly or indirectly by the licensee, the fair value of the power developed by the project under license and so used shall be reported annually by the licensee as operating revenue of such project: *Provided*, That such fair value so reported shall be subject to revision by the commission within one year from the date of filing of each such report: *And provided further*, That in any such revision the value so determined by the commission shall not be greater than the price at which an equal amount of power under similar service requirements could be purchased, or may or could be provided, by such licensee or subsidiary corporation from any other source.

C. *Surplus earnings* or *surplus* means the earnings in excess of the specified rate of return upon the actual, legitimate investment of the licensee in the project or projects.

D. *Amortization reserves* means the amount appropriated and set aside by the licensee out of surplus earnings for the purposes set out in section 10 (*d*) of the act.

SEC. 3. *Specified rate of return—Method of determining.*—A. The "specified rate of return" upon the actual, legitimate investment of a licensee in any project or projects shall, for the purposes of this regulation, be one and one-half (1½) times the weighted average annual interest rate payable on the par value of the bona fide interest-bearing debt of the licensee actually outstanding, in whole or in part, on account of the project property at the beginning of the period of amortization and of each calendar year thereafter: *Provided*, That, if at the beginning of the period of amortization or of any calendar year thereafter, the outstanding interest-bearing debt of the licensee on account of the project or projects under license, together with any other works or property operated in connection therewith, is less than 25 per cent of the actual, legitimate investment of the licensee in said project or projects, then and in such event for the calendar year next following the specified rate of return shall be two (2) times the legal rate of interest in the State in which the project, or the greater part thereof, is located.

B. In determining such weighted average annual interest rate there shall be included the interest payable according to the terms of the bonds, notes, or other evidences of such debt, discount (or pre-

mium) thereon, and expenses incurred in connection with the issue and initial sale thereof, such discount (or premium) and expenses for such purposes being prorated with respect to any item of such debt over the life of the security issued in respect thereof in the manner prescribed in the accounting rules and regulations of the commission.

C. When an issue of bonds, or other evidence of interest-bearing debt, is actually outstanding on account both of project property and of nonproject property such issue, for the purpose of this section, shall, unless otherwise provided in the lien, be prorated between project property and nonproject property in the ratio of the actual, legitimate investment of the licensee therein, respectively, estimated if not actually determinable.

D. The fixing of a specified rate of return for the purposes of this regulation shall not be construed as limiting in any degree whatsoever the authority of the commission, or of any other public agency, in respect to the determination of a fair rate of return in any rate-making proceedings or in any proceedings for the determination of the net investment under the provisions of sections 14 and 15 of the act, or in connection with any other matter not directly related to the administration of this regulation.

SEC. 4. *Period for accumulating amortization reserves.*—For the purpose of this regulation the period for computing earnings and surplus, the appropriating or setting aside of amortization reserves, and all accounting or transactions in connection therewith shall begin twenty (20) years after the date a project is placed in operation under a license issued under the act. This will include all projects so licensed whether constructed before or after the issuance of such license. The date of acceptance of a license under section 23 of the act for a project already constructed and in operation will, for the purposes of this regulation, be considered as the date of the beginning of operation of such project, unless otherwise specifically provided in the license.

SEC. 5. *Proportion of surplus earnings to be reserved.*—Subject to the provisions of section 6 of this regulation, the following proportions of such surplus earnings shall be paid into and held in such amortization reserve: Of all surplus earnings up to and including 2 per cent upon the actual, legitimate investment, 30 per cent thereof shall be so paid; of all surplus earnings in excess of 2 per cent and not in excess of 4 per cent upon such investment, 50 per cent thereof shall be so paid; of all such surplus earnings in excess of 4 per cent and not in excess of 6 per cent, 70 per cent thereof shall be so paid; and of all such surplus earnings in excess of 6 per cent, 90 per cent thereof shall be so paid: *Provided*, That if at the end of any calendar

year of the amortization period the commission shall find that the accumulated earnings of the licensee during the period of operation, including the first twenty (20) years thereof, have not yielded a fair return upon the actual, legitimate investment in the project or projects under license, the proportion of such surplus earnings for such calendar year and for succeeding calendar years to be paid into such amortization reserves shall be ten (10) per cent thereof until such time as the accumulated earnings of the licensee represent, in the judgment of the commission, a fair return upon such investment for such period of operation.

SEC. 6. *Accounting procedure.*—A. This regulation shall become effective with the beginning of the twenty-first year of operation of a project under license. On or before 60 days after the close of the calendar year in which the twenty-first year's operation commences under a license issued under the act, and likewise for each succeeding calendar year thereafter, the licensee shall ascertain the amount of "Earnings" or "Earnings—Dr." resulting from the year's operations, as also the surplus earnings, if any, and shall prepare and submit to the commission for approval a statement thereof, which statement shall show the items used in computing the earnings as well as all the necessary details with respect thereto; and such statement shall also show the actual, legitimate investment of the licensee in the project or projects at the beginning of the period of amortization or at the beginning of each calendar year thereafter. The actual, legitimate investment at the beginning of the period of amortization or of each calendar year thereafter shall be used as the basis for ascertaining the amount of the specified return. The statements with respect to earnings, etc., shall be cumulative. If at the close of the year following the beginning of the period of amortization, or any year thereafter, the statement submitted and approved by the commission shows earnings accumulated in excess of the specified rate of return on the actual legitimate investment for such period, such proportion of such excess as is required by section 5 hereof shall be set aside in a fund and accounted for in such manner as may be prescribed in the accounting rules and regulations of the commission: *Provided, however*, That the licensee shall not be required to include in the amortization reserve account or to set aside a total amount greater than the accumulated surplus earnings for the period.

B. The cash transferred to the amortization fund may be deposited in bank, or invested in the securities of the licensee, or such other securities as the commission may approve; and in the discretion of the commission such amortization reserves and funds shall be held until the termination of the license or be applied from time to time in reduction of the net investment.

C. Interest derived from the amortization fund deposited in bank or income from investments belonging to such fund shall be credited to the appropriate income account and an equal amount of cash transferred to the fund.

SEC. 7. *Disposition of amortization reserve accounts and funds.*—A. *Upon the transfer of license.*—Upon the transfer of any license, whether by voluntary transfer, judicial sale, foreclosure sale, or otherwise, any successor or assign of the rights under such license shall be required to transfer to his or its accounts any credit balance in the amortization reserve accounts as also any debit balance in the amortization fund account, and the use of such accounts and the balances therein and the accounting in connection therewith shall be continued by such successor or assign in the same manner as if there had been no transfer.

B. *Upon revocation of license.*—In the event a decree revoking a license is entered as a result of proceedings in equity in any court of competent jurisdiction and the whole or any part of the project or projects under license is sold by the court, the vendee shall be required to transfer to his or its accounts the credit balance in the amortization reserve account and the debit balance in the amortization fund account with respect of such part of the project or projects as may be acquired by such vendee under such sale, and the use of such accounts and balances and the accounting in connection therewith shall, unless the court decree otherwise, be continued by such vendee in the same manner as if there had been no sale: *Provided*, That such transfer of balances shall not be required of the United States in the event it becomes the purchaser of the whole or any part of the project.

C. *Upon the expiration of the license.*—If at the expiration of the original license the United States does not exercise its right to take over, maintain, and operate any project or projects of the licensee, and if at such time a new license is not issued to a new licensee or a new license issued to the original licensee upon such terms and conditions as may be authorized or required under the then existing laws and regulations, but an annual license is issued to the then licensee under the terms and conditions of the original license, then and in the latter event the then licensee shall continue in his or its accounts the credit balance in the amortization reserve account and the debit balance in amortization fund account, and the use of such accounts and balances and the accounting in connection therewith shall be continued under the rules and regulations in effect with respect thereto at the time of the expiration of the original license until such time as the United States may take over the project or projects or issue a new license to a new licensee. If a new license other than annual is issued by the commission, the foregoing requirements shall apply unless such new license shall specifically provide otherwise.

D. If and when the United States exercises its right to take over the project or projects under license or to issue a new license, any balances in the amortization reserve account and the amortization fund account shall be considered in determining the net investment in the project or projects, and the original licensee, its successors or assigns, shall be entitled to receive and retain any cash or other funds contained in the amortization fund.

REGULATION 18.—EXPROPRIATION OF EXCESSIVE PROFITS.

[As amended June 6, 1921.]

SECTION 1. Until the respective States shall make provision for preventing excessive profits or for the expropriation thereof to themselves, or until the period of amortization as provided in section 10 (*d*) of the act is reached, the licensee shall pay annually to the United States any and all excessive profits arising from the operation of the project or projects under license.

SEC. 2. If the commission at any time during the period specified in the preceding paragraph has reason to believe that any licensee may be earning or has earned excessive profits within the meaning of section 10 (*c*) of the act, it will cause an investigation to be instituted and a hearing to be had, and after such investigation and hearing will issue such order or orders, not inconsistent with the act, as may be appropriate concerning the expropriation of excessive profits, if any, and the payment thereof to the United States. If the licensee is a public-service or other corporation, or a person or association developing, transmitting, or distributing power for sale, or use in public service, and the regulation and control of the rates charged by such licensee is within the jurisdiction of the commission, such order or orders may require the licensee to make such reduction in the rates charged that excessive profits will not be earned.

SEC. 3. Where a State has created and has authorized and empowered a commission or other agency or agencies to regulate or control the rates and charges of payment for power developed, transmitted, or distributed within such State by public-service or other corporations, or by persons or associations, for sale or use in public service, it shall be deemed, for the purposes of this regulation and of section 10 (*c*) of the act, that such State has made provision for preventing excessive profits with respect to such public-service or other corporations and to such persons and associations.

SEC. 4. When the licensee is not a public-service corporation or a person, association, or corporation developing, transmitting, or distributing power for sale or use in public service, but such power is developed, transmitted, distributed, or used for manufacturing, in-

dustrial, or other nonpublic service purposes by the licensee or by any subsidiary corporation the stock of which is owned or controlled directly or indirectly by the licensee, and there is no actual and bona fide sale of power or no allocation, satisfactory to the commission, to the project or projects of the licensee of the proportion of earnings of the licensee properly assignable to said project or projects, the commission may determine the fair value of the power so used and from such value determine the profits of such licensee and whether and to what degree such profits so determined are excessive and will require the licensee to pay to the United States any and all such excessive profits: *Provided*, That such value so determined shall not be greater than the price at which an equal amount of power under similar service requirements could be purchased or produced by such licensee or subsidiary corporation from any other source; and *Provided further*, That the amounts to be paid to the United States hereunder shall not be greater than the amounts which would be paid into amortization reserves under the provisions of Regulation 17 hereof, were such regulation applicable to the projects and properties named in section 1 hereof.

SEC. 5. Any proceeding involving the matter of excessive profits shall, in so far as practicable, be conducted according to the procedure and practice in fixing and regulating the rates, charges, and practices of railroad companies as provided in the act to regulate commerce, approved February 4, 1887, as amended, and any licensee or other party to such proceeding shall have the same rights of hearing, defense, and review as said companies in such cases.

REGULATION 18.—ALLOCATION OF EARNINGS.

[As amended June 6, 1922.]

SECTION 1. For use in the administration of certain provisions of the act, and for other purposes, each licensee shall ascertain and report to the commission annually, and at such other times as the commission may require, the earnings of his project or projects, and in computing such earnings the items of operating revenues, operating expenses, income, and profit and loss, as enumerated or provided for in the definition of "earnings" in Regulation 17, section 2 hereof, shall be included.

SEC. 2. Where the operation of the project works is combined with the operation of a generating, distributing, or other operating system, or other nonproject property not under license, and it is necessary to allocate all or a portion of the items involved in computing the earnings as between the project and nonproject operations, such allocation shall be made on an equitable basis. The applicant, permittee, or licensee may either before the issuance of permit or license

or subsequent thereto and before the beginning of operation of the project works prepare and submit to the commission in detail a plan or basis for making such allocation and for ascertaining the earnings of the project. If the applicant or permittee so elects, such plan or basis shall be reviewed and a determination with respect thereto made by the commission prior to the issuance of permit or license. If such plan or basis so reviewed and determined involves a valuation of works or properties constructed or acquired prior to the date of issuance of permit or license the value of such works or properties shall, for the purpose of this regulation, be determined in the discretion of the commission either by agreement between the commission and the applicant, or permittee, prior to the date of the issuance of permit or license or by a rule or method set forth in such permit or license. If the applicant, permittee or licensee does not elect to have such plan or basis so prepared and submitted, reviewed and determined prior to the issuance of license such plan or basis shall be employed by the licensee unless and until the commission, upon application of the licensee or upon its own initiative, shall by order change or modify such plan or basis. Any such plan or basis, after approval by the commission, shall remain in effect unless and until, as conditions or experience warrant, the commission either upon application of the licensee or upon its own initiative, and at intervals of not less than five years, shall review such plan or basis; and if upon such review and after investigation and hearing, the commission shall find that such plan or basis no longer provides an equitable allocation of earnings it may by order change or modify such plan or basis.

REGULATION 23.—ACCOUNTS AND REPORTS.

[As amended June 6, 1921.]

SECTION 1. Each licensee shall as to each project under license, except as provided in section 3 hereof, conform to such rules and regulations as may be prescribed by the commission from time to time for the establishment and maintenance of a system of accounts and for the keeping and preserving of such books, records, and memoranda pertaining to the project and the project accounts as may be required by the commission.

SEC. 2. In order to aid the commission in determining the net investment of a licensee in any project, the licensee shall, upon oath, within a reasonable period of time, to be fixed by the commission, after the construction of the original project or any addition thereto or betterment thereof, file with the commission, in such detail as the commission may require, a statement in duplicate showing the actual legitimate cost of construction of such project,

addition, or betterment, and the price paid for water rights, rights of way, lands, or interest in lands; and the licensee shall grant to the commission or to its duly authorized agent or agents, at all reasonable times, free access to such project, addition, or betterment, and to all maps, profiles, contracts, reports of engineers, accounts, books, records, and all other papers and documents relating thereto.

SEC. 3. Where a licensee is a municipal corporation subject to regulation by a State commission or is a public service corporation or a person, association, or corporation owning or operating any project and developing, transmitting, or distributing power for sale or use in public service, and the records and accounts of such licensee are kept and maintained under and in conformity with the accounting rules and regulations prescribed by the public utility commission or other commission or regulatory body of the State or States in which the project is located, the licensee will not be required to maintain also the system of accounts provided by section 1 hereof, but the system of accounts prescribed by the State regulatory body may be substituted therefor if desired: *Provided*, That no licensee shall be relieved from keeping such permanent records as, in the judgment of the commission, are necessary to enable such licensee to submit to the commission such statements and reports as may be required for the purposes of sections 2 and 5 hereof or for other purposes of the act: *And provided further*, That a record shall be kept and maintained by each licensee showing separately and in detail all debits and credits to the property investment or fixed capital accounts of each project classified in accordance with the system of accounts provided by section 1 hereof.

SEC. 4. Irrespective of the extent to which a licensee is required to conform to the system of accounts provided by section 1 hereof, all reports, annual or otherwise, submitted under the provisions of the act or of these regulations on account of project property or the operations thereof shall conform in items included and in their segregation to the requirements of said system of accounts as if the accounts from which such statements or reports are compiled were kept and maintained according to such system.

SEC. 5. A. Each licensee shall submit at such time or times as the commission may require statements and reports, including full information as to assets and liabilities, capitalization, net investment and reduction thereof, gross receipts, interest due and paid, depreciation and other reserves, cost of project, cost of maintenance and operation of the project, cost of renewals and replacements of the project works, and as to depreciation of the project works and as to production, transmission, use and sale of power; and shall make adequate provision for currently determining such costs and other facts.

All such statements and reports shall be made upon oath, unless otherwise specified, and in such form and on such blanks as the commission may require.

B. Any licensee which, under the permission granted by section 5 hereof, does not keep its accounts in accordance with the system of accounts prescribed by the commission as provided by section 1 hereof, but substitutes therefor the system of accounts prescribed by a State regulatory body, shall, in addition to other reports which may be required under this regulation, file with the commission a verified copy of all annual reports made to such State regulatory body; and each licensee which is a corporation shall file with the commission a copy of all its annual reports made to its stockholders.

SEC. 6. The commission reserves to itself the right to investigate and make any lawful order concerning any item or amount included in the cost of the original project or of any addition thereto or betterment thereof, whether such cost is incurred by the licensee during the period of the license, or by a permittee or other person natural or artificial prior to the issuing of a license under the act.

FORMS.

The following forms are prescribed for applications filed under the Federal Water Power Act, approved June 10, 1920, (41 Stat., 1063), in accordance with the foregoing regulations:[1]

FORM 1.—*Official statement of organization of corporation and list of officers and directors.*

[See Regulation 2, sec. 4, par. A (1) (b).]

I, _____
(Name.) (Secretary or president.)
of the _____, do hereby certify that the organization of said corporation has been completed; and that the corporation is authorized to proceed with the project applied for according to the existing laws of the State of _____. I further certify that the following is a true list of the principal officers and of the directors of the said corporation, with the full name and official designation of each, to wit: (Here insert the full name and official designation of each principal officer and director.)

Witness my hand and the seal of the corporation this _____ day of _____, 19__.

_____.

_____

(SEAL.)

FORM 2.—*Dating and signature of applicant.*

[See Regulations 3, 4, and 5.]

This map (these estimates, this copy of notice, etc.) is a part of the application for preliminary permit (license) made by the undersigned this _____ day of _____, 19__.

_____

[1] Applications have proved to be so varied in size that it has been found impracticable to furnish printed blanks therefor. Applications should be typewritten, following the forms indicated herein.

FORM 3.—*Application for preliminary permit.*

See Regulations 2 and 3.]

(Act of June 10, 1920, 41 Stat. 1063.)

(1) _____

a { corporation / municipality } organized and existing under and by virtue of the laws of the State of _____ and having its office and principal place of business at _____, in the State of _____

(1) _____

citizen__ of the United States, whose business address is _____, being an applicant for a license under the Federal Water Power Act, do __ hereby make application to the Federal Power Commission for a preliminary permit for _____ months, for the project described herein and approximately shown upon a certain map signed by the applicant on the _____ day of _____ 192__, which map is filed herewith and made a part hereof. This application is made in order that the applicant may secure and maintain priority for a license under the Federal Water Power Act while procuring the data and performing the acts necessary to perfect an application for such license.

2. The location of the project __ applied for is as follows:

(a) In the State __ of _____

(b) In the county __ of _____

(c) On the following-named stream _____ navigable and carrying commerce to the following extent:

_____

_____

_____

_____

(d) In the region of the following-named cities and towns:

_____

_____

_____

_____

[1] Cancel words not used.

3. The proposed scheme of development for the project is as follows:

_____

_____

_____

4. The proposed use of market for the power to be developed is as follows:

_____

_____

_____

5. The location and capacity of all power projects owned or operated by the applicant, the markets supplied thereby, and the relations thereof to the project applied for are briefly described as follows:

_____

_____

_____

6. The following exhibits are filed herewith and are hereby made a part of this application:

(Give each exhibit a designation and brief description, as Exhibit A, certified copy of articles of incorporation; Exhibit B, official statement of organization of corporation and list of officers on Form 1; Exhibit C, statement of nature and amount of data available, etc.)

Exhibit: _____

Exhibit: _____

Exhibit: _____

In witness whereof the applicant has caused its name and corporate seal to be hereunto signed and affixed by

_____ its _____

thereunto duly authorized, this _____ day

of _____, 193__

_____

By _____

_____

Attest:

_____

Secretary.

(When the application is made by an individual or association of individuals it will be signed and sworn to before a notary public or other officer having authority to administer the oath, using the following form:)

Witness the signature__ of the applicant__ this _____

day of _____, 192__.

_____

_____

_____

_____

(If the applicant is an individual or an association of individuals proof of citizenship is required. Such proof may be by affidavit in the following form:)

STATE OF_____ }
County of_____ } ss.

_____

and _____, being duly sworn, each for himself, says that he is a citizen of the United States of America.

_____

_____

_____

Subscribed and sworn to before me this _____

day of _____, 192__.

[SEAL.] _____

Notary Public.

FORM 4.—*Application for License.*

[See Regulations 2 and 4, or 2 and 5.]

(Act of June 10, 1920, 41 Stat., 1063.)

(1) _____

a {corporation / municipality} organized and existing under and by virtue of the laws of the State of _____, and having its office and principal place of business at _____, in the State of _____ (2) _____, citizen__ of the United States, whose business address is _____, in pursuance of a preliminary permit issued to the applicant on the _____ day of _____, 192__, do hereby make application to the Federal Power Commission for a license for a project described herein and shown on general and detail maps signed by the applicant on the _____ day of _____, 192__, which maps are filed herewith and made a part hereof, said license to authorize the construction, operation, and maintenance of certain project works, the principal ones of which are designated as follows on said maps:

(Give the name or other designation and a brief description of the principal project works and cancel such of the four following items (*a*), (*b*), (*c*), and (*d*) as may not be applicable.)

(*a*. Dams and reservoir(s.) _____

_____

_____

(*b*. _____ water conduits.) _____

_____

_____

(*c*. _____ power houses.) _____

_____

_____

(*d*. _____ transmission lines.) _____

_____

_____

_____

[1] Cancel words not used.

2. The location of the project applied for is as follows:

(a) In the State of _____

(b) In the county of _____

(c) On the following-named stream _____

navigable and carrying commerce to the following extent:

_____

_____

_____

(d) In the region of the following-named cities and towns:

_____

_____

_____

3. The proposed scheme of development for the project is as follows:

_____

_____

4. The proposed use or market for the power to be developed is as follows:

_____

_____

_____

5. The location and capacity of all power projects owned or operated by the applicant, the markets supplied thereby, and the relation thereof to the project applied for, are briefly described as follows:

_____

_____

_____

6. The following exhibits are filed herewith and are hereby made a part of this application:

(Give each exhibit a designation and brief description, as Exhibit A, certified copy of articles of incorporation; Exhibit B, official statement of organization and list of officers on Form 3; Exhibit C, statement of nature and amount of data already available, etc.)

Exhibit: _____

Exhibit: _____

Exhibit: _____

In witness whereof the applicant has caused its name and corporate seal to be hereunto signed and affixed by _____ its _____ thereunto duly authorized, this _____ day of _____, 19__.

By _____

_____

_____

Attest:

_____

Secretary.

THE FEDERAL WATER POWER ACT.

(Approved, June 10, 1920; vol. 41, Statutes at Large, p. 1063.)
(Public—No. 280—66th Cong. H. R. 2184.)

AN ACT To create a Federal Power Commission; to provide for the improvement of navigation; the development of water power; the use of the public lands in relation thereto, and to repeal section 18 of the River and Harbor Appropriation Act, approved August 8, 1917, and for other purposes.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled, That a commission is hereby created and established, to be known as the Federal Power Commission (hereinafter referred to as the commission), which shall be composed of the Secretary of War, the Secretary of the Interior, and the Secretary of Agriculture. Two members of the commission shall constitute a quorum for the transaction of business, and the commission shall have an official seal, which shall be judicially noticed. The President shall designate the chairman of the commission.

SEC. 2. That the commission shall appoint an executive secretary, who shall receive a salary of $5,000 a year, and prescribe his duties, and the commission may request the President of the United States to detail an officer from the United States Engineer Corps to serve the commission as engineer officer, his duties to be prescribed by the commission.

The work of the commission shall be performed by and through the Departments of War, Interior, and Agriculture and their engineering, technical, clerical, and other personnel except as may be otherwise provided by law.

All the expenses of the commission, including rent in the District of Columbia, all necessary expenses for transportation and subsistence, including, in the discretion of the commission, a per diem of not exceeding $4 in lieu of subsistence incurred by its employees under its orders in making any investigation, or conducting field work, or upon official business outside of the District of Columbia and away from their designated points of duty, shall be allowed and paid on the presentation of itemized vouchers therefor approved by a member or officer of the commission duly authorized for that purpose; and in order to defray the expenses made necessary by the provisions of this Act there is hereby authorized to be appropriated such sums as Congress may hereafter determine, and the sum of $100,000 is hereby appropriated, out of any moneys in the Treasury not otherwise appropriated, available until expended, to be paid out

upon warrants drawn on the Secretary of the Treasury upon order of the commission.

SEC. 3. That the words defined in this section shall have the following meanings for the purposes of this Act, to wit:

"Public lands" means such lands and interest in lands owned by the United States as are subject to private appropriation and disposal under public-land laws. It shall not include "reservations," as hereinafter defined.

"Reservations" means national monuments, national parks, national forests, tribal lands embraced within Indian reservations, military reservations, and other lands and interests in lands owned by the United States, and withdrawn, reserved, or withheld from private appropriation and disposal under the public-land laws; also lands and interests in lands acquired and held for any public purpose.

"Corporation" means a corporation organized under the laws of any State or of the United States empowered to develop, transmit, distribute, sell, lease, or utilize power in addition to such other powers as it may possess, and authorized to transact in the State or States in which its project is located all business necessary to effect the purposes of a license under this Act. It shall not include "municipalities" as hereinafter defined.

"State" means a State admitted to the Union, the District of Columbia, and any organized Territory of the United States.

"Municipality" means a city, county, irrigation district, drainage district, or other political subdivision or agency of a State competent under the laws thereof to carry on the business of developing, transmitting, utilizing, or distributing power.

"Navigable waters" means those parts of streams or other bodies of water over which Congress has jurisdiction under its authority to regulate commerce with foreign nations and among the several States, and which either in their natural or improved condition, notwithstanding interruptions between the navigable parts of such streams or waters by falls, shallows, or rapids compelling land carriage, are used or suitable for use for the transportation of persons or property in interstate or foreign commerce, including therein all such interrupting falls, shallows, or rapids; together with such other parts of streams as shall have been authorized by Congress for improvement by the United States or shall have been recommended to Congress for such improvement after investigation under its authority.

"Municipal purposes" means and includes all purposes within municipal powers as defined by the constitution or laws of the State or by the charter of the municipality.

"Government dam" means a dam or other work, constructed or owned by the United States for Government purposes, with or without contribution from others.

"Project" means complete unit of improvement or development, consisting of a power house, all water conduits, all dams and appurtenant works and structures (including navigation structures) which are a part of said unit, and all storage, diverting, or forebay reservoirs directly connected therewith, the primary line or lines transmitting power therefrom to the point of junction with the distribution system or with the interconnected primary transmission system, all miscellaneous structures used and useful in connection with said unit or any part thereof, and all water rights, rights of way, ditches, dams, reservoirs, lands, or interest in lands, the use and occupancy of which are necessary or appropriate in the maintenance and operation of such unit.

"Project works" means the physical structures of a project.

"Net investment" in a project means the actual legitimate original cost thereof as defined and interpreted in the "classification of investment in road and equipment of steam roads, issue of 1914, Interstate Commerce Commission," plus similar costs of additions thereto and betterments thereof, minus the sum of the following items properly allocated thereto, if and to the extent that such items have been accumulated during the period of the license from earnings in excess of a fair return on such investment: (a) Unappropriated surplus, (b) aggregate credit balances of current depreciation accounts, and (c) aggregate appropriations of surplus or income held in amortization, sinking fund, or similar reserves, or expended for additions or betterments or used for the purposes for which such reserves were created. The term "cost" shall include, in so far as applicable, the elements thereof prescribed in said classification, but shall not include expenditures from funds obtained through donations by State, municipalities, individuals, or others, and said classification of investment of the Interstate Commerce Commission shall in so far as applicable be published and promulgated as a part of the rules and regulations of the commission.

SEC. 4. That the commission is hereby authorized and empowered—

(a) To make investigations and to collect and record data concerning the utilization of the water resources of any region to be developed, the water power industry and its relation to other industries and to interstate or foreign commerce, and concerning the location, capacity, development costs, and relation to markets of power sites, and whether the power from Government dams can be advantageously used by the United States for its public purposes, and what is a fair value of such power, to the extent the commission may deem necessary or useful for the purposes of this Act.

In order to aid the commission in determining the net investment of a licensee in any project, the licensee shall, upon oath, within a reasonable period of time, to be fixed by the commission, after the

construction of the original project or any addition thereto or betterment thereof, file with the commission, in such detail as the commission may require, a statement in duplicate showing the actual legitimate cost of construction of such project, addition, or betterment, and the price paid for water rights, rights of way, lands, or interest in lands. The commission shall deposit one of said statements with the Secretary of the Treasury. The licensee shall grant to the commission or to its duly authorized agent or agents, at all reasonable times, free access to such project, addition, or betterment, and to all maps, profiles, contracts, reports of engineers, accounts, books, records, and all other papers and documents relating thereto.

(b) To cooperate with the executive departments and other agencies of State or National Governments in such investigations; and for such purpose the several departments and agencies of the National Government are authorized and directed upon the request of the commission, to furnish such records, papers, and information in their possession as may be requested by the commission, and temporarily to detail to the commission such officers or experts as may be necessary in such investigations.

(c) To make public from time to time the information secured hereunder, and to provide for the publication of its reports and investigations in such form and manner as may be best adapted for public information and use. The commission, on or before the first Monday in December of each year, shall submit to Congress for the fiscal year preceding, a classified report showing the permits and licenses issued under this Act, and in each case the parties thereto, the terms prescribed, and the moneys received, if any, on account thereof.

(d) To issue licenses to citizens of the United States, or to any association of such citizens, or to any corporation organized under the laws of the United States or any State thereof, or to any State, or municipality for the purpose of constructing, operating, and maintaining dams, water conduits, reservoirs, power houses, transmission lines, or other project works necessary or convenient for the development and improvement of navigation, and for the development, transmission, and utilization of power across, along, from or in any of the navigable waters of the United States, or upon any part of the public lands and reservations of the United States (including the Territories), or for the purpose of utilizing the surplus water or water power from any Government dam, except as herein provided: *Provided*, That licenses shall be issued within any reservation only after a finding by the commission that the license will not interfere or be inconsistent with the purpose for which such reservation was created or acquired, and shall be subject to and contain such conditions as the Secretary of the department under whose supervision

such reservation falls shall deem necessary for the adequate protection and utilization of such reservation: *Provided further*, That no license affecting the navigable capacity of any navigable waters of the United States shall be issued until the plans of the dam or other structures affecting navigation have been approved by the Chief of Engineers and the Secretary of War. Whenever the contemplated improvement is, in the judgment of the commission, desirable and justified in the public interest for the purpose of improving or developing a waterway or waterways for the use or benefit of interstate or foreign commerce, a finding to that effect shall be made by the commission and shall become a part of the records of the commission: *Provided further*, That in case the commission shall find that any Government dam may be advantageously used by the United States for public purposes in addition to navigation, no license therefor shall be issued until two years after it shall have reported to Congress the facts and conditions relating thereto, except that this provision shall not apply to any Government dam constructed prior to the passage of this Act: *And provided further*, That upon the filing of any application for a license which has not been preceded by a preliminary permit under subsection (e) of this section, notice shall be given and published as required by the proviso of said subsection.

(e) To issue preliminary permits for the purpose of enabling applicants for a license hereunder to secure the data and to perform the acts required by section 9 hereof: *Provided, however*, That upon the filing of any application for a preliminary permit by any person, association, or corporation the commission, before granting such application, shall at once give notice of such application in writing to any State or municipality likely to be interested in or affected by such application; and shall also publish notice of such application for eight weeks in a daily or weekly newspaper published in the county or counties in which the project or any part thereof or the lands affected thereby are situated.

(f) To prescribe rules and regulations for the establishment of a system of accounts and for the maintenance thereof by licensees hereunder; to examine all books and accounts of such licensees at any time; to require them to submit at such time or times as the commission may require statements and reports, including full information as to assets and liabilities, capitalization, net investment and reduction thereof, gross receipts, interest due and paid, depreciation and other reserves, cost of project, cost of maintenance and operation of the project, cost of renewals and replacements of the project works, and as to depreciation of the project works and as to production, transmission, use and sale of power; also to require any licensee to make adequate provision for currently determining said costs and

other facts. All such statements and reports shall be made upon oath, unless otherwise specified, and in such form and on such blanks as the commission may require. Any person who, for the purpose of deceiving, makes or causes to be made any false entry in the books or the accounts of such licensee, and any person who, for the purpose of deceiving, makes or causes to be made any false statement or report in response to a request or order or direction from the commission for the statements and report herein referred to shall, upon conviction, be fined not more than $2,000 or imprisoned not more than five years, or both.

(g) To hold hearings and to order testimony to be taken by deposition at any designated place in connection with the application for any permit or license, or the regulation of rates, service, or securities, or the making of any investigation, as provided in this Act; and to require by subpœna, signed by any member of the commission, the attendance and testimony of witnesses and the production of documentary evidence from any place in the United States, and in case of disobedience to a subpœna the commission may invoke the aid of any court of the United States in requiring the attendance and testimony of witnesses and the production of documentary evidence. Any member, expert, or examiner of the commission may, when duly designated by the commission for such purposes, administer oaths and affirmations, examine witnesses and receive evidence. Depositions may be taken before any person designated by the commission or by its executive secretary and empowered to administer oaths, shall be reduced to writing by such person or under his direction, and subscribed by the deponent. Witnesses summoned before the commission shall be paid the same fees and mileage that are paid witnesses in the courts of the United States, and witnesses whose depositions are taken and persons taking the same shall severally be entitled to the same fees as are paid for like services in the courts of the United States.

(h) To perform any and all acts, to make such rules and regulations, and to issue such orders not inconsistent with this Act as may be necessary and proper for the purpose of carrying out the provisions of this Act.

SEC. 5. That each preliminary permit issued under this Act shall be for the sole purpose of maintaining priority of application for a license under the terms of this Act for such period or periods, not exceeding a total of three years, as in the discretion of the commission may be necessary for making examinations and surveys, for preparing maps, plans, specifications, and estimates, and for making financial arrangements. Each such permit shall set forth the conditions under which priority shall be maintained and a license issued. Such permits shall not be transferable, and may be canceled by order

of the commission upon failure of permittees to comply with the conditions thereof.

SEC. 6. That licenses under this Act shall be issued for a period not exceeding fifty years. Each such license shall be conditioned upon acceptance by the licensee of all the terms and conditions of this Act and such further conditions, if any, as the commission shall prescribe in conformity with this Act, which said terms and conditions and the acceptance thereof shall be expressed in said license. Licenses may be revoked only for the reasons and in the manner prescribed under the provisions of this Act, and may be altered or surrendered only upon mutual agreement between the licensee and the commission after ninety days' public notice.

SEC. 7. That in issuing preliminary permits hereunder or licenses where no preliminary permit has been issued and in issuing licenses to new licensees under section 15 hereof the commission shall give preference to applications therefor by States and municipalities, provided the plans for the same are deemed by the commission equally well adapted, or shall within a reasonable time to be fixed by the commission be made equally well adapted, to conserve and utilize in the public interest the navigation and water resources of the region; and as between other applicants, the commission may give preference to the applicant the plans of which it finds and determines are best adapted to develop, conserve, and utilize in the public interest the navigation and water resources of the region, if it be satisfied as to the ability of the applicant to carry out such plans.

That whenever, in the judgment of the commission, the development of any project should be undertaken by the United States itself, the commission shall not approve any applications for such project by any citizen, association, corporation, State, or municipality, but shall cause to be made such examinations, surveys, reports, plans, and estimates of the cost of the project as it may deem necessary, and shall submit its findings to Congress with such recommendations as it may deem appropriate concerning the construction of such project or completion of any project upon any Government dam by the United States.

The commission is hereby authorized and directed to investigate and, on or before the 1st day of January, 1921, report to Congress the cost and, in detail, the economic value of the power plant outlined in project numbered 3, House Document numbered 1400, Sixty-second Congress, third session, in view of existing conditions, utilizing such study as may heretofore have been made by any department of the Government; also in connection with such project to submit plans and estimates of cost necessary to secure an increased and adequate water supply for the District of Columbia. For this purpose the

sum of $25,000, or so much thereof as may be necessary, is hereby appropriated.

SEC. 8. That no voluntary transfer of any license, or of the rights thereunder granted, shall be made without the written approval of the commission; and any successor or assign of the rights of such licensee, whether by voluntary transfer, judicial sale, foreclosure sale, or otherwise, shall be subject to all the conditions of the license under which such rights are held by such licensee and also subject to all the provisions and conditions of this Act to the same extent as though such successor or assign were the original licensee hereunder: *Provided*, That a mortgage or trust deed or judicial sales made thereunder or under tax sales shall not be deemed voluntary transfers within the meaning of this section.

SEC. 9. That each applicant for a license hereunder shall submit to the commission—

(a) Such maps, plans, specifications, and estimates of cost as may be required for a full understanding of the proposed project. Such maps, plans, and specifications when approved by the commission shall be made a part of the license; and thereafter no change shall be made in said maps, plans, or specifications until such changes shall have been approved and made a part of such license by the commission.

(b) Satisfactory evidence that the applicant has complied with the requirements of the laws of the State or States within which the proposed project is to be located with respect to bed and banks and to the appropriation, diversion, and use of water for power purposes and with respect to the right to engage in the business of developing, transmitting, and distributing power, and in any other business necessary to effect the purposes of a license under this Act.

(c) Such additional information as the commission may require.

SEC. 10. That all licenses issued under this Act shall be on the following conditions:

(a) That the project adopted, including the maps, plans, and specifications, shall be such as in the judgment of the commission will be best adapted to a comprehensive scheme of improvement and utilization for the purposes of navigation, of water-power development, and of other beneficial public uses; and if necessary in order to secure such scheme the commission shall have authority to require the modification of any project and of the plans and specifications of the project works before approval.

(b) That except when emergency shall require for the protection of navigation, life, health, or property, no substantial alteration or addition not in conformity with the approved plans shall be made to any dam or other project works constructed hereunder of a capacity in excess of one hundred horsepower without the prior approval of

the commission; and any emergency alteration or addition so made shall thereafter be subject to such modification and change as the commission may direct.

(c) That the licensee shall maintain the project works in a condition of repair adequate for the purposes of navigation and for the efficient operation of said works in the development and transmission of power, shall make all necessary renewals and replacements, shall establish and maintain adequate depreciation reserves for such purposes, shall so maintain and operate said works as not to impair navigation, and shall conform to such rules and regulations as the commission may from time to time prescribe for the protection of life, health, and property. Each licensee hereunder shall be liable for all damages occasioned to the property of others by the construction, maintenance, or operation of the project works or of the works appurtenant or accessory thereto, constructed under the license, and in no event shall the United States be liable therefor.

(d) That after the first twenty years of operation out of surplus earned thereafter, if any, accumulated in excess of a specified reasonable rate of return upon the actual, legitimate investment of a licensee in any project or projects under license the licensee shall establish and maintain amortization reserves, which reserves shall, in the discretion of the commission, be held until the termination of the license or be applied from time to time in reduction of the net investment. Such specified rate of return and the proportion of such surplus earnings to be paid into and held in such reserves shall be set forth in the license.

(e) That the licensee shall pay to the United States reasonable annual charges in an amount to be fixed by the commission for the purpose of reimbursing the United States for the costs of the administration of this Act; for recompensing it for the use, occupancy, and enjoyment of its lands or other property; and for the expropriation to the Government of excessive profits until the respective States shall make provision for preventing excessive profits or for the expropriation thereof to themselves, or until the period of amortization as herein provided is reached, and in fixing such charges the commission shall seek to avoid increasing the price to the consumers of power by such charges, and charges for the expropriation of excessive profits may be adjusted from time to time by the commission as conditions may require: *Provided*, That when licenses are issued involving the use of Government dams or other structures owned by the United States or tribal lands embraced within Indian reservations the commission shall fix a reasonable annual charge for the use thereof, and such charges may be readjusted at the end of twenty years after the beginning of operations and at periods of not

less than ten years thereafter in a manner to be described in each license: *Provided*, That licenses for the development, transmission, or distribution of power by States or municipalities shall be issued and enjoyed without charge to the extent such power is sold to the public without profit or is used by such State or municipality for State or municipal purposes, except that as to projects constructed or to be constructed by States or municipalities primarily designed to provide or improve navigation licenses therefor shall be issued without charge; and that licenses for the development, transmission, or distribution of power for domestic, mining, or other beneficial use in projects of not more than one hundred horsepower capacity may be issued without charge, except on tribal lands within Indian reservations; but in no case shall a license be issued free of charge for the development and utilization of power created by any Government dam and that the amount charged therefor in any license shall be such as determined by the commission.

(f) That whenever any licensee hereunder is directly benefited by the construction work of another licensee, a permittee, or of the United States of a storage reservoir or other headwater improvement, the commission shall require as a condition of the license that the licensee so benefited shall reimburse the owner of such reservoir or other improvements for such part of the annual charges for interest, maintenance, and depreciation thereon as the commission may deem equitable. The proportion of such charges to be paid by any licensee shall be determined by the commission.

Whenever such reservoir or other improvement is constructed by the United States the commission shall assess similar charges against any licensee directly benefited thereby, and any amount so assessed shall be paid into the Treasury of the United States, to be reserved and appropriated as a part of the special fund for headwater improvements as provided in section 17 hereof.

(g) Such other conditions not inconsistent with the provisions of this Act as the commission may require.

(h) That combinations, agreements, arrangements, or understandings, express or implied, to limit the output of electrical energy, to restrain trade, or to fix, maintain, or increase prices for electrical energy or service are hereby prohibited.

(i) In issuing licenses for a minor part only of a complete project, or for a complete project of not more than one hundred horsepower capacity, the commission may in its discretion waive such conditions, provisions, and requirements of this Act, except the license period of fifty years, as it may deem to be to the public interest to waive under the circumstances: *Provided*, That the provisions hereof shall not apply to lands within Indian reservations.

SEC. 11. That if the dam or other project works are to be constructed across, along, or in any of the navigable waters of the United States, the commission may, in so far as it deems the same reasonably necessary to promote the present and future needs of navigation and consistent with a reasonable investment cost to the licensee, include in the license any one or more of the following provisions or requirements:

(a) That such licensee shall, to the extent necessary to preserve and improve navigation facilities, construct, in whole or in part, without expense to the United States, in connection with such dam, a lock or locks, booms, sluices, or other structures for navigation purposes, in accordance with plans and specifications approved by the Chief of Engineers and the Secretary of War and made part of such license.

(b) That in case such structures for navigation purposes are not made a part of the original construction at the expense of the licensee, then whenever the United States shall desire to complete such navigation facilities the licensee shall convey to the United States, free of cost, such of its land and its rights of way and such right of passage through its dams or other structures, and permit such control of pools as may be required to complete such navigation facilities.

(c) That such licensee shall furnish free of cost to the United States power for the operation of such navigation facilities, whether constructed by the licensee or by the United States.

SEC. 12. That whenever application is filed for a project hereunder involving navigable waters of the United States, and the commission shall find upon investigation that the needs of navigation require the construction of a lock or locks or other navigation structures, and that such structures can not, consistent with a reasonable investment cost to the applicant, be provided in the manner specified in section 11, subsection (a) hereof, the commission may grant the application with the provision to be expressed in the license that the licensee will install the necessary navigation structures if the Government fails to make provision therefor within a time to be fixed in the license and cause a report upon such project to be prepared, with estimates of cost of the power development and of the navigation structures, and shall submit such report to Congress with such recommendations as it deems appropriate concerning the participation of the United States in the cost of construction of such navigation structures.

SEC. 13. That the licensee shall commence the construction of the project works within the time fixed in the license, which shall not be more than two years from the date thereof, shall thereafter in good faith and with due diligence prosecute such construction, and shall within the time fixed in the license complete and put into operation

such part of the ultimate development as the commission shall deem necessary to supply the reasonable needs of the then available market, and shall from time to time thereafter construct such portion of the balance of such development as the commission may direct, so as to supply adequately the reasonable market demands until such development shall have been completed. The periods for the commencement of construction may be extended once but not longer than two additional years and the period for the completion of construction carried on in good faith and with reasonable diligence may be extended by the commission when not incompatible with the public interests. In case the licensee shall not commence actual construction of the project works, or of any specified part thereof within the time prescribed in the license or as extended by the commission, then, after due notice given, the license shall, as to such project works or part thereof, be terminated upon written order of the commission. In case the construction of the project works, or of any specified part thereof, have been begun but not completed within the time prescribed in the license, or as extended by the commission, then the Attorney General, upon the request of the commission, shall institute proceedings in equity in the district court of the United States for the district in which any part of the project is situated for the revocation of said license, the sale of the works constructed, and such other equitable relief as the case may demand, as provided for in section 28 hereof.

SEC. 14. That upon not less than two years' notice in writing from the commission the United States shall have the right upon or after the expiration of any license to take over and thereafter to maintain and operate any project or projects as defined in section 3 hereof, and covered in whole or in part by the license, or the right to take over upon mutual agreement with the licensee all property owned and held by the licensee then valuable and serviceable in the development, transmission, or distribution of power and which is then dependent for its usefulness upon the continuance of the license, together with any lock or locks or other aids to navigation constructed at the expense of the licensee, upon the condition that before taking possession it shall pay the net investment of the licensee in the project or projects taken, not to exceed the fair value of the property taken, plus such reasonable damages, if any, to property of the licensee valuable, serviceable, and dependent as above set forth but not taken, as may be caused by the severance therefrom of property taken, and shall assume all contracts entered into by the licensee with the approval of the commission. The net investment of the licensee in the project or projects so taken and the amount of such severance damages, if any, shall be determined by agreement between the commission and the licensee, and in case they can not agree, by proceedings in equity instituted by the United States in the district court of

the United States in the district within which any such property may be located: *Provided*, That such net investment shall not include or be affected by the value of any lands, rights of way, or other property of the United States licensed by the commission under this Act, by the license, or by good will, going value, or prospective revenues: *Provided further*, That the values allowed for water rights, rights of way, lands, or interest in lands shall not be in excess of the actual reasonable cost thereof at the time of acquisition by the licensee: *Provided*, That the right of the United States or any State or municipality to take over, maintain, and operate any project licensed under this Act at any time by condemnation proceedings upon payment of just compensation is hereby expressly reserved.

SEC. 15. That if the United States does not, at the expiration of the original license, exercise its right to take over, maintain, and operate any project or projects of the licensee, as provided in section 14 hereof, the commission is authorized to issue a new license to the original licensee upon such terms and conditions as may be authorized or required under the then existing laws and regulations, or to issue a new license under said terms and conditions to a new licensee, which license may cover any project or projects covered by the original license, and shall be issued on the condition that the new licensee shall, before taking possession of such project or projects, pay such amount, and assume such contracts as the United States is required to do, in the manner specified in section 14 hereof: *Provided*, That in the event the United States does not exercise the right to take over or does not issue a license to a new licensee, or issue a new license to the original licensee, upon reasonable terms, then the commission shall issue from year to year an annual license to the then licensee under the terms and conditions of the original license until the property is taken over or a new license is issued as aforesaid.

SEC. 16. That when in the opinion of the President of the United States, evidenced by a written order addressed to the holder of any license hereunder, the safety of the United States demands it, the United States shall have the right to enter upon and take possession of any project, or part thereof, constructed, maintained, or operated under said license, for the purpose of manufacturing nitrates, explosives, or munitions of war, or for any other purpose involving the safety of the United States, to retain possession, management, and control thereof for such length of time as may appear to the President to be necessary to accomplish said purposes, and then to restore possession and control to the party or parties entitled thereto; and in the event that the United States shall exercise such right it shall pay to the party or parties entitled thereto just and fair compensation for the use of said property as may be fixed by the commission

upon the basis of a reasonable profit in time of peace, and the cost of restoring said property to as good condition as existed at the time of the taking over thereof, less the reasonable value of any improvements that may be made thereto by the United States and which are valuable and serviceable to the licensee.

SEC. 17. That all proceeds from any Indian reservation shall be placed to the credit of the Indians of such reservation. All other charges arising from licenses hereunder shall be paid into the Treasury of the United States, subject to the following distribution: Twelve and one-half per centum thereof is hereby appropriated to be paid into the Treasury of the United States and credited to "Miscellaneous receipts"; 50 per centum of the charges arising from licenses hereunder for the occupancy and use of public lands, national monuments, national forests, and national parks shall be paid into, reserved, and appropriated as a part of the reclamation fund created by the Act of Congress known as the Reclamation Act, approved June 17, 1902; and 37½ per centum of the charges arising from licenses hereunder for the occupany and use of national forests, national parks, public lands, and national monuments, from development within the boundaries of any State shall be paid by the Secretary of the Treasury to such State; and 50 per centum of the charges arising from all other licenses hereunder is hereby reserved and appropriated as a special fund in the Treasury to be expended under the direction of the Secretary of War in the maintenance and operation of dams and other navigation structures owned by the United States or in the construction, maintenance, or operation of headwater or other improvements of navigable waters of the United States.

SEC. 18. That the operation of any navigation facilities which may be constructed as a part of or in connection with any dam or diversion structure built under the provisions of this Act, whether at the expense of a licensee hereunder or of the United States, shall at all times be controlled by such reasonable rules and regulations in the interest of navigation, including the control of the level of the pool caused by such dam or diversion structure as may be made from time to time by the Secretary of War. Such rules and regulations may include the maintenance and operation by such licensee at its own expense of such lights and signals as may be directed by the Secretary of War, and such fishways as may be prescribed by the Secretary of Commerce; and for willful failure to comply with any such rule or regulation such licensee shall be deemed guilty of a misdemeanor, and upon conviction thereof shall be punished as provided in section 25 hereof.

SEC. 19. That as a condition of the license, every licensee hereunder which is a public-service corporation, or a person, association, or corporation owning or operating any project and developing,

transmitting, or distributing power for sale or use in public service, shall abide by such reasonable regulation of the services to be rendered to customers or consumers of power, and of rates and charges of payment therefor, as may from time to time be prescribed by any duly constituted agency of the State in which the service is rendered or the rate charged. That in case of the development, transmission, or distribution, or use in public service of power by any licensee hereunder or by its customer engaged in public service within a State which has not authorized and empowered a commission or other agency or agencies within said State to regulate and control the services to be rendered by such licensee or by its customers engaged in public service, or the rates and charges of payment therefor, or the amount or character of securities to be issued by any of said parties, it is agreed as a condition of such license that jurisdiction is hereby conferred upon the commission, upon complaint of any person aggrieved or upon its own initiative, to exercise such regulation and control until such time as the State shall have provided a commission or other authority for such regulation and control: *Provided*, That the jurisdiction of the commission shall cease and determine as to each specific matter of regulation and control prescribed in this section as soon as the State shall have provided a commission or other authority for the regulation and control of that specific matter.

SEC. 20. That when said power or any part thereof shall enter into interstate or foreign commerce the rates charged and the service rendered by any such licensee, or by any subsidiary corporation, the stock of which is owned or controlled directly or indirectly by such licensee, or by any person, corporation, or association purchasing power from such licensee for sale and distribution or use in public service, shall be reasonable, nondiscriminatory, and just to the customer, and all unreasonable discriminatory and unjust rates or services are hereby prohibited and declared to be unlawful; and whenever any of the States directly concerned has not provided a commission or other authority to enforce the requirements of this section within such State or to regulate and control the amount and character of securities to be issued by any of such parties or such States are unable to agree through their properly constituted authorities on the services to be rendered or on the rates or charges of payment therefor, or on the amount or character of securities to be issued by any of said parties, jurisdiction is hereby conferred upon the commission, upon complaint of any person aggrieved, upon the request of any State concerned, or upon its own initiative, to enforce the provisions of this section, to regulate and control so much of the services rendered, and of the rates and charges of payment therefor as constitute interstate or foreign commerce, and to regulate the issuance of securities by the parties included within this section,

and securities issued by the licensee subject to such regulations shall be allowed only for the bona fide purpose of financing and conducting the business of such licensee.

The administration of the provisions of this section, so far as applicable, shall be according to the procedure and practice in fixing and regulating the rates, charges, and practices of railroad companies as provided in the Act to regulate commerce, approved February 4, 1887, as amended, and that the parties subject to such regulation shall have the same rights of hearing, defense, and review as said companies in such cases.

In any valuation of the property of any licensee hereunder for purposes of rate making, no value shall be claimed by the licensee or allowed by the commission for any project or projects under license in excess of the value or values prescribed in section 14 hereof for the purposes of purchase by the United States, but there shall be included the cost to such licensee of the construction of the lock or locks or other aids of navigation and all other capital expenditures required by the United States, and no value shall be claimed or allowed for the rights granted by the commission or by this Act.

SEC. 21. That when any licensee can not acquire by contract or pledges an unimproved dam site or the right to use or damage the lands or property of others necessary to the construction, maintenance, or operation of any dam, reservoir, diversion structure, or the works appurtenant or accessory thereto, in conjunction with an improvement which in the judgment of the commission is desirable and justified in the public interest for the purpose of improving or developing a waterway or waterways for the use or benefit of interstate or foreign commerce, it may acquire the same by the exercise of the right of eminent domain in the district court of the United States for the district in which such land or other property may be located, or in the State courts. The practice and procedure in any action or proceeding for that purpose in the district court of the United States shall conform as nearly as may be with the practice and procedure in similar action or proceeding in the courts of the State where the property is situated: *Provided*, That United States district courts shall only have jurisdiction of cases when the amount claimed by the owner of the property to be condemned exceeds $3,000.

SEC. 22. That whenever the public interest requires or justifies the execution by the licensee of contracts for the sale and delivery of power for periods extending beyond the date of termination of the license, such contracts may be entered into upon the joint approval of the commission and of the public-service commission or other similar authority in the State in which the sale or delivery of power is made, or if sold or delivered in a State which has no such public-

service commission, then upon the approval of the commission, and thereafter, in the event of failure to issue a new license to the original licensee at the termination of the license, the United States or the new licensee, as the case may be, shall assume and fulfill all such contracts.

SEC. 23. That the provisions of this Act shall not be construed as affecting any permit or valid existing right of way heretofore granted, or as confirming or otherwise affecting any claim, or as affecting any authority heretofore given pursuant to law, but any person, association, corporation, State, or municipality, holding or possessing such permit, right of way, or authority may apply for a license hereunder, and upon such application the commission may issue to any such applicant a license in accordance with the provisions of this Act, and in such case the provisions of this Act shall apply to such applicant as a licensee hereunder: *Provided*, That when application is made for a license under this section for a project or projects already constructed, the fair value of said project or projects, determined as provided in this section, shall for the purposes of this Act and of said license be deemed to be the amount to be allowed as the net investment of the applicant in such project or projects as of the date of such license, or as of the date of such determination, if license has not been issued. Such fair value may, in the discretion of the commission, be determined by mutual agreement between the commission and the applicant or, in case they can not agree, jurisdiction is hereby conferred upon the district court of the United States in the district within which such project or projects may be located, upon the application of either party, to hear and determine the amount of such fair value.

That any person, association, corporation, State, or municipality intending to construct a dam or other project works across, along, over, or in any stream or part thereof, other than those defined herein as navigable waters, and over which Congress has jurisdiction under its authority to regulate commerce between foreign nations and among the several States, may in their discretion file declaration of such intention with the commission, whereupon the commission shall cause immediate investigation of such proposed construction to be made, and if upon investigation it shall find that the interests of interstate or foreign commerce would be affected by such proposed construction, such person, association, corporation, State, or municipality shall not proceed with such construction until it shall have applied for and shall have received a license under the provisions of this Act. If the commission shall not so find, and if no public lands or reservations are affected, permission is hereby granted to construct such dam or other project works in such stream upon compliance with State laws.

SEC. 24. That any lands of the United States included in any proposed project under the provisions of this Act shall from the date of filing of application therefor be reserved from entry, location, or other disposal under the laws of the United States until otherwise directed by the commission or by Congress. Notice that such application has been made, together with the date of filing thereof and a description of the lands of the United States affected thereby, shall be filed in the local land office for the district in which such lands are located. Whenever the commission shall determine that the value of any lands of the United States so applied for, or heretofore or hereafter reserved or classified as power sites, will not be injured or destroyed for the purposes of power development by location, entry, or selection under the public-land laws, the Secretary of the Interior, upon notice of such determination, shall declare such lands open to location, entry, or selection, subject to and with a reservation of the right of the United States or its permittees or licensees to enter upon, occupy, and use any part or all of said lands necessary, in the judgment of the commission, for the purposes of this Act, which right shall be expressly reserved in every patent issued for such lands; and no claim or right to compensation shall accrue from the occupation or use of any of said lands for said purposes. The United States or any licensee for any such lands hereunder may enter thereupon for the purposes of this Act, upon payment of any damages to crops, buildings, or other improvements caused thereby to the owner thereof, or upon giving a good and sufficient bond to the United States for the use and benefit of the owner to secure the payment of such damages as may be determined and fixed in an action brought upon the bond in a court of competent jurisdiction, said bond to be in the form prescribed by the commission: *Provided*, That locations, entries, selections, or filings heretofore made for lands reserved as water-power sites or in connection with water-power development or electrical transmission may proceed to approval or patent under and subject to the limitations and conditions in this section contained.

SEC. 25. That any licensee, or any person, who shall willfully fail or who shall refuse to comply with any of the provisions of this Act, or with any of the conditions made a part of any license issued hereunder, or with any subpœna of the commission, or with any regulation or lawful order of the commission, or of the Secretary of War, or of the Secretary of Commerce as to fishways, issued or made in accordance with the provisions of this Act, shall be deemed guilty of a misdemeanor, and on conviction thereof shall, in the discretion of the court, be punished by a fine of not exceeding $1,000, in addition to other penalties herein prescribed or provided by law; and every month any such licensee or any such person

shall remain in default after written notice from the commission, or from the Secretary of War, or from the Secretary of Commerce, shall be deemed a new and separate offense punishable as aforesaid.

SEC. 26. That the Attorney General may, on request of the commission or of the Secretary of War, institute proceedings in equity in the district court of the United States in the district in which any project or part thereof is situated for the purpose of revoking for violation of its terms any permit or license issued hereunder, or for the purpose of remedying or correcting by injunction, mandamus, or other process any act of commission or omission in violation of the provisions of this Act or of any lawful regulation or order promulgated hereunder. The district courts shall have jurisdiction over all of the above-mentioned proceedings and shall have power to issue and execute all necessary process and to make and enforce all writs, orders, and decrees to compel compliance with the lawful orders and regulations of the commission and of the Secretary of War, and to compel the performance of any condition imposed under the provisions of this Act. In the event a decree revoking a license is entered, the court is empowered to sell the whole or any part of the project or projects under license, to wind up the business of such licensee conducted in connection with such project or projects, to distribute the proceeds to the parties entitled to the same, and to make and enforce such further orders and decrees as equity and justice may require. At such sale or sales the vendee shall take the rights and privileges belonging to the licensee and shall perform the duties of such licensee and assume all outstanding obligations and liabilities of the licensee which the court may deem equitable in the premises; and at such sale or sales the United States may become a purchaser, but it shall not be required to pay a greater amount than it would be required to pay under the provisions of section 14 hereof at the termination of the license.

SEC. 27. That nothing herein contained shall be construed as affecting or intending to affect or in any way to interfere with the laws of the respective States relating to the control, appropriation, use, or distribution of water used in irrigation or for municipal or other uses, or any vested right acquired therein.

SEC. 28. That the right to alter, amend, or repeal this Act is hereby expressly reserved; but no such alteration, amendment, or repeal shall affect any license theretofore issued under the provisions of this Act, or the rights of any licensee thereunder.

SEC. 29. That all Acts or parts of Acts inconsistent with this Act are hereby repealed: *Provided*, That nothing herein contained shall be held or construed to modify or repeal any of the provisions of the Act of Congress approved December 19, 1913, granting certain rights of way to the city and county of San Francisco, in the State of Cali-

fornia: *Provided further*, That section 18 of an Act making appropriations for the construction, repair, and preservation of certain public works on rivers and harbors, and for other purposes, approved August 8, 1917, is hereby repealed.

SEC. 30. That the short title of this Act shall be "The Federal Water Power Act."

Approved, June 10, 1920.

AMENDMENT TO THE FEDERAL WATER POWER ACT.

(41 Stat., 1353.)

AN ACT To amend an Act entitled "An Act to create a Federal Power Commission; to provide for the improvement of navigation; the development of water power; the use of the public lands in relation thereto; and to repeal section 18 of the River and Harbor Appropriation Act, approved August 8, 1917, and for other purposes," approved June 10, 1920.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled, That hereafter no permit, license, lease, or authorization for dams, conduits, reservoirs, power houses, transmission lines, or other works for storage or carriage of water, or for the development, transmission, or utilization of power, within the limits as now constituted of any national park or national monument shall be granted or made without specific authority of Congress, and so much of the Act of Congress approved June 10, 1920, entitled "An Act to create a Federal Power Commission; to provide for the improvement of navigation; the development of water power; the use of the public lands in relation thereto; and to repeal section 18 of the River and Harbor Appropriation Act, approved August 8, 1917, and for other purposes," approved June 10, 1920, as authorizes licensing such uses of existing national parks and national monuments by the Federal Power Commission is hereby repealed.

Approved March 3, 1921.

ORDERS.

ORDER, No. 1.

By authority of section 2 of the Federal Water Power Act approved June 10, 1920 (Public 280), it is ordered that the Executive Secretary of the Federal Power Commission shall be authorized to draw upon the Secretary of the Treasury all warrants for expenditures out of appropriations heretofore or hereafter made for the use of said Commission.

Done at Washington, D. C., this 31st day of July, 1920.

NEWTON D. BAKER, *Chairman.*

Attest:

O. C. MERRILL,
Executive Secretary.

ORDER, No. 2.

By authority of section 2 of the Federal Water Power Act, approved June 10, 1920 (Public 280, 66th Congress), and pursuant to the action of the Federal Power Commission at its meeting of July 28, 1920, it is hereby ordered that the duties of the Executive Secretary of the Federal Power Commission, to be performed under the general direction of the Commission, shall be as follows:

1. To administer the Act as executive officer of the Commission and to see that the rules and regulations of the Commission are carried out.

2. To supervise under the Act and regulations all personnel that may be employed by or detailed or assigned to the Commission, and to prescribe their duties within the limits of the Act and regulations.

3. To have general administrative charge of the conduct, preparation, and publication of all investigations, valuations, hearings, and reports authorized or required by the Act, unless otherwise provided by the Commission.

4. To approve vouchers for expenditures incurred on account of salaries and other expenses payable under the provisions of the Act.

5. To administer oaths and affirmations, examine witnesses, and receive evidence as authorized by section 4 (*g*) of said Act.

6. To formulate, authenticate, and record the findings of the Commission provided for in sections 4 (*d*), 7, 21, and 23 of the Act, or other sections of the Act, unless otherwise provided by the Commission.

7. To attest all orders, decisions, or regulations of the Commission and to certify under seal copies of such orders, decisions, or regula-

tions, or of any findings, report, map, plan, or other record of the Commission, whenever required for any lawful purpose.

8. To execute and issue permits and licenses under the seal of the Commission.

9. To approve under the seal of the Commission voluntary transfers of licenses, or of the rights thereunto granted.

10. To cancel or terminate permits or licenses under the conditions prescribed in section 5 and in section 13 of the Act, respectively.

Done at the city of Washington, District of Columbia, this 23d day of August, 1920.

NEWTON D. BAKER, *Chairman.*

Attest:

O. C. MERRILL,
Executive Secretary.

ORDER, No. 3.

By authority of section 3 of the Federal Water Power Act, approved June 10, 1920 (Public 280, 66th Congress), and pursuant to the action of the Federal Power Commission at its meeting of July 28, 1920, it is hereby ordered that the duties of the Engineer Officer of the Federal Power Commission, to be performed under the general direction of the Executive Secretary, shall be to act as Chief Engineer of the Commission, and to have general charge of its engineering activities.

Done at the city of Washington, District of Columbia, this 23d day of August, 1920.

NEWTON D. BAKER, *Chairman.*

Attest:

O. C. MERRILL,
Executive Secretary.

ORDER, No. 4.

By authority of section 7 of the Federal Water Power Act, approved June 10, 1920 (Public 280), and pursuant to the direction of the Commission, it is hereby ordered that the instructions to the Chief of Engineers, issued in compliance with the request of the Commission at its meeting of July 1, 1920, to undertake the investigations and other work of the Great Falls Project, required by said section 7, be and the same are hereby confirmed.

Done at the city of Washington, District of Columbia, this 23d day of August, 1920.

NEWTON D. BAKER, *Chairman.*

Attest:

O. C. MERRILL,
Executive Secretary.

ORDERS, No. 5.

By authority of section 2 of the Federal Water Power Act, approved June 10, 1920 (Public 280, 66th Congress), and pursuant to the action of the Federal Power Commission at its meeting of September 3, 1920, it is hereby ordered that the duties of the Executive Secretary of the Commission shall include, in addition to those prescribed in Orders No. 2, dated August 23, 1920, the following, namely: To authorize all advertising in newspapers required by section 4 (*d*) and section 4 (*e*) of the Act, and such other advertising as may be required in the administration of the Act.

Done at the city of Washington, District of Columbia, this 3d day of September, 1920.

NEWTON D. BAKER, *Chairman.*

Attest:

O. C. MERRILL,
Executive Secretary.

ORDERS, No. 6.

By authority of paragraph (*h*) of section 4 of the Federal Water Power Act, approved June 10, 1920 (Public 280, 66th Congress), and in pursuance of the action of the Federal Power Commission at its meeting of September 3, 1920, it is hereby ordered that the following rules and regulations effective on and after the date of execution hereof, being Regulations 1 to 19, inclusive, shall govern in the matter covered thereby in the administration of said Act.

Done at the city of Washington, District of Columbia, this 3d day of September, 1920.

NEWTON D. BAKER, *Chairman.*

Attest:

O. C. MERRILL,
Executive Secretary.

NOTE.—Orders, No. 6 was superseded by Orders, No. 9 of February 28, 1921, which latter prescribed Regulations 1 to 20, inclusive. By Orders, No. 11 of June 6, 1921 (see page 87 hereof), certain of the regulations were amended, and in their amended form are shown herein on pages 6 to 46, inclusive.

ORDERS, No 7.

By authority of paragraph 2 of section 2 of the Federal Water Power Act, approved June 10, 1920 (41 Stat., 1063), and in pursuance of the action of the Federal Power Commission at its meeting of

November 8, 1920, it is hereby ordered that the following travel regulations shall be effective on and after the date of execution hereof.

Done at the city of Washington, District of Columbia, this 8th day of November, 1920.

NEWTON D. BAKER, *Chairman.*

Attest:

O. C. MERRILL,
Executive Secretary.

NOTE.—The travel regulations referred to in Orders, No. 7 have been printed in pamphlet form. As they are of interest chiefly to employees of the commission, they have not been included in this publication.

ORDERS, No. 8.

Approval having been given by the Commission on December 27, 1920, to the opinion by its Chief Counsel that, as to records not privileged, there is—

no reason why authenticated or unauthenticated copies thereof may not be furnished, and that the Commission may authorize charges for such service and prescribe a schedule for such charges; and that as to records confidential in their nature copies thereof should not be furnished,

the following instructions will govern the matter of furnishing copies or official records of the Commission, and the matter of inspecting such records:

1. Fees will be charged for all written copies at the rate of fifteen cents for each hundred words therein (if printed stock forms are used charge will be made for the written or typewritten portions only); and for copies made by photographic, photolithographic, blue print, or other process, the actual or estimated expense of reproduction will be charged: *Provided*, That there shall be no charge for the making or verification of copies required for official use by the officers of any branch of the Government: *Provided further*, That a charge of twenty-five cents shall be made for furnishing authenticated copies of any rules, regulations, or other matter printed by the Commission for gratuitous distribution.

2. In event it should appear that the making of any such copies will unduly interfere with the work of the Commission or deplete its appropriations, the Executive Secretary may deny any applications, whenever such denial will not be prejudicial to the interests of the Government; or he may authorize copies to be made at other than expense of the Commission under such arrangement as he may approve.

3. Any person desiring a copy of any record in the Commission must make written application therefor (except in cases coming within the proviso in paragraph 1), stating specifically (*a*) the particular record of which copy is desired, (*b*) the kind of copy de-

sired, whether written, photographic, or other, and whether authenticated or unauthenticated, and (c) the purpose for which such copy is desired to be used; and shall deposit the approximate amount of the charge for the copy, which deposit will be returned should the application be denied. Should the amount deposited be found to be insufficient to pay the charge, the desired copy will not be delivered until the deficiency is paid. Any excess deposited will be returned to the applicant when the copy is delivered.

4. The question of whether the furnishing of any desired copy of any record of the Commission is prejudicial to the interests of the Government, whether the particular record is confidential in its nature, and whether the particular interest of the applicant is such as will warrant permission being given to inspect such record, and what is a proper purpose in making inspection, will be determined primarily and promptly by the chief of division to whose work the record pertains, who may, if in doubt, submit the question to the Executive Secretary for decision; or the chief of division may deny the application, in which event the applicant may himself submit the question to the Executive Secretary for decision.

Done at the city of Washington, District of Columbia, this fourteenth day of February, 1921.

NEWTON D. BAKER, *Chairman.*

Attest:

O. C. MERRILL,
Executive Secretary.

ORDER, No. 9.

By authority of paragraph (*h*) of section 4 of the Federal Water Power Act, approved June 10, 1920 (41 Stat., 1063), and in pursuance of the action of the Federal Power Commission at its meeting of February 28, 1921, it is hereby ordered that the following rules and regulations, effective on and after the date of execution hereof, being Regulations 1 to 20, inclusive, shall govern in the matters covered thereby, in the administration of said act; and that this order shall supersede Orders, No. 6, of September 3, 1920.

Done at the city of Washington, District of Columbia, this 28th day of February, 1921.

NEWTON D. BAKER, *Chairman.*

Attest:

O. C. MERRILL,
Executive Secretary.

NOTE.—Certain of the Regulations 1 to 20, inclusive, prescribed by Orders, No. 9, were amended by Orders, No. 11 of June 6, 1921 (see page 57 hereof), and in their amended form are shown herein on pages 6 to 49, inclusive.

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ORDERS, No. 10.

By authority of paragraph one of section 2 and paragraph (*h*) of section 4 of the Federal Water Power Act, approved June 10, 1920 (41 Stat., 1063), and in pursuance of the action of the Federal Power Commission at its meeting of May 20, 1921, it is hereby ordered that the following general procedure, whenever practicable, be observed in the administration of said Act, and that the Executive Secretary be authorized and directed to take such steps as may be necessary to place such procedure into effect.

Done at the city of Washington, District of Columbia, this 2d day of June, 1921.

JOHN W. WEEKS, *Chairman.*

Attest:
O. C. MERRILL,
Executive Secretary.

GENERAL PROCEDURE FOR ADMINISTRATION OF THE FEDERAL WATER POWER ACT.

I. ACTION BY THE COMMISSION.

("Commission" in the following paragraphs means the Commission itself as distinguished from its executive staff.)

1. The Commission to hold regular meetings at stated intervals, at which time action to be taken on matters initiated by members of the Commission or formulated and presented by the Executive Secretary. Such matters to include the following:

(a) Findings with respect to effect of power projects upon navigable waters or reservations.
(b) Authorization for issuance of permits and licenses, and restoration to entry of lands in power-site reserves.
(c) Legal opinions.
(d) Matters of policy or of general administration.
(e) Appeals.
(f) Formal orders.
(g) Regulations.
(h) Legislation.

2. Special meetings to be held upon call of the chairman when in his judgment necessary in order to avoid delay on pending matters or in case of hearings before the Commission.

II. ACTION BY EXECUTIVE SECRETARY—GENERAL.

("Executive Secretary" in the following paragraphs includes also the individuals detailed or assigned to the Commission and working under the supervision of the Executive Secretary.)

1. To formulate and present to the Commission for its action matters within the scope of paragraph "1" preceding. Matters arising under divisions "c," "d," "e," and "g" of said paragraph, and in other cases on request of any member of the Commission, to be submitted in written form to the individual

members of the Commission prior to the date of the meeting upon which presented for action.

4. To keep minutes of all meetings of the Commission, to record therein the substance of all action taken, and to furnish the individual members of the Commission with copies of such minutes.

III. PERMITS, LICENSES, AND DECLARATIONS OF INTENTION—GENERAL.

(A) Action by the Departments.

(a) field offices.

5. To receive applications, to examine them for conformity with regulations, to secure additions and corrections when necessary, and when complete to submit copy with statement of date of filing directly to the Executive Secretary.

6. When applications are sufficiently complete, to give the public notice, to prepare and arrange for advertising, as required by section 4, subsections (d) and (e) of the Act, and to submit the bill therefor and a certificate of completion of advertisement directly to the Executive Secretary.

7. To make field examination of projects, to prepare reports thereon, including such conditions as may be necessary for the protection of navigation or for the adequate protection and utilization of any reservation involved, and to submit the same to the Executive Secretary through the appropriate Washington office of the Department concerned.

8. Where there are conflicting applications for the same site, or objections have been made to the application, or information is needed which can not be secured through individual investigation, and a public hearing is therefore necessary or desirable, to hold such hearing in the field wherever practicable and to submit with and in the same manner as the report on the project a record of such hearing, consisting either of stenographic transcript or notes, together with any exhibits filed.

9. To give sufficient supervision to construction, operation, and maintenance of project works to determine whether there is substantial compliance with requirements of license in respect thereto.

(b) Washington office.

10. The appropriate Washington office of the several departments to submit to the Executive Secretary, with any additional material or recommendation desired, the reports and records of hearings specified in paragraphs 7 and 8 preceding.

11. When projects involve dams or other structures affecting navigation the Chief of Engineers to approve the same and secure the approval of the Secretary of War, as required by section 4(d) of the Act before license is issued.

(B) Action by Executive Secretary.

12. Applications filed directly with the Executive Secretary to be examined to determine whether they conform with the regulations and them to be transmitted to the appropriate department with a statement of the respect, if any, in which incomplete, for submission by such department to its field offices for further action in accordance with paragraphs 5–8 preceding.

13. All applications, whether filed directly with the Executive Secretary or transmitted to him from the field, to be assigned a serial number and appropriate notification made.

14. In all applications involving public lands the Commissioner of the General Land Office to be notified of the areas affected in order that withdrawal may be made under the provisions of section 24 of the Act and that record thereof may be filed with the appropriate land office.

15. Hearings to be held by Executive Secretary when Washington is the most convenient place for such hearings except when the Commission wishes to conduct a hearing itself, or approves the request that it be so conducted. Hearings to be conducted by the Executive Secretary outside of Washington when such hearings can be more conveniently held by him than by others. (This relates particularly to hearings involving applications. For hearings on miscellaneous matters, see paragraph 24 following.)

16. Upon receipt of reports and other papers, the same to be examined in connection with the application, and if no further information required, permit or license, as the case may be, to be prepared and the cases reported to the Commission at its next meeting. If and when approved by the Commission the maps and plans to be approved and the permit or license to be executed and issued by the Executive Secretary.

17. In reporting to the Commission recommendations for the issuance of permits and licenses the Executive Secretary to submit for the approval of the Commission, if the project affects navigable waters, a finding with respect to the use and benefit of such project in interstate or foreign commerce, and, if the project affects a reservation of the United States, a finding that the license will not interfere or be inconsistent with the purpose for which such reservation was created or acquired.

18. In the case of reports upon declarations of intention the Executive Secretary to make and record on behalf of the Commission the finding required by section 23 of the Act, and, if it is found that the proposed construction will affect interstate or foreign commerce, to treat the declaration as an application for permit or license and to proceed accordingly.

19. In the case of applications for projects of 100 horsepower capacity or less, or for minor parts of complete projects, the Executive Secretary to determine what general requirements may, under the provisions of section 10 (f) of the Act, be waived.

20. Subject to appeal to the Commission, the Executive Secretary to decide between contesting applicants for the same site, to reject those not approved; and, in general, to reject applications if the plans proposed do not provide for adequate development of the site, or if the applicant can not make reasonable showing of financial ability, or if approval of the application would not be in the public interest.

21. Executive Secretary to report to the Commission at its meetings, for entry upon the minutes, applications filed, applications advertised, findings made and proposed, and permits or licenses the issuance of which is recommended.

IV. SPECIAL INVESTIGATIONS.

22. An investigation be made of so much of the Colorado River as will determine the proper relation of power developments on the middle section of the river to irrigation on the headwaters, on the tributaries, and on the lower reaches of the river, such investigation to be undertaken as soon as arrangements can be effected between the Reclamation Service, the Commission, and the States concerned and, pending the employment of personnel by the Commission, the Chief of Engineers or the Geological Survey, or both, be requested to detail an engineer to represent the Commission.

22. Similar investigations on other pending cases to be undertaken as soon as arrangements can be made, details or assignments of individuals to be requested from the department or departments in the best position to act for the Commission.

V. APPLICATIONS FOR LICENSES UNDER SECTION 23 OF ACT INVOLVING PROPERTY VALUATIONS.

24. Action upon applications in accordance with section 23 of the Act for projects already constructed by applicants who hold or possess permits, rights of way, or other authority heretofore granted, to be suspended until such time as the Commission has authority to employ sufficient personnel to undertake the valuations required, or until the disposition of other cases pending before the Commission makes existing personnel available.

25. When any such applicant is without authority to maintain and operate its project, license to be issued under the conditions that valuation shall be made at the earliest practicable date, that it shall be determined as of the date of issuance of license, and that the licensee shall agree to accept and to enter upon its books as the value of its property on such date the amount determined under the provisions of section 23.

VI. POWER SITE RESTORATIONS.

(A) Action by the Departments.

(a) Field offices.

26. To receive applications if tendered and to submit same to Executive Secretary with report thereon through the appropriate Washington office. So far as practicable all such applications to be filed with the local land offices and transmitted therefrom through the General Land Office to the Executive Secretary.

(b) Washington office.

27. To transmit applications with all available data thereon to the Executive Secretary.

28. When determination has been made the General Land Office will record the fact and notify the local land office. All further action will be within the exclusive jurisdiction of the Department of the Interior.

(B) Action by Executive Secretary.

29. On the receipt of applications directly, or by reference from departments, to secure available information from the General Land Office, Geological Survey, or Forest Service, and if adequate information is not thus available, to call for such further information from the appropriate Government agencies as may be necessary. When sufficient information is received, to submit matter to the Commission for the determination required by section 24 of the Act, to certify such determination to the Commissioner of the General Land Office and to record the action taken in the minutes of the Commission.

VII. LEGAL OPINIONS AND DECISIONS.

30. Opinions of the Chief Counsel rendered in connection with the work of the Commission to be transmitted to the members of the Commission for in-

formation and individual approval, and to be later submitted by the Executive Secretary to the Commission for formal action. If approved by the Commission, such opinions to become decisions of the Commission, and abstracts thereof to be entered upon the minutes of the meeting at which approved. If approved, the Executive Secretary to transmit copies of such decisions to each of the three Departments for their information and record. In case of disagreement the question to be either referred back to the Chief Counsel for further consideration or decided by vote of the Commission, or referred to the Attorney General, as the Commission may determine.

31. In matters involving appropriations of the Commission the question to be formulated by the Executive Secretary and letter to the Comptroller of the Treasury to be prepared for the signature of the Chairman of the Commission.

VIII. ACCOUNTS AND REPORTS.

32. In conformity with the Rules and Regulations and with the system of accounting adopted, and subject to appeal to the Commission, the Executive Secretary:

(a) To determine the forms of annual and special reports to be submitted by licensees under the requirements of section 4, subsections (*a*) and (*f*) of the Act.

(b) To make investigations, hold hearings, and determine whether the proposals of licensees for the allocation of earnings between project and nonproject property are equitable; whether classification of property for the purpose of depreciation, as proposed by licensees, is reasonable; whether the rates and amounts of depreciation and the reserves established thereby, as required by section 10, subsection (*c*) of the Act are adequate; and whether the licensee is earning or has earned excessive profits within the meaning of section 10, subsection (*b*) of the Act.

33. The Executive Secretary to determine benefits which have equitably accrued to any licensee on account of the construction of storage reservoirs or other headwater improvements by another licensee, by a permittee, or by the United States, and to determine the annual charges which should be paid on account thereof, as required by Section 10, subsection (*f*) of the Act.

IX. HEARINGS AND APPEALS.

34. In cases of request for hearing before the Commission such hearing, unless in any case the Commission decide otherwise, to be held in the first instance by the Executive Secretary and preliminary decision to be made by him on the matter at issue.

35. If those requesting hearing are dissatisfied with the preliminary decision, appeal may be taken to the Commission, in which event an agreed statement of facts, if such can be reached, to be presented to the Commission by the Executive Secretary, together with a digest of the arguments for and against the matter at issue and any briefs or other papers pertinent to the case, for consideration by the Commission at its next regular meeting, at which time opportunity for oral argument to be given if appellant desires and Commission concurs.

36. If no appeal taken, the preliminary decision to be presented by the Executive Secretary to the Commission at its next regular meeting for approval or for such modification as the Commission may direct.

37. Appeals from decisions of Executive Secretary made in accordance with paragraph 36, to be handled in the manner provided in paragraph 35.

ORDERS, No. 11.

By authority of paragraph (*h*) of section 4 of the Federal Water Power Act, approved June 10, 1920 (41 Stat., 1063), and in pursuance of the action of the Federal Power Commission at its meeting of May 28, 1921, it is hereby ordered that Regulations 1, 2, 3, 4, 5, 6, 12, 14, 16, 17, 18, 19, and 20, of the Rules and Regulations of the Commission promulgated by Orders No. 9 of February 28, 1921, be amended as hereinafter set forth; that said regulations so amended shall be effective on and after the date of execution hereof, and shall govern in the matters covered thereby in the administration of said Act; and that any permit or license heretofore issued may, upon written application by the permittee or licensee, be subject to the rules and regulations as herein amended, in lieu of the rules and regulations promulgated by said Orders No. 9.

Done at the city of Washington, District of Columbia, this 6th day of June, 1921.

JOHN W. WEEKS, *Chairman.*

Attest:

O. C. MERRILL,
Executive Secretary.

NOTE.—The text of Order No. 11, as adopted by the commission, contains the several paragraphs, sections, etc., of regulations as amended. Inasmuch as the amended regulations are printed in full elsewhere herein the amended text has been omitted from what follows, but reference thereto is given.

REGULATION 1.—GENERAL DEFINITIONS.

At the end of section 1 add the words "as amended by the Act of March 3, 1921 (41 Stat., 1353)," so that said section shall read as follows. (For section 1 as amended, see page 6.)

In the first line[1] of section 4, strike out the words and punctuation, "national monuments, national parks,"; before the word "owned" in line 3 of said section insert the words and punctuation ": except national monuments and national parks,"; so that said section shall read as follows. (For section 4 as amended see page 6.)

REGULATION 2.—APPLICATIONS—GENERAL REQUIREMENTS.

In the second line of paragraph A (3), (a) of section 4, after the word "located" insert a comma; in the third line of said paragraph, strike out the word "other" and insert in lieu thereof the words "by the"; so that said paragraph shall read as follows. (For paragraph as amended, see page 9.)

REGULATION 3.—APPLICATIONS FOR PRELIMINARY PERMITS.

In the second line of the first paragraph, strike out the word "items" and insert in lieu thereof the word "documents"; in the fourth line strike out the

[1] References to lines follow the printed form of Orders, No. 9.

word "form" and insert in lieu thereof the word "manner"; so that said paragraph shall read as follows. (For paragraph as amended, see page 11.)

In the first line of section 4 after the words "Exhibit D" insert the words "Statement of," so that said section shall read as follows. (For section 4 as amended, see page 11.)

In the fourth line of section 8, after the word "boundary," insert in parentheses the words "as defined in Sec. 13 of Regulation 1," and substitute commas for the parentheses in lines 4 and 5 of said section, so that said section shall read as follows. (For section 8 as amended, see page 11.)

In the first line of section 10 strike out the words "Exhibit J," and in the same line strike out the word "exhibits" and insert in lieu thereof "documents or data," so that said section shall read as follows. (For section 10 as amended, see page 12.)

REGULATION 4.—APPLICATIONS FOR LICENSES—MAJOR PROJECTS.

In the fourth line of the first paragraph strike out the word "items" and insert in lieu thereof the word "documents"; in the fifth line of the same paragraph strike out the word "form" and insert in lieu thereof the word "manner," so that said paragraph shall read as follows. (For paragraph as amended, see page 12.)

In the eighth line of section 4 strike out the word "of" and insert in lieu thereof the word "or," so that said section shall read as follows. (For section 4 as amended, see page 13.)

In the first line of section 16 strike out the word "Exhibits" and insert in lieu thereof the words "documents or data," so that said section shall read as follows. (For section 16 as amended, see page 17.)

REGULATION 5.—APPLICATIONS FOR LICENSES—MINOR PROJECTS.

In the second line of the first paragraph, after the word "capacity," insert the words and punctuation ", and for projects which involve transmission lines only,"; in the third line of the same paragraph strike out the word "items" and insert in lieu thereof the word "documents"; and in the fourth line of the same paragraph strike out the word "form" and insert in lieu thereof the word "manner," so that said paragraph shall read as follows. (For paragraph as amended, see page 17.)

Add new sections 7 and 8 as follows. (For new sections 7 and 8, see page 18.)

REGULATION 6.—APPLICATIONS FOR LICENSES—MAJOR PROJECTS ALREADY CONSTRUCTED.

In the fourth line of the first paragraph strike out the word "items" and insert in lieu thereof the word "documents"; in the sixth line of the same paragraph strike out the word "form" and insert in lieu thereof the word "manner"; after the figure "2" in the sixth line of the same paragraph add the words "and designated 'Exhibit A,' 'Exhibit B,' etc., respectively, as indicated"; so that said paragraph shall read as follows. (For paragraph as amended, see page 19.)

Strike out sections 1 and 2 and insert in lieu thereof the following. (For sections 1 and 2 as amended, see page 19.)

In the first line of section 6 strike out the word "exhibits" and insert in lieu thereof the word "documents," so that said section shall read as follows. (For section 6 as amended, see page 20.)

REGULATION 12.—PROJECT WORKS

In the fifth line of paragraph B of section 3 strike out the word "do" and in lieu thereof insert the word "will" and after the word "which" at the end of the eighth line of the same paragraph insert a comma followed by the words "in the judgment of the commission, have produced or will," so that paragraph shall read as follows. (For paragraph B as amended, see page 25.)

Strike out paragraph A of section 5 and insert in lieu thereof the following paragraph. (For paragraph A as amended, see page 29.)

In the sixth line of paragraph B of section 6 strike out the word "therefor" and insert in lieu thereof the words "for such injury or destruction, or by," and in the same line strike out the word "thereof" and insert in lieu thereof the words "or repair of damaged property," so that said paragraph shall read as follows. (For paragraph B as amended, see page 30.)

REGULATION 14.—ANNUAL CHARGES.

Strike out the first paragraph and insert in lieu thereof the following. (For paragraph as amended, see page 32.)

In the first line of section 3 following the word "horsepower" insert the words "of power capacity," so that said section shall read as follows. (For section 3 as amended, see page 33.)

Strike out section 8 and insert in lieu thereof the following. (For section 8 as amended, see page 34.)

REGULATION 16.—DEPRECIATION RESERVES.

Strike out section 1 and insert in lieu thereof the following. (For section 1 as amended, see page 35.)

Strike out the words "accruing depreciation and all" appearing in the first and second lines of the first paragraph of section 3, and in the second line of the same paragraph strike out the words "in connection therewith" and insert in lieu of the latter the words "for depreciation as it currently accrues," so that said paragraph shall read as follows. (For paragraph as amended, see page 35.)

In the twenty-fifth line of paragraph A of section 4 strike out the word "accrued" and after the word "depreciation" in the same line insert the words "that has accrued"; following the word "service" where it first occurs in the twenty-sixth line of the same paragraph insert a comma followed by the words "or the loss in service value or in the capacity for service that has taken place in such property"; after the word "shall" in the twenty-eighth line of the same paragraph insert the words "except as provided in section 6 hereof," so that the last two sentences of said paragraph, beginning on the twenty-second line thereof, shall read as follows. (For paragraph as amended, see page 37.)

In the third, fifth, tenth, and eighteenth lines of paragraph B of section 4 strike out the word "charge" and insert in lieu thereof the words "account for"; strike out the words "and upon which no depreciation charges are proposed," beginning on the seventh and ending on the eighth line of the same paragraph; in the eleventh line of the same paragraph strike out the word "estimated" and insert in lieu thereof the words "which the licensee may estimate"; and in the twenty-third line of the same paragraph strike out the word "charging" and insert in lieu thereof the words "accounting for," so that said paragraph shall read as follows. (For paragraph B as amended, see page 37.)

Strike out section 5 and insert in lieu thereof the following. (For section 5 as amended, see page 37.)

Following section 5 insert two new sections to be numbered 6 and 7, as follows. (For new paragraphs 6 and 7, see page 38.)

On the first line of section 6 strike out the figure "6" and insert in lieu thereof the figure "8," so that the designation shall read "SEC. 8."

Strike out section 7 and insert in lieu thereof section numbered 9, as follows. (For section numbered 9, see page 39.)

REGULATION 17.—AMORTIZATION RESERVES.

Strike out section 2 and insert in lieu thereof the following. (For section 2 as amended, see page 40.)

Strike out paragraph A of section 3 and insert in lieu thereof the following. (For paragraph A as amended, see page 41.)

Strike out paragraph C of section 3 and insert in lieu thereof the following. (For paragraph C as amended, see page 42.)

Strike out section 4 and insert in lieu thereof the following. (For section 4 as amended, see page 42.)

Strike out section 5 and insert in lieu thereof the following. (For section 5 as amended, see page 42.)

In the first line of paragraph C of section 7 strike out the parentheses and the words "*secs. 14 and 15*" inclosed therein, so that the title of said paragraph shall read as follows:

C. *Upon the expiration of the license.*

In the fifth line of paragraph D of section 7 insert the words "its successors or assigns" preceded and followed by a comma, so that said paragraph shall read as follows. (For paragraph D as amended, see page 45.)

REGULATION 18.—REPROMULGATION OF EXCESSIVE PROFITS.

In section 1 strike out the words "and of any other property operated in connection therewith," beginning on the sixth line and ending on the seventh line, so that said section shall read as follows. (For section 1 as amended, see page 45.)

Strike out section 4 and insert in lieu thereof the following. (For section 4 as amended, see page 45.)

REGULATION 19.—ALLOCATION OF EARNINGS.

Strike out section 2 and insert in lieu thereof the following. (For section 2 as amended, see page 46.)

REGULATION 20.—ACCOUNTS AND REPORTS.

Strike out section 1 and insert in lieu thereof the following. (For section 1 as amended, see page 47.)

Following section 2 insert three new sections to be numbered 3, 4, and 5, as follows. (For new sections 3, 4, and 5, see pages 48 and 49.)

In the first line of section 3 strike out the figure "3" and insert in lieu thereof the figure "6," so that the designation shall read "SEC. 6."

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FEDERAL POWER COMMISSION

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REGULATIONS 1, 2, 3, 4, 5 and 6

AS AMENDED BY ORDERS NO. 15 OF JUNE 15, 1923.

EFFECTIVE ON JULY 1, 1923, AND SUPERSEDING
REGULATIONS 1 TO 6 INCLUSIVE AS AMENDED BY
ORDERS NO. 11 OF JUNE 6, 1921.

The amended Regulations contained herein supersede those of the same number contained in printed pamphlet entitled -

RULES AND REGULATIONS

As Amended by Order No. 11
of June 6, 1921.

GOVERNING THE ADMINISTRATION OF
THE FEDERAL WATER POWER ACT

With Copies of the Act, of
Amendments Thereto, and of
Orders Nos. 1 to 11, Inclusive

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FIRST REVISED ISSUE
Effective June 6, 1921.

WASHINGTON
JULY 1, 1923.

FEDERAL POWER COMMISSION

- - - -

THE SECRETARY OF WAR, Chairman,

THE SECRETARY OF THE INTERIOR. THE SECRETARY OF AGRICULTURE.

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O. C. MERRILL, EXECUTIVE SECRETARY.

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Orders, No. 15.

By authority of paragraph (h) of Section 4 of the Federal Water Power Act, approved June 10, 1920 (41 Stat., 1063), and in pursuance of the action of the Federal Power Commission at its meeting of June 15, 1923, it is hereby ordered that Regulations 1, 2, 3, 4, 5 and 6, of the Rules and Regulations of the Commission promulgated by Orders, No. 9 of February 28, 1921, and amended by Orders, No. 11 of June 6, 1921, be further amended as hereinafter set forth; that said Regulations so amended be effective on and after July 1, 1923, and govern in the matters covered thereby in the administration of said Act; and that any permit or license heretofore issued may upon written application by the permittee or licensee be subject to said rules and regulations as herein amended in lieu of the rules and regulations theretofore in effect.

Done at the City of Washington, District of Columbia, this 15th day of June, 1923.

HUBERT WORK,

Acting Chairman.

Attest:

O. C. MERRILL,

Executive Secretary.

RULES AND REGULATIONS

REGULATION 1. - GENERAL DEFINITIONS.

(As Amended, Effective July 1, 1936.)

The words defined in this regulation shall have the following meaning for the purposes of these rules and regulations:

SECTION 1. "The Federal Water Power Act" and "act" mean the act of Congress, entitled "An act to create a Federal Power Commission; to provide for the improvement of navigation; the development of water power; the use of the public lands in relation thereto; and to repeal section 18 of the River and Harbor Appropriation Act, approved August 8, 1917, and for other purposes," approved June 10, 1920 (41 Stat., 1063), as amended by the act of March 3, 1921 (41 Stat., 1353).

SEC. 2. "Commission" means the Federal Power Commission created by the Federal Water Power Act, or its successor, or, with respect to any authority or duty prescribed by the act, such officer or agent as it may lawfully designate to assume or perform such authority or duty.

SEC. 3. "Public lands" means such lands and interest in lands owned by the United States as are subject to private appropriation and disposal under public-land laws. It shall not include "reservations," as hereinafter defined.

SEC. 4. "Reservation" means national forests, tribal lands embraced within Indian reservations, military reservations, and other lands and interests in lands, except national monuments and national parks, owned by the United States and withdrawn, reserved, or withheld from private appropriation and disposal under the public-land laws; also lands and interests in lands acquired and held for any public purpose.

SEC. 5. "Corporation" means a corporation organized under the laws of any State or of the United States empowered to develop, transmit, distribute, sell, lease, or utilize power in addition to such other powers as it may possess, and authorized to transact in the State or States in which its project is located all business necessary to effect the purposes of a license under the act. It shall not include "municipalities" as hereinafter defined.

SEC. 6. "State" means a State admitted to the Union, the District of Columbia, and any organized Territory of the United States.

SEC. 7. "Municipality" means a city, county, irrigation district, drainage district, or other political subdivision or agency of a State competent under the laws thereof to carry on the business of developing, transmitting, utilizing, or distributing power.

SEC. 8. "Municipal purposes" means and includes all purposes within municipal powers as defined by the constitution or laws of the State or by the charter of the municipality.

SEC. 9. "Navigable waters" means those parts of streams or other bodies of water over which Congress has jurisdiction under its authority to regulate commerce with foreign nations and among the several States, and which either in their natural or improved condition, notwithstanding interruptions between the navigable parts of such streams or waters by falls, shallows, or rapids compelling land carriage, are used or suitable for use for the transportation of persons or property in interstate or foreign commerce, including therein all such interrupting falls, shallows, or rapids; together with such other parts of streams as shall have been authorized by Congress for improvement by the United States or shall have been recommended to Congress for such improvement after investigation under its authority.

SEC. 10. "Government dam" means a dam or other work, constructed or owned by the United States for governmental purposes, with or without contribution from others.

SEC. 11. "Project" means complete unit of improvement or development, consisting of a power house, all water conduits, all dams and appurtenant works and structures (including navigation structures) which are a part of said unit, and all storage, diverting, or forebay reservoirs directly connected therewith, the primary line or lines transmitting power therefrom to the point of junction with the distribution system or with the interconnected primary transmission system, all miscellaneous structures used and useful in connection with said unit or any part thereof, and all water rights, rights of way, ditches, dams, reservoirs, lands, or interest in lands, the use and occupancy of which are necessary or appropriate in the maintenance and operation of such unit.

SEC. 12. "Project area" means all lands, without respect to ownership and whether or not the exact boundaries thereof can be definitely fixed and determined, the use and occupancy of which are or will be valuable or serviceable in the maintenance and operation of the project; on which are located or to which are appurtenant the project works other than portable property and the rights, easements or interests likewise valuable and

serviceable and the ownership and possession, or the right of use and occupancy, of which are subject to acquisition by the United States under the provisions of Section 14 of the Federal Water Power Act.

SEC. 13. "Project boundary" means the line or lines inclosing or showing the location of the project area.

SEC. 14. "Project works" means the physical structures of a project, and includes reservoirs, dams, waterways, power houses and power house equipment, sub-stations and sub-station equipment, transmission lines, telephone lines, railways, tramways, roads, trails, bridges, and all other fixed structures, equipment, and facilities used or useful in the maintenance or operation of a project and located upon its project area; also such portable property as may be used and useful in connection with the project or any part thereof, whether located on or off the project area, when the inclusion of such property as a part of the project works is approved by the Commission.

SEC. 15. The "power capacity" of a project means the continued product of -

A. The factor 0.08; (The factor 0.08 represents the horsepower at 70 per cent efficiency of 1 cubic foot of water per second falling through a head of 1 foot.)

B. The average static head in feet; and

C. The water supply, in cubic feet per second and not in excess of the hydraulic capacity of the approved project works, estimated to be available from natural flow or from storage, or from both, for 80 per cent of the time.

SEC. 16. "Net investment" in a project means the actual legitimate original cost thereof as defined and interpreted in the "Classification of Investment in Road and equipment of Steam Roads, issue of 1914, Interstate Commerce Commission," plus similar costs of additions thereto, and betterments thereof, minus the sum of the following items properly allocated thereto, if and to the extent that such items have been accumulated during the period of the license from earnings in excess of a fair return on such investment: (a) Unappropriated surplus, (b) aggregate credit balances of current depreciation accounts, and (c) aggregate appropriations of surplus or income held in amortization, sinking fund, or similar reserves, or expended for additions or betterments or used for the purposes for which such reserves were created. The term "cost" shall include, in so far as applicable, the elements thereof prescribed in said classification, but shall not include expenditures from funds obtained through donations by States, municipalities, individuals, or others.

REGULATION D.

APPLICATIONS -- GENERAL REQUIREMENTS

(As Amended, Effective July 1, 1923.)

SECTION 1. Applications for preliminary permits or licenses may be filed either with the commission at Washington, D. C., or with such office, agent, or agency of the commission as may from time to time be established or authorized to receive applications on behalf of the commission.

SEC. 2. Applications filed with the Departments of War, Interior, or Agriculture, prior to approval of the act, under the provisions of then existing law and accepted as complete by the department with which filed will upon written request of the applicant be received by the commission as an application under the act.

SEC. 3. The date of filing application shall be the date of receipt of the latest communication containing information deemed by the Commission essential for its action on the application.

SEC. 4. All applications for preliminary permits or for licenses shall include:*

A. Information relative to the applicant's qualifications to make application as follows:

(1) If the applicant is a corporation:

(a) A copy of its charter or articles of incorporation duly certified by the secretary of state of the State where organized or other officer having legal custody of a record of incorporation (one copy only, marked "Exhibit A").

(b) Execute Form 1 ** in triplicate and mark it "Exhibit B."

(2) If the applicant is a State:

A copy of the law or laws, or reference thereto, under authority of which the application is made, duly certified by the governor or secretary of state of the State, under seal, and two uncertified copies marked "Exhibit B."

(3) If the applicant is a municipality:

(a) A copy of its charter or other organization papers duly certified by the secretary of state of the State in which it is located, or by the officer having legal custody of the record of municipal incorporations (one copy only, marked "Exhibit A").

(b) A certified copy, or reference thereto, of the State law or laws authorizing the operations contemplated by the application and two uncertified copies marked "Exhibit B."

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*If any applicant shall have filed with the commission any of the papers required by this regulation, a specific reference to such filing, accompanied by duly certified statements of changes thereafter made, thereby bringing up to date the information of the previous filing, will be accepted as fulfilling the requirements with respect to such papers.

**For Forms see Appendix.

(4) If the applicant is an association of citizens:

(a) Each member shall make affidavit of citizenship. (See application forms 3, 4a, 4b and 4c.) ** Associations shall submit their articles of association. If there be none, the fact shall be stated over the signature of each member of the association (one copy only, marked "Exhibit A").

(b) A complete list of members must be given in an affidavit by one of them (in triplicate, marked "Exhibit B").

(5) If the applicant is an individual:

An affidavit by the applicant that he is a citizen of the United States. (See application forms 3, 4a, 4b and 4c.)**

B. General data with respect to the project or projects applied for, to be shown on the prescribed application Form 3, 4a, 4b or 4c,

**

C. Maps and drawings as required by Regulations 3, 4, or 5, as the case may be. All maps and drawings:

(1) Shall be on tracing linen cut to uniform size, not smaller than 24 inches by 36 inches and not larger than 28 inches by 40 inches, the latter size being preferred, except that lithographed official maps issued by Federal or State agencies may be used for general maps of the project, and, when so used, one copy for permanent record shall be mounted on linen.

(2) Shall have a clear border of one-half inch on three sides, and of 2½ inches on one of the shorter sides, which shall be the left-hand border of the map.

(3) Shall have a numerical scale and a graphical scale, the latter not less than 6 inches in length.

(4) Shall, if a map, have true and magnetic meridians indicated thereon.

(5) Shall have a space 4 inches by 7 inches in the lower right corner, the upper half of which shall bear the title, scale, etc., and the lower half of which shall be left clear.

(6) Shall, if the project affects lands covered by the public-land survey, show, in so far as practicable, the location of all lines of such survey crossing the project area. If on unsurveyed public lands or reservations, the protraction of township and section lines shall be shown, such protractions whenever available to be those recognized by the agency of the United States having jurisdiction over the lands.

(7) Shall be rolled, not folded, for mailing, etc.

SEC. 5. Applicants may be required upon request of the commission to furnish maps, plans, or other data in addition to the requirements specifically set forth in the regulations, if in the judgment of the commission such additional data are desirable for a full understanding of the project or projects or for the purpose of enabling the commission to review the design thereof, either in whole or in part.

SEC. 6. The names of applicants, the information contained in the application forms (Forms 3, 4a, 4b and 4c), ** and general project maps will be available for general public information. Other information concerning applications will not be made public except upon a showing satisfactory to the commission of the public necessity or desirability therefor, or with the

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** For Forms see Appendix.

consent of the applicant. At public hearings upon any application the Commission may require the presentation of such information respecting the application as in its judgment the proper conduct of the hearing or the public interests requires.

REGULATION 3.

APPLICATIONS FOR PRELIMINARY PERMITS

(As Amended, Effective July 1, 1923.)

All applications for preliminary permits shall be submitted in triplicate on Form 3, ** and shall be accompanied by the documents specified below, each of which shall be dated and signed by the applicant in the manner prescribed in Form 2a ** and designated "Exhibit A," "Exhibit B," etc., as indicated:

SECTION 1. Exhibit A. - Certified copy of charter, articles of incorporation or other organization papers (one copy only). (See Regulation 2, sec. 4).

SEC. 2. Exhibit B. - Other evidence that applicant is qualified to apply for and receive a permit (in triplicate). (See Regulation 2, sec. 4).

SEC. 3. Exhibit C. - Statement of nature and amount of data available, such as surveys, maps, plans, stream measurements, foundation explorations, etc., and of work already performed, including preliminary construction, such as clearing, road building, etc. (in triplicate).

SEC. 4. Exhibit D. - Statement of nature and amount of work proposed to be performed under preliminary permit, such as surveying, preparation of maps and plans, measurement of streams, explorations of foundations, or preliminary construction, and estimate of cost thereof (in triplicate).

SEC. 5. Exhibit E. - Statement of nature, extent, and ownership of water rights which applicant contemplates using in the development of each project; also statement of applicant's plans with reference to perfecting water rights (in triplicate).

SEC. 6. Exhibit F. - Statement of ownership of lands which applicant contemplates using in the development of each project; also statement of applicant's plans with reference to acquiring lands or the right of occupancy and use thereof (in triplicate).

SEC. 7. Exhibit G. - Such data as the applicant desires to supply as to his ability to finance the preliminary work as well as the project or projects applied for (in triplicate). The Commission may decline to approve the application unless satisfied that the applicant will be able to finance the preliminary work and the project.

**For Forms see Appendix.

SEC. 8. Exhibit H. - A general map showing the nature of the proposed project, its principal features and their location and the location of the project as a whole with reference to some well known town or stream (see sec. 9 and note following that section). On this map shall be placed a line indicating the approximate project boundary (as defined in sec. 13 of Regulation 1) of the area to be occupied by the principal project works such as dams, reservoirs, forebays, waterways, and power houses but excluding transmission lines, and, if necessary, in order to determine the location of the project on the ground, there shall be shown on the map the approximate distances and bearings of points on the project boundary from natural objects or permanent monuments that can be readily found and recognized from descriptions thereof noted on the map, such points to be located at sufficiently frequent intervals to serve such purpose. If the project is on land covered by the public-land survey, such distances and bearings shall be shown from the nearest existing corners of such survey. (One tracing and two blueprints, or lithographed official map with project shown thereon, one copy mounted on linen and four copies not so mounted). (For size, etc., of map, see Regulation 2, sec. 4, par. C).

SEC. 9. Exhibit I. (to be submitted only if public lands or reservations are affected). - A map of the proposed project, showing principal project works in a manner similar to Exhibit H, except that such maps shall show and shall be on a scale to present effectively:

(1) The project boundary which shall be the line inclosing all 40-acre tracts (or similar subdivisions) of the public-land survey which are to be occupied or used in whole or in part by the project. In case the subdivisions extend to areas of less than 40 acres the boundary shall be drawn accordingly.

(2) The status of lands, indicating separately lands patented, lands entered or otherwise embraced in any unperfected claim under the public land laws, unreserved public lands, and lands of each and every reservation affected.

The map to be submitted as "Exhibit I" shall consist of one tracing and three blueprints. (For size, etc., of map, see Regulation 2, sec. 4, par. C.)

NOTE: If so desired, a single map may be submitted for Exhibits H and I, provided it shows all the information required for both.

SEC. 10. Such additional documents or data as applicant may consider pertinent to submit.

REGULATION 4.

APPLICATIONS FOR LICENSES - MAJOR PROJECTS AND MINOR PARTS THEREOF.

(Does not include minor projects of not more than 100 horsepower, or projects already constructed, as to which see Regulations 5 and 6, respectively.)

(As Amended, Effective July 1, 1923.)

All applications for licenses, for a complete project or for a minor part thereof (including transmission lines) to be constructed under a license, or for additions to or modifications of projects already under license, shall be submitted in triplicate on Form 4a, 4b, or 4c, ** and shall be accompanied by the documents specified below in so far as they are applicable, each of which shall be dated and signed by the applicant in the manner prescribed in Form 2a or 2b ** and designated "Exhibit A," "Exhibit B," etc., respectively, as indicated.

SECTION 1. Exhibit A. - Certified copy of charter, articles of incorporation, or other organization papers (one copy only). (See Regulation 2, sec. 4). If already furnished for preliminary permit, reference thereto will suffice.

SEC. 2. Exhibit B. - Other evidence that applicant is qualified to proceed with the project applied for (in triplicate). (See Regulation 2, sec. 4). If already furnished for preliminary permit, reference thereto will suffice.

SEC. 3. Exhibit C. - Field notes or a description by metes and bounds of the final location survey of the project boundary. Such portion of the project area as will be used for transmission lines, telephone lines, canals, roads, etc., may be described by center line survey specifying the distance of the project boundary therefrom, if definitely determined. Field notes need not be submitted as a separate exhibit when the information is presented on maps filed with application (in triplicate).

SEC. 4. Exhibit D. - Evidence that the applicant has complied with the requirements of the laws of the State or States within which the project or projects will be located with respect to bed and banks and with respect to the right to engage in the business of developing, transmitting, and distributing power, and in any other business necessary to effect the purposes of the license applied for. This evidence shall be accompanied by a statement of the steps that have been taken and the steps that remain to be taken to acquire franchise or other rights from counties and municipalities before the project or projects can be completed and put into operation (in triplicate).

** For Forms see Appendix.

SEC. 5. Exhibit D. - Statement, in triplicate, of the nature, extent, and ownership of the water rights which the applicant proposes to use in the development of the project or projects covered by application, together with satisfactory evidence that the applicant has proceeded as far as practicable in perfecting its rights to use sufficient water for proper operation of the project works. A certified statement from the proper State agency setting forth the extent and validity of the applicant's water rights shall be appended, if practicable. In case the approval or permission of one or more State agencies is required by State law as a condition precedent to the applicant's right to take or use water for the operation of the project works, duly certified evidence of such approval or permission, or a showing of cause why such evidence cannot be reasonably submitted, shall also be filed. When State certificate is involved, one certified copy and two uncertified copies will suffice. If statement submitted with application for preliminary permit gives the information required above, a reference thereto will suffice.

SEC. 6. Exhibit F. - A statement, in triplicate, giving full details as to applicant's plans for acquiring title to or the right to occupy and use lands other than those owned by the applicant or by the United States essential for carrying out the project or projects covered by the application. If the applicant, at the time of filing application, has, by easement, lease, franchise, or otherwise, acquired the right to occupy and use lands owned by others, the statement should show, with respect to each separate right of occupancy and use, (a) from whom acquired, (b) the date acquired, (c) nature and extent of the right acquired, (d) whether perpetual or of limited term, and (e) if of limited term, when such term expires. If statement submitted with application for preliminary permit gives the information required above, a reference thereto will suffice.

SEC. 7. Exhibit G. - Statement showing the financial ability of the applicant to carry out the project or projects applied for (in triplicate). If adequate statement has been furnished with application for preliminary permit, reference thereto will suffice.

SEC. 8. Exhibit H. - Statement of the effect of the proposed operation of the project works on the normal flow of the stream, including a statement of the minimum flow proposed to be released during periods of low water and full exposition of the relation of any proposed ponding of the flow to the conservation and utilization in the public interest of the available water resources for the purposes of power, navigation, irrigation, reclamation, flood control, and municipal water supply (in triplicate).

SEC. 9. Exhibit I. - Estimate of the power capacity of each project, accompanied by the complete data upon which such estimate is based, including stream flow, evaporation records, static heads, etc. A list of all present and proposed sources of power for the system of which the project or projects will be a part, including the approximate location, water power or steam power, source of water, ultimate capacity of all power plants in use or proposed to be used, and the present installed capacity of constructed

plants; also connections, if any, with other power systems (in triplicate). If any of these data are of record in any branch of the United States Government at Washington, appropriate reference thereto will suffice.

SEC. 10. Exhibit J. - General map covering the entire project area or areas, showing on a single sheet and to an appropriate scale:

A. Principal structures and other important features of the project, including such roads, railways, tramways, and bridges as it is proposed shall become a part of the project works and be placed under the license.

B. All transmission lines and all telephone lines which it is proposed shall become a part of the project works and be placed under license, as well as the entire, or principal part, of the transmission system, if any, with which the project or projects may be connected, indicating prominently by appropriate symbol the portion or portions of the transmission lines or system covered by application for license.

C. State and county lines, towns, streams, railroads, power plants, irrigation systems and other features in the vicinity of the proposed development, information concerning which will aid in arriving at a general comprehension of the project.

D. References to the detail map, indicating by outline the portion shown on each sheet.

E. If all features cannot be shown with sufficient distinctness on one sheet, two general maps may be furnished, one for the power plant and appurtenant works, and one for the transmission system.

(Furnish one tracing and two blueprints of general map filed as "Exhibit J," or one lithographed map mounted on linen and four unmounted with project works appropriately marked thereon. For size, etc., of map, see Regulation 2, sec. 4 par. C.)

SEC. 11. Exhibit K. - Detail map covering entire project area or areas. Scale shall be such as to show clearly but without unnecessary multiplicity of sheets the essential details of surveys and of notes as to ownership or right of occupancy of lands within the project area. In general, a scale of approximately 400 feet to the inch is appropriate for features containing a relatively large amount of detail, and scales of 1,000 or 2,000 feet to the inch where there is little detail, as is frequently the case with respect to transmission and telephone lines, roads, railways, and large reservoirs. Elevations shall be tied to Government bench marks whenever available, and shall be referred to mean sea level, except that, in the case of projects on navigable waters having a datum accepted for local use by the United States Engineer Department, War Department, such local datum shall be used. If more than one sheet is used the sheets shall be numbered consecutively, and each shall bear a small diagram showing the entire map and indicating the portions shown on each sheet. Several sections of a conduit, transmission line, telephone line, road, railway, etc., may be shown upon a single sheet if so placed or limited as to avoid crowding or confusion.

The detail map to be filed as "Exhibit K" shall conform to the specifications set forth in following paragraphs A to C, inclusive, except to the extent and in the particulars that the requirements thereof may be expressly waived or modified by the commission.

A. It shall show the project area and the project boundary, as defined in sections 12 and 13 respectively of Regulation 1, both of which shall be subject to the approval of the commission. Unless satisfactory reasons are given to the contrary, the project boundary shall not be more than 200 feet (horizontal measurement) from the exterior margin (in general, high-water level) of reservoirs, nor shall the width of the project area for canals, ditches, pipe lines, transmission lines, roads, and other so-called continuous structures exceed 200 feet. The project boundary shall be shown on the map in such manner that it can be readily identified on the ground. There shall be shown the location and description of monuments and other marks and reference lines therefrom to permanent objects, in accordance with good practice in land surveying.

If the project boundary is located on lands covered by the public land survey there shall be shown reference lines from the initial point of the project boundary survey by distances and bearings to an established corner, if such can be identified within a distance of 2 miles. At the intersection of the project boundary with a line of the public land survey there shall be shown the location of such intersection on the project boundary and the bearing and distance to the nearest identified corner in each direction on the line crossed, if such distance does not exceed 1 mile.

Such portions of the project area as will be used only for continuous structures such as transmission lines, telephone lines, canals, roads, etc., may be described by center or offset lines of survey, specifying distances of the project boundary therefrom. Such lines of survey shall be referred to the public land survey and permanent objects in a manner similar to that prescribed for the project boundary.

There shall be shown the status as to ownership and the boundary lines and area of each parcel of land within the project area, designating separately lands owned by the applicant, lands for which the applicant holds rights of use and occupancy for purposes of the project, reservations (indicating separately each reservation), and public lands (indicating separately lands, full title to which remains in the United States, and lands in which the United States retains only an interest). Where the project works occupy lands not owned by the applicant, but as towhich the applicant holds only an easement, franchise, lease, or other right of occupancy and use, the map shall show the nature of such right, and shall give appropriate reference to "Exhibit E" for further details.

B. The location of all project works shall be accurately shown, such as:
(1) Dams.
(2) Reservoirs - Indicate the flow lines for maximum and minimum water levels and for elevation of spillway crest, and give tables or diagrams of areas and capacities for maximum and minimum water levels and for each contour line.

(3) Water conduits. - Indicate center line, type, i.e., flume, ditch, tunnel, pipe, etc.; and grade and elevation of bottom at each change of grade.

(4) Power houses and substations.

(5) Transmission lines and appurtenances, telephone lines, roads, railways, trails, tramways, and bridges.

(6) Navigation structures.

(7) Channel approaches to navigation structures. - Indicate elevation of bottom for distances of not less than 1,000 feet above and below the structures.

C. Show contour lines with contour interval of not more than 10 feet for the entire project area, except such portions as will be occupied by only such project works as are named in paragraph B (5) above, or as will be included in reservoirs below the minimum elevation to which the water may be drawn down; Provided, That a profile of tunnel lines may be substituted for contours along such lines.

SEC. 12. Exhibit L. - General design drawings showing plans, elevations, and sections of all principal structures and appurtenant works or other features of each project applied for. These drawings shall be in sufficient detail and shall be accompanied by sufficient information relating to controlling factors (such as character of foundations and explorations thereof, materials, types of construction, important elevations, and water levels, etc.) to enable the commission to have a full understanding of the project and to check safety, adequacy, and desirability in the development of the resources involved.

Scales will not be specified, but it is desired that they be no larger than necessary to show clearly the information required. Drawings should be simple. Details are desired only as necessary to show features of importance in determining safety, adequacy, and suitability of design. Working drawings are not desired as part of application, but should be prepared for purposes of construction and retained as a record of the work when completed. (One tracing and two blueprints.)

This section applies to -

(a) Dams and appurtenances, such as spillways, fishways, outlet works, etc.

(b) Navigation structures and approaches thereto, including locks, lock gates, and operating machinery, etc.

(c) Conduits, including forebays, intake works, surge tanks, and other pressure relief devices, etc.

(d) Power houses and substations.

SEC. 13. Exhibit M. - General descriptions and general specifications of mechanical, electrical, and transmission equipment and their appurtenances in sufficient detail to enable the commission to have a full understanding of the project or projects and to determine safety and adequacy and suitability for the development and utilization of the resources involved (in triplicate).

SEC. 14. Exhibit N. - Estimate of the cost of developing each project, segregated by principal features, showing quantities, unit costs, etc., in sufficient detail for a full understanding of the elements of cost of the project (in triplicate).

SEC. 15. Exhibit O. - Detailed statement of the time desired for completing preliminary construction and for beginning and completing construction of the project works. If the ultimate development is to be completed and put into operation in two or more parts, the time desired for beginning and completing the construction of each part shall be given (in triplicate).

SEC. 16. Such additional documents or data as applicant may consider pertinent to submit.

REGULATION 5.

APPLICATIONS FOR LICENSES - MINOR PROJECTS.

(As Amended, Effective July 1, 1923.)

All applications for licenses for power projects of not more than 100-horsepower capacity, or for parts thereof, whether to be constructed or already constructed, shall be submitted in triplicate on Form 1a ** and shall be accompanied by the documents specified below, in so far as they are applicable, each of which shall be dated and signed by the applicant in the manner prescribed in Form 2a ** and designated "Exhibit A," "Exhibit B," etc., respectively, as indicated:

SECTION 1. Exhibit A. - Copy of charter, articles of incorporation, or other organization papers (one copy only). (See Regulation 2, sec. 4.)

SEC. 2. Exhibit B. - Other evidence that applicant is qualified to proceed with the project applied for. Certified copy of list of associates, if an association (in triplicate). (See Regulation 2, sec. 4.)

SEC. 3. Exhibit C. - Field notes, or a description by metes and bounds of the final location survey of the project boundary. Such portion of the project area as will be used for transmission lines, telephone lines, canals, roads, etc., may be described by center line survey specifying the distance of the project boundary therefrom, if definitely determined. Field notes need not be submitted as a separate exhibit when the information is presented on maps filed with application (in triplicate).

SEC. 4. Exhibit D. - Statement of the applicant's water rights accompanied by evidence that the State water laws have been complied with to the extent necessary to permit the applicant to proceed with all operations contemplated in the application (in triplicate).

** For Forms see Appendix.

SEC. 5. Exhibit E. - Statement of the time desired for beginning and completing the proposed construction (in triplicate).

SEC. 6. Exhibit F. - Map of the project area drawn to any convenient scale (for size of sheets, etc., see Regulation 2, sec. 4, par. C), and showing:

A. The project area and the project boundary, as defined in sections 12 and 13, respectively, of Regulation 1, both of which shall be subject to the approval of the commission. Unless satisfactory reasons are given to the contrary, the project boundary shall not be more than 200 feet (horizontal measurement) from the exterior margin (in general, high water level) of reservoirs, nor shall the width of the project area for canals, ditches, pipe lines, transmission lines, roads, and other so-called continuous structures exceed 200 feet. The project boundary shall be shown on the map in such manner that it can be readily identified on the ground. There shall be shown the location and description of monuments and other marks and reference lines therefrom to permanent objects, in accordance with good practice in land surveying.

If the project boundary is located on lands covered by the public-land survey, there shall be shown reference lines from the initial point of the project boundary survey by distances and bearings to an established corner, if such can be identified within a distance of 2 miles. At the intersection of the project boundary with a line of the public-land survey there shall be shown the location of such intersection on the project boundary and the bearing and distance to the nearest identified corner in each direction on the line crossed, if such distance does not exceed 1 mile.

Such portions of the project area as will be used only for continuous structures, such as transmission lines, telephone lines, canals, roads, etc., may be described by center or offset lines of survey, specifying distances of the project boundary therefrom. Such lines of survey shall be referred to the public-land survey and permanent objects in a manner similar to that prescribed for the project boundary.

There shall be shown the status as to ownership and the boundary lines and area of each parcel of land within the project area, designating separately lands owned by the applicant, lands for which the applicant holds rights of use and occupancy for purposes of the project, reservations (indicating separately each reservation), and public lands (indicating separately lands, full title to which remains in the United States, and lands in which the United States retains only an interest). Where the project works occupy lands not owned by the applicant, but as to which the applicant holds only an easement, franchise, lease, or other right of occupancy and use, the map shall show the nature of such right.

B. The location of all project works, such as dams, reservoirs, canals, flumes, pipe lines, power houses, transmission lines, telephone lines, roads, trails, etc. Indicate the flow line fixed by maximum water level and the area and storage capacity of each reservoir. If the application covers project works in addition to those already constructed, show in an appropriate manner which project works or parts thereof have already been constructed.

SEC. 7. Exhibit G. - General description of mechanical, electrical, and transmission equipment, and other appurtenances in sufficient detail to enable the commission to have a full understanding of the project (in triplicate).

SEC. 8. Exhibit H. - Statement of the cost of constructed works and of the estimated cost of works to beconstructed, showing quantities, unit costs, etc., in sufficient detail for a full understanding of the elements of cost of the project (in triplicate).

SEC. 9. Exhibit I. (to be filed for constructed projects only). - Statement of the nature and character of the permit, right of way, or other authority, if any (see section 23 of the Act), claimed to be held by the applicant.

REGULATION 6.

APPLICATIONS FOR LICENSES MAJOR PROJECTS AND PARTS THEREOF ALREADY CONSTRUCTED.

(As Amended, Effective July 1, 1923.)

All applications for licenses for projects or parts thereof already constructed (except for minor projects or parts thereof, of not more than 100-horsepower capacity, for which see Regulation 5) shall be submitted in triplicate on Form 4a, 4b, or 4c, ** and shall be accompanied by the documents specified below in so far as they are applicable, each of which shall be dated and signed in the manner prescribed in Form 2a or 2b, ** and designated "Exhibit A," "Exhibit B," etc., respectively, as indicated.

SECTION 1. Exhibits A to M, inclusive. - All documents prescribed in Regulation 4, Exhibits A to M, inclusive, showing on the maps and plans therein provided for in some appropriate manner what project works or parts thereof have already been constructed.

SEC. 2. Exhibits N and O. - If the application covers project works in addition to those already constructed, submit as "Exhibit N" an estimate of the cost of such additional works segregated by principal features, showing quantities, unit costs, etc., in sufficient detail for a full understanding of the elements of cost; and submit also as "Exhibit O" a detailed statement of the time desired for beginning and completing such additional construction. If the additional construction is to be completed and put into operation in two or more parts, the time desired for beginning and completing the construction of each part shall be given.

SEC. 3. Exhibit P. - A statement of the nature and character of the permit, right of way, or other authority, if any (see section 23 of the Act), claimed to be held by the applicant. This statement shall be accompanied by copies of or appropriate references to the legislative authority, if any, by

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**For Forms see Appendix.

or under which such permit, right of way, or authority was acquired, and if granted by an instrument in writing, certified copy of such instrument, or, in lieu thereof, if such a copy is of record in any department of the United States Government at Washington, a statement to that effect and reference thereto (in triplicate).

SEC. 4. Exhibit Q. - A statement setting forth a brief history of the project works already constructed, giving time of commencement and of completion of construction of the several parts thereof, date of commencement of operation, and method of financing (in triplicate).

SEC. 5. Exhibit R. - An inventory or schedule, in detail, of all project works located upon the project area as shown by Exhibit K; of all water rights, lands, or interests in lands; and of all other properties, either tangible or intangible, necessary and convenient or used and useful in the operation and maintenance of the project and which the applicant desires to place under and make subject to the license applied for. Such inventory or schedule shall also show the actual or estimated original or historical cost, and, so far as practicable, the items thereof, for each separate major item or unit of property; the location of all structures and other physical properties; and such other details as the commission may require in any particular case. Such inventory or schedule of property shall be submitted on blank forms to be supplied by or approved by the commission prior to such submission.

SEC. 6. Such additional documents as applicant may consider pertinent to submit.

A P P E N D I X to Amended Regulations 1 to 6, inclusive, effective July 1, 1923.

NOTE. Blank forms are not furnished by the Commission.*

FORMS.

The following forms are prescribed for applications filed under the Federal Water Power Act, approved June 10, 1920, (41 Stat., 1063) in accordance with the foregoing regulations:*

FORM 1. - Official statement of organization of corporation and list of officers and directors.

(See Regulation 2, sec. 4, par. A (1) (b).)

I, _____
(Name) (Secretary or president)

of the _____, do hereby certify that the organization of said corporation has been completed; and that the corporation is authorized to proceed with the project applied for according to the existing laws of the State__ of _____. I further certify that the following is a true list of the principal officers and of the directors of the said corporation, with the full name and official designation of each, to wit: (Here insert the full name and official designation of each principal officer and director).

Witness my hand and the seal of the corporation this _____ day of _____, 19___.

_____

_____

(Seal)

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*Applications have proved to be so varied in size that it has been found impracticable to furnish printed blanks therefor. Applications should be typewritten, following the forms indicated herein.

FORM 2a - Dating and Signature of Applicant.

(See Regulations 3, 4, and 5.)

This map (these estimates, this copy of notice, etc.) is a part of the application for preliminary permit (license) made by the undersigned this _____day of _____, 19___.

_____

FORM 2b - Dating and Signature of Applicant.

(See Regulations 3, 4, and 5.)

(This form to be used for exhibits pertaining to applications for amendment of plans for project under license. Use wording which fits the facts.)

This drawing (This map, These field notes, etc.) is a part of an application made by the undersigned this _____day of _____, 19___, for an amendment of license for Project No._____, and supersedes Sheet ___, Exhibit ___ (modifies Sheet ____, Exhibit ___) (supplements Exhibit ___).

_____

Licensee.

By_____

Attest:

_____

Secretary.

FORM 3. - Application for Preliminary Permit.

(See Regulations 2 and 3.)

(Act of June 10, 1920, 41 Stat., 1063.)

1.* _____

a {corporation / municipality} organized and existing under and by virtue of the laws of the State of _____, and having its office and principal place of business at _____, in the State of _____.

1.* _____

citizen__ of the United States, whose business address is _____ _____, being an applicant for a license under the Federal Water Power Act, do__ hereby make application to the Federal Power Commission for a preliminary permit for _____months, for the project described herein and approximately shown upon a certain map signed by the applicant on the _____day of _____, 192___, which map is filed herewith and made a part hereof. This application is made in order that the applicant may secure and maintain priority for a license under the Federal Water Power Act while procuring the data and performing the acts necessary to perfect an application for such license.

2. The location of the project__ applied for is as follows:

(a) In the State__ of _____

(b) In the county___ of _____

(c) On the following named stream _____ navigable and carrying commerce to the following extent:

_____

*Unused words not used.

(d) In the region of the following named cities and towns:

_____

_____

_____

3. The proposed scheme of development for the project is as follows:

_____

_____

_____

4. The proposed use of market for the power to be developed is as follows:

_____

_____

_____

5. The location and capacity of all power projects owned or operated by the applicant, the markets supplied thereby, and the relation thereof to the project__ applied for are briefly described as follows:

_____

_____

_____

6. The following exhibits are filed herewith and are hereby made a part of this application:

(Give each exhibit a designation and brief description, as Exhibit A, certified copy of articles of incorporation; Exhibit B, official statement of organization of corporation and list of officers on Form 1; Exhibit C, statement of nature and amount of data available, etc.)

Exhibit: _____

Exhibit: _____

Exhibit: _____

IN WITNESS WHEREOF the applicant has caused its name and corporate seal to be hereunto signed and affixed by

_____, its _____,

thereunto duly authorized, this _____day of _____,

192___.

_____

By_____

_____

Attest:

_____,
Secretary.

(When the application is made by an individual or association of individuals, it will be signed and sworn to before a notary public or other officer having authority to administer the oath, using the following form:)

WITNESS the signature__ of the applicant__ this _____ ___

day of _____, 192__.

_____

_____

_____

_____

(If the applicant is an individual or an association of individuals proof of citizenship is required. Such proof may be by affidavit in the following form:)

STATE OF _____)
) SS.
County of_____)

_____,

and _____, being duly sworn, each for himself, says that he is a citizen of the United States of America.

_____

_____

_____

Subscribed and sworn to before me this _____

day of _____, 192__.

(SEAL) _____
Notary Public.

FORM 4a - Application for License.

(See Regulations 2 and 4, or 2 and 5.)

(Act of June 10, 1920, 41 Stat., 1063.)

1.* _____

a (corporation / municipality) organized and existing under and by virtue of the laws of the State of _____, and having its office and principal place of business at _____, in the State of _____.

1.* _____,

citizen__ of the United States, whose business address is _____, in pursuance of a preliminary permit issued to the applicant on the _____day of _____, 192__, do hereby make application to the Federal Power Commission for a license for a project described herein and shown on general and detail maps signed by the applicant on the _____day of _____, 192__, which maps are filed herewith and made a part hereof, said license to authorize the construction, operation, and maintenance of certain project works, the principal ones of which are designated as follows on said maps:

(Give the name or other designation and a brief description of the principal project works and cancel such of the four following items (a), (b), (c), and (d) as may not be applicable.

(a. Dams and reservoirs.)_____

_____

_____

_____

_____

(b. _____water conduits.) _____

_____

_____

_____

*Cancel words not used.

(c. _____ power houses.) _____

_____

_____

(d. _____ transmission lines.) _____

_____

_____

_____

2. The location of the project__ applied for is as follows:

(a) In the State of _____

(b) In the county of _____

(c) On the following named stream _____ navigable and carrying commerce to the following extent:

_____

_____

_____

(d) In the region of the following named cities and towns:

_____

_____

_____

3. The proposed scheme of development for the project is as follows:

_____

_____

4. The proposed use or market for the power to be developed is as follows:

_____

_____

_____

5. The location and capacity of all power projects owned or operated by the applicant, the markets supplied thereby, and the relation thereof to the project__ applied for, are briefly described as follows:

_____

_____

_____

6. The following exhibits are filed herewith and are hereby made a part of this application:

(Give each exhibit a designation and brief description, as Exhibit A, certified copy of articles of incorporation; Exhibit B, official statement of organization and list of officers on Form 1; Exhibit C, statement of nature and amount of data already available, etc.)

Exhibit: _____

Exhibit: _____

Exhibit: _____

IN WITNESS WHEREOF the applicant has caused its name and corporate seal to be hereunto signed and affixed by _____ its _____, thereunto duly authorized, this _____ day of _____, 192__.

By _____

_____

_____

Attest:

_____

Secretary.

FORM 4B - Application for Amendment of License.

(See Regulations 3 and 4 or 3 and 5.)

(Act of June 10, 1920, 41 Stat., 1063.)

1.* _____

a (corporation) (municipality) organized and existing under and by virtue of the laws of the State of _____, and having its office and principal place of business at _____, in the State of _____

1.* _____, citizen of the United States, whose business address is _____, to whom a license for a power project, designated as Project No. _____, was issued by the Federal Power Commission on the _____day of _____, 192__, hereby makes application to said Commission for an amendment of said license in the manner and to the extent described herein and as shown on general and detail maps (plans) (specifications) (field notes) signed by the applicant on the _____day of _____, 19__, which _____ are filed herewith and made a part hereof.

2. (Brief statement or description of change desired).

_____

_____

_____

3. The proposed changes are necessary and desirable for the following reasons: _____

_____

*Cancel words not used.

4. The following exhibits are filed herewith and are hereby made a part of this application for amendment of license:

Exhibit ____, Sheet ____, superseding Exhibit ____, Sheet ____.

Exhibit ____, Sheet ____, modifying Exhibit ____, Sheet ____.

Exhibit ____, Sheet ____, supplementing Exhibit____, Sheet____.

(Use wording which fits the facts.)

IN WITNESS THEREOF the applicant has caused its name and corporate seal to be hereunto signed and affixed by _____, its _____, thereunto duly authorized, this _____day of _____, 19___.

By_____

_____

Attest:

_____
Secretary.

FORM 80 - Application for a License

for a Project Involving Transmission Lines only.

(See Regulations 2 and 4 or 2 and 5.)

(Act of June 10, 1920, 41 Stat., 1063).

1.* _____

(corporation / municipality) organized and existing under and by virtue of the laws of the State of _____, and having its office and principal place of business at _____, in the State of _____.

1.* _____, citizen_ of the United States, whose business address is _____ hereby make_ application to the Federal Power Commission for a license for a transmission line described herein and shown on general and detail maps signed by the applicant on the _____day of _____, 192__, which maps are filed herewith and made a part hereof, said license to authorize the construction, operation, and maintenance of said transmission line described as follows:

_____

_____

3. The location of the transmission line, license for which is applied for, is as follows:

(a) In the State of _____.

(b) In the county of _____.

*Cancel words not used.

(c) On (public lands) (lands within _____

National Forest) (lands within _____Indian Reservation).

3. The proposed use of the transmission line is as follows:

_____

_____

_____

4. The following exhibits are filed herewith and are hereby made a part of this application:

(Furnish Exhibits A, B, C, D, J, K, M, N, and O of Regulation 4. For short lines omit Exhibit J. In submitting Exhibit K furnish detailed information for only that part of line which crosses public lands, it being understood that the Commission reserves the right to call for such information with respect to other lands if deemed essential.)

Exhibit _____

Exhibit _____

IN WITNESS WHEREOF, the applicant has caused its name and corporate seal to be hereunto signed and affixed by _____, its _____, thereunto duly authorized, this _____day of _____, 19___.

By_____

_____

Attest:

_____

Secretary.

APPLICATION FOR LICENSE
(Under Act of June 10,192 0)

****

SODA PROJECT

SNAKE RIVER, IDAHO

UTAH POWER & LIGHT COMPANY

****

Filed in Triplicate

APPLICATION FOR LICENSE
(Act of June 10, 1920, 41 Stat., 1063)

SODA PROJECT
BEAR RIVER, IDAHO
UTAH POWER AND LIGHT COMPANY

(1) The Utah Power and Light Company, a Corporation organized under and by virtue of the Laws of the State of Maine, and having its office and principal place of business at Salt Lake City in the State of Utah, in pursuance of a preliminary permit (covering four sites on Bear River of which the project applied for is one), issued to the applicant on the 20th day of May, 1921, does hereby make application to the Federal Power Commission for a license for a project described herein and shown on general and detail maps signed by the applicant on the 10 day of August, 1922, which maps are filed herewith and made a part hereof, said license to authorize the construction, operation and maintenance of certain project works, the principal ones of which are designated as follows on said maps:

(a) Dams and Reservoirs: A gravity concrete dam approximately 250 feet long will be constructed at the site shown on Exhibit K, drawing No. 3. For approximately 104 feet in length it will be built to an elevation of 5725 mean sea level and will be non-overflow type. The power house will be integral with this section of the dam. This section will also have an outlet, provided with a balanced plunger valve in its base for the purpose of draining the reservoir and by-passing part of the flow of the stream.

The remainder of the dam will be built to an elevation of 5710 mean sea level and its crest will be provided with a series of regulating gates which will raise the normal water level to an elevation of 5720 mean sea level.

The reservoir formed by the construction of the dam will extend up the river a distance of approximately 6 miles and its capacity will be in accordance with the following table:

Contour	Acres Area	Total Capacity in Acre Feet
5660	23.0	0
70	41.7	350
80	69.8	900
90	137.3	1,900
5700	250.5	3,800
10	591.2	7,700
5720	1165.6	16,300

The land affected by the construction of the dam and its resultant reservoir is outlined on Exhibits J and K, drawing No. 1.

(c) Power House. The power house for this project will be built on the lower side of the non-overflow part of the dam and its substructure will be integral with it. The steel frame superstructure will be of such shape and height as to house the traveling crane and other equipment.

This station will house two 10,500 hp vertical water turbines to operate at approximately 257 rpm under a normal head of 80 ft. The maximum head will be 81 ft and the minimum head 59 ft. These turbines will be direct connected to vertical 7,500 kw, 6600 v, 3 phase, 60 cycle generators. The station substructure will contain all the auxiliary equipment, such as switchboard, motor generator set, oil switches, instrument transformers, governors, lubricating oil and governor oil system and station transformers. Plans, elevation and sections of this power house and dam are shown on drawings under Exhibit L,and these drawings are as follows:

Exhibit L - No. 1 - Plan and Sectional Plans -(#3796)
" L - No. 2 - Elevation and Sections - (#3797)

The switchyard will be located at the top of the cliff on a plot of ground directly north of the dam. It will contain the transformers, switching structure, high tension buses, switches, etc., for transforming the power and distributing it over the transmission lines extending from this station. The location and size of the switchyard and number of outgoing lines are shown under Exhibit K, Drawing No. 2, General Plan of Development.

(d) Transmission Lines. The transmission lines included in this project will be one 132 kv line, approximately 10 miles long, connecting this station with the applicant's general transmission system at the Grace station.

(2) The location of the project applied for is as follows:

(a) In the State of Idaho
(b) In the Counties of Bannock and Caribou
(c) On the following-named streams: Bear River; navigable and carrying commerce to the following extent: None.
(d) In the region of the following-named cities and towns: The applicant serves territory extending from Ashton, Idaho, on the north to Huntington, Utah, on the south, a distance of 370 miles; and from Pocatello, Idaho, on the west to Park City,Utah on the east, a distance of 58 miles; approximately 175 communities are served, including Salt Lake City,Ogden, Provo, Logan, Bingham, Hanson,Park City,Lehi and American Fork, Utah; Idaho Falls, Rexburg, Ashton, St.Anthony,Preston and Montpelier, Idaho.

(3) The proposed scheme of development for the project is as follows: A gravity concrete dam across Bear River which shall form a reservoir with 16,300 acre-feet capacity. The water will be conducted through intakes in the dam itself to the wheels in the power house on the lower side of the dam. The water will be utilized under an average head of 30 ft to develop a maximum of 15,000 kw of power. Transform this power and transmit it into the applicant's distribution system as outlined under Exhibit J, drawing No. 2.

(4) The proposed use or market for the power to be developed is as follows: To add to the capacity of the company's generating stations already serving the territory described in a previous paragraph with electric current for power, light, irrigation, traction and other purposes. The total population served is estimated at more than 300,000, and electric service is supplied to about 75,000 customers at this date.

(5) The location and capacity of all power projects owned or operated by the applicant, the markets supplied thereby, and the relation thereof to the project applied for, are briefly described as follows:

Description of the inter-connected system and its relation to the area has been given in preceding paragraphs.

The following plants are either owned or leased and comprise the applicant's interconnected system:

Name of Plant	Location	Installed Capacity KW
HYDRO-ELECTRIC		
Alpine	Alpine Creek	1750
American Fork - Upper	American Fork Creek	1200
" " - Lower	" " "	950
Battle Creek	Battle Creek - Utah Co.	2400
Cove	Bear River	7500
Davis	Farmington Creek	512
Georgetown	Georgetown Creek -	180
Grace	Bear River	33000
*Granite	Cottonwood Creek - Utah. Salt Lake Co	1500
*Hyrum	Blacksmith Fork	2000
High Creek	Cub River	550
Idaho Falls	Snake River	1875
Jordan Narrows	Jordan River	1000
Logan	Logan River	2000
Mill Creek - Upper	Mill Creek	300
" " - Lower	" "	1150
Murdock	Provo River	2500
Olmsted	" "	7200
Ontario	Bear River	30000

* Leased

Name of Plant	Location	Installed Capacity KW	
Paris	Paris Creek	650	
*Pioneer	Ogden River	6500	
Park City	Ontario Drain Tunnel	75	
Riverdale	Weber River	3750	
Snake Creek	Snake Creek	1180	
Santaquin	Summit Creek	880	
*Stairs	Cottonwood Creek	1800	Salt Lake Co.
St. Anthony	Snake River	600	
Wheelon	Bear River	7125	
*Weber	Weber River	2500	
*Willard	Willard Creek	380	

Total Capacity .....Hydro-electric 122,647 Kw

Steam Plants

*Jordan	Salt Lake City	16,000

Total - Hydro and Steam ..... 138,647 Kw

(6) The following exhibits are filed herewith and are hereby made a part of the application:

Exhibit A: Reference to certificate of organization.
Exhibit B: Statement of organization and list of officers and directors.
Exhibit C: Field notes or description of Project Boundaries and Transmission Lines
Exhibit D: Evidence that the applicant has complied with requirements of the laws of the State within which project will be located
Exhibit E: Statement of the nature, extent and ownership of water rights and lands
Exhibit F: Statement regarding Government dam or other Government structure involved
Exhibit G: Statement showing ability of applicant to finance project
Exhibit H: Statement of effect of project on steam flow
Exhibit I: Statement of Power Capacity of project (FL3792)
Exhibit J: General map of entire project (FL3792) and general map of applicant's transmission system (FL3793)
Exhibit K: Detail maps of entire project (FL3794) (FL3795)
Exhibit L: General design drawings: (FL3796) (FL3797)
Exhibit M: Statement regarding mechanical, electrical and transmission equipment
Exhibit N: Estimate of cost of developing project
Exhibit O: Statement of time desired to complete construction of the project works

* Leased

IN WITNESS WHEREOF the applicant has caused its name and corporate seal to be hereunto signed and affixed by [illegible], its Vice-President, thereunto duly authorized, this 12 day of [illegible], 1922.

UTAH POWER AND LIGHT COMPANY

By [illegible]
Vice-President

Attest:

[illegible]
Asst. Secretary

Filed in Triplicate

EXHIBIT "A"

REFERENCE TO CERTIFICATE OF ORGANIZATION

****

To accompany application for
License under Act of June 10, 1920.

****

SCIDA PROJECT

BEAR RIVER, IDAHO

UTAH POWER AND LIGHT COMPANY

****

EXHIBIT "A"

Responding to Regulation 4 - Sec. 1

.....

APPLICATION FOR LICENSE-SODA PROJECT
BEAR RIVER, IDAHO — UTAH POWER & LIGHT COMPANY

.....

Reference to Certificate of Organization:

A copy of the Certificate of Organization of the Utah Power and Light Company, certified by the Deputy Secretary of the State of Maine, is filed with the Federal Power Commission as Exhibit "A" accompanying an application made July 7, 1920, entitled "Application for Preliminary Permit under Act of June 10, 1920, Four Bear River Sites, Bear River, Idaho, Utah Power & Light Company and numbered Permit No. 20.

No change has been made affecting the information set forth in the certificate or organization referred to above since said certificate was issued.

This statement is a part of the application for license made by the undersigned this 12 day of August, 1922.

UTAH POWER & LIGHT COMPANY

By E. W. Peck
Vice-President

Attest:

Asst. Secretary

Filed in Triplicate

EXHIBIT "B"

STATEMENT OF ORGANIZATION AND
LIST OF OFFICERS AND DIRECTORS

****

To accompany Application for License
under Act of June 10,1920.

****

SNAKE PROJECT

BEAR RIVER, IDAHO

UTAH POWER AND LIGHT COMPANY

****

EXHIBIT "B"

Responding to Regulation 4 - Sec. 2.

....

APPLICATION FOR LICENSE -SEDA PROJECT

BEAR RIVER, IDAHO - UTAH POWER AND LIGHT COMPANY

.....

Statement of Organization and List of

Officers and Directors.

.....

I E. W. Hill, Vice-President of the Utah Power and Light Company, do hereby certify that the organization of said corporation has been completed; and that the corporation is authorized to proceed with the project applied for according to the existing laws of the State of Idaho. I further certify that the following is a true list of the principal officers and of the directors of said corporation, with the full name and official designation of each, to wit:

OFFICERS

S. R. Mitchell	Chairman of Board
Lafayette Hanchett	President
S. R. Lush	Vice-President & Gen'l Manager
C. E. Greenbank	Vice-President
D. F. McGee	Vice-President
E. W. Hill	Vice-President
Geo. E. Thomas	Secretary and Treasurer
E. P. Summerhom	Assistant Secretary
W. S. Hodgson	Asst. Secretary & Asst. Treasurer
H. L. Martin	Assistant Secretary
A. C. Ray	Assistant Treasurer
G. J. Blakeman	Assistant Treasurer

DIRECTORS

Herbert S. Amerbach	C. E. Loose,
M. S. Browning	Stephen H. Love
T. R. Cutler	S. A. Mitchell
L. H. Farnsworth	P. J. Moran
C. E. Groesbeck	C. W. Nibley
Lafayette Hanchett	Geo. B. Thomas
J. C. Howard	Bulkeley Wells
Charles Hayden	S.C. Wright
S. R. Inch	

The official certificate of Robert C. Jones, Secretary of State for the State of Idaho, certifying that the Utah Power and Light Company had complied with the laws of the State of Idaho, governing foreign corporations, etc. and is a corporation in good standing and authorized and entitled to transact business, and conduct its operations, is filed with the Federal Power Commission as part of Exhibit "F", accompanying an application filed July 7, 1920, entitled "Application for Preliminary Permit under Act of June 10, 1920, Four Bear River Sites, Bear River, Idaho, Utah Power and Light Company, and marked Permit No. 20.

This statement is a part of the application for license made by the undersigned this 10 day of August 1922.

Witness my hand and the seal of the corporation this 10 day of August 1922.

UTAH POWER AND LIGHT COMPANY

By E. B. Hill
Vice-President

Attest:

Assistant Secretary

Filed in Triplicate

EXHIBIT "G"

FIELD NOTES OR DESCRIPTION OF PROJECT
BOUNDARIES AND TRANSMISSION LINES

.....

To accompany Application for License
under Act of June 10,1920.

.....

SODA PROJECT

BEAR RIVER, IDAHO

UTAH POWER AND LIGHT COMPANY

.....

EXHIBIT "G"

Responding to Regulation 4 - Sec. 2.

*****

APPLICATION FOR LICENSE - SCHA PROJECT
BEAR RIVER, IDAHO - UTAH POWER & LIGHT COMPANY

****

Field Notes or Description of
Project Boundaries and Transmission Lines

****

Applicant has not compiled Field notes or a description by metes and bounds of the entire final location survey of the project boundaries and of transmission lines, as this data is noted on tracings filed with this application. The tracings containing this data are filed as Exhibits "F" and "F" of this application for License.

This statement is a part of the application for License made by the undersigned this 1st day of January 1923.

UTAH POWER & LIGHT COMPANY

By E. W. Rich
Vice President

Attest:

A. L. Thomas
Assistant Secretary

Filed in Triplicate

EXHIBIT "F"

EVIDENCE THAT APPLICANT HAS COMPLIED WITH THE REQUIREMENTS OF THE LAWS OF THE STATE WITHIN WHICH THE PROJECT WILL BE LOCATED

****

To accompany Application for License under Act of June 10, 1920.

****

SODA PROJECT

BEAR RIVER, IDAHO

UTAH POWER AND LIGHT COMPANY

****

EXHIBIT "D"

Responding to Regulation 4 - Sec. 4.

APPLICATION FOR LICENSE - SCERA PROJECT
BEAR RIVER, IDAHO - UTAH POWER AND LIGHT COMPANY

.....

All of the requirements of the State of Idaho with respect to the development contemplated under this application are covered by the permits referred to under Exhibit "B" of this application.

The applicant is a going concern owning and operating electric light and power properties in Idaho, and has complied with the requirements of the laws of the State of Idaho with respect to the right to engage in the business of developing, transmitting and distributing power and in any other business necessary to effect the purpose of the license applied for.

The official certificate of Robert C. Jones, Secretary of State for the State of Idaho, certifying that the Utah Power and Light Company has complied with the laws of the State of Idaho governing foreign corporations, etc., and is a corporation in good standing and authorized and entitled to transact business, and conduct its operations, is filed with the Federal Power Commission as part of Exhibit "B" accompanying an application made July 7, 1920, entitled "Application for Preliminary Permit under Act of June 10, 1920, Four Bear River Sites, Bear River, Idaho, Utah Power and Light Company, and marked Permit No. 20.

No additional franchises or other rights from counties and municipalities will be required in order to complete this project and to put it in operation.

This statement is a part of the application for license by the undersigned this 10 day of May 1922.

UTAH POWER AND LIGHT COMPANY

By _____
Vice President

Attest:

_____
Assistant Secretary

Filed in Triplicate

EXHIBIT "F"

STATEMENT OF THE NATURE, EXTENT
AND OWNERSHIP OF WATER RIGHTS AND LANDS

****

To accompany Application for License
under Act of June 10, 1920.

****

SODA PROJECT

BEAR RIVER, IDAHO

UTAH POWER AND LIGHT COMPANY

*****

EXHIBIT "F"
Responding to Regulation 4 - Sec. 5.

APPLICATION FOR LICENSE - SODA PROJECT
BEAR RIVER, IDAHO - UTAH POWER AND LIGHT COMPANY

****

Statement of the nature, extent and ownership of water rights and lands.

A statement regarding the nature, extent and ownership of the water rights and of the ownership of the lands which the applicant proposes to use in the development of the project applied for is filed with the Federal Power Commission as Exhibit "F" accompanying an application made July 7, 1920, entitled "Application for Preliminary Permit under Act of June 10, 1920, Four Bear River Sites, Bear River, Idaho, Utah Power and Light Company and numbered Permit No. 20.

irrigation use?

The permit (No. 20970) of the State of Idaho to divert water for this project having expired a new Permit (No.22060) has been applied for and granted. Certified copy of this Permit is attached hereto and made a part hereof.

Drawing No. 1 of Exhibit "J" of this application shows the ownership of lands as of July 1, 1922. The applicant is actively engaged in acquiring the remaining lands and expects to secure the remaining portions very soon. Photoprint of this drawing is herewith attached for convenience.

This statement is a part of the application for license made by the undersigned this 10 day of August 1922.

UTAH POWER AND LIGHT COMPANY

By E. A. Hill
Vice President

Attest:

Assistant Secretary

(Form No. 1)

Address all communications to
Utah Power & Light Company, Attention Mr. Coren,
P. O. Salt Lake City, Utah.

APPLICATION FOR PERMIT

To Appropriate the Public Waters of the State of Idaho

Application No. 22960

Permit No. _____

District No. _____

1 Name of Applicant: Utah Power & Light Company.

Postoffice address Salt Lake City, County Salt Lake, State Utah.

If applicant is a corporation, give:

(a) Date and place of incorporation: September 6, 1912, Augusta, Kennebec Co., Maine

(b) Amount of capital stock: $0,000,000.00 (c) Amount paid in: $43,537,000 (4/30/22)

(d) Names and addresses of directors:

See Remarks "A"

H. The financial resources of the applicant are: (a) Cash on hand: $ 588,604.29 (Apr. 30, 1922)

(b) Treasury stock: $ None (c) Bonds to be issued: $ 69,997,000.

(d) Other resources: See Remarks "B"

2. Quantity of water claimed One thousand five hundred (1500)------ cubic feet per second.

3. Source of water supply: Bear River

which is a tributary of Great Salt Lake

4. Location of point of diversion: See Remarks "C" feet distant from the ____ corner of Section ____, T. ____, R. ____, B. M. and is in the ____ of Section ____, T. ____, R. ____, B. M. County of ____

5 Water is to be used for: Power purposes.

6. If for mining, milling, power or manufacturing purposes, give:

(a) Point of use of water: See Remarks "D" feet distant from ____ corner of Section ____, T. ____, R. ____, B. M. in the ____ of Section ____, T. ____, R. ____, B. M.

(b) Amount of power generated: See Remarks H. P. under ____ feet head.

(c) Water to be returned to Bear River at a point See Remarks "D" feet distant from the ____ corner of Section ____, T. ____, R. ____, B. M. in the ____ of Section ____, T. ____, R. ____, B. M.

7. Estimated cost of works: $10,000,000.00

8. Kinds of works: See Remarks "E"
(Reservoir, dam, ditch, flume, pipe, etc.)

Remarks "E"

9. Height of dam ____ feet; length of dam at top ____ feet; length of dam at bottom ____ feet; material used in dam Remarks "E"
(If height of dam will exceed 10 feet, send to Department of Reclamation for Regulations)

10. Size of headgate: Width Remarks "E" feet; height ____ feet.

11. Ditch: Width at bottom See "E" feet; Width at water line ____ feet; Depth of water ____ feet; Dimensions of flume ____ Diameter of pipe ____ inches; Length of conduit ____ miles. Average grade per mile ____ feet.

12 The time required for the completion of such work is Five years.

13 The time required for the complete application of the water to the proposed use is Six additional years.

14. The land to be irrigated is described in the following tabulation:

(Give irrigable acreage in each 40-acre subdivision.)

Twp.	Range	Sec.	NE¼				NW¼				SW¼				SE¼				Totals
			NE¼	NW¼	SW¼	SE¼	NE¼	NW¼	SW¼	SE¼	NE¼	NW¼	SW¼	SE¼	NE¼	NW¼	SW¼	SE¼	

Total Number of Acres to be Irrigated

S C H E D U L E S

"A"

Names and Addresses of Directors.

Herbert S. Auerbach,
Auerbach Company,
Salt Lake City, Utah.

M. S. Browning,
First National Bank,
Ogden, Utah.

L. H. Farnsworth,
Walker Brothers Bankers,
Salt Lake City, Utah.

C. E. Groesbeck,
71 Broadway,
New York City, New York.

Lafayette Hanchett,
983 Third Avenue,
Salt Lake City, Utah.

J. C. Howard,
Utah Oil Refining Company,
Salt Lake City, Utah.

Chas. Hayden,
25 Broad Street,
New York City, New York.

S. A. Inch,
Kearns Building,
Salt Lake City, Utah.

C. E. Loose,
Provo Com'l & Savings Co.,
Provo, Utah.

Stephen H. Love,
Salt Lake City,
Utah.

S. C. Mitchell,
71 Broadway,
New York City, New York.

P. J. Moran,
Salt Lake City,
Utah.

C. W. Nibley,
40 North Main Street,
Salt Lake City, Utah.

Geo. B. Thomas,
Kearns Building,
Salt Lake City, Utah.

Bulkeley Wells,
318 - 14th Street,
Denver, Colorado.

G. G. Wright,
Salt Lake City,
Utah.

"B"

Hydro-electric plants, transmission system, substations, distribution systems and other electrical facilities, and other property in Idaho and Utah; necessary construction funds to be provided from sale of notes, bonds and stock.

"C"

Location of Points of Diversion:

(1) From Bear River in Caribou County, Idaho, into Soda Reservoir, at a point South 5 degrees 45 minutes West 1500 feet from the quarter corner on the East Boundary line of Section 13, Township 9 South, Range 41 East, S. L., in the Southeast quarter of said Section 13. A continuous flow of 1500 cubic feet per second will be diverted at this point.

(2) From Bear River in Caribou County, Idaho, and Soda Reservoir into penstocks by means of a dam located in the channel of said river at a point South 31 degrees 30 minutes West 830 feet from the Northeast corner of Section 18, Township 9 South, Range 41 East, S. L.

REMARKS

"C" Cont'd.

(5) From Bear River in Caribou County, Idaho, into Lava Reservoir at a point South 71 degrees 30 minutes West 930 feet from the Northwest corner of Section 15, Township 9 South, Range 41 East, B. M. The 1500 second feet continuous flow diverted at the points described in paragraphs (1) and (2) above and returned to the river at the point described in paragraph (1) of "D" will not be abandoned by the applicant, but will be carried in the natural channel of the stream and re-diverted at the points described in this and paragraph (4) hereof and, less such amount as may be lost by percolation and evaporation in transit, will again be used at the point described in paragraph (2) of "D". Soda Point

(4) From Bear River in Bannock County, Idaho, and Lava Reservoir into penstocks by means of a dam located in the channel of Bear River at a point South 12 degrees 45 minutes East 2090 feet from the quarter corner on the North boundary line of Section 31, Township 9 South, Range 41 East, B. M.

(5) From Bear River in Franklin County, Idaho, into Harrows Reservoir at a point South 74 degrees 01 minutes East 3173 feet from the Northwest corner of Section 26, Township 13 South, Range 40 East, B. M., in the Northeast quarter of said Section 26. The 1500 second feet continuous flow diverted at the points described in paragraphs (1) and (2) above and returned to the river at the point described in paragraph (1) of "D" and re-diverted, used and returned to the river as described in paragraphs (3) and (4) above and paragraph (2) of "D", will not be abandoned by the applicant, but will be carried in the natural of the stream and re-diverted at the points described in this and paragraph (5) below and, less such amount as may be lost by percolation and evaporation in transit, will again be used at the point described in paragraph (3) of "D".

(6) From Bear River in Franklin County, Idaho and Harrows Reservoir into penstocks by means of a dam located in the channel of said river at a point South 31 degrees 55 minutes East 3260 feet from the quarter corner on the North boundary line of Section 3, Township 14 South, Range 40 East, B.M.

(7) From Bear River in Franklin County, Idaho, into Mink Reservoir at a point South 31 degrees 55 minutes East 3260 feet from the quarter corner on the North boundary line of Section 3, Township 14 South, Range 40 East, B. M. The 1500 second feet continuous flow diverted at the points described in paragraphs (1), (2), (3), (4), (5) and (6) above and returned to the river at the points described in paragraphs (1), (2) and (3) of "D" will not be abandoned by the applicant, but will be carried in the natural channel of the stream and re-diverted at the points described in this and paragraph (8) below and, less such amount as may be lost by percolation and evaporation in transit, will against be used at the point described in paragraph (4) of "D".

(8) From Bear River in Franklin County, Idaho, and Mink Reservoir into penstocks by means of a dam located in the channel of said river at a point North 51 degrees 30 minutes West 2120 feet from the Southeast corner of Section 16, Township 14 South, Range 40 East, B. M., in the Southeast quarter of said Section 16.

REMARKS

"B"

Location of Point of Use for Power and Point of Return:

(1) The Point of use and return of the water diverted at point of diversion from Soda Reservoir, as hereinabove set out in paragraph (2), Remarks "B", is at a power house located in the dam, the center of which is located in the channel of Bear River at a point South 51 degrees 30 minutes West 830 feet from the Northeast corner of Section 18, Township 9 South, Range 41 East, B. M. The equivalent of a continuous flow of 1500 cubic feet per second will be used through the said power house for the generation of electrical energy.

(2) The point of use and return of the water diverted at point of diversion from Lava Reservoir, as hereinabove set out in paragraph (4), Remarks "B", is at a power house located in the dam, the center of which is located in the channel of Bear River at a point South 13 degrees 30 minutes East 2215 feet from the quarter corner on the North boundary line of Section 31, Township 9 South, Range 41 East, B. M. The equivalent of a continuous flow of 1500 cubic feet per second will be diverted and used for the generation of electrical energy at said power plant.

(3) The point of use and return of the water diverted from Narrows Reservoir, as hereinbefore set out in paragraph (6), Remarks "B", is at a power house to be built in the dam located in the channel of Bear River at a point South 51 degrees 55 minutes East 3260 feet from the quarter corner on the North boundary line of Section 3, Township 14 South, Range 40 East, B. M. The equivalent of a continuous flow of 1500 cubic feet per second will be diverted and used for the generation of electrical energy through the said plant.

(4) The point of use and return of the water diverted at the point of diversion from Bear River and the Link Reservoir, as hereinbefore set out in paragraph (8), Remarks "B", is at a power plant to be built in the dam, which is located in the channel of Bear River at a point North 51 degrees 30 minutes West 2120 feet from the Southeast corner of Section 16, Township 14 South, Range 40 East, B. M. The equivalent of a continuous flow of 1500 cubic feet per second will be diverted and used for the generation of electrical energy at this plant.

"K"

(1) The water to be diverted at the place designated under Remarks "C", subdivision (2) will be diverted by means of a re-inforced concrete and masonry dam, located in the channel of Bear River at the point described in said paragraph (2). Said Dam will be 82 feet high, 825 feet long on top, 100 feet long on the bottom, with openings for three penstocks through the dam, which will convey the water to generating machinery located at the dam and there used under a head of 80 feet to generate 12,500 horsepower of electrical energy.

(2) The water to be diverted at the place designated under Remarks "C", subdivision (4), will be diverted by means of a re-inforced concrete and masonry dam, located in the channel of Bear River at a point described in said paragraph (4). Said dam will be 60 feet high, 300 feet long on top, 100 feet long on the bottom, with openings for three penstocks through the dam which will convey the water to generating machinery located at the dam and there used under a head of 50 feet to generate 11,000 horsepower of electrical energy.

(3) The water to be diverted at the place designated under Remarks "B", subdivision (6), will be diverted by means of a re-inforced concrete and masonry dam, located in the channel of Bear River at a point designated in said paragraph (6). Said dam will be 60 feet high, 320 feet long on top and 120 feet long on the bottom, with openings for three penstocks through the dam which will convey the water to generating machinery located at the dam and there used under a head of 60 feet to generate 8500 horsepower of electrical energy.

(4) The water to be diverted at the place designated under Remarks "C", subdivision (8) will be diverted by means of a re-inforced concrete and masonry dam, located in the channel of Bear River at the place designated in said paragraph (8). Said dam will be 70 feet high, 450 feet long on top, 120 feet long on the bottom, with openings for three penstocks through the dam which will convey the water to generating machinery located at the dam and there used under a head of 70 feet to generate 9500 horsepower electrical energy.

"F"

The reservoirs indicated in this application will be used to equalize the flow of water to the generating machinery and will not be used primarily as storage reservoirs. Released stored water from Bear Lake Reservoir will be retained in the above mentioned reservoirs for use through the power plants during the hours of maximum demand for power.

In addition to the natural flow that may be available at the points of use hereinabove set forth, said applicant is entitled to divert and use at there various sites all released stored water from Bear Lake Reservoir which it shall hereafter divert and impound in said reservoir from Bear River, Bear Lake and North or Mud Lake, under and by virtue of its rights as decreed in the Final Decree in that certain suit in equity, in the District Court of the United States for the District of Idaho, Eastern Division, No. 203, wherein applicant Utah Power & Light Co. was plaintiff and Last Chance Canal Company, Ltd., et al defendants.

a) Is reservoir to be used?.....If so, fill in (b) and (c) below.)

(b) Name of reservoir and number of Storage Permit:.....

(c) Date of filing of Application for Storage Permit and Name of Applicant.....

Remarks:

BE IT KNOWN That the undersigned hereby makes application for permit to appropriate the public waters of the State of Idaho as herein set forth.

Utah Power & Light Company
Applicant.

By Markham Cheever Agent.
Genl Supt. and Chief Engr.

16.

Affidavit of Permission to File on Springs

(Not to be used when spring is situated on lands owned by applicant.)

I, ... of ....., County of ..... State of ....., do hereby certify that I am the owner of lessee of the land on which the spring mentioned in the application of ..... is located, to-wit: .....

and that I do hereby grant unto the said ..... permission to file on the said spring as set forth in the foregoing application.

STATE OF IDAHO, }
County of ..... } ss.

On this ..... day of ..... 19...., before me, a Notary Public for the State of Idaho, residing at ..... personally appeared .....

known to me to be the person.... whose name..... subscribed to the foregoing certificate, and acknowledged to me that ...he... executed the same.

Witness my hand and seal, the day and year in this certificate first above written.

..... Notary Public.

My commission expires.....

Approval of Commissioner of Reclamation

The number of this permit is

Recorded in Book Page Approved

This is to certify that I have examined the within application for a permit to appropriate the public waters of the State of Idaho, and hereby approve the same subject to the following limitations and conditions:

Bond in the sum of $ to be filed on or before

Work to begin on or before and to continue diligently and uninterruptedly to completion, unless temporarily interrupted by circumstances over which the permit holder has no control.

One-fifth of the work above specified to be completed on or before

The whole of said work to be completed on or before

Beneficial use of water appropriated in accordance herewith, to be made on or before

Witness my hand this day of 19

Commissioner of Reclamation.

This duplicate original (or certified copy) of Application for Permit No. 22060 to appropriate the Public Waters of the State of Idaho, is a part of the application for license made by the undersigned this 16 day of [illegible] 1922.

[illegible] POWER & [illegible] COMPANY.

By
Vice President

Attest
Assistant Secretary

No.

PERMIT

Date of first receipt at office of Commissioner of Reclamation

9 A. M. June 24, 1922

Returned to applicant for correction

Corrected application received

Fee, $10.00

FILING FEES FOR LAND PERMIT:

For the first Sec. Ft. $1.00

For each additional Sec. Ft. or fraction thereof 10

STATE OF IDAHO, }
County of Ada. } ss.

I, W. G. SWENDSEN, Commissioner of Reclamation of the State of Idaho, hereby certify the above and foregoing to be a full, true and correct copy of application for permit to appropriate the public waters of the State of Idaho, No. 22060; that the same is in proper form and will be regularly passed to permit and entered upon the records of the Department of Reclamation, Boise, Idaho.

IN WITNESS WHEREOF, I have hereunto set my hand and affixed the seal of my office at Boise, Idaho, this 3rd day of July, 1922.

W. G. SWENDSEN,
Commissioner of Reclamation

By
Custodian of Records.

Blue Mountain	Yampa River	-	14000	
Total Capacity-Hydroelectric		122647 kw	to 751,647 kw 803,147 kw	
Steam Plants				
Jordan	Salt Lake City	15000	16000	
Total - Hydro and Steam		137647 kw	777647 kw to 819147 kw	

Storage Reservoirs

It will be noted from the above table that more than one-half of the installed capacity is in four plants on BearRiver. The greater part of the energy from these four plants is transmitted over three 132,000 volt circuits to the Terminal Substation nearSalt Lake City where it is stepped down to 44,000 volts and connected to the main 44,000 volt network which transmits the energy to the centers of distribution. The transmission and distribution system comprises approximately 2100 pole miles of 11000 volts or above, and approximately 1500 pole miles of distribution lines at 6600 volt or less.

Connections to other Power Systems

The Northern end of the Utah Power and Light Company's system is connected with the eastern division of the Idaho Power and Light Company's system at Pocatello and at Blackfoot.

These connections are shown by Exhibit I, drawing No. 1.

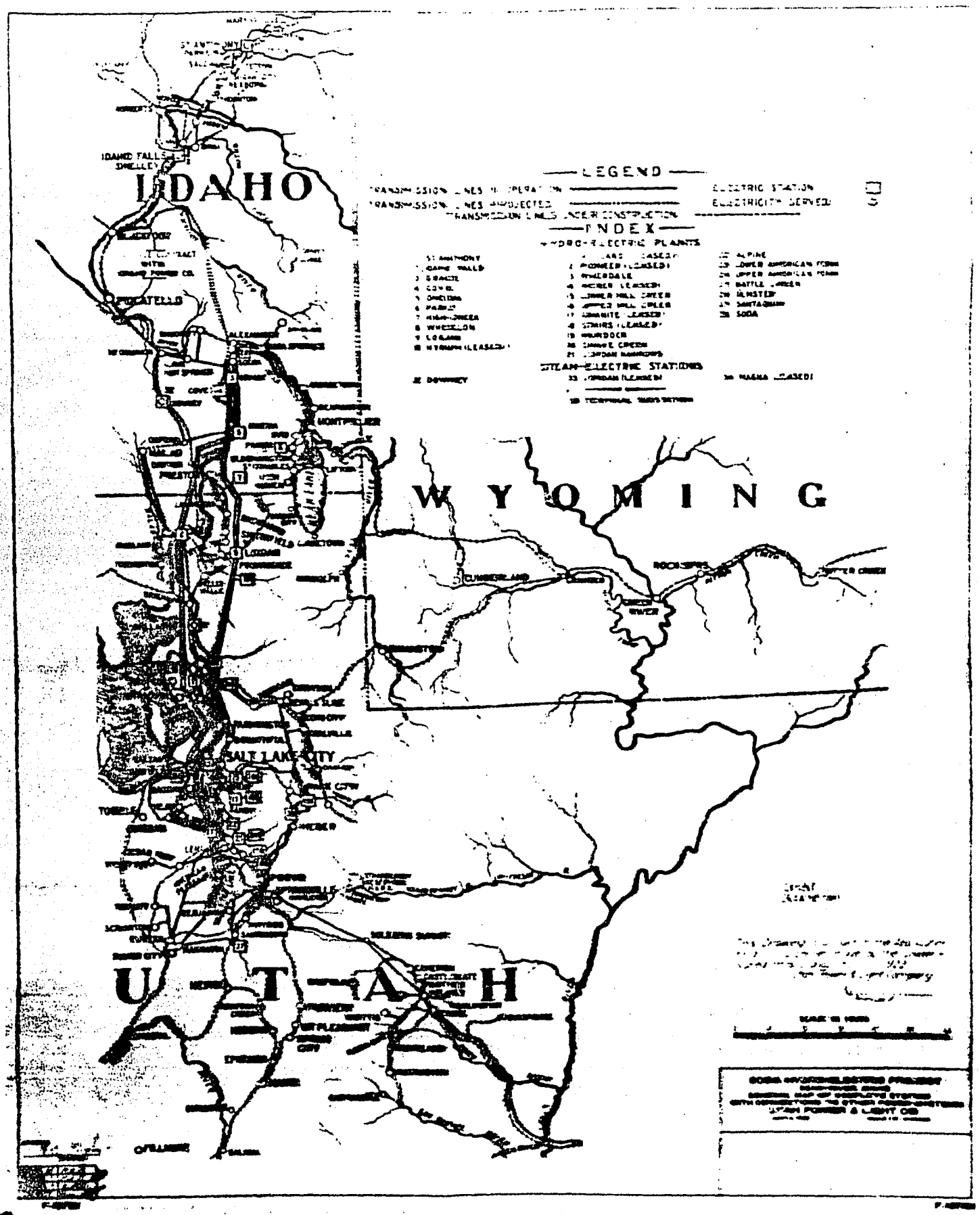
This statement is a part of the application for license made by the undersigned this 10 day of [illegible] 1922.

UTAH POWER AND LIGHT COMPANY

By [signature]
Vice-President

Attest:

[signature]
Assistant Secretary


IDAHO
WYOMING
UTAH
IDAHO FALLS
SHELLEY
POCATELLO
SALT LAKE CITY
LEGEND
INDEX
HYDRO-ELECTRIC PLANTS
STEAM-ELECTRIC STATIONS

Filed in Triplicate
No. 1 - Filed separately-one tracing and two blueprints
No. 2 - " " " linen mounted and four unmounted lithographed maps.

EXHIBIT "J"

GENERAL MAP OF RETURN PROJECT AND
GENERAL MAP OF APPLICANT'S TRANSMISSION SYSTEM

To accompany Application for License
under Act of June 10,1920.

.....

SUBA PROJECT

BEAR RIVER, IDAHO

UTAH POWER AND LIGHT COMPANY

.....

EXHIBIT "J"

Responding to Regulation 4 - Sec. 10.

APPLICATION FOR LICENSE - SODA PROJECT
BEAR RIVER, IDAHO - UTAH POWER AND LIGHT COMPANY

******

Concerning General Maps of Entire Project and General Map of Applicant's Transmission System.

This Exhibit, consisting of:

No. 1 - General Map of Entire Project-U.P.&L.Co.(2 sheets)(R-1792)
No. 2 - General Map of Transmission System-U.P.&L.Co. (R-1793)
(Showing interconnected part of system to which the proposed Soda Development will not be connected),

has been presented as follows:

No. 1 - General Map (2 sheets) has been presented in roll form as defined by Regulation 2-Sec.4-Par.C of the Rules and Regulations of the Power Commission. One tracing and two blueprints are submitted of each sheet of this drawing and, in addition, photoprints of these sheets are herewith attached.

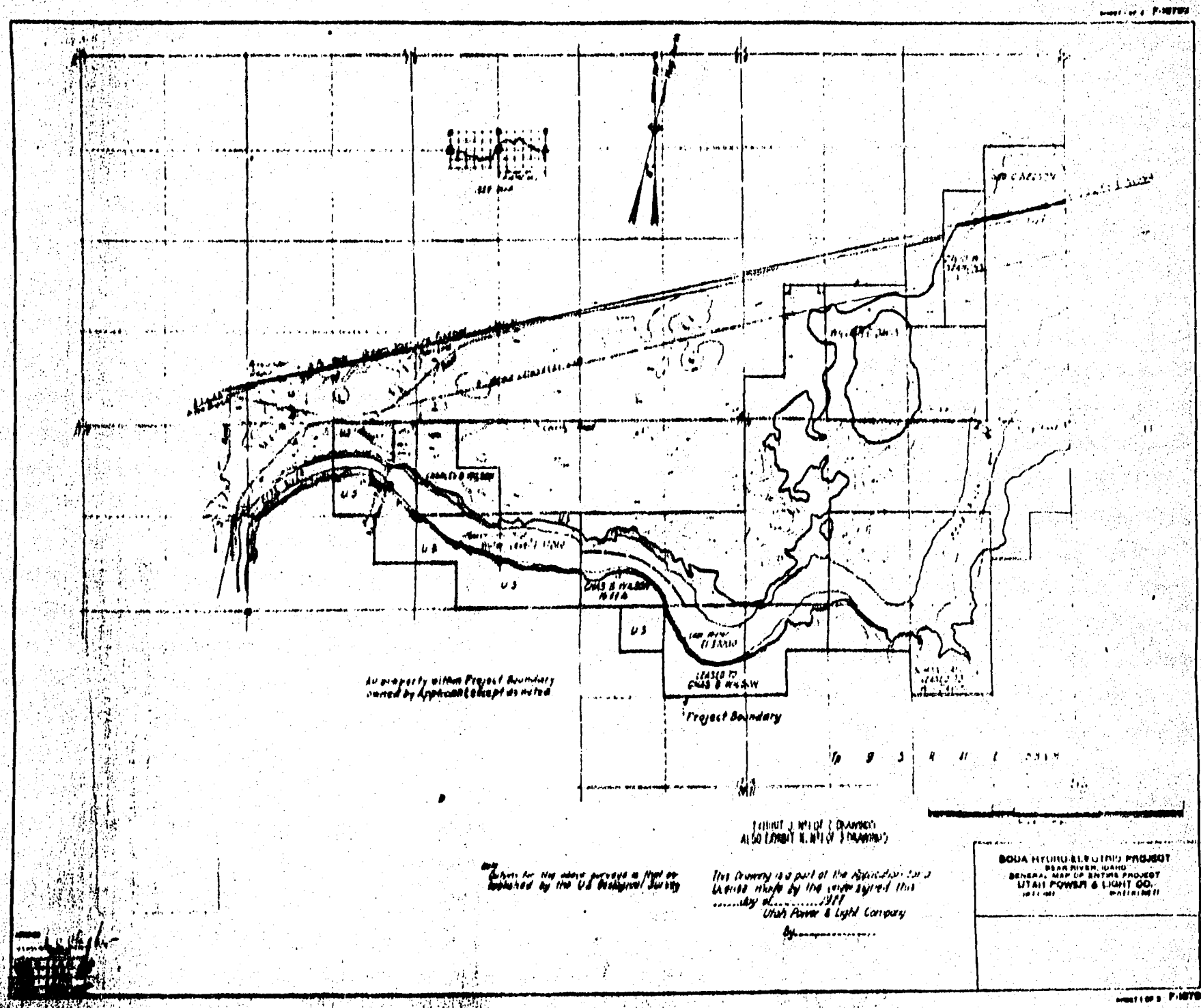
No. 2 - The General Map of the Transmission System has been presented as follows: One copy mounted on linen and four unmounted copies of lithographed map have been presented in roll form as defined by Regulation 2-Sec. 4-Par. C of the Rules and Regulations of the Power Commission and, in addition, photoprint of this drawing is herewith attached. The reason for submitting the map in this form is that the original is sixteen (16) feet long and would require six (6) sheets to show it in standard form. It is thought that the system can be better seen and understood from the map submitted.

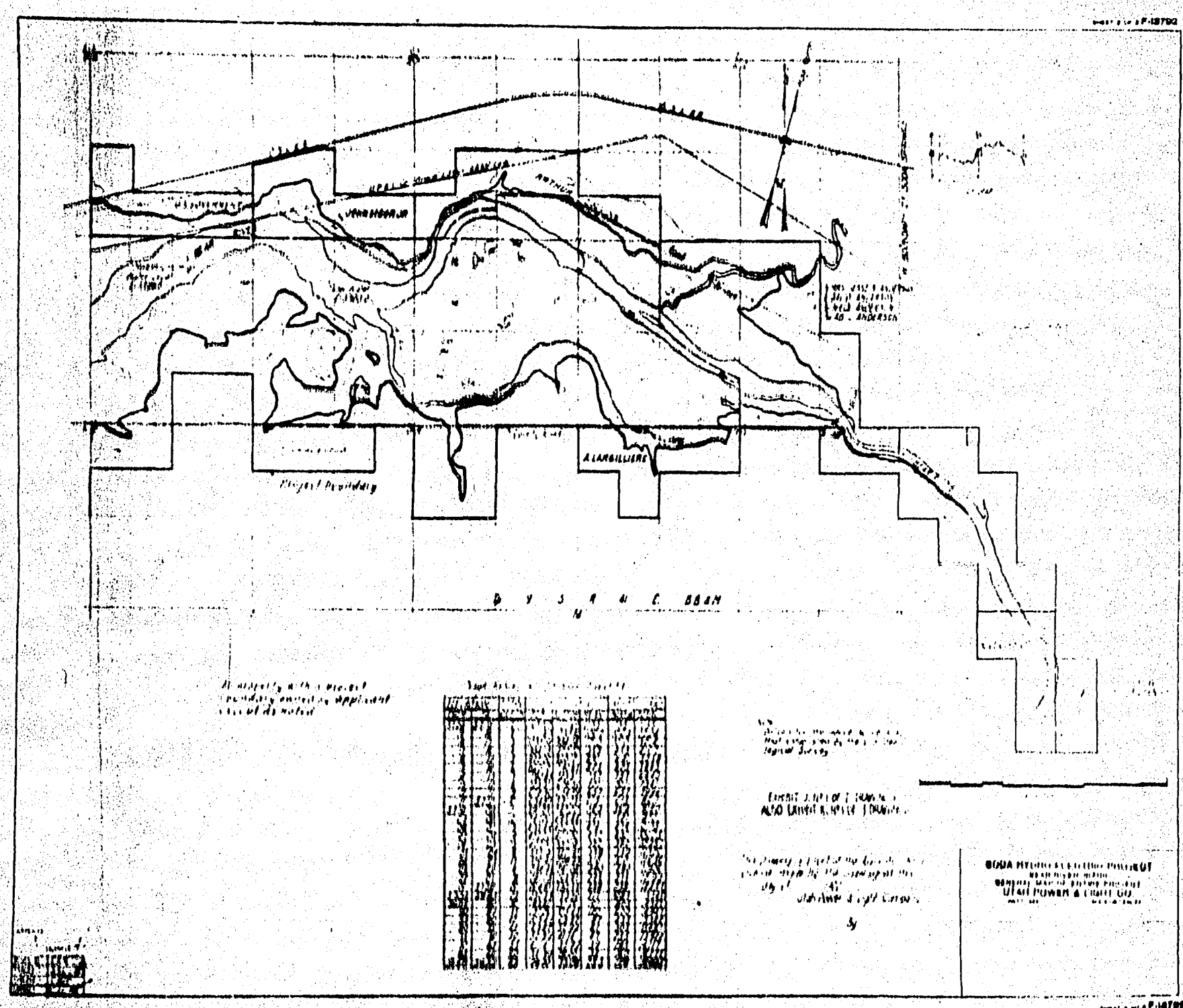
This statement is a part of application for license made by the undersigned this 15 day of June 1922.

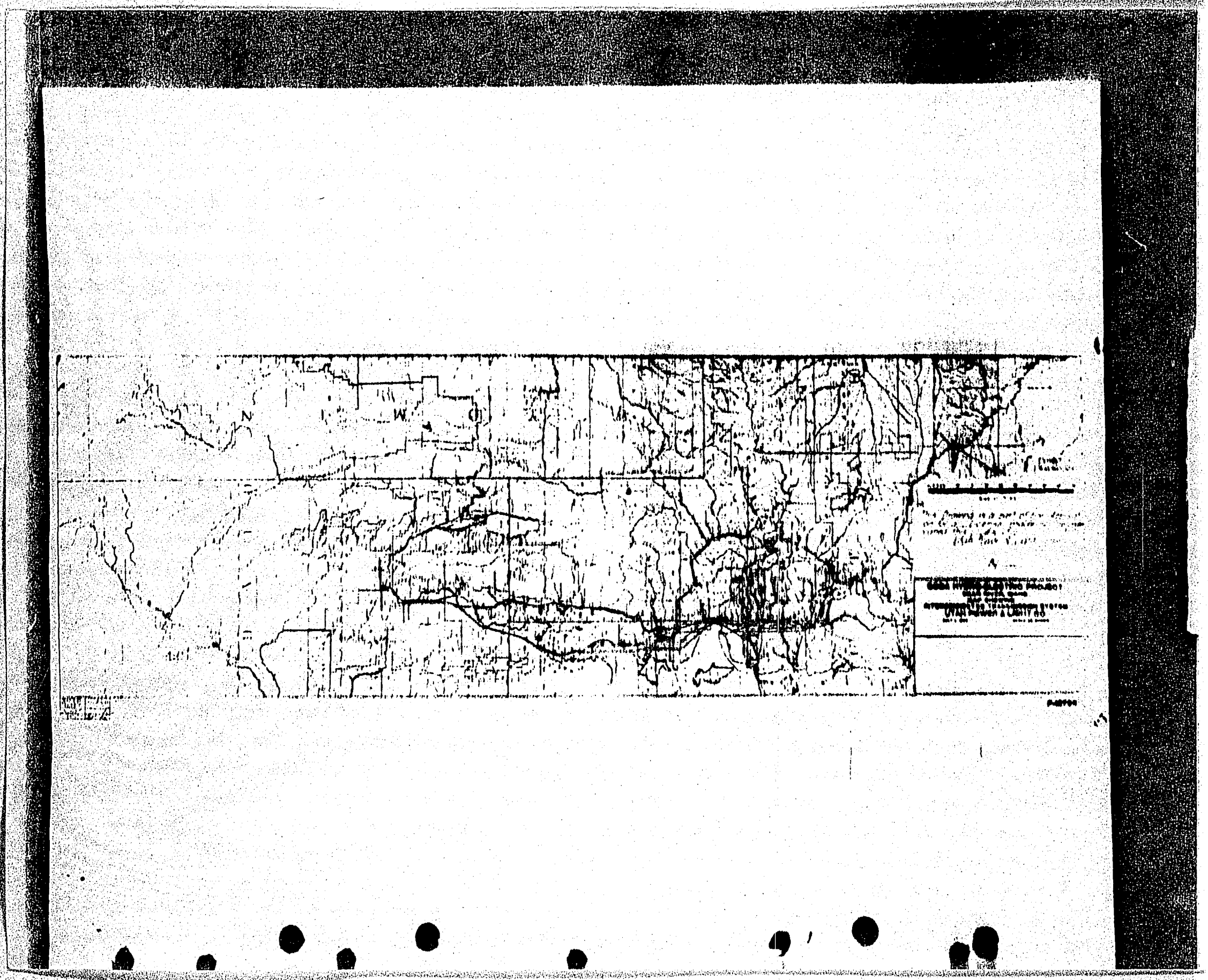
UTAH POWER AND LIGHT COMPANY

By E. J. Ford
Vice-President

Attest: A. W. [illegible]
Assistant Secretary


Project Boundary
SOUTH FORK-BLACKTAIL PROJECT
BEAR RIVER, IDAHO
GENERAL MAP OF ENTIRE PROJECT
UTAH POWER & LIGHT CO.


A LARGILLIERE
D Y S A N C BEAM



Filed in triplicate
Filed separately-One tracing and two Blueprints

EXHIBIT "F"

DETAIL MAPS OF ENTIRE PROJECT

To accompany Application for License
under Act of June 10,1920.

.....

SODA PROJECT

BEAR RIVER, IDAHO

UTAH POWER AND LIGHT COMPANY

.....

EXHIBIT "F"

Responding to Regulation 4 - Sec. 11.

APPLICATION FOR LICENSE—SODA PROJECT
BEAR RIVER, IDAHO——UTAH POWER AND LIGHT COMPANY

****

Concerning Detail Maps of Entire Project.

This Exhibit, consisting of:

No. 1 General Contour Map and Character of Foundations (F13794)
No. 2 General Plan of Development (F13795)

has been presented in roll form as defined by Regulation 2 - Sec. 4, Par. C, of the Rules and Regulations of the Power Commission. One tracing and two blueprints are submitted of each drawing and, in addition, photoprints of these drawings are herewith attached.

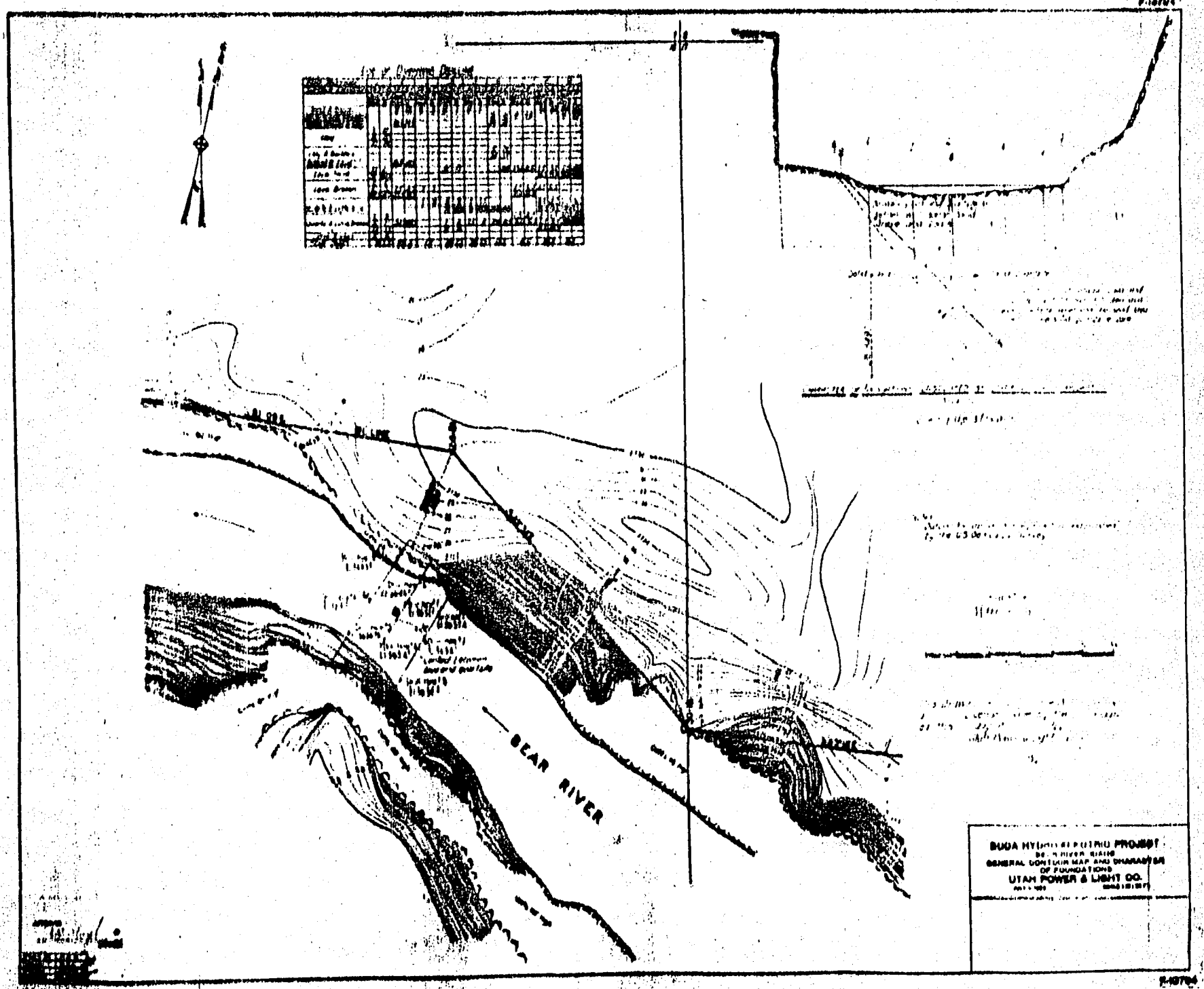
This statement is a part of application for license made by the undersigned this 10 day of January 1922.

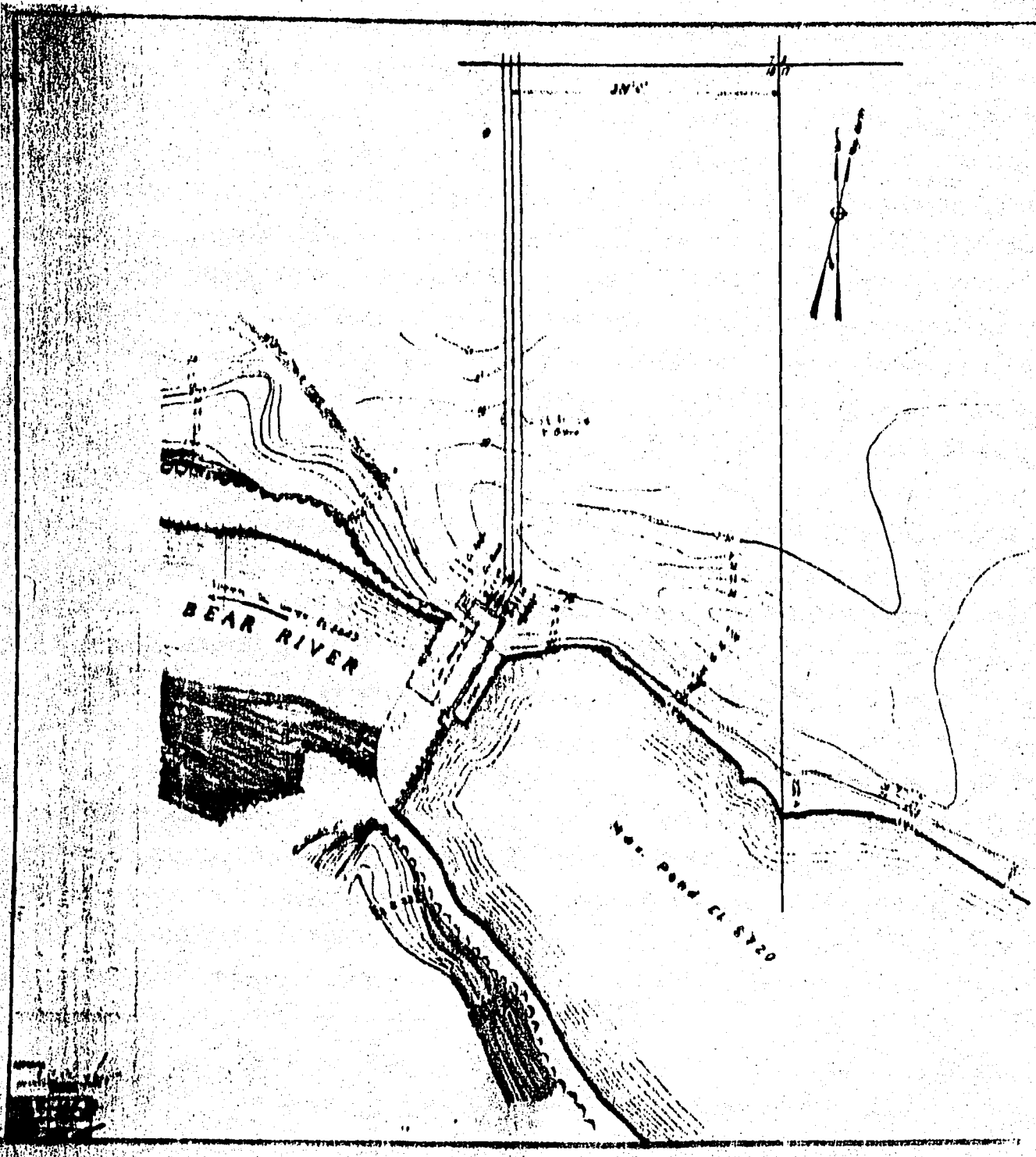
UTAH POWER AND LIGHT COMPANY

By E. P. Ward
Vice-President

Attest:

H. [illegible]
Assistant Secretary


BEAR RIVER


BEAR RIVER
NEW POND EL 6720
BEAR RIVER BASIN
GENERAL PLAN OF DEVELOPMENT
UTAH POWER & LIGHT CO.

Filed in Triplicate

Filed separately - one tracing and two blueprints.

EXHIBIT "L"

GENERAL DESIGN DRAWINGS

****

To accompany Application for License
under Act of June 10, 1920.

******

SWAN FALLS

NEAR KUNA, IDAHO

UTAH POWER AND LIGHT COMPANY

****

EXHIBIT "L"

Responding to Regulation 4—Sec. 12

APPLICATION FOR LICENSE—SODA PROJECT
BEAR RIVER, IDAHO——UTAH POWER AND LIGHT COMPANY

****

Concerning General Design Drawings.

This Exhibit, consisting of:

No. 1 - Plan and Horizontal Sections of Power House and Dam. (F-13796)
No. 2 - Elevation and Sections of Power House and Dam. (F13797)

has been presented in roll form as defined by Regulations 2-Sec. 4-Par. C, of the Rules and Regulations of the Power Commission. One tracing and two blueprints are submitted of each drawing and, in addition, for convenience photoprints of these drawings are herewith attached.

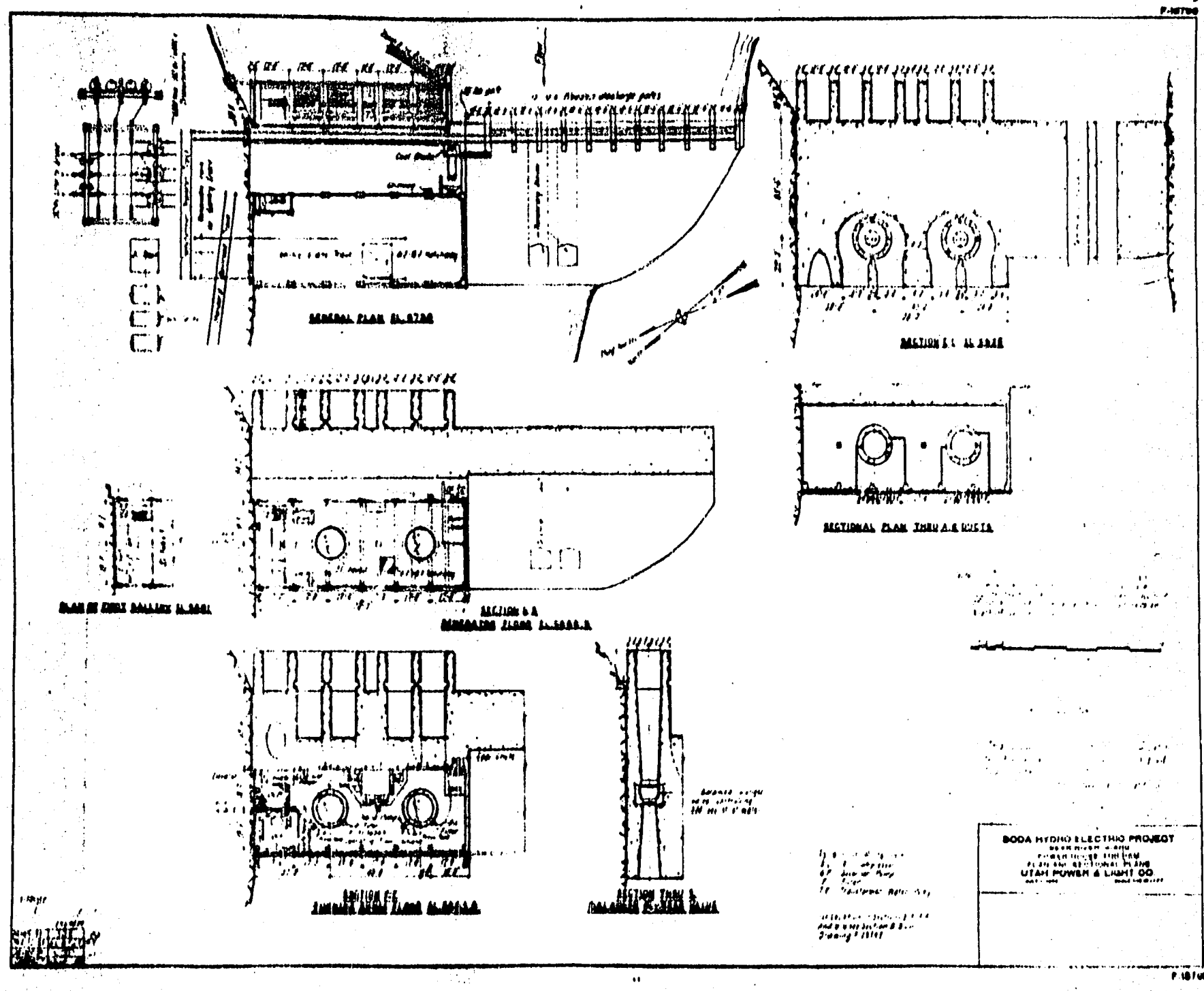
This statement is a part of application for license made by the undersigned this 19 day of August 1922.

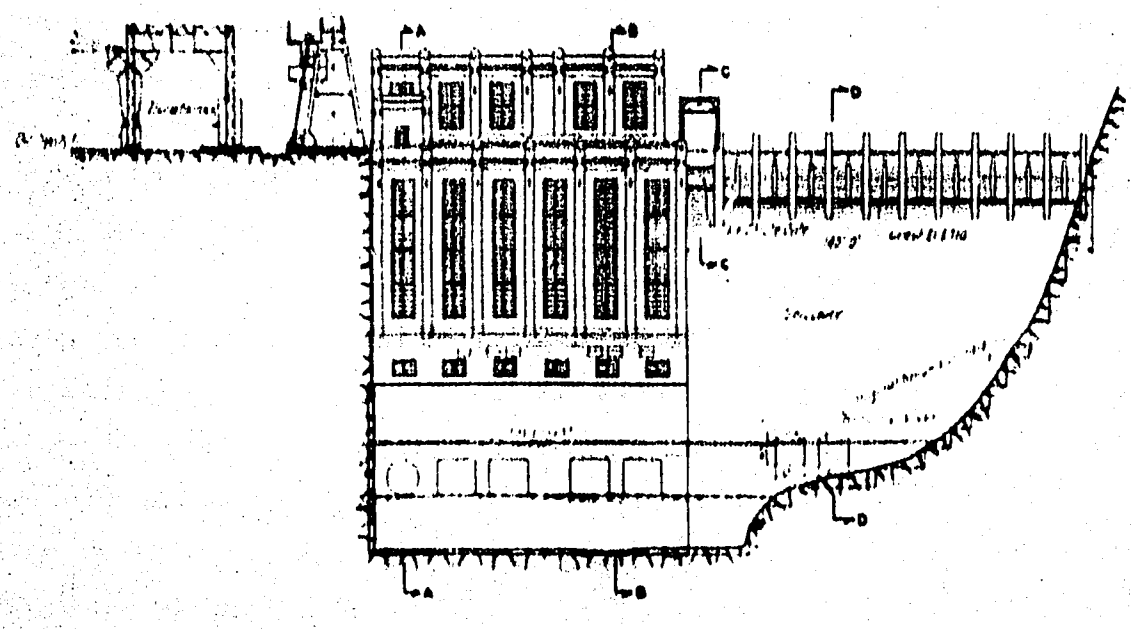
UTAH POWER AND LIGHT COMPANY

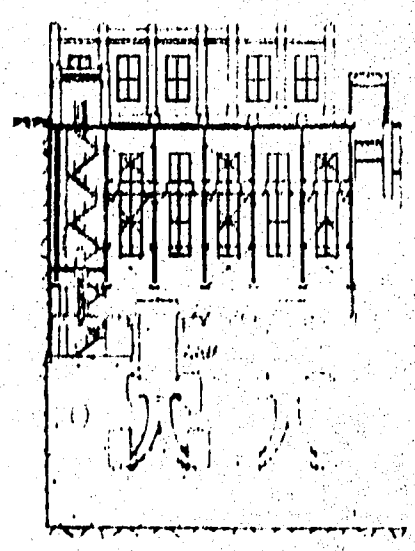
By _____
Vice-President

Attest:

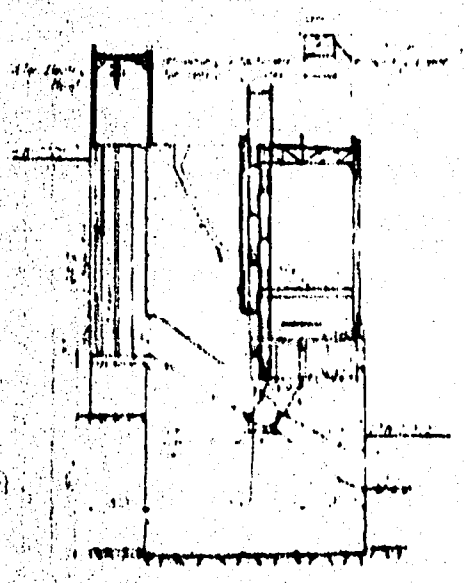
_____
Assistant Secretary


BODA HYDRO ELECTRIC PROJECT
UTAH POWER & LIGHT CO.

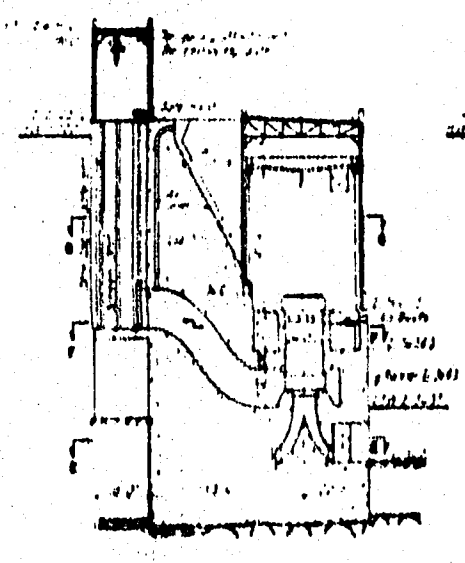




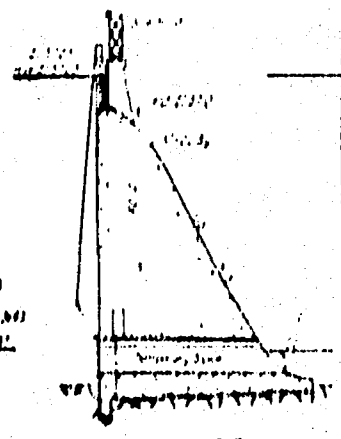
LONGITUDINAL SECTION THRU 6 UNITS



SECTION A-A



SECTION B-B



SECTION C-C

SECTION D-D

EXHIBIT
DRAWING NO.

BODA HYDRO ELECTRIC PROJECT
UTAH POWER & LIGHT CO

Filed in Triplicate

EXHIBIT "K"

STATEMENT OF MECHANICAL
ELECTRICAL & TRANSMISSION ENGINEER

To accompany Application for License
under Act of June 10, 192 0.

.....

SODA PROJECT

BEAR RIVER, IDAHO

UTAH POWER AND LIGHT COMPANY

.....

THIS EXHIBIT.....M.....SUBMITTED WITH AND MADE A PART OF APPLICATION OF THE UTAH POWER & LIGHT CO. FOR A LICENSE FOR PROJECT No. 20 Idaho (Soda Units) RECOMMENDED FOR APPROVAL.

H.E.B.
.....
CHIEF ENGINEER

APPROVED August 17, 1923
BY ORDER OF THE FEDERAL POWER COMMISSION
.....
EXECUTIVE SECRETARY

Amendment APPROVED Feb. 5, 1923

LICENSE ISSUED.....July 5..... 1923

.....
EXECUTIVE SECRETARY

EXHIBIT "I"

Responding to Regulation 4 - Sec. 13.

APPLICATION FOR LICENSE—SODA PROJECT
BEAR RIVER, IDAHO——UTAH POWER AND LIGHT COMPANY

****

Description of mechanical, electrical and transmission equipment.

There will be installed in the substructure of the power house two vertical water turbines direct connected to vertical water wheel generators. These turbines will be designed to develop 10,500 hp under a net head of 80 ft when running at a speed of 257 rpm. They will be controlled and regulated by oil pressure governors with motor for switchboard control.

The substructure will also contain one 60 inch balanced plunger valve, to be used to by-pass part of the flow of the stream.

The station superstructure will house an electrically operated traveling crane, for handling all mechanical equipment. The crane will have a capacity of 75 tons, with an auxiliary hoist of 10 tons capacity, both to have a clear lift above the operating floor of 40 ft. A gantry crane of 75 tons capacity, and normally stationed at one end of the switchyard, will be arranged to run on to the power house roof at the yard level. This crane will be used to take heavy equipment to and from the power house through a hatchway in the roof.

The auxiliary mechanical equipment will consist of lubricating and governor oil pumps, oil sump tanks, oil filter, and air compressor.

Electrical Equipment

The generators to be installed will be 7500 kw, 10,000 kva, 6600 v, 3-phase, 60 cycle, 257 rpm 28 poles vertical shaft water wheel type. A seperate motor driven 250 v exciter will be placed in the operating room. The 6600 v oil switches and control switchboard for generator, transformers and outgoing lines will be placed in the operating room below the generator floor level. A storage battery will be provided for control of the oil circuit breakers.

The step-up transformers will consist of 3-6000 kva single phase transformers for stepping up from 6600 v to 132,000 v.

One extra transformer will be provided as a spare.

The transformers will be installed on the high cliff north of the dam in a transformer and switchyard having provision for one 132 kv transmission line.

Concrete foundations and steel structures will be used. Facilities for storage of oil, for storage of materials, and for making repairs to equipment will be provided as indicated on the drawings.

Transmission Lines

The only transmission line necessary for putting this project in operation is one 132 kv line, approximately 10 miles long, to connect this station with the applicant's general transmission system at the Grace station.

This statement is a part of application for license made by the undersigned this 10 day of January 1922.

UTAH POWER AND LIGHT COMPANY

By E D Hill
Vice-President

Attest:

G L Simmons
Assistant Secretary

Filed in Triplicate

EXHIBIT "F"

ESTIMATE OF COST OF DEVELOPING PROJECT

******

To accompany Application for License
under Act of June 10, 1920.

****

SODA PROJECT

BEAR RIVER, IDAHO

UTAH POWER AND LIGHT COMPANY

****

EXHIBIT "F"

Responding to Regulation 4 - Sec. 14.

APPLICATION FOR LICENSE——SODA PROJECT
BEAR RIVER, IDAHO——UTAH POWER AND LIGHT COMPANY

****

Concerning Estimate of Cost of Project.

This Exhibit sets forth the estimated cost of the project, segregated by principal features, showing quantities, unit costs, etc. in sufficient detail for a full understanding of the elements of cost of the project and is presented in photoprint form, copies of which are herewith attached.

This statement is a part of application for license made by the undersigned this 10 day of August 1922.

UTAH POWER AND LIGHT COMPANY

By E B Kell
Vice-President

Attest:

Assistant Secretary

PREPARED [illegible]
CHECKED [illegible]
Approved [illegible]

Estimated Cost Analysis

[illegible]

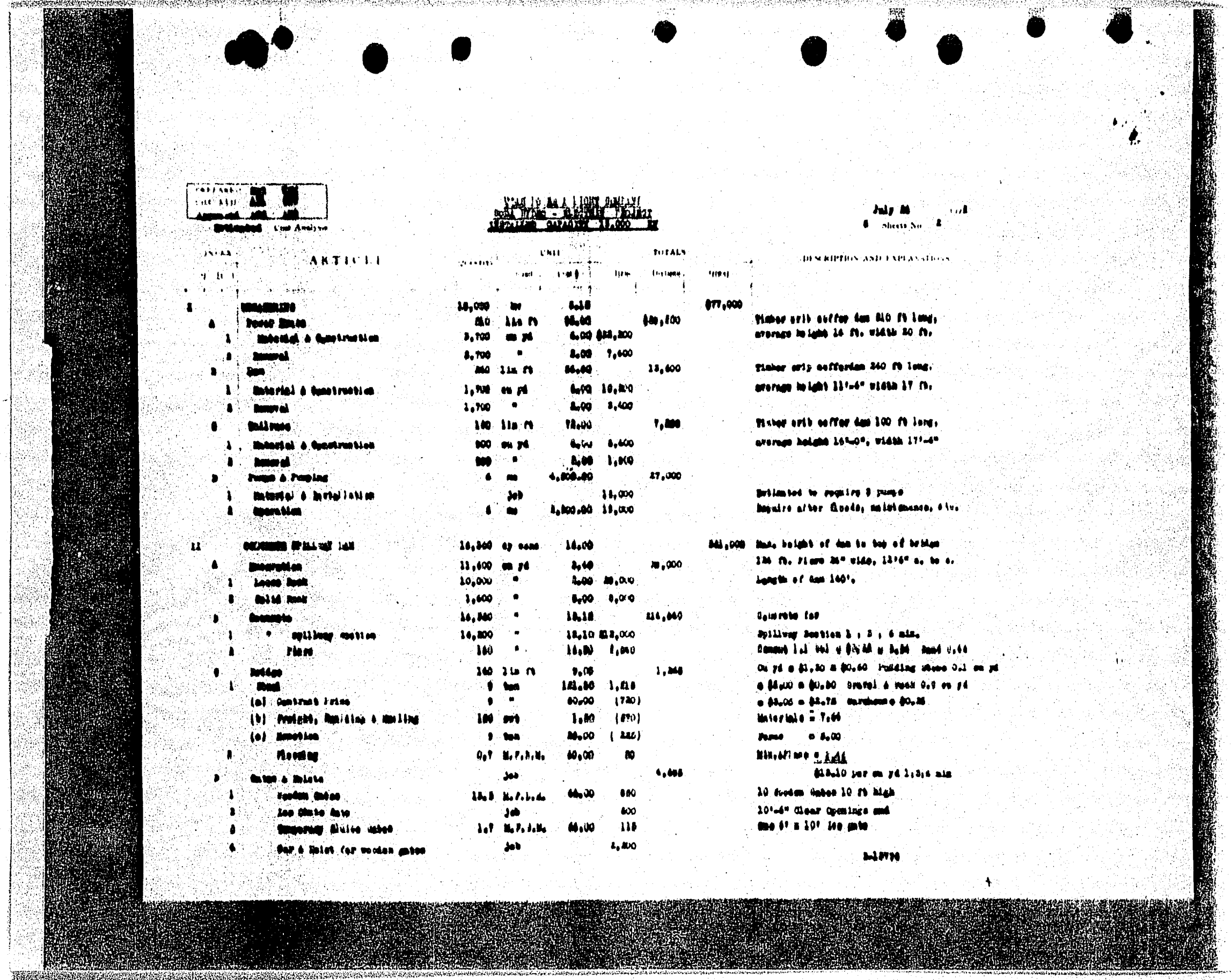
SUMMARY

July 26, [illegible]

Sheets No. 1

INDEX G D I	ARTICLE	Quantity	Unit Used	Unit Cost $	Item	Total $ Amount	Group	DESCRIPTION AND CLASSIFICATION
I	EXCAVATION	680	Lin ft	119.00			77,000	680 Lin ft of Cofferdam
II	CONCRETE GRAVITY DAM	140	"	1,860.00			261,000	Max. height 154' length 140'
III	GENERATING STATION	15,000	kw	28.60			428,000	Length 102' width 58'-6" Height 84'
IV	INTAKE	15,000	"	8.80			132,000	For the two units and a by-pass valve
V	TAILRACE	15,000	"	1.80			27,000	
VI	MECHANICAL EQUIPMENT	21,000	hp	8.30			175,000	2x10,500 hp vertical turbines
VII	GENERAL EQUIP. "	15,000	kw	5.67			60,000	75 ton station crane, 75 ton gantry & sump equip.
VIII	INDOOR ELECTRICAL EQUIPMENT	15,000	kw	14.00			210,000	2-7500 kw, 6600 v, 3 phs generators
IX	OUTDOOR " "	15,000	kw	8.67			130,000	6-4000 kva 6600-138 kv transformers
X	IMPROVEMENTS TO GROUNDS	15,000	kw	5.76			86,000	Operators' dwellings, service, roads, fencing
XI	TOTAL MATERIAL & LABOR	15,000	kw	100.00			$1,505,000	
XII	LAND & RIGHT OF WAY		job				256,000	Total of approx. 2,925 acres
XIII	SURVEYING & INVESTIGATIONS		"				75,000	Preliminary Surveys & studies & Construction
XIV	CONSTRUCTION PLANT (Misc)	1,505,000	$	7.0			105,000	Surveys
XV	WAREHOUSE & STORES	1,600,000	$	1.0			16,000	
XVI	CAMP, COMMISSARY & HOSPITAL	1,686,000	$	1.8			86,000	
XVII	SUPERINTENDENCE & GENERAL	1,840,000	$	5.0			88,000	Field office expense, bonuses, taxes, etc.
XVIII	ENGINEERING	1,780,000	$	7.8			130,000	Design & Field Engineering
XIX	CONTINGENCIES	1,860,000	$	5.0			93,000	
XX	CONSTRUCTION FEES	1,905,000	$	3.4			65,000	
XXI	ADMINISTRATION & LEGAL	2,015,000	$	1.0			20,000	
XXII	INTEREST DURING CONSTRUCTION	2,035,000	$	6.4			131,000	6.5% money, 1/2 money for 1-1/2 years.
XXIII	TOTAL COST	15,000	kw	$168.80			$2,530,000	
		21,000	hp	120.10				
		40,000	kva	186.00				

Sheet No. 1



Estimated Cost Analysis

July 56

Sheet No 2

ITEM	ARTICLE	QUANTITY	UNIT		UNIT PRICE	TOTALS		DESCRIPTION AND EXPLANATIONS
I	[illegible]	15,000	mf	5.18			$77,000	
A	Power Plants	810	lin ft	95.80		$80,100		Timber crib coffer dam 810 ft long;
1	Material & Construction	5,700	cu yd	6.00	$38,200			average height 16 ft. width 80 ft.
2	Removal	5,700	"	2.00	7,600			
B	Dam	240	lin ft	86.00		13,600		Timber crip cofferdam 240 ft long,
1	Material & Construction	1,700	cu yd	6.00	10,200			average height 11'-6" width 17 ft.
2	Removal	1,700	"	2.00	3,400			
C	Spillway	100	lin ft	78.00		7,800		Timber crib coffer dam 100 ft long,
1	Material & Construction	800	cu yd	6.00	6,400			average height 16'-0", width 17'-6"
2	Removal	800	"	2.00	1,400			
D	Pumps & Pumping	6	mo	4,000.00		27,000		
1	Material & Installation		job		15,000			Estimated to require 3 pumps
2	Operation	6	mo	2,000.00	12,000			Repairs after floods, maintenance, etc.
II	[illegible] Spillway Dam	16,360	cy conc	16.00			$61,000	Max. height of dam to top of bridge
A	Excavation	11,600	cu yd	2.40		28,000		134 ft. Piers 25' wide, 13'6" c. to c.
1	Loose Rock	10,000	"	2.00	20,000			Length of dam 160'.
2	Solid Rock	1,600	"	5.00	8,000			
B	Concrete	16,360	"	18.18		114,060		Concrete for
1	" spillway section	16,200	"	18.10	$12,000			Spillway Section 1 , 2 , 6 min.
2	Piers	160	"	16.00	1,800			Cement 1.1 bbl @ $3.60 Sand 0.44
C	Bridge	160	lin ft	9.06		1,448		Cu yd @ $1.30 @ $0.60 Building stone 0.1 cu yd
1	Steel	9	tons	121.66	1,218			@ $6.00 @ $0.80 Gravel & rock 0.9 cu yd
	(a) Contract Price	9	"	80.00	(720)			@ $3.05 = $2.75 Surcharge @ $0.35
	(b) Freight, Handling & Hauling	180	cwt	1.00	(180)			Materials = 7.66
	(c) Erection	9	tons	30.00	(225)			Forms @ 8.00
2	Flooring	0.7	M.F.B.M.	60.00	80			Miscellaneous 1.44
D	Gates & Chute		job			4,000		$18.10 per cu yd 1:3:6 mix
1	Wooden Gates	15.5	M.F.B.M.	60.00	880			10 Wooden Gates 10 ft high
2	Log Chute Gate		job		600			10'-6" Clear Openings and
3	Temporary Sluice gates	1.7	M.F.B.M.	60.00	118			One 6' x 10' log gate
4	Bar & Rack for wooden gates		job		2,400			

PREPARED [redacted]
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APPROVED [redacted]

Preliminary Cost Analysis

[redacted]

July 26, 19[illegible]
Sheet No. 8

ITEM	ARTICLE	QUANTITY	UNIT		TOTALS		DESCRIPTION AND DATA AUTHORITIES
			Cost	Item	Divisions	Group	
II	CONCRETE SPILLWAY DAM (Contd)						
4	(a) Contract Price	1	ea	..	(2,000)		One 9 ton electrically operated
	(b) Freight, Hauling & Hauling	60	cwt	2.50	(150)		hoist for handling service gates
	(c) Erection	2	ton	50.00	(100)		on crest of dam spillway
5	Ice Gate Hoist	1	ea		900		
	(a) Contract Price	1	"	800.00	(800)		One ton ton electrically operated
	(b) Freight, Hauling & Hauling	30	cwt	2.50	(65)		hoist for ice and trash gate
	(c) Erection	1.25	ton	80.00	(35)		
6	Miscellaneous		job			13,400	
III	GENERATING STATION	258,000	cu ft	1.84		438,000	Generating Station built on downstream face
A	Substructure	82,000	cu yd B.	10.25		358,900	of dam. Substructure contains water conduits
1	Excavation	38,500	cu yd	4.17	80,500		Superstructure, steel frame, brick curtain
(a)	Loose Rock	26,000	"	2.00	(64,000)		walls 102' X 56'-6" X 89' high. Building
(b)	Solid Rock	1,300	"	5.00	(6,500)		superstructure built sufficiently strong to
2	Concrete	82,000	"	13.50	594,000		support the 75 ton station crane and the 75
3	Rock fill	1,400	"	1.00	1,400		ton crane on the roof.
B	Superstructure	258,000	cu ft	0.32		71,500	
1	Steel	175	ton	166.00	29,550		
(a)	Contract Price	175	"	100.00	(17,500)		
(b)	Freight, Hauling & Hauling	3,500	cwt	1.50	(5,250)		
(c)	Erection & Painting	175	ton	56.00	(9,150)		
2	Brick	375	M	60.00	16,500		
3	Windows & Doors	8,400	sq ft	1.50	8,400		Steel sash, windows & doors
4	Roofing	3,500	"	1.50	5,500		
5	Lighting		job		5,000		Including fixtures, wire & conduits
6	Plumbing		"		3,000		
7	Painting		"		1,000		
8	Stairs, Gratings, etc.		"		2,000		
9	Heating		"		5,000		
B	Miscellaneous		"			30,550	

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Estimated Cost Analysis

[illegible] POWER & LIGHT COMPANY
[illegible]

July 26, [illegible]
Sheet [illegible] 4

INDEX	ARTICLE	Quantity	UNIT			TOTALS		
			Unit	Cost $	Item	Section	Group	
W	INTAKE	18,000	cu	8.80			188,000	
A	Excavation Solid Rock	100	cu yd	8.00		800		Loose rock excavation included in station
B	Concrete	3,040	" "	16.55		50,600		Concrete includes only piers, balance included in station
C	Screens, Gates & Guides	160	ton	340.00		55,600		
1	Contract price	160	"	180.00	22,640			8 Sets of screens 12'-0" x 42'-0" high with a concrete curtain wall to prevent the entrance of floating ice and trash into the turbines.
2	Freight, Handling & Hauling	3,000	cwt	1.80	4,320			
3	Erection	160	ton	70.00	7,000			
D	Gate Hoist		job			20,000		Each gate hoist consists of 2 floor stands & 2 steel stems of 110,000# capacity on each stem. These hoists are motor operated but arranged for hand operation and remote and near control.
1	Contract Price	2	each	9,400.00	18,800			
2	Freight, Handling & Hauling	370	cwt	2.30	848			
3	Erection	16.5	ton	14.00	372			
E	Screen Hoist		job			8,880		One electrically operated monorail twin of 16,000 # capacity with motor operated trolley.
1	Contract Price	1	each		5,400			
2	Freight, Handling & Hauling	62	cwt	2.60	160			
3	Erection	3	ton	10.00	30			
F	Gate and Screen House	32,000	cu ft	0.82		26,256		Screen house is 4 x 46 x 20' high built of concrete with steel frame to give operators and screens protection from weather
1	Steel	14	ton	167.00	2,340			
	(a) Contract Price	14	"	100.00	(1,400)			
	(b) Freight, Handling & Hauling	800	cwt	1.80	(480)			
	(c) Erection	14	ton	38.00	(490)			
2	Brick	100	M	60.00	6,000			
3	Windows & Doors	1,100	sq ft	1.60	1,760			Steel mesh, windows & doors.
4	Roofing	1,950	" "	1.80	3,510			
5	Lighting		job		840			Including fixtures, wires & conduits.
7	Painting		"		800			
8	Wooden Floor	2.4	M.F.B.M.	60.00	144			
M	Miscellaneous		job			9,166		
V	Tailrace						87,000	
A	Excavation	12,700	cu yd	2.00	25,400			
M	Miscellaneous		job		1,600			

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PREPARED [illegible]
CHECKED [illegible]
APPROVED [illegible]
Estimated Cost Analysis

[illegible]

July 24 [illegible]

ITEM	ARTICLE	Quantity	Unit	Unit Cost	Item	TOTALS Division	Group	DESCRIPTION
VI	MECHANICAL EQUIPMENT	22,000	hp	8.20			178,000	Two 10,500 hp vertical reaction turbines
A	Turbine & Governor	22,000	"	6.80		136,600		utilizing 1250 cec. ft. under a net head
1	Contract Price	21,000	"	5.78	121,000			of 90 ft at 187 rpm. Generals Electric steel
2	Freight, Handling & Hauling	6,000	cwt	2.20	9,400			direct connected to 7500 kw generators. A
3	Erection	200	ton	84.00	8,200			by-pass having a capacity of 500 c.f.,
B	Hydraulic Operated Plunger Valve		job			14,625		controlled by a plunger valve, is provided
1	Contract Price	37.5	ton	404.00	13,800			to supply water below the development in
2	Freight, Handling & Hauling	550	cwt	2.45	1,800			case the units were not operating
3	Erection	37.5	ton	30.00	825			
C	Governor and Lubricating Oil System	21,000	hp	.24		5,050		
D	Coupling & Indicating Devices	21,000	"	.16		3,360		
E	Testing	2	Units	2,500.00		5,000		
M	Miscellaneous					8,875		
VII	GENERAL STATION EQUIPMENT	18,000	hp	1.90			60,000	One 75 ton electric crane for lift city
A	Power House Crane		job			21,660		one auxiliary hoist for handling light
1	Contract Price	1	ea		18,000			weight apparatus in the station.
2	Freight, Handling & Hauling	900	cwt	2.30	2,070			
3	Erection	48	ton	78.00	1,870			
B	Gantry Crane		job			10,110		One 75 ton electric gantry crane with [illegible] ft
1	Contract Price	1	ea		9,000			on top of power house roof for handling
2	Freight, Handling & Hauling	250	cwt	1.32	330			apparatus in or out of the station from the
3	Erection	10	ton	84.00	840			railroad siding.
C	Passenger Elevator		job			3,000		
D	Machine Shop Equipment		"			2,000		Lathes, drill press, forge & misc. tools
M	Miscellaneous		"			1,868		& building
VIII	LOCOMOTIVE ELECTRICAL EQUIPMENT	10,000	lbs	18.00			180,000	
A	Generator	10,000	"	8.00		180,000		3 - 7500 kw 6600 V 3 ph generators
1	Material	10,000	"	9.70	112,100			
	(a) Cost f.o.b. factory	10,000	"	7.00	(108,000)			
	(b) Freight	6,000	cwt	2.40	(9,400)			
	(c) Handling & Hauling	200	ton	8.00	(600)			Cars delivered under crane

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INDEX	ARTICLE	Quantity	Unit	Cost $	Item	TOTALS Division	Group	
VIII	MINOR ELECTRICAL EQUIPMENT (Contd)							
	A Labor		job		8,000			
	B Monitors	800	km	22.00		18,000		8x100 km motor driven monitors, one being spare
	1 Material	800	"	20.00	11,800			
	(a) Cost f.o.b. Factory	800	"	24.00	(10,800)			
	(b) Freight	800	cwt	3.60	(720)			
	(c) Handling & Hauling		job		(300)			
	A Labor		"		800			
	C Switching Equipment (Incl. Switchbd) (Incl. Transf.Oil Sw.Gear & Comm.)	10,000	km	1.87		28,000		5 - Oil switches 6 - Bench panels ,7 vertical panels, 5 field
	1 Material		job		20,000			
	2 Labor		"		8,000			
	D Wire Cable & Conduits	10,000	km	.66		10,000		
	1 Material		job		6,000			
	2 Labor		"		4,000			
	E Station Service Pr. & Lgt. Equipt.	800	kva	26.70		8,000		Transformers, battery & charging set
	1 Material		job		6,000			
	2 Labor		"		2,700			
	F Testing	10,000	km	.11		1,000		
	1 Material		job		800			
	2 Labor		"		1,000			
	H Miscellaneous		"			8,000		
IX	OUTDOOR ELECTRICAL EQUIPMENT	10,000	km	8.67			180,000	
	A Transformers	24,000	kva	3.00		72,000		4x 6000 kva 66kV 13.8 kv
	1 Material	24,000	kva	2.98	68,000			
	(a) Cost fob Factory	24,000	kva	2.60	(60,000)			
	(b) Freight	2,400	cwt	2.60	(2,400)			
	(c) Handling & Hauling	800	tons	2.00	(400)			
	4 Labor		job		2,000			
	B 138 kv Oil Circuit Breakers	8	ea	12,000		96,000		1x138 kv oil cut breaker
	1 Material	8	ea	12,000	88,000			

PREPARED [illegible]
APPROVED [illegible]

Estimated Cost Analysis

[illegible] POWER & LIGHT COMPANY
[illegible] - HYDRO-ELECTRIC PROJECT
[illegible] CAPACITY - 15,000 KW

July 26, [illegible] 2
Sheet No. 7

INDEX	ARTICLE	Quantity	UNIT Unit	UNIT Cost	UNIT Item	TOTALS Division	TOTALS Other	DESCRIPTION AND EXPLANATION
22	OUTDOOR ELECTRICAL EQUIPMENT (cont'd)							
1	(a) Open Cpb Factory	8	ea	18,000	(36,000)			
	(b) Freight	400	cwt	2.40	(960)			
	(c) Hauling & Hanling	20	ton	2.00	(40)			
2	Labor		job		1,000			
3	Air Break Switches, Buses & Insul.		"			8,000		
1	Material		"		5,000			
2	Labor		"		1,000			
5	Transformer Handling Equip. & Erectn		"			8,000		Transfer Car $1800. Frame $600
1	Material		"		5,700			Lifting jaws $300, Freight & Handling $200
2	Labor		"		800			
6	Steel supporting Structure					8,000		
1	Material	20,000	lb	.10	6,000			
2	Labor		job		2,000			
7	Transformer cooling system		"			5,000		
1	Material		"		3,000			
2	Labor		"		2,000			
8	Insulating Oil System		"			7,000		
1	Material		"		6,000			
2	Labor		"		1,000			
11	Terminations (installed)	100	cu yd	40.		4,000		
12	Grading		job			1,000		
13	Miscellaneous					6,000		
1	REINFORCEMENTS TO UNDERSEA	10,000	lb	5.75			56,000	
A	Warehouse & Machine Shop		job			4,800		
B	Oil and Battery House		"			4,000		
C	Grading & Planting		"			4,000		
D	Permanent Roads & Roads	0.8	mi	25,000		4,600		
E	Fencing		"			650		
F	Water Supply		"			2,850		Tank & Piping for station & Cottages
G	Sewerage Disposal System		"			1,550		

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APPROVED	

Preliminary Cost Analysis

YEAR BOOK A LICENSE APPLICANT

July 26, 19[illegible]

8 Sheets No. 8

LINE	ARTICLE	Quantity	UNIT		TOTALS			DESCRIPTION AND DATA AND
			Unit	Cost $	Item	Division	Group	
1	DEVELOPMENT OF SOURCES (Cont'd)							
	A Lighting		LS			450		
	B Operators Dwellings		"			30,000		
	M Miscellaneous		"			5,100		
20	TOTAL MATERIAL AND LABOR	15,000	kw	100.00			1,500,000	
21	LAND & [illegible]	2,500	acres	80.00			250,000	
21.1	SURVEYS AND INVESTIGATIONS		job				75,000	Preliminary surveys & Studies & Construction
22	CONSTRUCTION PLANT	1,500,000	$	7.0			105,000	Surveys
23	ENGINEERS AND OFFICES	1,000,000	$	1.0			10,000	
24	CAMP, COMMISSARY AND HOSPITAL	1,000,000	$	1.0			10,000	
25.1	SUPERINTENDENCE & GENERAL	1,000,000	$	4.0			40,000	Field office expense, damages, taxes, etc.
25.11	ENGINEERING	1,700,000	$	5.0			120,000	Design & field engineering
26	CONTINGENCIES	1,000,000	$	5.0			95,000	
28	CONSTRUCTION FUND	1,000,000	$	4.4			40,000	
29.1	ADMINISTRATION AND LEGAL	1,000,000	$	1.0			10,000	
29.11	INTEREST DURING CONSTRUCTION	1,000,000	$	6.6			110,000	
29.111	TOTAL COST	15,000	kw	$160.00			2,400,000	
		21,000	kw	114.10				
		30,000	kw	100.00				

This estimate is a part of Application for license made by the undersigned this 10 day of August 1928

Utah Power & Light Company

By [signature]
Vice President

Attest [signature]
Assistant Secretary

Exhibit

Filed in Triplicate

EXHIBIT "O"

STATEMENT OF THE TIME DESIRED FOR COMPLETING CONSTRUCTION OF THE PROJECT WORKS.

.....

To accompany Application for License under Act of June 10,1920.

.....

SODA PROJECT

BEAR RIVER, IDAHO

UTAH POWER AND LIGHT COMPANY

.....

EXHIBIT "O"

Responding to Regulation 4-Sec. 15.

APPLICATION FOR LICENSE—SOMA PROJECT

NEAR RIVER, IDAHO——UTAH POWER AND LIGHT COMPANY

****

Statement of time desired for construction.

Construction work, which gives an estimated capacity of 2,300 hp as set forth in this application as Exhibit "1", will be commenced as soon as possible after license is secured, and, it is hoped completed within two years after that date.

This statement is a part of application for license made by the undersigned this 15 day of August 1922.

UTAH POWER AND LIGHT COMPANY

By _____
Vice-President

Attest:

_____
Assistant Secretary

I, O. C. Merrill, Executive Secretary of the Federal Power Commission, do hereby certify that the following is a true and correct copy from the record of the proceedings of the Commission in my custody of that portion of the minutes of the Eighteenth meeting of the Commission, held on the 20th day of May, 1921, which refers to the application of the Utah Power & Light Co., of Salt Lake City, Utah, (Project No. 20).

2. In the matter of the application of the Utah Power & Light Co., of Salt Lake City, Utah (project No. 20), it was voted that a preliminary permit for a period of two years and nine months be issued for four proposed power developments on Bear River in southeastern Idaho; that the permittee be required to file an application for a license on or before December 1, 1923, and that the permit when issued be subject to the provisions of the act, to the rules and regulations of the Commission, and to the following special conditions recommended by the executive secretary.

(a) That the permittee install such gauges as may be necessary to determine the stream flow of Bear River and the amount of water held in or drawn for storage.

(b) That the permittee sink such test pits or make such other foundation explorations as may be necessary to determine the character of the foundations at each of the proposed dams and power houses.

(c) That if license be issued it be for a period of 50 years and subject to the rules and regulations in force at the time of the issuance of permit.

Witness my hand and seal of the Federal Power Commission at Washington, D. C., this third day of May, 1922.

O. C. Merrill

Executive Secretary.

FEDERAL POWER COMMISSION
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JUL 7 1921
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THE FEDERAL POWER COMMISSION

Preliminary Permit

Project No. 20, Idaho

Utah Power and Light Company

WHEREAS, by Act of Congress, approved June 10, 1920 (41 Stat.,1063) designated therein as "The Federal Water Power Act" and hereinafter called "the Act", the Federal Power Commission, hereinafter called "The Commission," is authorized and empowered, inter alia, to issue preliminary permits for the purpose of enabling applicants for a license under the Act to secure the data and to perform the acts required of such applicants by Section 9 of the Act; and

WHEREAS, the Utah Power and Light Company, hereinafter called "the Permittee," a public service corporation organized and existing under the laws of the State of Maine and having its office and principal place of business in the city of Salt Lake City, in the State of Utah, is an applicant for a license under the Act, and, in order to maintain priority of application therefor while securing the data and performing the acts aforesaid and to comply with the rules and regulations of the Commission with respect to applications for license, filed in due form with the Commission on the fifteenth day of November, 1920, an application for a preliminary permit for a proposed power project, designated as Project No. 20, on the records of the Commission, located in the vicinity of Preston, in the Counties of Bannock, Caribou, and Franklin, State of Idaho, and involving certain public lands and reservation of the United States, all as hereinafter described; and

WHEREAS, the Permittee has submitted satisfactory evidence of its incorporation, of its right to perform within said State of Idaho the acts necessary for the purposes of this permit, and of its ability to finance the preliminary work and the proposed project; and

WHEREAS, notice of said application has been given and published by the Commission as required by Section 4 of the Act; full opportunity has been given all interested parties to be heard; and no application for said proposed project, or in conflict therewith, has been filed by any State or municipality; and

WHEREAS, it appears that said proposed project, as hereinafter described can be developed into and adapted to a comprehensive scheme of improvement and utilization for the purposes of water-power development and of other beneficial public uses; and that neither the permit nor the license applied for will interfere or be inconsistent with the purpose for which said reservation was created; and

WHEREAS, the Permittee on the twenty-fifth day of June, 1921, pursuant to an authorization of its Board of Directors, hereto attached, accepted in writing the terms and conditions of this permit.

NOW, THEREFORE, the Permittee is hereby granted a preliminary permit for the sole purpose of maintaining priority of application for a license under the terms of the Act while making examinations and surveys, preparing maps, plans, specifications, and estimates, and making financial arrangements; said permit being subject to all the terms and conditions of the Act, to the rules and regulations of the Commission pursuant thereto, which said rules and regulations are hereto attached and made a part hereof, and to the following express conditions, to wit:

Article 1. The priority granted hereunder shall be for a period of thirty-three (33) months from the date of issuance hereof, and for a proposed project described as follows:

A. Dams and Reservoirs,-

1. A dam across Bear River in NE¼, Sec. 18, T. 9 S., R. 41 E., B. B. & M., forming Soda Point Reservoir, a portion of which involves vacant land and land within the Cache National Forest.

2. A dam across Bear River in NE¼, Sec. 31, T. 9 S., R. 41 E., B. B. & M., forming Lava Reservoir, a portion of which involves vacant land and land within the Cache National Forest.

3. A dam across Bear River in SE¼, Sec. 3, T. 14 S., R. 40 E., B. B. & M., forming Harrows Reservoir, a portion of which involves vacant land.

4. A dam across Bear River in SE¼, Sec. 16, T. 14 S., R. 40 E., B. B. & M., forming Mink Creek Reservoir, a portion of which involves vacant land.

B. Power Houses,-

A Power house with necessary generating and accessory equipment to be located within or adjacent to each dam; all as located and described by certain maps and data filed with and made a part of said application for preliminary permit.

Article 2. The Permittee shall on or before the first day of December, 1923, file with the Executive Secretary of the Commission at Washington, District of Columbia, or with such other officer or agent of the Commission, or

at such place, as may be designated by the Commission, and in the manner prescribed by said rules and regulations, an application for a license for said proposed project and for the use and occupancy of such lands or other property of the United States as may be required in the construction, maintenance, or operation thereof.

Article 3. The Permittee shall make such engineering and other investigations, secure such data and perform such acts as will enable it to submit to the Commission on or before the date named in Article 2 hereof, such maps, plans, specifications, or estimates of cost as may be required for a full understanding of the proposed project; and shall supply for the use of the Commission correct copies of engineering reports and of any other information secured in connection with such investigations when and as they are submitted to the Permittee. Such investigations shall include the following special matters:

A. The Permittee shall install within ninety (90) days from the date of issuance hereof, and thereafter maintain, standard staff, or recording gages at such points as may be necessary to determine the stage and available flow of Bear River and the amount of water held in and drawn from storage; shall provide for periodic readings of such gages and for the adequate rating of Bear River at such points. The installation of gages, the ratings of said river and the determination of the flow thereof, shall be made in cooperation with the United States Geological Survey and under the supervision of its district engineer having charge of stream-gaging operations in the region of said project; and the Permittee shall reimburse the said United States Geological Survey for expenses incurred in such cooperation and supervision, or

for such part thereof as said district engineer may deem equitable in the circumstances. The Permittee shall keep accurate and sufficient record of the foregoing determinations to the satisfaction of the Commission, shall make return of such records at the time of filing application for license as aforesaid, and at such other times as the Commission may require, and in such form as the Commission may prescribe.

B. The Permittee shall sink such test pits or make such borings or other foundation explorations as will make available sufficient information relating to character of foundations for each of the said dams and power houses to permit of the designing of such dams and power houses in accordance with good engineering practice and the checking of their safety, adequacy, and desirability in the development of the resources involved. The work outlined in this paragraph shall be started within sixty (60) days from the date of acceptance hereof, and shall thereafter be prosecuted diligently to completion.

Article 4. License will be issued for said proposed project only if it appears that the scheme of development proposed in said application for license will be best adapted to the improvement and utilization of the site for purposes of water-power development and of other beneficial public uses. In reaching decision thereon, the Commission will consider:

A. Whether the maps, plans, and specifications are such:

(1) That full, practicable utilization will be made of the water, storage possibilities, and the head at the sites to be developed.

(2) That the structures shall be safe and in accordance with good engineering practice.

(3) That all unnecessary energy losses, whether in hydraulic works or in mechanical or electrical equipment, will be avoided.

B. Whether in relation to existing or probable future projects upon the same or adjacent streams, the fullest practicable utilization of the water, storage possibilities, and head available will be made possible.

C. Whether said project will be in general accord with the most beneficial utilization of the water for navigation, water power, irrigation, or other beneficial public uses, and for aiding flood control, reclamation, and similar developments.

D. Whether proper provision is made for present or future electrical interconnection with other projects or systems in order to take advantage of diversity of stream flow and of power demands.

E. Whether the use to which the power will be devoted is, in general, in accord with the needs of the community and of the public welfare.

F. Whether the applicant is financially able to carry out the development.

G. Whether the construction, maintenance, and operation of the proposed project works will interfere or be inconsistent with the purpose for which any reservation was created or acquired.

Article 5. The priority granted hereunder will be lost if the Permittee fails to fulfill the requirements of this permit, if the permit is cancelled by order of the Commission, or if in the course of consideration by the Commission of said application for license, the Permittee shall not on or before the expiration of the period hereof, or such later date as may be fixed by the Commission:

A. File data required by the Commission in addition to that contained in or furnished with said application; or

B. Present satisfactory evidence of ability to carry out the plan as set forth in said application; or as required to be modified by the Commission; or

C. Accept the conditions of the proposed license; or

D. Modify its plans as may be required by the Commission if the project adopted as disclosed in said plans is not such as in the judgment of the Commission based upon the considerations set forth in Article 4 hereof will be best adapted to a comprehensive scheme of improvement and utilization for the purposes of navigation, of water-power development, and of other beneficial public uses.

Article 6. The Permittee shall keep accurate and dependable records of all expenditures made for the purposes authorized herein; and in the event that a license is issued for said proposed project covered in whole or in part by this permit, any and all items properly includible in the actual legitimate cost of said project, representing expenditures made before the date of the license, shall be supported by proper vouchers or other records, the same as would have been required of a licensee had no preliminary permit

been issued; and any such vouchers or records, or certified copies thereof, in support of any item properly includible in the cost of said project shall become a part of the records of said project and shall be kept and retained by the Permittee in the manner required by the Commission. A report of all such expenditures, in such detail as the Commission may require, shall be submitted promptly when called for by the Commission.

Article 7. If license is issued for said proposed project it shall be subject to the rules and regulations of the Commission in force at the date of issuance hereof; and, subject to the provisions of Sections 15, 16, and 26 of the Act and of the last proviso of Section 14 of the Act, shall be for a period of fifty (50) years.

Article 8. This permit confers no authority upon the Permittee to occupy or use Public lands or other property of the United States for purposes of construction unless specific permission is given by the Commission for such occupancy or use; and neither the granting of such authority nor the performance of construction work whether with or without such authority shall be deemed to have created any equities or to have established any rights with respect to issuance of license, beyond what would have been created or established had such authority not been given or such work not been performed.

Article 9. This permit is not transferable and may be cancelled by order of the Commission upon failure of the Permittee in good faith to begin or diligently to prosecute the investigations contemplated herein, or to comply with any other conditions hereof.

I IN WITNESS WHEREOF, the Federal Power Commission has caused its name and seal to be hereunto signed and affixed by O. C. Merrill, its Executive Secretary, this 6th day of July, 1921.

FEDERAL POWER COMMISSION

By O. C. Merrill
Executive Secretary.

(SEAL)

In testimony of the acceptance of the foregoing permit and of the conditions therein imposed, the Permittee has caused its name and corporate seal to be hereto signed and affixed this Twenty fifth day of June, 1921, by Lafayette Hanchett, its President, pursuant to a resolution of its Board of Directors, dated this Tenth day of June 1921, a certified copy of the record thereof being hereto attached.

UTAH POWER & LIGHT COMPANY.

By Lafayette Hanchett
President

(SEAL)

Attest:

Secretary.

RESOLVED, that this Company does hereby accept the "Preliminary Permit" issued, or to be issued, by the Federal Power Commission for "Project No. 20, Idaho, Utah Power & Light Company," with all the terms and provisions of said permit, as contained in the draft submitted to the officials of this Company, and the President of this Company is hereby authorized to execute, and the Secretary is authorized to attest, such acceptance of said permit as is prescribed by the Federal Power Commission as evidence of this acceptance, pursuant to this resolution.

- - - - - - - - - -

I, Geo. B. Thomas, Secretary of the Utah Power & Light Company, hereby certify that the foregoing is a true and correct copy of a resolution adopted by the Board of Directors of the Utah Power & Light Company at a meeting held June 10, 1921.

FEDERAL POWER COMMISSION
RECEIVED
NOV 15 1920
MAILS AND FILES

EXHIBIT "A"

CERTIFIED COPY, CERTIFICATE OF ORGANIZATION

UTAH POWER AND LIGHT COMPANY

* * * * * *

To accompany application for preliminary permit under Act of June 10, 1920.

FOUR BEAR RIVER SITES.
IDAHO.

Form 1. 1-17-49

State of Maine.

Department of State

L. Ernest Thornton, Deputy

I, Frank W. Ball, Secretary of State, ~~certify that~~ of the State of Maine, and as such custodian of the Great Seal of said State which is hereunto affixed, hereby certify that the foregoing pages numbered 1 - 11, inclusive, constitute a true copy of the original certificate of organization, together with all amendments thereof taken from the records of this office; that said corporation is and has been from the time of filing a copy of the record of said certificate, which said copy was duly filed according to law as shown on page 11 of said certificate, a duly organized and existing corporation under the laws of this state; that said amendments became effective upon the day of filing as shown by copy of the record of filing as set forth at the bottom of pages 1 to 5, both inclusive.

In Testimony Whereof, I have caused the Great Seal of the State to be hereunto affixed. GIVEN under my hand at Augusta, this twenty-eighth day of May in the year of our Lord one thousand nine hundred and twenty and of the one hundred and forty-fourth year of the Independence of the United States of America.

L. Ernest Thornton, Deputy Secretary of State.

EX. A.

Augusta, Maine, November 14, 1912.

To the Honorable Secretary of the State of Maine.

I, Joseph Williamson, Clerk of UTAH POWER & LIGHT COMPANY, hereby certify that at a legal meeting of the stockholders of said Company held at its principal office in this city this day, the following resolutions were unanimously adopted by all the issued capital stock of said Company:

WHEREAS, it appears that the amount of capital stock of this corporation is insufficient for the purpose for which said corporation is organized, therefore, be it

RESOLVED, that the capital stock of this corporation be increased from $1,000, divided into 10 shares of the par value of $100 each, to $40,000,000 divided into 400,000 shares of the par value of $100 each, which shares shall have such preferences as may be stated in the by-laws.

RESOLVED that the Clerk of the Company be and he is hereby authorized and directed to file the required certificate of the foregoing increase with the Secretary of the State of Maine.

ATTEST:

Jos. Williamson
Clerk.

STATE OF MAINE.
Office of Secretary of State
Augusta, Nov. 15, 1912.
Received and filed this day.
ATTEST:

J. E. Alexander
Deputy Secretary of State.

Recorded Vol. 9 Page 492.

Augusta, Maine, January 25, 1913.

To the Honorable Secretary of the State of Maine:

I, Joseph Williamson, Clerk of STATE POWER & LIGHT COMPANY, hereby certify that at a legal meeting of the stockholders of said company held at its principal office in this city this day, the following preamble and resolutions were unanimously adopted by vote of all the issued stock of said company:

WHEREAS, it appears that the amount of capital stock of this corporation is insufficient for the purpose for which said corporation is organized,

Therefore, be it

RESOLVED that the capital stock of this corporation be increased from $40,000,000, divided into 400,000 shares of the par value of $100 each, to $45,000,000, divided into 450,000 shares of the par value of $100 each, which shares shall have such preferences as may be stated in the by-laws.

RESOLVED that the Clerk of the Company be and he is hereby authorized and directed to file the required certificate of the foregoing increase with the Secretary of the State of Maine.

ATTEST:

Joseph Williamson
Clerk.

STATE OF MAINE.
Office of Secretary of State,
Augusta, Jan. 25, 1913.
Received and filed this day.
ATTEST:

J. E. Alexander.
Secretary of State.

Recorded Vol. 9 Page 558.

Augusta, Maine, January 29, 1913.

To the Honorable Secretary of the State of Maine:

I, Joseph Williamson, Clerk of UTAH POWER & LIGHT COMPANY, hereby certify that at a legal meeting of the stockholders of said Company held at its principal office in this city this day, the following preamble and resolutions were unanimously adopted by vote of all the issued capital stock of said Company:

WHEREAS it appears that the number of Directors of this Company is inconvenient for the transaction of its business,

THEREFORE BE IT RESOLVED that the number of Directors of Utah Power & Light Company be increased from five to fifteen; and be it further

RESOLVED that the Clerk of said Company be and hereby is authorized and directed to file the required certificate of such change in the number of Directors with the Secretary of State of the State of Maine.

ATTEST:

Joe. Williamson
Clerk.

STATE OF MAINE.
Office of Secretary of State.
Augusta, Jan. 29, 1913.
Received and filed this day.
ATTEST:

J. E. Alexander
Secretary of State.

Recorded Vol. 9 Page 564.

Augusta, Maine, October 15, 1916.

TO THE HONORABLE SECRETARY OF THE STATE OF MAINE:

I, Ernest L. Nelson, Clerk of UTAH POWER & LIGHT COMPANY, hereby certify that at a legal meeting of the stockholders of said Company, held at its principal office in this city this day the following resolutions were unanimously adopted by the vote of 384,445 shares of the capital stock of this Company:

WHEREAS, it appears that the amount of capital stock of this corporation is insufficient for the purposes for which said corporation is formed,

THEREFORE, BE IT RESOLVED:

That the authorized capital stock of this Company be and it hereby is increased from $45,000,000 divided into 450,000 shares of the par value of $100 each to $60,000,000 divided into 600,000 shares of the par value of $100 each; and

BE IT FURTHER RESOLVED:

That the capital stock of this Company shall consist of 600,000 shares of the par value of $100 each, of which 150,000 shares shall be preferred stock, 100,000 shares shall be second preferred stock and 350,000 shares shall be common stock, with the rights, privileges and preferences as in the by-laws now stated; and

BE IT FURTHER RESOLVED:

That the Clerk of the Company be and he is hereby authorized and directed to file the required certificate of the foregoing increase of stock with the Secretary of the State of Maine.

ATTEST:

Ernest L. Nelson

Clerk.

STATE OF MAINE.
Office of Secretary of State.
Augusta, Oct. 15, 1916.
Received and filed this day.
ATTEST:

John E. Bunker
Secretary of State

Recorded Vol. 11 Page 488.

UTAH POWER & LIGHT COMPANY.

Certificate of Change of Number of Directors.

TO THE HONORABLE SECRETARY OF THE STATE OF MAINE:

I, ERNEST L. McLEAN, clerk of Utah Power & Light Company, hereby certify that at a legal meeting of the stockholders of said Company, held at its principal office in the City of Augusta, Maine, on the 21st day of February, 1917, the following preamble and resolutions were unanimously adopted by a vote of the stockholders of said corporation holding 386,553 shares, being more than a majority of the issued capital stock of said corporation:

"WHEREAS the stockholders of this Company find that the number of directors of this Company is inconvenient for the transaction of its business,

THEREFORE, BE IT

RESOLVED that the number of directors of Utah Power & Light Company be increased from fifteen to seventeen; and

BE IT FURTHER

RESOLVED that the clerk of said Company be and hereby is authorized and directed to execute and file with the Secretary of State of the State of Maine, a certificate of such change in the number of directors."

IN WITNESS WHEREOF I have hereunto set my hand this twenty-first day of February, 1917.

Ernest L. McLean
Clerk.

STATE OF MAINE.

Office of Secretary of State,

Augusta, Feb. 21, 1917.

Received and filed this day.

ATTEST:

Frank W. Ball.
Secretary of State

Recorded Vol. 12 Page 54.

to buy, sell, lease and use machinery, generators, motors, lamps, apparatus, devices, supplies and articles of every kind pertaining to or in any wise connected with the production, use, distribution, regulation, control or application of electricity or electrical apparatus for light, heat, power, telegraph, telephone, railway, manufacturing and any and all other purposes; to construct, acquire, purchase, use, sell or lease any works, construction or plants or parts thereof connected with or involving the production, use, distribution, regulation, control or application of electricity or electrical apparatus for any of such purposes; to buy, acquire, lease, use, produce, furnish and supply electricity or any other power or force, in any form and for any purpose whatsoever.

To acquire, build, construct, own, lease and operate railway properties of all kinds and descriptions (including parks, places of amusement and other usual or useful adjuncts to said railway property and business) and with any kind of motive power, and to sell and lease the same;

To manufacture, purchase, sell and distribute, for light, heat and power and all other purposes, natural and artificial gas, and to acquire, construct, purchase, own, maintain, operate, sell and lease all necessary and convenient works, conduits, plants, apparatus, and connections for holding, receiving, purifying, manufacturing, selling, utilizing and distributing natural or artificial gas; to manufacture and sell or otherwise dispose of chemicals or other products derived wholly or in part from gas or gas works.

To manufacture, purchase, sell and distribute steam and hot water for heating and other purposes, and to acquire, construct, purchase, own maintain, operate, sell and lease all necessary and convenient works, plants, apparatus and connections for manufacturing, selling and distributing steam and hot water;

To construct and acquire by purchase, lease or otherwise, reservoirs dams, canals, ditches, flumes, pipe lines and such other works, plants, equipments, appliances and apparatus as may be necessary, useful or appropriate for impounding, storing, conveying, distributing, and utilizing water for power, irrigation, fire,

-/-

sanitary, domestic, manufacturing and other uses, and to use, apply, sell and otherwise dispose of water for such uses; to construct and to maintain by condemnation, lease or otherwise, and to operate hydraulic and other works, transmission plants, transmission lines, transformer and distribution stations and distributing circuits and any and all rights of way connected therewith or useful therefor; to transform the power generated by hydraulic or other plants into electrical or other energy, and transmit, use or otherwise dispose of the said electrical or other energy for any and all purposes; to acquire any and all rights or other property necessary or useful in connection with acquiring, owning, and operating any or all of said plants;

To acquire, buy, operate, lease and sell ice and refrigerating plants; and to acquire, lease, hold, use and otherwise avail of such real and personal estate, property, rights, privileges, grants, consents and franchises, including inventions, patents, processes, stocks, bonds and other evidences of indebtedness of persons, firms or corporations, and franchises or special grants or privileges from cities, towns or other municipalities, as the company shall deem requisite or advantageous in pursuance of any of its corporate purposes above stated; and to mortgage, pledge, sell, convey or otherwise dispose of any or all of the foregoing; and to undertake, contract for or carry on any business or operation deemed by the company incidental to, or in aid of, or advantageous in pursuance of, any of its corporate purposes.

Nothing herein shall be deemed to limit or exclude any power, right or privilege given to the company by law.

But the business of construction and operation of railroads and aiding in the construction thereof, the business of telegraph and telephone companies, and the business of gas and electric companies are to be carried on only in states and jurisdictions other than the State of Maine, and only in such other states and jurisdictions when and where and as permissible under the laws thereof; and it is not intended that the corporations shall exercise in any state any powers not permitted to it under the law of such state.

REMARKS

No.

Names and Addresses of Directors:

Herbert S. Auerbach,
Auerbach Company,
Salt Lake City, Utah.

M. S. Browning,
First National Bank,
Ogden, Utah.

T. R. Cutler,
Utah-Idaho Sugar Company,
Salt Lake City, Utah.

L. M. Farnsworth,
Walker Brothers Bankers,
Salt Lake City, Utah.

G. E. Greenbeck,
71 Broadway,
New York City, New York.

Lafayette Hanchett,
948 Third Avenue,
Salt Lake City, Utah.

J. G. Howard,
Utah Oil Refining Company,
Salt Lake City, Utah.

Chas. Hayden,
25 Broad Street,
New York City, New York.

S. R. Inch,
Kearns Building,
Salt Lake City, Utah.

E. E. Loose,
Provo Com'l & Savings Bank,
Provo, Utah.

W. S. McCornick,
McCornick & Company,
Salt Lake City, Utah.

S. Z. Mitchell,
71 Broadway,
New York City, N. Y.

F. J. Murphy,
Salt Lake City,
Utah.

C. W. Nibley,
40 North Main Street,
Salt Lake City, Utah.

Geo. E. Thomas,
Kearns Building,
Salt Lake City, Utah.

Bulkeley Wells,
516 - 14th Street,
Denver, Colorado.

H. G. Wright,
Salt Lake City, Utah.

No.

Hydro-electric plants, transmission system, substations, distribution systems and other electrical facilities, and other property in Idaho and Utah; necessary construction funds to be provided from sale of notes, bonds and stock.

[redacted]

[redacted]

Section of Place of Diversion:

(1) From Bear River in Caribou County, Idaho, into Soda Reservoir, at a point South 8 degrees 45 minutes East 1650 feet from the quarter corner on the West boundary line of Section 15, Township 9 South, Range 41 East, B. M., in the Southeast quarter of said Section 15. A continuous flow of 1500 cubic feet per second will be diverted at this point.

(2) From Bear River in Caribou County, Idaho, and Soda Reservoir into penstocks by means of a dam located in the channel of said river at a point South 31 degrees 30 minutes West 830 feet from the Northeast corner of Section 18, Township 9 South, Range 41 East, B. M.

(3) From Bear River in Caribou County, Idaho, into Lava Reservoir at a point South 31 degrees 30 minutes West 830 feet from the Northwest corner of Section 18, Township 9 South, Range 41 East, B. M. The 1500 second feet continuous flow diverted at the points described in paragraphs (1) and (2) above and returned to the river at the point described in paragraph (1) of "D" will not be abandoned by the applicant, but will be carried in the natural channel of the stream and re-diverted at the points described in this and paragraph (4) hereof and, less such amount as may be lost by percolation and evaporation in transit, will again be used at the points described in paragraph (2) of "D".

(4) From Bear River in Bannock County, Idaho, and Lava Reservoir into penstocks by means of a dam located in the channel of Bear River at a point South 12 degrees 45 minutes East 2090 feet from the quarter corner on the North boundary line of Section 31, Township 9 South, Range 41 East, B. M.

(5) From Bear River in Franklin County, Idaho, into Cherry Reservoir at a point South 74 degrees 01 minutes East 3173 feet from the Northwest corner of Section 26, Township 15 South, Range 40 East, B. M., in the Northeast quarter of said Section 26. The 1500 second feet continuous flow diverted at the points described in paragraphs (1) and (2) above and returned to the river at the point described in paragraph (1) of "D" and re-diverted, after it returns to the river as described in paragraphs (3) and (4) above and paragraph (2) of "D", will not be abandoned by the applicant, but will be carried in the natural channel of the stream and re-diverted at the points described in this and paragraph (6) below and, less such amount as may be lost by percolation and evaporation in transit, will again be used at the points described in paragraph (5) of "D".

(6) From Bear River in Franklin County, Idaho, and Cherry Reservoir into penstocks by means of a dam located in the channel of said river at a point South 31 degrees 30 minutes West 830 feet from the Quarter corner on the North boundary line of Section [illegible], Township [illegible], Range [illegible], B. M.

(7) From Deer River in Franklin County, Idaho, into Tank Reservoir at a point North 81 degrees 30 minutes West 2400 feet from the Southeast corner of Section 16, Township 14 South, Range 40 East, B. M., in the Southeast quarter of said Section 16, [illegible] (1.0) second feet continuous flow at the points described in paragraphs (1., (2., (3., (4., (5. and (6. of "B" river at the [illegible] paragraphs (1., (2. and (3. of "B" shall not be authorized by the applicant, but will be carried in the natural channel of the stream and re-diverted at the points described in this and paragraph (6) below and, less such amount as may be lost by percolation and evaporation in transit, will again be used at the point described in paragraph (4) of "B".

(6) From Deer River in Franklin County, Idaho, and Tank Reservoir into penstocks by means of a dam located in the channel of said river at a point North 81 degrees 30 minutes West 2120 feet from the Southeast corner of Section 16, Township 14 South, Range 40 East, B. M., in the Southeast quarter of said Section 16.

REMARKS

"D"

Location of Point of Use for Power and Point of Return:

(1) The Point of use and return of the water diverted at point of diversion from Soda Reservoir, as hereinabove set out in paragraph (2), Remarks "C", is at a power house located in the dam, the center of which is located in the channel of Bear River at a point South 31 degrees 30 minutes West 830 feet from the Northeast corner of Section 18, Township 9 South, Range 41 East, B. M. The equivalent of a continuous flow of 1500 cubic feet per second will be used through the said power house for the generation of electrical energy.

(2) The point of use and return of the water diverted at point of diversion from Lava Reservoir, as hereinabove set out in paragraph (4), Remarks "C", is at a power house located in the dam, the center of which is located in the channel of Bear River at a point South 15 degrees 30 minutes East 2115 feet from the quarter corner on the North boundary line of Section 31, Township 9 South, Range 41 East, B. M. The equivalent of a continuous flow of 1500 cubic feet per second will be diverted and used for the generation of electrical energy at said power plant.

(3) The point of use and return of the water diverted from Harrows Reservoir, as hereinbefore set out in paragraph (6), Remarks "C", is at a power house to be built in the dam located in the channel of Bear River at a point South 31 degrees 55 minutes East 5240 feet from the quarter corner on the North boundary line of Section 3, Township 14 South, Range 40 East, B. M. The equivalent of a continuous flow of 1500 cubic feet per second will be diverted and used for the generation of electrical energy through the said plant.

(4) The point of use and return of the water diverted at the point of diversion from Bear River and the Mink Reservoir, as hereinbefore set out in paragraph (3), Remarks "C", is at a power plant to be built in the dam, which is located in the channel of Bear River at a point North 31 degrees 30 minutes West 2130 feet from the Southeast corner of Section 14, Township 14 South, Range 40 East, B. M. The equivalent of a continuous flow of 1500 cubic feet per second will be diverted and used for the generation of electrical energy at this plant.

"E"

(1) The water to be diverted at the place designated under Remarks "B", subdivision (2) will be diverted by means of a re-inforced concrete and masonry dam, located in the channel of Bear River at the point described in said paragraph (2). Said dam will be 42 feet high, 525 feet long on top, 100 feet long on the bottom, with openings for three penstocks through the dam, which will convey the water to generating machinery located at the dam and there used under a head of 90 feet to generate 12500 horsepower of electrical energy.

(2) The water to be diverted at the place designated under Remarks "C", subdivision (4), will be diverted by means of a re-inforced

REMARKS ..

("F" Continued)

concrete and masonry dam, located in the channel of Bear River at a point described in said paragraph (4). Said dam will be 80 feet high, 300 feet long on top, 100 feet long on the bottom, with openings for three penstocks through the dam which will convey the water to generating machinery located at the dam and there used under a head of 80 feet to generate 11000 horsepower of electrical energy.

(5) The water to be diverted at the place designated under Remarks "F", subdivision (5), will be diverted by means of a re-inforced concrete and masonry dam, located in the channel of Bear River at a point designated in said paragraph (5). Said dam will be 80 feet high, 320 feet long on top and 120 feet long on the bottom, with openings for three penstocks through the dam which will convey the water to generating machinery located at the dam and there used under a head of 80 feet to generate 3500 horsepower of electrical energy.

(6) The water to be diverted at the place designated under Remarks "F", subdivision (6) will be diverted by means of a re-inforced concrete and masonry dam, located in the channel of Bear River at the place designated in said paragraph (6). Said dam will be 75 feet high, 450 feet long on top, 120 feet long on the bottom, with openings for three penstocks through the dam which will convey the water to generating machinery located at the dam and there used under a head of 70 feet to generate 9000 horsepower electrical energy.

The reservoirs indicated in this application will be used to equalize the flow of water to the generating machinery and will not be used primarily as storage reservoirs. Released stored water from Bear Lake Reservoir will be retained in the above mentioned reservoirs for use through the power plants during the hours of maximum demand for power.

In addition to the natural flow that may be available at the points of use hereinabove set forth, said applicant is entitled to divert and use at these various sites all released stored water from Bear Lake Reservoir which it shall hereafter divert and impound in said reservoir from Bear River, Bear Lake and North or Mud Lake, under and by virtue of those certain applications made by said applicant, or its predecessors in interest, as follows:

> Those two certain appropriations made respectively on the 24th day of March and the 12th day of April, 1902, by notices posted by L. L. Munn, et. al., at the point of diversion located in the Southwest quarter of Section 7, Township 14 South, Range 45 East, Boise Meridian, and recorded in the office of the Recorder of Bear Lake County, Idaho, at pages 335 to 338 of Volume 2 of Miscellaneous Records, and pages 342 to 346 of Volume 2 of Miscellaneous Records, respectively, and filed in the office of the State Engineer of Idaho on April 7th 1902 and April 22nd 1902, respectively; License No. 8362, priority, September 11th 1912; Permits Nos. 859 and 12993; Permits Nos. 14625 and 16206, and/or such rights as may hereafter be decreed to said applicant in that certain suit in equity now pending in the District Court of the United States for the District of Idaho, Eastern Division, filed and Docketed in Equity No. 203, wherein this applicant, Utah Power & Light Company, is plaintiff, and The Last Chance Canal Company, Ltd., and others, are defendants.

FEDERAL POWER COMMISSION
RECEIVED
NOV 15 1920
MAILS AND FILES

EXHIBIT "D"

DEVELOPMENT DATA AVAILABLE AND REQUIRED

UTAH POWER AND LIGHT COMPANY

• • • • •

To accompany application for preliminary permit under Act of June 10, 1920.

FOUR BEAR RIVER SITES, IDAHO.

Proj. No. 20

EXHIBIT "D"

Responding to Regulation 3-C.

(a) The following is a statement of the nature and amount of data already available.

Soda Point: There are available -

(1) Stream flow records covering the period from 1914 to date.

(2) Topographic Stadia Survey of Reservoir Site and map on scale of 1 inch equals 500 ft. and contour interval of 5 ft.

(3) Map showing detailed topography at dam site on scale of 1 inch equals 50 ft. and contour interval of 1 ft.

(4) Diamond Drill Exploration of dam site which shows bed rock approximately 30 ft. below low water level.

Lava: There are available -

(1) Stream flow records covering the period 1914 to date.

(2) Topographic Stadia Survey and map of Reservoir Site on scale of 1 inch equals 500 ft. and contour interval of 10 ft.

(3) Map showing detailed topography at dam site on scale of 1 inch equals 50 ft. and contour interval of 5 ft.

(4) Diamond Drill Exploration of dam site which shows bed rock at river bed.

Narrows: There are available -

(1) Stream flow records of river at a point 3 miles above dam site from 1914 to date.

(2) Topographic Stadia Survey and map of Reservoir Site on scale of 1 inch equals 200 ft. and contour interval of 10 ft.

(3) Diamond Drill Exploration of dam site has been made and shows that bed rock is more than 100 ft. below

river bed and that it is impracticable to construct a masonry dam on bed rock foundation. Dam will probably be of loose rock or rock filled timber crib construction.

Mink: There are available -

(1) Stream flow records of river at a point 6 miles above dam site for period 1914 to date.

(2) Topographic Stadia Survey and map of Reservoir Site on scale of 1 inch equals 200 ft. and contour interval of 10 ft.

(3) Diamond Drill Exploration of dam site which shows that bed rock is more than 150 feet below river bed and that it is impracticable to construct a masonry dam resting on a bed rock foundation. Dam will probably be of loose rock or rock filled timber crib construction.

(b) For two of the projects, viz: Soda Point and Lava, it is thought that surveys are sufficiently accurate to determine the project boundaries, the relation of same to the public land subdivision, and to permit the determination of reservoir capacities. For the other two projects, viz: Narrows and Mink, more accurate surveys of reservoir sites and dam sites will be necessary for the making of application for license. In addition to these surveys it will be necessary to prepare the necessary maps, plans and specifications for all four projects to accompany the application for license.

This statement is a part of the application for preliminary permit made by the undersigned this Seventeenth day of June, 1920.

UTAH POWER AND LIGHT COMPANY,

By W. Mansbach
VICE PRESIDENT.

RECEIVED
NOV 15 1920
MAILS AND FILES

EXHIBIT "F"

OWNERSHIP OF LANDS AND WATER RIGHTS, ETC.

UTAH POWER AND LIGHT COMPANY

• • • • •

To accompany application for preliminary permit under Act of June 10, 1920.

FOUR BEAR RIVER SITES, IDAHO

EXHIBIT "F"

In Response to Regulation 3-E.

Proj. No. 20.

Concerning Ownership of Water Rights:-

Rights to divert water for the four sites covered by this application are included under a single application for permit, No. 20970, a certified copy of which is attached hereto and made a part hereof. Further evidence of title is shown in the final decree in the case of the Utah Power and Light Company vs. the Last Chance Canal Co., Ltd., et als, being No. 203 in Equity in the District Court of the United States of the District of Idaho, Eastern Division. Copy of this decree is attached hereto.

Concerning Ownership of Land:-

As is shown by Exhibit B, a large part of the land involved in the proposed developments is in public ownership. Small parcels otherwise owned have from time to time been acquired in fee by the applicant, but by far the greater part of the lands now in private ownership remain to be acquired. It is impossible to make any definite statement at this time because the plans are merely tentative. In general, it may be said that during the course of the surveys, and prior to the presentation of an application for license, the privately owned lands necessary to this project will be acquired, either by private negotiation or by legal process.

This statement is a part of the application for preliminary permit made by the undersigned this Seventeenth day of June, 1920.

UTAH POWER AND LIGHT COMPANY.

By [signature] Vice President.

State of Maine.

Certificate of Organization of a Corporation under the General Law.

The undersigned officers of a corporation organized at 242 Water Street, Augusta, Maine,

at a meeting of the signers of the articles of agreement therefor, duly called and held at the office of Williamson, Burleigh & McLean in the City of Augusta, Maine,

on Friday the sixth day of September, A. D. 191 2.

hereby certify as follows:

The name of said corporation is

MAINE POWER & LIGHT COMPANY.

The purposes of said corporation are

The amount of capital stock is ...re thousand dollars.

The amount of common stock is one thousand dollars.

The amount of preferred stock is nothing.

The amount of capital stock already paid in is nothing.

The par value of the shares is one hundred dollars.

The names and residences of the owners of said shares are as follows:

Names	Residences	No. of Shares. Common.	Preferred.
Joseph Williamson,	Augusta, Maine.	2	
Ernest L. McLean,	Augusta, Maine.	2	
Geoffrey Ionta,	New York, N. Y.	2	
E. M. Leavitt,	Winthrop, Maine.	2	
E. M. Hussey,	Augusta, Maine.	2	
	Total,	10	

Said corporation is located at Augusta, Maine, in the County of Kennebec.

The number of directors is five and their names are Geoffrey Konta, Joseph Williamson, Ernest L. McLean, E. M. Leavitt and E. M. Hussey.

The name of the clerk is Joseph Williamson and his residence is Augusta, Maine.

The undersigned E. M. Leavitt is president; the undersigned, E. M. Leavitt is treasurer; and the undersigned Geoffrey Konta, E. M. Leavitt and E. M. Hussey

are a majority of the directors of said corporation.

Witness our hands this sixth day of September A.D. 1912

E. M. Leavitt *President.*

E. M. Leavitt *Treasurer.*

Geoffrey Konta
E. M. Leavitt
E. M. Hussey
Directors.

KENNEBEC ss. September 6, A. D. 1912.

Then personally appeared Geoffrey Konta, E. M. Leavitt and E. M. Hussey

and severally made oath to the foregoing certificate, that the same is true.

Before me,

Joseph Williamson *Justice of the Peace.*

STATE OF MAINE.

Attorney General's Office, Sept. 6, *A. D. 1912.*

I hereby certify that I have examined the foregoing certificate, and the same is properly drawn and signed, and is conformable to the constitution and laws of the State.

W. R. Pattangall *Attorney General.*

COPY.

(Name of Corporation)

UTAH POWER & LIGHT COMPANY

Kennebec, ss.

Registry of Deeds.

Received Sept. 6 1917

at 3 h. 30 m. P. M.

Recorded in Vol. 504 Page 48

ATTEST:

L. O. Tebbetts Register.
by T. G. Tebbetts Clerk
A true copy of record.

ATTEST:

L. O. Tebbetts Register,
by T. G. Tebbetts Clerk

STATE OF MAINE.

Office of Secretary of State.

Augusta, Sept. 6 1917

Received and filed this day.

ATTEST:

J. E. Alexander Secretary of State.
Deputy

Recorded in Vol. 81 Page 509

State of Maine.

OFFICE OF SECRETARY OF STATE.

I hereby certify that the foregoing is a true copy from the records of this office.

In Testimony Whereof, I have caused the seal of the State to be hereunto affixed.

Given under my hand at Augusta, this _____ day of _____ in the year of our Lord one thousand nine hundred and _____ and in the one hundred and _____ year of the Independence of the United States of America.

_____

State of Idaho

Department of State.

I, [illegible], secretary of State of the State of Idaho, do hereby certify that I am the legal custodian of the records of the said State pertaining to all corporations, both foreign and domestic, which have qualified to do business under the laws of the State of Idaho, and of the right of such corporations to transact business in said State at the present time, and that I am the proper officer to execute this certificate.

I further certify that [illegible]

a corporation organized under and by virtue of the laws of the State of Maine, has complied with the laws of the State of Idaho, governing foreign corporations, has paid to the State of Idaho all corporation license taxes and has performed all other obligations owing by it to the State of Idaho, is a corporation in good standing in said State and is authorized and entitled to transact business and conduct its operations therein.

IN TESTIMONY WHEREOF, I have hereunto set my hand and affixed the Great Seal of the State. Done at Boise, the Capital of Idaho, this 16th day of May, 1930.

Robert E. Jones

Secretary of State.

B

EXHIBIT "B"

OFFICIAL STATEMENT OF ORGANIZATION
AND LIST OF OFFICERS AND DIRECTORS

I, C. E. Groesbeck, Vice-President of the Utah Power and Light Company, do hereby certify that the organization of said corporation has been completed; and that the corporation is authorized to proceed with the project applied for according to the existing laws of the State of Idaho (See attached certificate). I further certify that the following is a true list of the principal officers and of the directors of said corporation, with the full name and official designation of each, to wit:

Officers

Lafayette Hanchett,	President
W. S. McCornick,	Vice President
S. R. Inch,	Vice President & Genl. Mgr.
C. E. Groesbeck,	Vice President
D. F. McGee,	Vice President
E. W. Hill,	Vice President
Geo. B. Thomas,	Treas. and Secretary.
E. P. Summerson,	Asst. Secretary.
E. L. Martin,	Assistant Secretary
C. C. Parsons,	Assistant Secretary
A. C. Ray,	Assistant Treasurer
Wm. Reiser,	Assistant Treasurer
G. J. Hickman,	Assistant Treasurer

Directors

Herbert S. Auerbach
M. S. Browning
T. R. Cutler
L. H. Farnsworth
C. E. Groesbeck
Lafayette Hanchett
J. C. Howard
Chas. Hayden
S. R. Inch
C. E. Loose
W. S. McCornick
S. Z. Mitchell
P. J. Moran
C. W. Nibley
Geo. B. Thomas
Bulkeley Wells
G. G. Wright

Witness my hand and the seal of the corporation this Seventeenth day of June, 1920.

W. Mormack

Vice President.

attest
E. Summerhays
asst Secretary

Form No. 1 Proj. 1780 20. Address all communications to PROJECT 20

Utah Power & Light Company, Attention Mr. Corey,

P. O. Salt Lake City, Utah.

APPLICATION FOR PERMIT

To Appropriate the Public Waters of the State of Idaho

RECEIVED NOV 15 1920 WATER AND POWER

Application No. 20-370

Permit No. ____

District No. ____

1. Name of Applicant Utah Power & Light Company

Postoffice address Salt Lake City County Salt Lake State Utah

2. If applicant is a corporation, give:

(a) Date and place of incorporation: September 5th 1912, Augusta, Kennebec County, Maine

(b) Amount of capital stock: $60,000,000.00 (c) Amount paid in: $45,387,000. (11/30/19)

(d) Names and addresses of directors:

See Remarks "A"

II. The financial resources of the applicant are: (a) Cash on hand: $885,685.00 (Nov. 30, 1919)

(b) Treasury stock: $ None (c) Bonds to be issued: $ 76,456,000

(d) Other resources: See Remarks "B"

2. Quantity of water claimed: One thousand five hundred (1500) cubic feet per second.

3. Source of water supply Bear River which is a tributary of Great Salt Lake

4. Location of point of diversion: See Remarks "C" feet distant from the corner of Section ____, T. ____ R. ____ B. M., and is on the ____ of Section ____, T. ____ R. ____ B. M., County of ____

5. Water is to be used for: Power purposes

6. If for mining, milling, power or manufacturing purposes, give:

(a) Point of use of water: See Remarks "D" feet distant from corner of Section ____ T. ____ R. ____ B. M., in the ____ of Section ____, T. ____ R. ____ B. M.

(b) Amount of power generated: See Remarks H. P. under ____ feet head

(c) Water is to be returned to Bear River at a point See Remarks "D" feet distant from the ____ corner of Section ____ T. ____ R. ____ B. M., in the ____ of Section ____, T. ____ R. ____ B. M.

7. Estimated cost of works: $10,000,000.00

8. Kind of works: See Remarks "E"

(Reservoir, dams, canals, flumes, pipes, etc.)

9. Height of [illegible] dam; length of dam at top ____ feet; length of dam at bottom ____ feet; height of dam above bed of stream ____ feet; width of dam at top ____ feet; at bottom ____ feet; character of dam ____

10. Area to be covered by reservoir: See Remarks "F"

11. Size of reservoir, length ____ feet; breadth ____ feet; depth ____ feet; capacity ____ cubic feet or ____ acre feet.

12. Where lands to be irrigated are described by legal subdivisions, state ____

13. Description of ditch ____

14. Where lands to be irrigated are not described by legal subdivisions, state ____

12. The time required for the completion of such work .... Five (5) .... years

13. The time required for the complete application of the water to the proposed use ... Six (6) ... additional years

14. The land to be irrigated is described in the following tabulation

(Give irrigable acreage in each 40-acre subdivision. Designate ownership of land, as Government, State or Private. If Private, give names of owners.)

Twp	Range	Sec.	NE¼				NW¼				SW¼				SE¼				Totals
			NE¼	NW¼	SW¼	SE¼	NE¼	NW¼	SW¼	SE¼	NE¼	NW¼	SW¼	SE¼	NE¼	NW¼	SW¼	SE¼	

Total Number of Acres to be Irrigated..................

11 a. Is reservoir to be used? _____ If so, fill in (b) and (c) below

b. Name of reservoir and number of Storage Permit

c. Date of filing of Application for Storage Permit and Name of Applicant

Remarks:

BE IT KNOWN That the undersigned hereby makes application for permit to appropriate the public waters of the State of Idaho as herein set forth.

Utah Power & Light Company
Applicant.

By D. R. Inch
Agent.
Pocatello, Idaho

Affidavit of Permission to File on Springs.

I, _____ of _____, County of _____, State of _____, do hereby certify that I am the owner or lessee of the land on which the spring mentioned in the application of _____ is located, to-wit: _____ and that I do hereby grant unto the said _____ permission to file on the said spring as set forth in the foregoing application.

_____

STATE OF IDAHO,
County of _____ } ss.

On this _____ day of _____, 19____ before me, a Notary Public for the State of Idaho, residing at _____, personally appeared _____ known to me to be the person_____ whose name_____ subscribed to the foregoing certificate, and acknowledged to me that _he_ executed the same.

Witness my hand and seal, the day and year in this certificate first above written.

_____
Notary Public.

My commission expires _____

APPROVAL OF STATE ENGINEER

The number of this permit is

Recorded in Book ... Page ... Approved ...

This is to certify that I have examined the within application for a permit to appropriate the public waters of the State of Idaho, and hereby approve the same, subject to the following limitations and conditions:

Bond in the sum of $... to be filed on or before ...

Work to begin on or before ... and to continue diligently and uninterruptedly to completion, unless temporarily interrupted by circumstances over which the permit holder has no control.

One-fifth of the work above specified to be completed on or before ...

The whole of said work to be completed on or before ...

Beneficial use of water appropriated in accordance herewith, to be made on or before ...

Witness my hand this ... day of ... 19...

State Engineer.

PERMIT

No. ...

Filed in office of State Engineer at ... o'clock ... M., ... 19...

Recorded in Book ... of Permits at page ...

Fee for recording and application received ... $1.00

Fee for additional Sec. Ft. or fractions ... 10

Fee for approving and issuing PERMIT ...

V50 92

COUNTY OF ADA, } ss.

I, W. G. Swendsen, Commissioner of Reclamation of the State of Idaho, hereby certify the above and foregoing to be a full, true and correct copy of Application for permit to appropriate the public waters of the State of Idaho, No. 20970, filed in the Department of Reclamation, at Boise, Idaho, at 8:30 P. M. June 1, 1920.

That said application is in acceptable form and the same will be approved and permit issued in regular order, the applicant having complied with the laws of the State of Idaho relative to filing application for the appropriation of water.

IN WITNESS WHEREOF, I have hereunto set my hand and affixed the official seal of this department at Boise, Idaho, this 1st day of June, 1920.

W. G. Swendsen

Commissioner of Reclamation.

By: ...

FEDERAL POWER COMMISSION
RECEIVED
NOV 15 1920
MAILS AND FILES

EXHIBIT "G"

ABILITY OF APPLICANT TO FINANCE PROJECT

UTAH POWER AND LIGHT COMPANY

• • • •

To accompany application for preliminary permit under Act of June 10, 1920.

FOUR BEAR RIVER SITES, IDAHO.

EXHIBIT "G"

In Response to Regulation 3-F.

As to the Ability of Applicant to Finance the Project Applied For:-

The applicant is a going concern, owning and operating electric light and power properties in Utah and Idaho; also all of the issued securities of the Western Colorado Power Company and all the capital stock of the Utah Light and Traction Company.

The project applied for under the present application is not a new business venture but is to be developed in response to the growth in an already existing consumers' demand for electric energy.

This statement is a part of the application for preliminary permit made by the undersigned this Seventeenth day of June, 1920.

UTAH POWER AND LIGHT COMPANY,

By _____
Vice President.

attest:
_____
Secretary

FEDERAL POWER COMMISSION

RULES AND REGULATIONS

AS AMENDED BY ORDER No. 11
OF JUNE 6, 1921

GOVERNING THE ADMINISTRATION OF THE FEDERAL WATER POWER ACT

WITH COPIES OF THE ACT, OF
AMENDMENT THERETO, AND OF
ORDERS Nos. 1 TO 11, INCLUSIVE

FIRST REVISED ISSUE
EFFECTIVE JUNE 6, 1921

WASHINGTON
GOVERNMENT PRINTING OFFICE
1921

duplicate of rules filed earlier in this case

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PAGES 4

FEDERAL POWER COMMISSION

WASHINGTON, D. C.

AMENDMENT NO. 1 of PRELIMINARY PERMIT

Project No. 20 - Idaho

Utah Power & Light Company

FEDERAL POWER COMMISSION

Amendment No. 1 of Preliminary Permit

Project No. 20 - Idaho

Utah Power & Light Company

WHEREAS, under authority of the Federal Water Power Act of June 10, 1920 (41 Stat., 1063), the Federal Power Commission, hereinafter called "the Commission," on July 19, 1921, issued to the Utah Power & Light Company, a public service corporation organized and existing under the laws of the State of Maine, hereinafter called "the Permittee," a preliminary permit for a power project designated on the records of the Commission as Project No. 20, involving the construction of dams and reservoirs in Bear River and on lands partly within the Cache National Forest, in Rannock, Caribou and Franklin counties, Idaho, said preliminary permit providing, inter alia, that the priority of application for a license granted thereunder shall be for a period of thirty-three months from the date of issuance thereof, and that application for license shall be filed on or before December 1, 1923; and

WHEREAS, the Permittee made application on November 26, 1923, to the Commission to amend said preliminary permit by extending said period of priority and said period within which application for license shall be filed for three months subsequent to the date of expiration of said preliminary permit, to-wit: to July 19, 1924; said extension being for the purpose of enabling the Permittee to complete its plans; and

WHEREAS, Section 5 of said Act provides, inter alia,

> That each preliminary permit issued under this Act shall be for the sole purpose of maintaining priority of application

for a license under the terms of this Act for such period or periods, not exceeding a total of three years, as in the discretion of the Commission may be necessary for making examinations and surveys, for preparing maps, plans, specifications and estimates, and for making financial arrangements: and

WHEREAS, the Commission finds that the extension of the period of priority and the period within which application for license shall be filed to include July 19, 1924, which is within the total period of three years authorized by said Act, is reasonable and necessary for the purpose for which said preliminary permit was issued:

NOW, THEREFORE, pursuant to authority of the Federal Power Commission given at its meeting of December 3, 1923, a certified copy of the record thereof being hereto attached, said preliminary permit is hereby amended by extending the period of priority of application for license and the period within which application for license shall be filed to include July 19, 1924.

IN WITNESS WHEREOF, the Federal Power Commission has caused its name and seal to be hereto signed and affixed by O. C. Merrill, its Executive Secretary, at Washington, D. C., this 29th day of December, 1923.

FEDERAL POWER COMMISSION

By O. C. Merrill
Executive Secretary.

I, C. C. Merrill, Executive Secretary of the Federal Power Commission, do hereby certify that the following is a true and correct copy from the record of the proceedings of the Commission in my custody of that portion of the minutes of the sixtieth meeting of the Commission, held on the 3rd day of December, 1923, which refers to the application of the Utah Power & Light Company of Salt Lake City, Utah (Project No. 20).

> "In the matter of the application of the Utah Power & Light Company of Salt Lake City, Utah (Project No. 20), for an amendment of the preliminary permit issued on July 19, 1921, so as to extend the period thereof to include July 19, 1924, such extension being desired to continue investigational work and prepare plans: It appearing to the Commission that the extension of said period to include July 19, 1924, which date is within the total period of 3 years authorized by the Federal water power act, is reasonable and necessary for the purpose for which said permit was issued, such extension being desired to enable the permittee to complete its plans for carrying out the development: it was voted that said permit be amended by extending the period of priority and the period within which application for license shall be filed to include July 19, 1924, and that the Executive Secretary be authorized to issue a formal instrument evidencing this action."

Witness my hand and seal of the Federal Power Commission at Washington, D. C., this 29th day of December, 1923.

C. C. Merrill

Executive Secretary.

55

UTAH POWER & LIGHT COMPANY

APPLICATION

to

FEDERAL POWER COMMISSION

for

LICENSE

Under Act of June 10, 1920 (41 Stat. 1063)

for

MINK-LAVA PROJECT

Bonner Idaho

Application for License
Utah Power & Light Company
Mink-Lava Project

(1) The Utah Power & Light Company, a corporation organized and existing under and by virtue of the laws of the State of Maine, and having its office and principal place of business at Salt Lake City, in the State of Utah, in pursuance of a preliminary permit covering four sites on Bear River (of which the project applied for is one) issued to the applicant on the 20th day of May, 1921, does hereby made application to the Federal Power Commission for a license for a project described herein and shown on general and detail maps signed by the applicant on the 11th day of July, 1924, which maps are filed herewith and made a part hereof, said license to authorize the construction, operation, and maintenance of certain project works, the principal ones of which are designated as follows on said maps:

(a) Dams and Reservoirs - Mink Development

The dam will be of earth fill, 375 ft long with top elevation 4749.0 (U.B.M. Datum) and a maximum height of 140-ft. The spillway section of the dam will be of concrete, and will consist of three 10-ft x 30-ft tainter gates with crest at elevation 4729.0 and a free spillway or overflow section 70-ft long with top at elevation 4739.0. The concrete portion of the dam will be on rock which is at a considerable distance below the surface as shown by drill explorations, description and conclusions of which are given in a progress report heretofore filed with the Federal Power Commission.

The reservoir formed by the dam will extend northward on the Bear River to the Oneida Hydro-Electric Development a distance of approximately 5 mi. The estimated available storage is 3,400 ac ft between elevations 4739 and 4731.

Contour	Acres Area	Capacity in Acre Feet
4739	465	3400
4735	445	1700
4731	420	0

The land affected by the construction of the dam and its resultant reservoir is shown on Exhibit "F".

(b) Water Conduits - Mink Development

The intake will contain the screens together with a cylinder gate 25-ft in diameter. The water will be conducted from the intake to the units through a 21-ft diameter concrete lined tunnel, having a 40-ft diameter surge tank near the lower end, and then through two 14-ft diameter steel penstocks to the units. There will be a valve in each penstock to control the flow of water to the units.

(c) Power House- Mink Development

The power house for this development will be built on the easterly side of the river below and apart from the dam. There will be a superstructure to this station, including a traveling crane provided to run over the generator floor to handle all heavy station equipment, transformers, etc.

The station substructure will house two 15,000 hp vertical water turbines to operate at approximately 150 rpm under a normal head of 110-ft. The turbines will be direct connected to vertical 10,000 kw, 6600 v, 3 ph, 60 cyc generators. The substructure will also contain all the auxiliary equipment such as switchboard, waterwheel driven exciter, motor generator exciter sets, oil switches, station transformers, governors, lubricating oil and governor oil systems. Plans, elevations and sections of the power house and dam are shown on drawings under Exhibit "L", these drawings being as follows:

Exhibit "L" - Mink - General Plan
Exhibit "L" - Mink Power House - Sections and Details
Exhibit "L" - Mink Dam - Sections and Details

The switchyard will be located directly south of the power house. It will contain the transformers, switching structure, high tension buses, switches, and transmission lines extending from this station. The location and size of the switchyard and the number of outgoing lines are shown under Exhibit "L", Mink - General Plan.

(d) Transmission Lines - Mink Development

The transmission lines included in this development will be one 130 kv line, connecting this station with the applicant's general transmission system.

(a) Dams and Reservoirs - Lava Development

A gravity concrete dam approximately 500-ft long will be constructed across the Bear River as shown on Exhibit "L", Drawing #1. For approximately 370-ft of its length the dam will be built to elevation 5655 and will be of the non-overflow type. The power house will be integral with this section of the dam. This section will also contain the small unit, utilizing the irrigation water supplied to the Last Chance Canal.

The remainder of the dam, designated as spillway section, will be approximately 137-ft long with crest at elevation 5636. This section will be provided with three 30-ft x 14-ft tainter gates to regulate the flow and raise the water level in the reservoir to elevation 5650, together with a 15-ft x 10-ft trash gate.

The reservoir formed by the construction of this dam will extend upstream to the Soda Development, a distance of approximately 4 mi. The estimated available storage is 1800 ac ft between elevations 5650 and 5638.

Contour	Acres Area	Capacity in Acre Feet
5650	168	1800
5646	158	1200
5642	148	600
5638	137	0

The land affected by the construction of the dam and its resultant reservoir is shown on Exhibit "K".

(c) Power House - Lava Development

The power house for this project will be part of the non-overflow section of the dam. There will be no superstructure to the station, however, the generators will be enclosed. A gantry crane will be provided to run along and over the generator floor and will extend to the switchyard. The crane will handle all heavy station equipment, transformers, etc.

The station substructure will house two 8,700 hp vertical turbines to operate under a head of 90-ft. These turbines will be direct connected to vertical 6,000 kw, 6,600 v, 3 ph, 60 cyc generators. The station substructure will contain all

the auxiliary equipment such as switchboard, waterwheel drivem exciter, motor generator exciter sets, oil switches, station transformers, governors, and lubricating and governor oil systems.

There will be a small power house between the main station and the switchyard which will also be a part of the nonoverflow section of the dam. This substructure will house a 2,000 hp vertical turbine to operate under a head of 41-ft. This turbine will be direct connected to a vertical 1,400 kw, 6600 v, 3 ph, 60 cyc generator. This unit will be excited by a 50 kw motor generator exciter.

Plans, elevations and sections of the power house and dam are shown on drawings under Exhibit "L" as follows:

Exhibit "L" - Lava - General Plan and Downstream Elevations
Exhibit "L" - Lava - Power House and Dam - Sections and Details

The switchyard will be located south of the power house. It will contain the transformers, switching structure, high tension buses, switches and transmission lines, extending from this station. The location and size of the switchyard and the outgoing lines are shown under Exhibit "L" - Lava - General Plan and Downstream Elevation.

(d) Transmission Lines - Lava Development

The transmission lines included in this development will consist of 130 kv tap to applicants transmission system.

(2) The location of the project applied for is as follows:

(a) In the State of Idaho
(b) In the Counties of Franklin and Bannock
(c) On the following named stream: Bear River: navigable and carrying commerce to the following extent: None.
(d) In the region of the following named cities and towns: The applicant serves territory extending from Ashton, Idaho, on the north to Huntington, Utah, on the south, a distance of 370 miles; approximately 175 communities are served, including Salt Lake City, Ogden, Provo, Logan, Bingham, Eureka, Park City, Lehi and American Fork, Utah; Idaho Falls, Rexburg, Ashton, St. Anthony, Preston and Montpelier, Idaho.

(3) The proposed scheme of development for the project is as follows:

Mink Development

An earth fill dam across the Bear River which will form a reservoir with 3,400 ac ft capacity. The water will be conducted from the intake through a concrete lined tunnel and then through two steel penstocks to the wheels in the power house. The water will be utilized under a normal head of 110-ft to develop a maximum of 20,000 kw of power. This power will be transformed and transmitted into the applicant's general transmission system.

Lava Development

A concrete gravity dam across the Bear River will form a reservoir of 1,800 ac ft capacity. The water will be conducted through an intake structure on the upstream side of the power house to the wheels. The water will be utilized under an average head of 90-ft to develop a maximum of 12,000 kw. The water supplied to the Last Chance Canal will be utilized under a head of 41-ft to develop 1,400 kw. This power will be transformed and transmitted by tapping into the applicants transmission system.

(4) and (5) A statement regarding the proposed use or market for the power to be developed, and regarding the location and capacity of all power projects owned or operated by the applicant is filed with the Federal Power Commission as part of an application made August 16, 1922, entitled "Application for License under Act of June 10, 1920, Soda Project, Bear River, Idaho, Utah Power and Light Company."

(6) The following exhibits are filed herewith or herein referred to and are hereby made a part of the application:

Exhibit A - Reference to Certificate of Organization

Exhibit B - Reference to Statement of Organization and List of Officers and Directors

Exhibit C - Statement as to Field Notes or Description of Project Boundaries

Exhibit D - Reference to Evidence that the Applicant has Complied with Requirements of Laws of the State within which Project will be Located

Exhibit E - Reference to Statement of the Nature, Extent and Ownership of Water Rights

Exhibit F - Statement of the Nature, Extent and Ownership of Lands

Exhibit G - Statement Concerning Ability of Applicant to Finance Project

Exhibit H - Statement of Effect of Project on Stream Flow

Exhibit I - Statement of Power Capacity of Project

Exhibit J - General Maps of Entire Project and Reference to General Map of Applicant's Transmission System

Exhibit K - Detail Map of Entire Project

Exhibit L - General Design Drawings

Exhibit M - Statement Regarding Mechanical, Electrical and Transmission Equipment

Exhibit N - Estimate of Cost of Developing Project

Exhibit O - Statement of Time Desired to Complete Construction of the Project Works

IN WITNESS WHEREOF the applicant has caused its name and corporate seal to be hereunto signed and affixed by Eustis its Vice-President, thereunto duly authorized, this 11th day of July, 1924.

UTAH POWER AND LIGHT COMPANY

By E. W. Eustis
Vice-President

Attest:

F. J. [illegible]
Assistant Secretary

EXHIBIT A, B, D, E

Mink-Lava Project

The exhibits designated below, having been filed heretofore with the Federal Water Power Commission, are by reference hereby adopted and made a part of this application:

Exhibit A - Certificate of Organization

Reference is made to Exhibit A in application for preliminary permit for this project, no change having been made in certificate of organization since date of filing with Federal Power Commission.

Exhibit B - Statement of Organization and List of Officers and Directors

Reference is made to Exhibit B in application for license for Logan Power Plant. (Federal Power Commission Project No. 486)

Exhibit D - Compliance with Requirements of State Laws

Reference is made to Exhibit D in application for license for Oneida Power Plant. (Federal Power Commission Project No. 472)

Exhibit E - Statement of the Nature, Extent and Ownership of Water Rights

Reference is made to Exhibit E in application for license for the Soda Project (Federal Power Commission Project No. 20) granted subsequent to a preliminary permit which also covers the project here applied for.

This statement is a part of the application for license made by the undersigned this 11th day of July, 1924.

UTAH POWER & LIGHT COMPANY

By _____
Vice-President

EXHIBIT C

Mink-Lava Project

FIELD NOTES OR DESCRIPTION OF PROJECT BOUNDARIES

Applicant has not compiled field notes or a description by metes and bounds of the entire final location survey of the project boundaries as this data is presented on tracing filed as Exhibit "K" of this application for license.

This statement is a part of the application for license made by the undersigned this 11th day of July 1924.

UTAH POWER AND LIGHT COMPANY

By _____

Vice-President

THIS EXHIBIT ..F.. SUBMITTED WITH AND MADE A PART OF APPLICATION OF THE UTAH POWER & LIGHT CO, FOR AN AMENDMENT OF LICENSE FOR PROJECT NO. 20 IDAHO IS RECOMMENDED FOR APPROVAL.

CHIEF ENGINEER

APPROVED OCTOBER 10 1927
BY ORDER OF THE FEDERAL POWER COMMISSION

EXECUTIVE SECRETARY

AMENDMENT OF LICENSE ISSUED DECEMBER 14 1927

EXECUTIVE SECRETARY

EXHIBIT F

Mink-Lava Project

STATEMENT OF THE NATURE, EXTENT AND OWNERSHIP OF LANDS

Mink Development

(a) Lands owned in fee: The lands owned in fee are indicated by cross-hatching and are marked "Utah Power & Light Company" on Exhibit "K".

(b) Lands in private ownership: The Utah Power & Light Company owns all the private land that falls within the project boundary with the exception of the northeast quarter of the northwest quarter of Section 35, Township 13 South, Range 40 East which is still in private ownership and marked "P" on Exhibit "K".

(c) Lands in public ownership: The remaining lands within the project boundary are public lands and are marked "U.S." on Exhibit "K".

Lava Development

The applicant does not at the present time own any of the lands within the project area, the land being either publicly or privately owned. The lands in public ownership are marked "U. S." and in private ownership are marked "P" on Exhibit "K".

This statement is a part of the application for license made by the undersigned this 11th day of July, 1924

UTAH POWER & LIGHT COMPANY

By _____
Vice-President

EXHIBIT G

Wink Lava Project

FINAL ABILITY OF APPLICANT TO CARRY OUT THE PROJECT

The applicant is a going concern operating Electric, Light & Power Companies in Utah and Idaho. The project applied for in the present application is not a new business venture, but is to be developed in response to the growth of an already existing consumers demand for electric energy.

This statement is a part of the application for license made by the undersigned this 11th day of July 1924.

UTAH POWER & LIGHT COMPANY,

By _____

Vice President

EXHIBIT H

Mink-Lava Project

STATEMENT OF THE EFFECT OF THE PROPOSED OPERATION OF THE PROJECT WORKS ON THE NORMAL FLOW OF THE STREAM

Mink Development

This development is a part of the project covered by this application and will have no effect on the normal flow of the stream above the project works. Below said works, the effect will be to make the river more responsive to the irrigation and power demand. It has been necessary at certain periods in the past to waste considerable water into Great Salt Lake in order to insure a sufficient irrigation supply for irrigation needs when required. The operation of this project will not diminish the average flow, but will beneficially affect the distribution thereof.

Lava Development

This development which is part of the project covered by this application is located between applicant's stations at Grace and Soda about 50 miles below the outlet of Bear Lake which acts as a storage reservoir for Bear River water and equalizes the flow to the applicant's plants, including the project applied for, over daily, monthly and yearly periods.

The effect of this development will be to hold a small amount of water in the reservoir created by the dam, this storage water being used during daily peak load hours by drawing down the reservoir.

The capacity of the applicant's other stations below this development is such and the irrigation requirements are such that a large amount of water must be released continuously in Bear Lake. The project applied for will not diminish this average flow, but will tend to further utilize the water of the stream by carrying part of the peak load now carried by other plants with a waste of water.

This statement is a part of the application for license made by the undersigned this 11th day of July, 1924.

UTAH POWER & LIGHT COMPANY

By _____
Vice-President

EXHIBIT I

Mink-Lava Project

STATEMENT OF POWER CAPACITY OF PROJECT

The natural flow at the Mink Power Site has been determined from a gaging station just below the Oneida tailrace, the gaging station being known as Bear River below Oneida tailrace. Between this station and the Mink Site there is no appreciable tributary inflow. The figures in the following table showing the natural flow for the period 1913 to 1922 inclusive, upon which the subsequent determination of the power capacity of the project is based, are derived from the observations recorded at the Oneida gaging station taking account of the plus and minus contributions from Bear Lake storage owned and heretofore created by the applicant.

NATURAL OR UNREGULATED FLOW IN DAY SECOND FEET - 1913-1922

	1913	1914	1915	1916	1917	1918	1919	1920	1921	1922
Jan.	——	22812	17763	——	——	27525	12138	18333	23795	21346
Feb.	——	19951	16009	——	——	22709	17326	21071	22906	19564
Mar.	——	37939	31988	71381	——	42811	37582	32843	70769	27294
Apr.	——	107661	33393	79056	——	58821	53413	57815	72989	82525
May	——	126035	24672	76818	——	52935	35935	121634	136323	163986
June	30884	99083	19254	41341	111612	44103	4363	81903	105078	92292
July	29196	39686	7616	13859	59185	18524	0	12771	30404	21123
Aug.	13008	15114	3354	9086	18928	7530	2169	6194	15641	18137
Sept.	18858	22885	——	10819	21955	11199	6160	18869	22059	23615
Oct.	25899	24663	——	21278	22085	22462	15648	21934	20793	21970
Nov.	25804	29728	——	19765	23214	24267	18925	27398	23484	25290
Dec.	22101	25458	——	18215	23918	23122	16644	25271	23888	23031
Year	——	588725	——	——	——	356006	216261	450139	570126	539970

The head at this development will be as follows:

Maximum head 112-ft
Normal head 110-ft
Minimum head 107-ft
Average static head 110-ft

The flow as defined by Regulation 1, Sec. 15 of the Rules and Regulations of the Federal Power Commission on the basis of the above records is 360 cu ft per sec.

Using this figure and an average static head of 110-ft, the power capacity of the development as defined by the Regulations stated above is 3170 hp.

Mink-Lava Project

The natural flow of the Lava Development has been determined from the records of a gaging station known as the Bear River at Alexander. There is no appreciable tributary inflow between this gaging station and the Lava site. The figures in the following table showing the natural flow for the period 1913 to 1922 inclusive, upon which the subsequent determination of the project power capacity is based, are derived from the observations recorded at the Alexander gaging station taking into account the plus and minus contributions from Bear Lake storage owned and heretofore created by the applicant.

NATURAL OR UNREGULATED FLOW IN DAY SECOND FEET - 1913 - 1922

	1913	1914	1915	1916	1917	1918	1919	1920	1921	1922
Jan.	12865	15682	14275	14446	14500	16899	——	14372	17362	17367
Feb.	12750	12661	13654	13422	13233	14513	——	17051	15397	14681
Mar.	24681	27695	25345	62719	17285	34805	——	25058	56179	20525
Apr.	88386	94911	30318	69916	76186	47291	——	48696	89090	73115
May	60760	124505	21877	74995	108953	49581	30699	105032	117627	143526
June	32202	103540	24971	49194	109572	49519	10495	82936	111775	96802
July	33474	40026	13678	21454	67810	26791	5045	21555	35967	25098
Aug.	15362	21474	7580	11848	24333	9839	4393	13046	20415	21068
Sept.	16812	17911	9575	10927	20725	12644	5961	15042	20104	20990
Oct.	21337	25184	14653	16808	20478	17875	12173	19034	17587	17801
Nov.	20447	18309	13870	14268	20117	14729	12991	20192	17994	19447
Dec.	15404	13085	12004	13517	21960	12086	10922	18838	20275	18262
Year	352480	512979	201796	5735[illegible]	514952	306370	——	400830	509752	488282

The head at this development will be as follows:

Maximum head 97-ft
Normal head 90-ft
Minimum head 90-ft
Average static head 93-ft

On the basis of the records shown above, it is estimated that the flow as defined by Regulation 1, Sec. 15 of the Rules and Regulations of the Federal Power Commission is 360 cu ft per sec.

Using this figure and an average static head of 93-ft, the power capacity of the development as defined by the Regulations stated above is 2678 hp.

A list of all present and proposed sources of power for the system which this project will be a part is filed with the Federal Power Commission as Exhibit "I" accompanying an application made August 16, 1922, entitled "Application for License, Soda Project, Bear River, Idaho, Utah Power and Light Company."

CONNECTIONS TO OTHER POWER SYSTEMS

The northern end of the Utah Power and Light Company's system is connected with the eastern division of the Idaho Power Company's system at Pocatello and at Blackfoot.

This statement is a part of the application for license made by the undersigned this 11th day of January, 1924.

UTAH POWER & LIGHT COMPANY

By _____
Vice-President

EXHIBIT J
Mink-Lava Project

GENERAL MAP OF ENTIRE PROJECT

This exhibit, consisting of:

No. 1 - Map of Entire Project

has been presented in roll form as defined by Regulation 2, Section 4, Paragraph C of the Rules and Regulations of the Power Commission. One tracing and two blueprints of this drawing are submitted and in addition, photoprints are hereto attached.

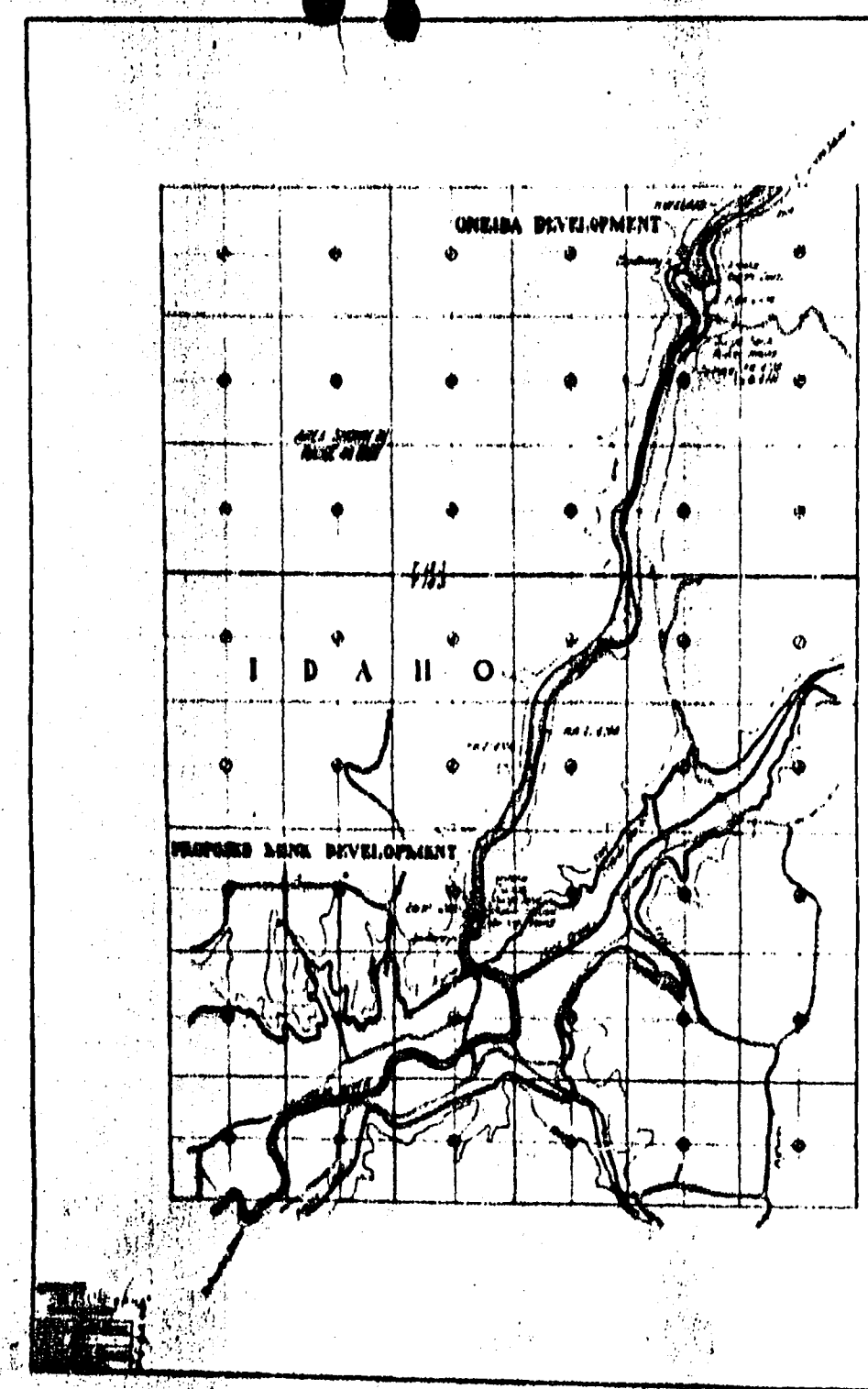
The transmission system shown on drawing No. 1, Exhibit I accompanying the application for license for Soda Development, gives the applicants transmission system.

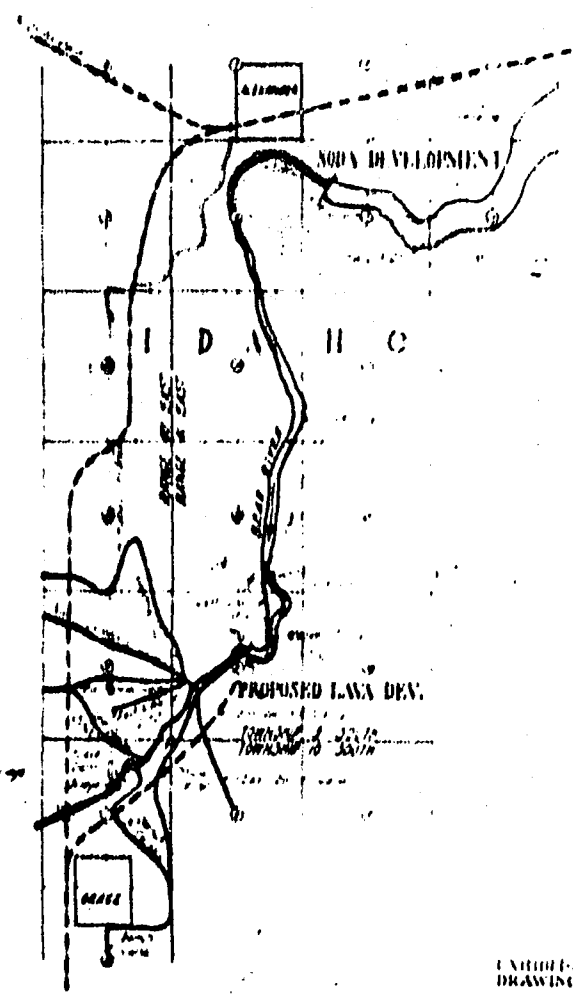
This statement is a part of the application for license made by the undersigned this 11th day of July, 1924.

UTAH POWER & LIGHT COMPANY

By _____
Vice President.

F-19547





ENGINEER'S DRAWING NO.1

SCALE 1" = 2000'

MINK-LAVA HYDRO-ELEC. PROJECT
MAP OF UTILITY PROJECT
UTAH POWER & LIGHT CO.

F-19547

EXHIBIT K

Mink-Lava Project

STATEMENT CONCERNING DETAIL MAP OF ENTIRE PROJECT

This exhibit, consisting of:

No. 1 - Map showing Project Boundary

has been presented in roll form as defined by Regulation 2, Section 4, Paragraph C of the Rules and Regulations of the Power Commission. One tracing and two blueprints of this drawing are submitted and in addition, photoprints are hereto attached.

This statement is a part of the application for license made by the undersigned this 11th day of July, 1934.

UTAH POWER & LIGHT COMPANY

By _____

Vice-President

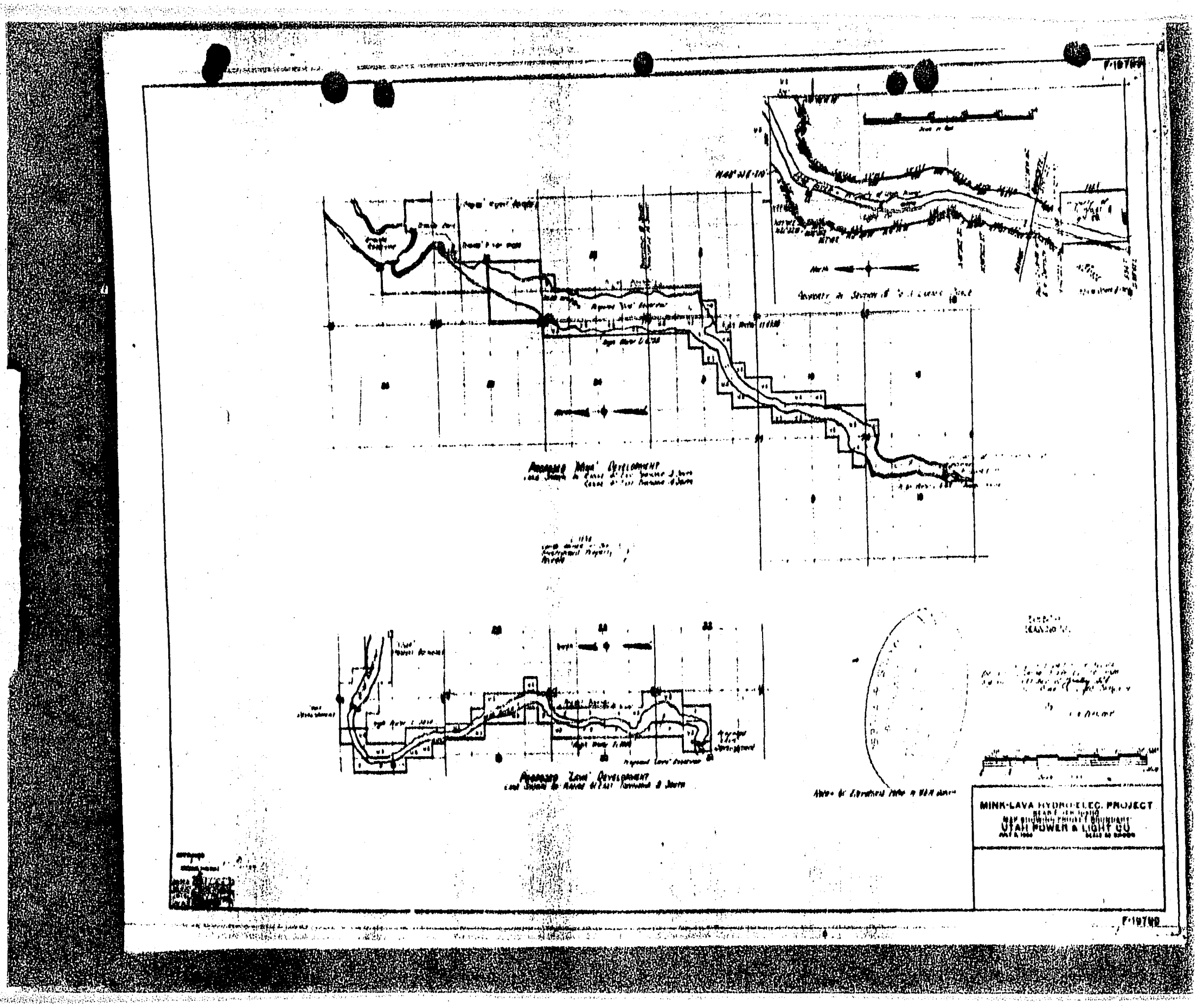

MINK-LAVA HYDRO-ELEC. PROJECT
UTAH POWER & LIGHT CO.

EXHIBIT L

Mink-Lava Project

GENERAL DESIGN DRAWINGS

This exhibit, consisting of:

No. 1 - Mink - General Plan

No. 2 - Mink - Power House Sections and Details

No. 3 - Mink Dam - Sections and Details

No. 4 - Lava - General Plan and Downstream Elevation

No. 5 - Lava - Power house and Dam - Sections and Details

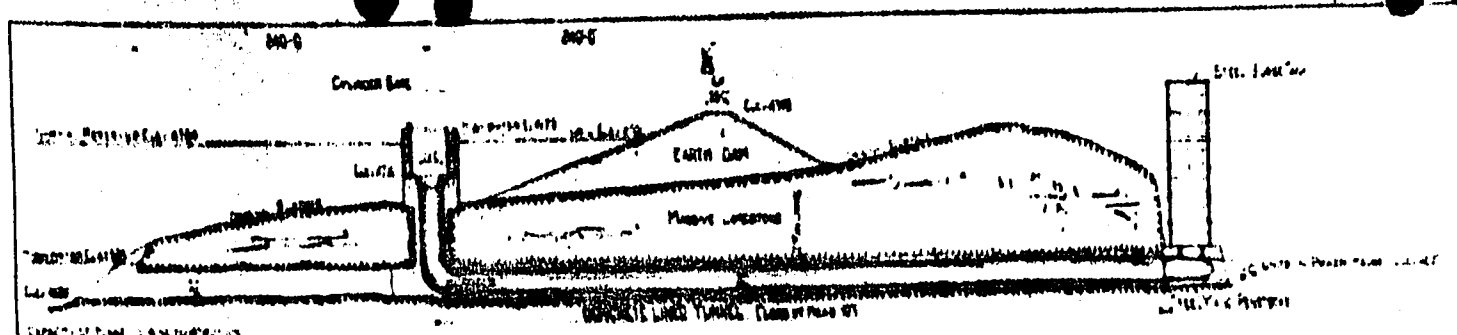
has been presented in roll form as defined by Regulation 2, Section 4, Paragraph C of the Rules and Regulations of the Power Commission. One tracing and two blueprints of each drawing are submitted and in addition, photoprints are hereto attached.

This statement is a part of the application for license made by the undersigned this 11th day of July, 1924.

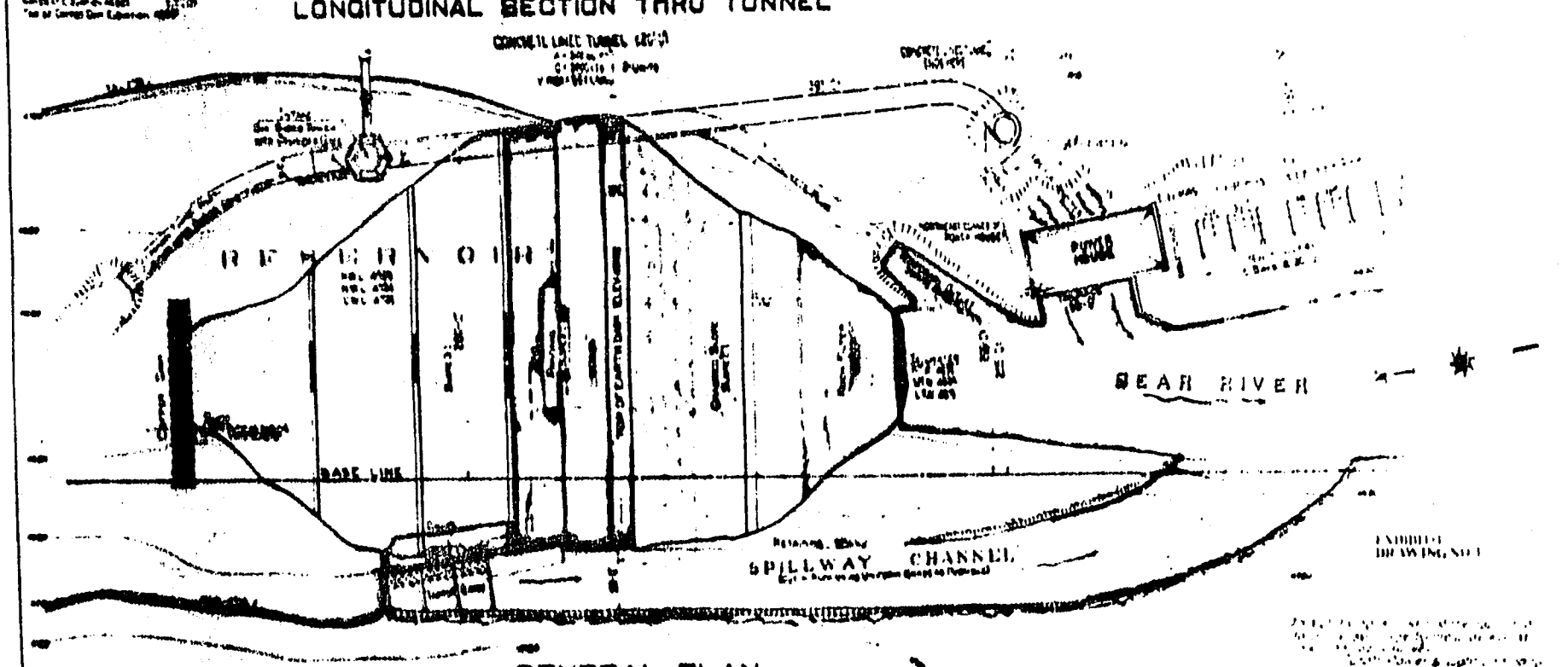
UTAH POWER & LIGHT COMPANY

By _____

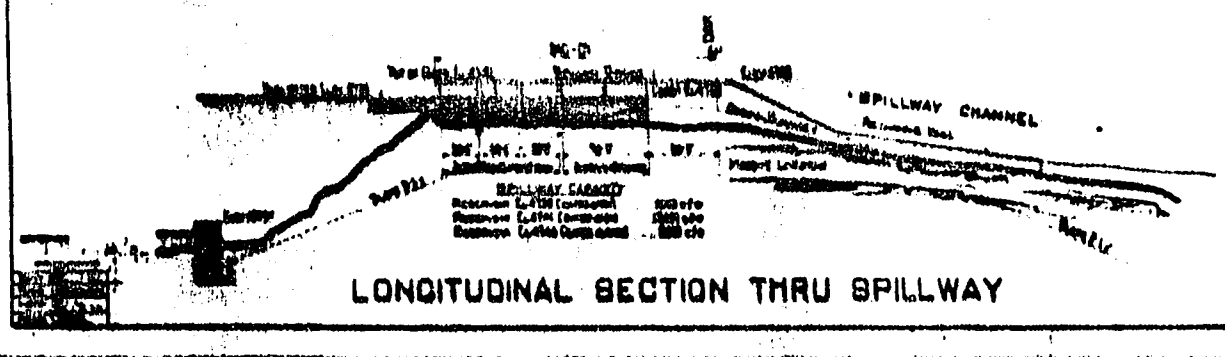
Vice-President.



LONGITUDINAL SECTION THRU TUNNEL



GENERAL PLAN

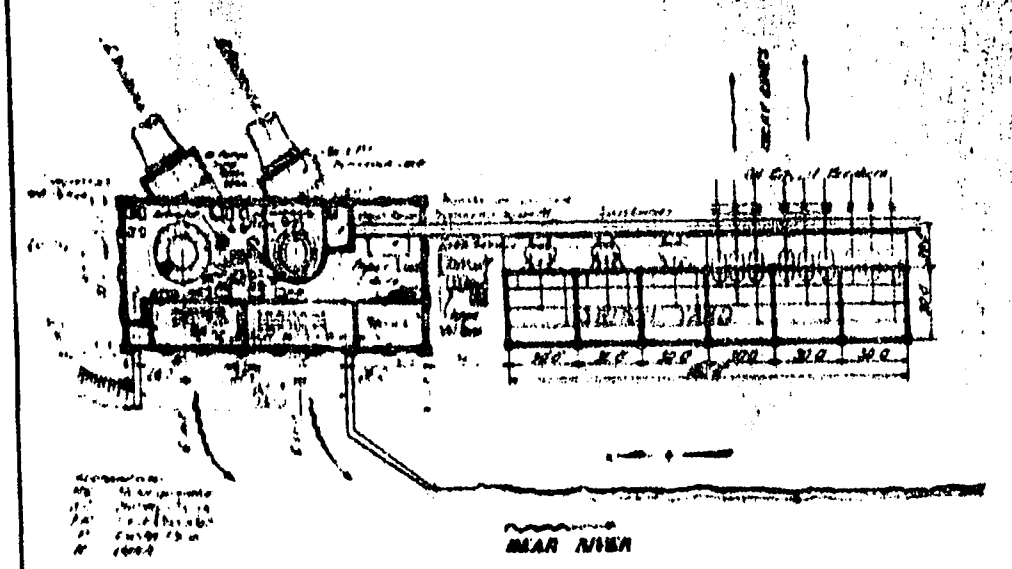


LONGITUDINAL SECTION THRU SPILLWAY

MINK-LAVA HYDRO E.T.L. PROJECT
BEAR RIVER IDAHO
MINK GENERAL PLAN
UTAH POWER & LIGHT CO.

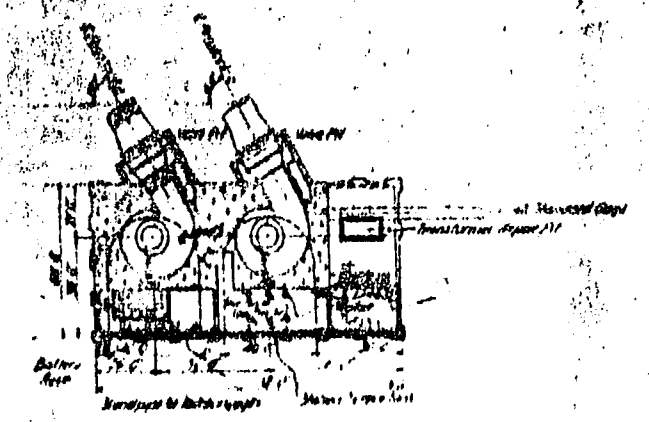
EXHIBIT
DRAWING NO.

F-19683

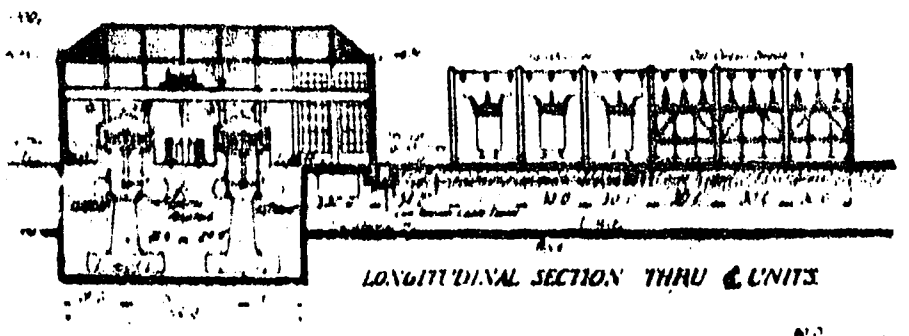


REAR VIEW

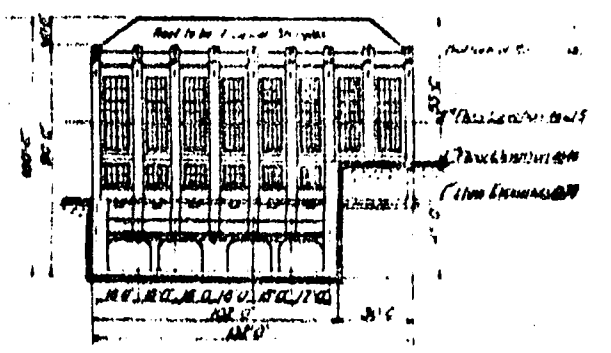
OPERATING FLOOR PLAN.



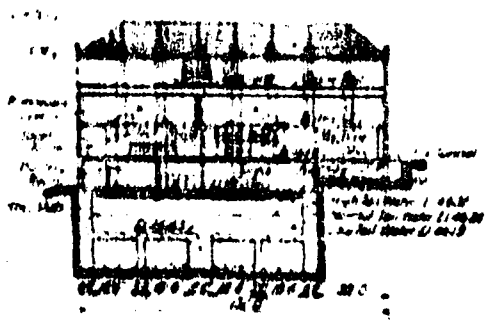
HORIZONTAL SECTION THRU UNITS.



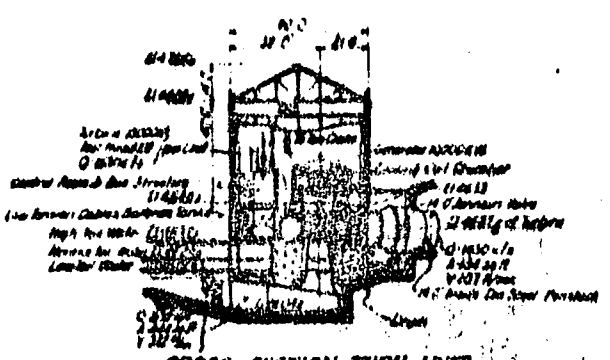
LONGITUDINAL SECTION THRU 4 UNITS



DOWNSTREAM ELEVATI.



LONGITUDINAL SECTION THRU CENTRAL HOUSE.



CROSS SECTION THRU UNIT.

SCALE 1/4 PART

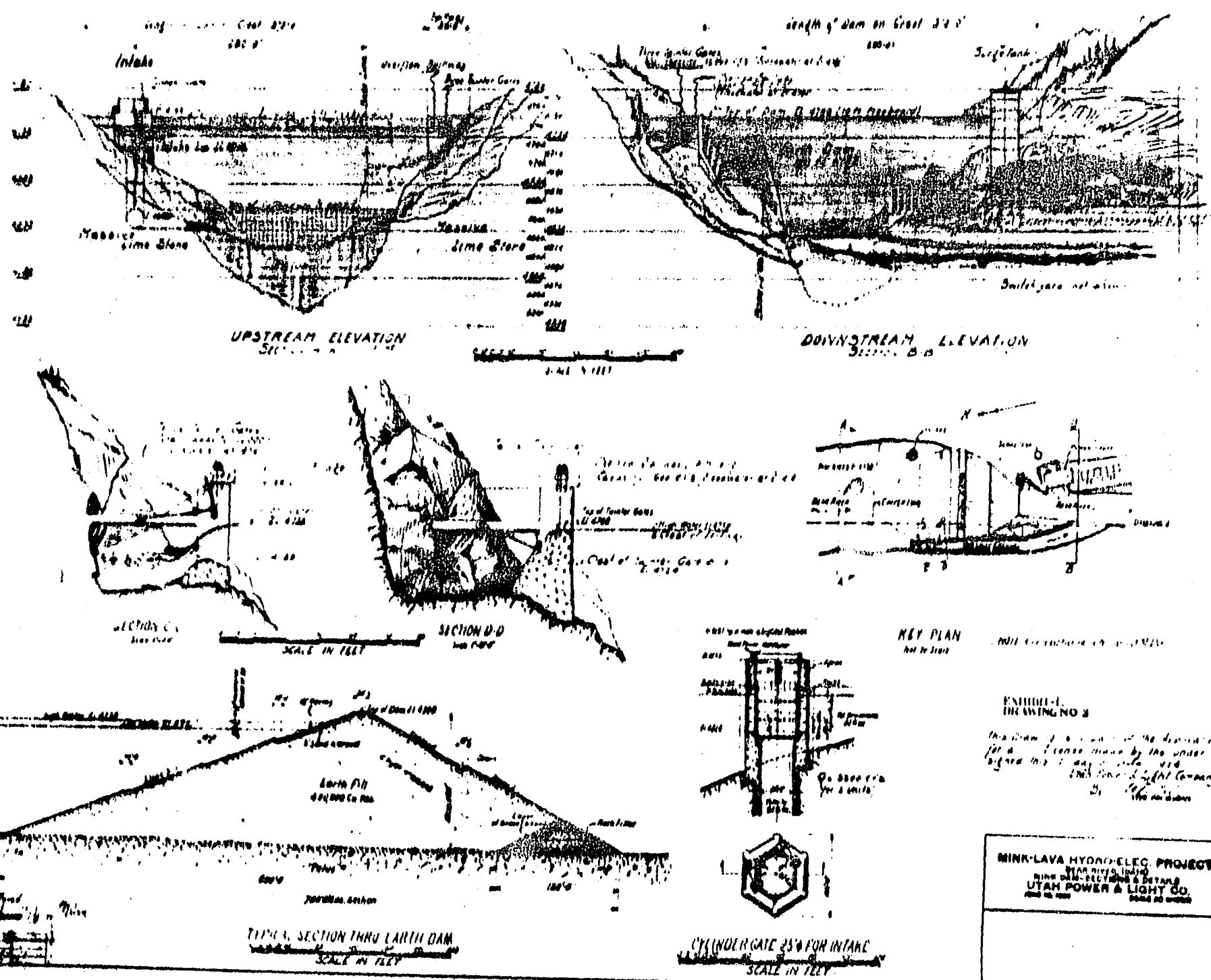
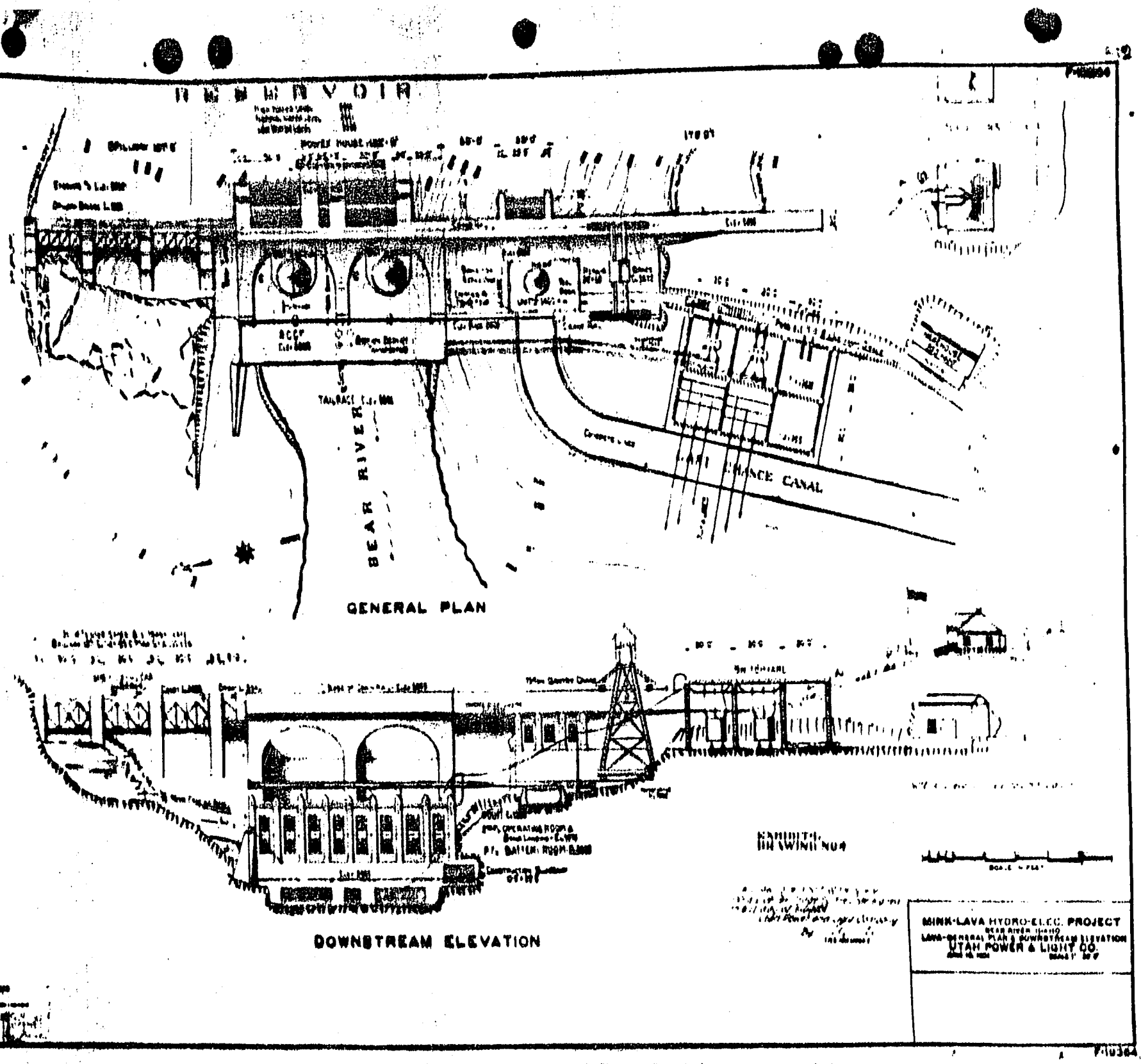
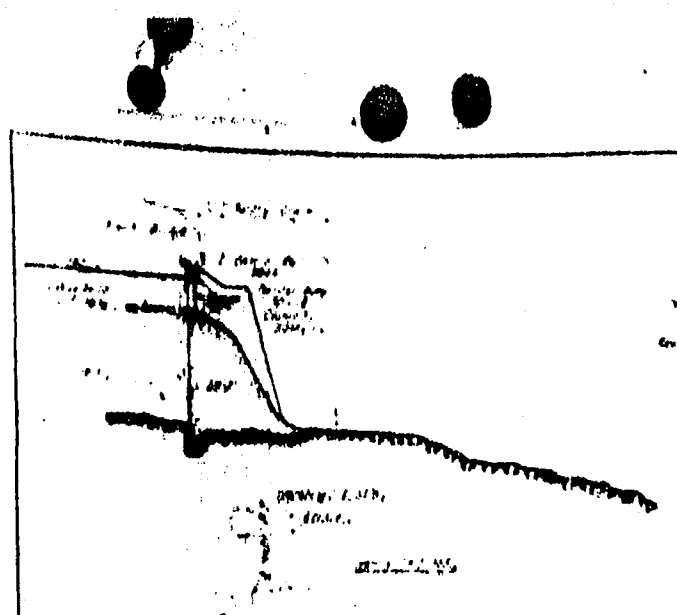


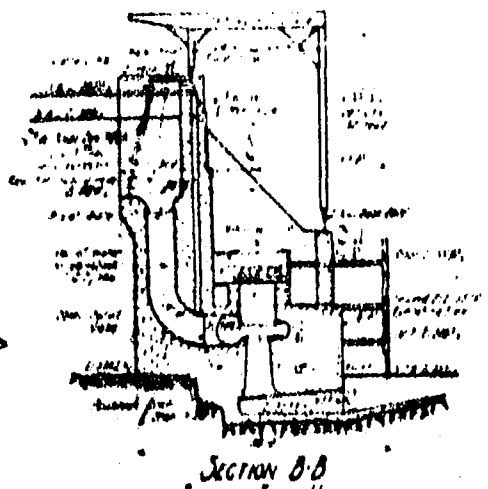
EXHIBIT I
DRAWING NO 2

MINK-LAVA HYDRO-ELEC. PROJECT
UTAH POWER & LIGHT CO.

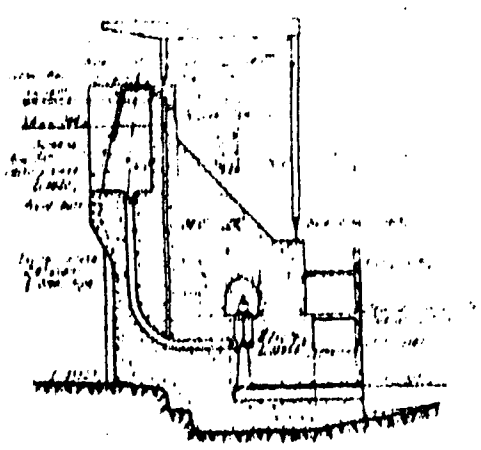

RESERVOIR
BEAR RIVER
TAILRACE
ANCE CANAL
GENERAL PLAN
DOWNSTREAM ELEVATION
MINK-LAVA HYDRO-ELEC. PROJECT
BEAR RIVER, IDAHO
LAVA-GENERAL PLAN & DOWNSTREAM ELEVATION
UTAH POWER & LIGHT CO.



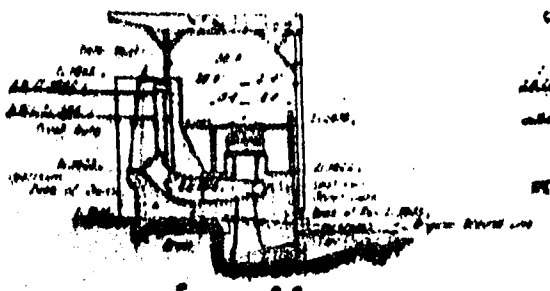
SECTION A-A
THRU SPILLWAY SECTION



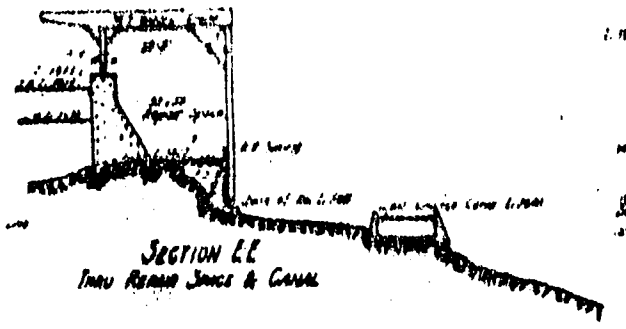
SECTION B-B
SECTION THRU UNITS



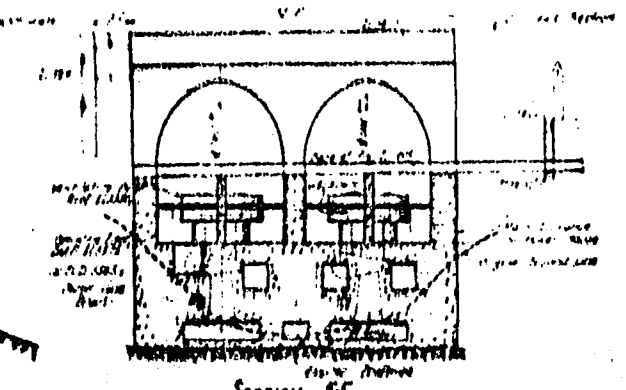
SECTION C-C
SECTION THRU EXCITER UNIT



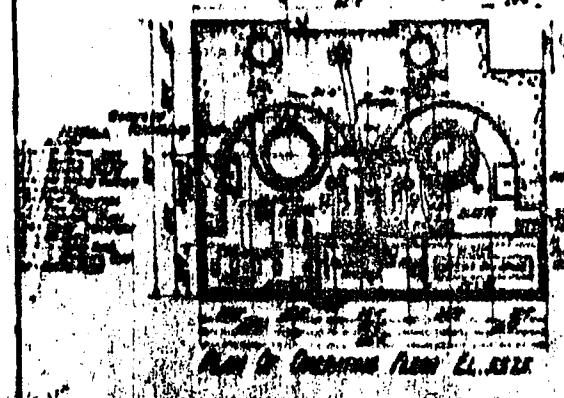
SECTION D-D
SECTION THRU UNIT 3



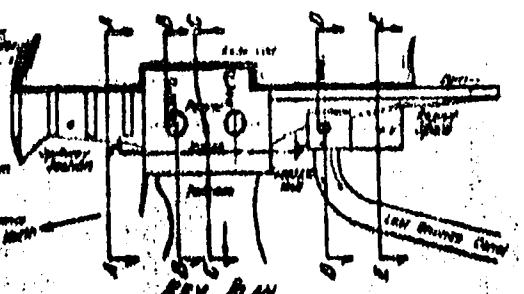
SECTION E-E
THRU REGULATING GATES & CANAL



SECTION F-F
LONGITUDINAL SECTION THRU POWER HOUSE



PLAN OF OPERATING FLOOR EL. 832.5



KEY PLAN

KLAMATH-L
DRAWING NO 5

THIS DRAWING IS PART OF THE HYDROELECTRIC PLANS FOR THE KLAMATH RIVER DEVELOPMENT AND SHALL NOT BE USED FOR ANY OTHER PURPOSE WITHOUT THE WRITTEN CONSENT OF THE UNDERSIGNED

BY

SCALE IN FEET

KLAMATH HYDRO ELECTRIC DEVELOPMENT

UTAH POWER & LIGHT CO.

EXHIBIT M

Mink-Lava Project

This sheet superseded by sheet rec'd April 2-1925

DESCRIPTION OF MECHANICAL, ELECTRICAL AND TRANSMISSION EQUIPMENT

Mink Development

There will be installed in the substructure of the power house two vertical water turbines direct connected to vertical water-wheel generators. These turbines will be designed to develop 15,000 hp under a head of 110 ft when running at a speed of 150 rpm. They will be controlled and regulated by oil pressure governors with motor for switchboard control

The station superstructure will house an electrically operated travelling crane for handling all mechanical equipment. The crane will have a capacity of 75 tons with auxiliary hoist of 10 ton capacity.

The auxiliary mechanical equipment will consist of lubricating and governor oil pumps, oil sump tanks, oil filter, and air compressor.

Electrical Equipment

The generators to be installed will be 10,000 kw, 6600 v, 3 ph, 60 cyc, 150 rpm, vertical shaft waterwheel type. There will be a 350 kw waterwheel driven exciter together with two 175 kw motor driven exciters. The 6600 v oil switches and control switchboard for generator, transformers and outgoing lines will be placed in the operating room below the generator floor level. A storage battery will be provided for control of the oil circuit breakers.

The step-up transformers will consist of six 5,000 kva single phase transformers for stepping up from 6600v to 130,000 v. One extra transformer will be provided as a spare.

Facilities for storage of oil, for storage of materials and for making repairs to equipment will be provided as indicated on drawings.

Transmission Lines

The transmission line necessary for putting this development into operation will be one 130 kv line connecting this station with the applicant's general transmission system.

Sheet superseded by sheet received April 2 1925

Lava Development

There will be installed in the substructure of the power house two vertical water turbines direct connected to vertical water-wheel generators. These turbines will be designed to develop 8,500 hp under a net head of 90-ft running at a speed of 180 rpm. They will be controlled and regulated by oil pressure governors with motor for switchboard control.

There will also be a small power house containing a unit that will utilize the irrigation water passing through the Last Chance Canal. The substructure of this power house will contain a vertical waterwheel turbine direct connected to a vertical waterwheel generator. This turbine will develop 2,000 hp under a net head of 41-ft when operating at a speed of 360 rpm.

A housed in gantry crane of 75 ton capacity will run over these units, the run of this crane to extend to the switch-house. The crane will be electrically operated and will have a capacity of 75 tons with an auxiliary hoist of 10 ton capacity. This crane will be used for handling all station mechanical equipment and also to move heavy equipment to and from the switchyard.

The auxiliary mechanical equipment will consist of lubricating and governor oil pumps, oil sump tanks, oil filter and air compressor.

Electrical Equipment

The generators to be installed will be 6,000 kw, 6600 v, 3 ph, 60 cyc, 180 rpm, vertical shaft waterwheel type. There will also be a 90 kw waterwheel driven exciter in the operating room, together with 2 motor driven exciters of the same capacity. The generator to be installed in the small power house will be 1,400 kw, 6600 v, 3 ph, 60 cyc, 360 rpm, vertical shaft waterwheel type. This unit will be excited by a 50 kw motor driven exciter. The 6600 v oil switches and control switchboard for generators, transformers and outgoing lines will be placed in the operating room below the generator floor level. A storage battery will be provided for control of the oil circuit breakers.

The step-up transformers will consist of three 5,000 kva single phase transformers for stepping up from 6600 v to 130,000 v. One extra transformer will be provided as a spare.

Transmission Lines

The transmission lines for putting this development into operation will consist of 130 kv tap to applicant's transmission system.

Exhibit M
Mink-Lava Project

This statement is a part of the application for license made by the undersigned this 11 day of July, 1924.

UTAH POWER & LIGHT COMPANY

By _____
Vice-President

EXHIBIT N

Mink-Lava Project

ESTIMATE OF COST OF DEVELOPING PROJECT

This exhibit sets forth the estimated cost of the project, segregated with principal features and shows quantities, unit costs, etc., in sufficient detail for a full understanding of the elements of cost. It is presented in photoprint form, copies of which are hereto attached.

This statement is a part of the application for license made by the undersigned this 11th day of July, 1924.

UTAH POWER & LIGHT COMPANY

By _____

Vice-President

PREPARED C.V. CRUISE

CHECKED

C.N. PHILLIPS
W.C. CHAPPELL

UTAH POWER & LIGHT COMPANY
MINK LAVA HYDRO ELECTRIC PROJECT
MINK DEVELOPMENT
20,000 KW INSTALLATION

June 15, 1956

Cost Analysis

ACCT. NO.	ARTICLE	QUANTITY	Unit	Unit $	ITEM	TOTALS Division	TOTALS Project
111	DAMS, RESERVOIRS & INTAKE	20,000	kw	38.85			777,000
1	Reservoir	20,000	kw	1.35		28,000	
3	Earth Dam	20,000	kw	22.25		445,000	
4	Spillway	20,000	kw	9.00		180,000	
7	Intake	20,000	kw	6.35		127,000	
112	WATERWAYS	20,000	kw	24.80		496,000	
96	POWER STATION STRUCTURES	20,000	kw	23.50		472,000	
113	ROADS, TRAILS AND BRIDGES	20,000	kw	5.00		100,000	
115	TURBO GENERATORS AND ACCESSORIES	20,000	kw	21.95		439,000	
116	ELECTRICAL EQUIPMENT	20,000	kw	5.25		105,000	
122	SUBSTATION EQUIPMENT	20,000	kw	10.75		215,000	
141	GENERAL EQUIPMENT	20,000	kw	1.00		20,000	Sub Total 2224000
159	CONSTRUCTION SUSPENSE ACCOUNTS	20,000	kw	16.55		331,000	
	OMISSIONS AND CONTINGENCIES	20,000	kw	7.50		150,000	
191	ENGINEERING AND SUPERVISION	20,000	kw	19.55		391,000	
192	LAW EXPENDITURES DURING CONSTRUCTION	20,000	kw	.85		17,000	
194	TAXES DURING CONSTRUCTION	20,000	kw	.85		17,000	
195	INTEREST DURING CONSTRUCTION	20,000	kw	7.05		141,000	
	TOTAL COST WITHOUT LANDS OR TRANSMISSION LINE	20,000	kw	184.55		3,671,000	
	LANDS PURCHASED					20,000	
	TOTAL COST WITHOUT TRANSMISSION LINE					3,691,000	

Approved:

Engineer

This estimate is a part of the application for license made by the undersigned this day of 1956.

UTAH POWER & LIGHT COMPANY

By

Vice-Pres.

B-21160

1-8

PREPARED G.F. CRUDEN
CHECKED

W.C. CHAPPELL
C.N. PHILLIPS

Cost Analysis

UTAH POWER & LIGHT COMPANY
MINK LAVA HYDRO ELECTRIC PROJECT
MINK DEVELOPMENT
20,000 KW INSTALLATION

June 25, 1954.

Sheet No. 3

INDEX	ARTICLE	QUANTITY	UNIT	COST $	ITEM	DIVISION	GROUP	DESCRIPTION AND DATA SOURCE
111	DAMS, RESERVOIRS AND INTAKES	20,000	kw	38.85			777,000	No clearing. About ½ miles of gravel road running from section 8 to section 2b. Private road owned by the Utah Power and Light Company which must be relocated is given under group 113 in this estimate.
1	Reservoir	20,000	kw	1.25		25,000		
2	Gravel road	2.8	mi	10,000	28,000			
3	Earth Dam	20,000	kw	33.25		665,000		Dam will be built of earth, will be 375 ft long, 140 ft high above the river bed with 2 to 1 slope on upstream side and with 2 to 1 slope on the downstream side, 10 ft freeboard 20' top width, top elevation 6749.
	1 Unwatering							Timber crib 170' long, 20 ft wide maximum height 30'; used to divert water thru tunnel.
	.01 Diversion Dam	3,850	cu yd	4.00	17,100			
	.02 Maintenance and pumping		job		7,000			Pumping at dam necessary only during excavation of cut-off trench but diversion dam must be maintained for a period of one year. Price also includes pumping for tunnel excavation. Dyke to keep water out of cut-off trench during excavation. The tunnel is an essential part of the unwatering scheme; full estimate for tunnel included under 1123.
	.04 Earth dyke	700	cu yd	1.00	700			
	2 Excavation							
	.01 Stripping	2,500	cu yd	1.00	2,500			All humus and other objectionable material removed.
	.02 Excavation in cut-off trench							Cut-Off trench 30' deep unless rock is encountered at less depth.
	(a) Rock	200	cu yd	5.00	1,000			
	(b) Mixed	6,000	cu yd	2.00	12,000			
	3 Foundation preparation							
	.02 Drainage		job		2,000			Tile drainage arranged to drain lower side of dam.
	5 Embankment	350,000	cu yd	1.00	350,000			Will placed by hydraulic or semi-hydraulic method.
	6 Surface protection							

B-20,000

Standard Form No. 22064

PREPARED BY: PRUYN
CHECKED:

T. N. PHILLIPS
W. C. CHAPPELL

UTAH POWER & LIGHT COMPANY
MAMMOTH HYDRO ELECTRIC PROJECT
MINE DEVELOPMENT
AD. DRO. EQ. INSTALLATION

June 28, 1944.

Cost Analysis

INDEX	ARTICLE	QUANTITY	UNIT		TOTALS			DESCRIPTION AND DETAILS OF ITEMS
			Unit	Cost $	Item	Division	Group	
	.01 Rip rap	8,400	cu yd	8.00	19,200			40' wide 14" thick laid on gravel bed and extending across the dam. Includes special rip-rap around spillway.
	.02 Surface dressing	8,000	sq yd	1.00	8,000			Surface dressing is a light pavement on the downstream side made with stone taken from the embankment material and for the purpose of preventing erosion.
9	Rock fill	20,000	cu yd	.80	16,000			Placed at downstream toe of dam. Price covers placing only. The material will be obtained from the various rock excavations.
9	Miscellaneous				9,800.			
4	Spillway	20,000	kw	9.00		180,000		Spillway is channel cut in rock at west end of earth dam, it is equipped with three 10' x 30' tainter gates with lip at elevation 4729 designed to discharge 8000 cfs. Additional capacity provided by free spillway and large freeboard.
2	Excavation							
	.01 Mixed	8,000	cu yd	1.00	8,000			
	.02 Rock	42,000	cu yd	3.00	126,000			
4	Concrete	8,000	cu yd	16.00	32,000			
8	Auxiliary structures							
	.01 Gate operating bridge							
	(a) Material fob Mr.		job		2,000			
	(b) Hauling	12	ton	10.00	120			
	(c) Erecting	12	ton	80.00	960			
8	Misc operating equipment							
	.01 Gates and guides							Tainter gates 3 - 10' x 30' Prices on gate hoist and bridge based on recent purchase of similar eqt.
	(a) Material fob Mr	3	ea	1,600.00	5,400			
	(b) Erection							
	(c) Hoist fob Harvey, Ill		job		4,000			
	(d) Hauling and handling	24	tons	10.00	240			
	(e) Freight on Hoist	192	cwt	2.25	432			
9	Miscellaneous		job		1,248			

B-20000

PREPARED C.W. CROUCH
CHECKED

C.H. PHILLIPS
W.C. CHAPPELL

Cost Analysis

UTAH POWER & LIGHT COMPANY
MAIN LAVA CYLER HARTERS PROJECT
WILD DEVELOPMENT
BOARD OF INSTALLATION

June 21, 1951

ITEM	ARTICLE	QUANTITY	UNIT	COST $	ITEM	DETAILS Division	Group	
7	Intake	30,000	bw	6.45		187,000		Intake consists of six oiled steel built of reinforced concrete with inside diameter of 26' built over tunnel near upstream toe of dam. It is equipped with a cylinder gate 25' in diameter with intake screen mounted on the face of the tower. Gate motor operated by means of rack and pinion, included in Item 8.
	2 Excavation							
	4 Concrete (1:2:4)	240	cu yd	30.00	7,200			
	4 Concrete (1:3:6)	950	cu yd	25.00	23,750			
	5 Structural steel	190	tons	250.00	47,500			
	7 Bridge in place		job		4,500			
	8 Intake Operating Equipment							
	.01 Gate in place	50	ton	250.00	12,500			
	.02 Screens in place	180,000	lb	.11	19,000			
	.03 Hoist in place		job		5,000			
	.06 Crane		"	"	5,000			
	Miscellaneous				5,250			
113	DIVERSION	30,000	bw	34.50			496,000	Tunnel is used during construction to carry flow of river discharging 500
8	Tunnel and Shaft	30,000	bw	13.05		41,000		sec ft from the head created by diversion dam and 12,000 sec ft will have to be by- 467%. Net area of main portion 1 ft will be used as a pressure tunnel when plant is in operation. This 650 ft is lined with concrete. The remainder of the tunnel is not lined. A shaft is provided leading to the intake tower and surge chamber.
	8 1 Excavation							
	.01 Earth	4,000	cu yd	1.50	6,000			30% overbreak
	.02 Rock	18,000	cu yd	8.00	144,000			
	4 Concrete	4,000	cu yd	21.00	100,000			
	4 Concrete and steel plugs	2	ea	1000.00	2,000			Steel plates and concrete plug used to cut off sections of tunnel to be abandoned when pressure tunnel is placed in service.
	6 Temporary Timber Wings & Walls	20	M F Ft.	100.00	2,000			For intake and outlet of temporary portions of tunnel.

B-30000

PREPARED A.V. SMITH
CHECKED

W.C. CHAPPELL
C.N. PHILLIPS

UTAH POWER & LIGHT COMPANY
MINK LAVA HYDRO ELECTRIC PROJECT
MINK DEVELOPMENT
20,000 KW INSTALLATION

Cost Analysis

June 29, 1926

Sheets No. 5

INDEX	ARTICLE	QUANTITY	UNIT		TOTALS			DESCRIPTION AND EXPLANATIONS
			Unit	Cost $	Item	Division	Group	
8	Surge Tank	20,000	kw	4.00		80,000		
1	Foundations							
	2 Excavations	1,500	C.Y.	2.00	12,500			
	Concrete	1,000	C.Y.	15.00	15,000			
2	Tank Structure							
1	Tank Steel F.O.B. Siding	810	ton	80(4.00	41,000			
8	Handling & Erection	250	ton	10.00	2,500			
9	Miscellaneous				2,500			
7	Penstocks	20,000	kw	7.75		155,000		Penstocks are short, and lead from tunnel to power house; dia. of each pipe 14'; velocity of water in pipes under max load 10' per sec.
3	Excavation							
	.01 Mixed	1,000	cu yd	1.50	1,500			
	.08 Rock	100	cu yd	5.00	500			
	.08 Rock fill		teh		500			
4	Concrete footings	100	cu yd	25.00	2,500			Bills
5	Pipe and saddle in place	140,000	lb	.10	14,000			
6	Valves							Johnson valve on each pipe line.
	.01 Material F.O.B. Factory	400,000	lb	.20	80,000			
	freight	4,000	cwt	2.50	10,000			
	.05 Hauling and Handling	200	ton	10.00	2,000			
	.04 Erection	200	ton	30.00	6,000			
	.08 Testing		job		3,000			
7	Wye		"		20,000			21'-0" x 14'-0" steel wye in place.
9	Miscellaneous				5,000			
8	Tailrace							Included in building
94	POWER STATION STRUCTURES						478,000	
1	Improvements to Sta. site	20,000	kw	7.50		15,000		
1	Clearing grading preparing grd.		job		5,000			
3	Rds. Walks, and fences		"		3,000			
4	Sewage water supply & ltg.		"		6,000			
9	Miscellaneous				1,000			
2	Station building	20,000	kw	21.30		426,000		
1	Umwatering							
	.01 Earth Dyke	1,000	cu yd	1.00	1,000			
	.08 Removal earth dyke		job		500			
	.01 Pumping		"		4,000			

B-20000

X X

8-3

[redacted] C.V. CHUTER
CHECKED

C.V. PHILLIPS
W.C. CHAPPELL

Cost Analysis

UTAH POWER & LIGHT COMPANY
MINK LAVA HYDRO ELECTRIC PROJECT
MINK DEVELOPMENT
20,000 KW INSTALLATION

June 25, 1924. 192
Sheets No 6

ITEM		ARTICLE	QUANTITY	UNIT	Cost $	Item	Division	Group	DESCRIPTION AND DATA
	2	Excavation							
		.01 Earth	16,500	cu yd	2.00	33,000			
		.02 Rock	4,100	cu yd	8.00	32,800			
		.03 Backfilling		job		2,000			
	4	Concrete (1:3:6)	400	cu yd	25.00	10,000			
	4	Concrete (1:3:6)	6,000	cu yd	20.00	120,000			
	6	Superstructure	430,000	cu ft	.50	215,000			
	7	Crane		job		30,000			Installed - 75 tons capacity
	8	Operators village					41,000		
	1	Improvement to site		"		1,000			
	3	.03 Cottages	4	ea	8000.00	24,000			
		.04 Warehouse and Garage		job		6,000			
113		ROADS, TRAILS AND BRIDGES	30,000	kw	3.00			100,000	
	2	Roads	8	mi	10000.00		80,000		Private road Utah Power & Light Co.
	3	New highway bridge over Bear R.		job			20,000		Crosses river at the power station.
115		TURBO GENERATOR UNITS & ACCESSORIES	30,000	kw	21.95			659,000	
	1	Main turbines including governors	30,000	"	9.60		196,000		Two 15000 H.P. units maximum head 112 ft average head 110 ft 150 rpm.
	1	Machines fob Factory	2	ea	81000.00	162,000			
	2	Freight	8,000	cwt	2.50	20,000			
	3	Hauling and handling	400	ton	10.00	4,000			
	6	Erecting	400	"	30.00	12,000			
	3	Exciter turbine complete in place		job			8,000		
	4	Main Generators	30,000	kw	13.50		405,000		
	1	Contract price	30,000	kw	8.50	170,000			Two 10,000 kw - 150 rpm vertical gen. 6600 v, 3 ph, 60 cyc with two separate M.G. exciters each 17½ kw capacity and one turbine driven exciter, 350 kw capacity.
	2	Freight	7,000	cwt	2.50	17,500			
	3	Hauling and handling	450	ton	10.00	4,500			
	4	Installation		job		10,000			
	9	Miscellaneous				3,000			
	5	Turbine driven exciter generator					15,000		
	1	Contract price	350	kw	30.00	10,500			

B-30000

PREPARED BY W.A. EMLEM
CHECKED BY

W.G. CHAPPELL
C.M. PHILLIPS

UTAH POWER & LIGHT COMPANY
MARK LAVA HYDRO ELECTRIC PROJECT
MARK DAVIS DEVELOPMENT
20,000 KW INSTALLATION

June 25, 1944.
Sheet No. 7

Cost Analysis

INDEX			ARTICLE	QUANTITY	UNIT		TOTALS			DESCRIPTION AND EXPLANATIONS
					Unit	Cost $	Item	Division	Group	
		8	Freight fob siding	400	cwt	2.50	1,000			
		9	Hauling and handling	20	ton	10.00	200			
		6	Installation		job		1,000			
		9	Miscellaneous				300			
	6		Auxiliary equipment					15,000		
		2	Lubricating oil system				5,000			
		3	Service water system				5,000			
		8	Gauges and indicating devices				3,000			
		9	Miscellaneous				2,000			
116			ELECTRICAL EQUIPMENT	20,000	kw	5.25			105,000	
	1		Main switching control & protective equipment	20,000	kw	3.10		62,000		
		1	Oil circuit breakers	4 8	H-203 VK-138-B	3100.00	12,000 4,000			
		2	Air break & Disc. switches				3,000			
		3	Switchboard (Inc. Relays & Instrument Transf.)	9	ea	1500.00	13,500			
		4	Buses, coupers & supports (Incl. switch & Instr. Transf.		job		4,000			
		7	Wiring							
			.01 Conduit				3,000			
			.02 Cable, Insulators & Supp.				4,500			
			.03 Control wiring (Incl. Special Conduit.)				10,500			
		8	Voltage regulators				3,000			
		9	Miscellaneous				4,500			
	8		Auxiliary electrical equipment	20,000	kw	1.20		24,000		
		1	Sta. Service Transformers				6,000			4 - 150 kva Transformers - 60 cycle
		3	M.G. Sets for Sta. Service							
			.01 Contract price	2	ea	30.00	10,500			175 kw
			.02 Freight	400	cwt	2.50				
		5	Storage Battery & Charging Set				4,000			
		9	Miscellaneous				3,500			B-10000

S-42

PREPARED E.V. CRITES
CHECKED

E.C. CHAPPELL
C.M. PHILLIPS

Cost Analysis

UTAH POWER & LIGHT COMPANY
MINK LAVA HYDRO ELECTRIC PROJECT
MINK DEVELOPMENT
40,000 KW. INSTALLATION

June [illegible]

INDEX	ARTICLE	QUANTITY	UNIT		UNIT COST	ITEM	TOTALS Division	TOTALS Group	DESCRIPTION AND DATA
3	Auxiliary switching Control								
	Protective equipment						11,000		
1	Oil Circuit Breakers					800			
2	Air break & Disc. Switches					400		16.6 kv	
3	Switchboard (Incl. Relays and Instrument transformers	8	panel		1800	3,000			
4	Buses Coupl'g & Support (Incl. Bus. & Instr. Tr . f. Coupl.'s)					2,000			
7	Wiring								
	.01 Conduit					1,300			
	.02 Cable Insulator & Supports					1,200			
	.03 Control wiring (Incl. Spec. Cond.)					1,300			
9	Miscellaneous					400			
9	Misc. Electrical Equip.						8,000		
133	SUBSTATION EQUIPMENT	38,000	kva		4.14			411,000	
1	Outdoor Structures						30,000		
1	Improvements to yard site								
	.01 Clearing, grading, draining sodding		job			5,000			
	.02 Railway tracks & trestles and Transfer Tracks					5,000			
	.03 Roads, walks and fences		"			8,000			
	.04 Yard lighting		"			1,000			
2	Yard overhead structures		"			10,000			
3	Yard underground structures		"			5,000			
9	Miscellaneous & Unclassified		"			2,000			
2	Transformers	38,000	kva		3.80		144,000		
1	Cost f.o.b. factory	38,000	"		3.00	105,000			7-5000 kva single phase 60 cyc
2	Freight	5,000	cwt		2.50	12,500			8600/13800 v water cooled. One spare
4	Hauling	380	tons		10.00	3,800			
5	Special foundations & excpt.'s		job			8,000			
									3-20000

9-04

PERFORMED B.V. CRUISE
CHECKED
Cost Analysis

C. CHAPPELL
C.N. PHILLIPS

UTAH POWER & LIGHT COMPANY
MINK LAVA HYDRO ELECTRIC PROJECT
MAIN DEVELOPMENT
20,000 KW INSTALLATION

June 25, 1962

INDEX	ARTICLE	QUANTITY	UNIT		TOTALS Item	Division	Group	DESCRIPTION AND REMARKS
6	Installation		job		3,000			
9	Miscellaneous		"		2,000			
3	High voltage switching control and protective equipment	20,000	kw	1.75		35,000		
1	Oil circuit breakers				16,000			
2	Air break & Disc Switches				12,000			
5	Subs. (Incl. Relays & Instr. Transformers)				1,500			
7	Cond. & Insulators (Incl. wiring & Outdoor buses)				4,000			
9	Miscellaneous							
7	Auxiliary Substation Equipment					12,000		
2	Transformer handling equipment				3,000			
3	Transf. Cooling water System				4,000			
4	Oil Storage & Handling Facilities				4,000			
9	Miscellaneous				1,000			
9	Miscellaneous substation equipment					4,000		
102	GENERAL EQUIPMENT		job				20,000	Includes furniture, storehouse and shop equipment, laboratory and transportation. Sub total 2,644,000
100	CONSTR. PURPOSES ACCOUNTS							
1	CONSTRUCTION EQUIPMENT		"			200,000	321,000	
2	CONSTR. BUILDINGS & FACILITIES		"			30,000		
	INCIDENTAL LABOR EXPENSE					101,000		
1	Carr. and Commissary Loss	3,854,000	%	1.0	39,000			
3	Hospital Expense & Injuries not included in insurance	3,854,000	%	0.5	19,000			
3	Cost of securing labor	3,854,000	%	1.0	39,000			
4	Compensation insurance	3,854,000	%	1.0	39,000			
	OVERHEAD AND CONTINGENCIES	3,881,000	%	5.0			100,000	

L-84

D-20000

PREPARED U.V. CRUTER
CHECKED

W. CHAPPELL
C.M. PHILLIPS

Cost Analysis

UTAH POWER & LIGHT COMPANY
MINK LAVA HYDRO ELECTRIC PROJECT
MINK DEVELOPMENT
20,000 KW INSTALLATION

June 3, 19[illegible]

ITEM	ARTICLE	QUANTITY	UNIT		COST Item	TOTALS Division	Group
152	ENGINEERING AND SUPERVISION						491,000
1	New York Office Engineering	3,105,000	%	4.0	124,000		
2	Local Office Engineering	3,105,000	%	3.0	93,000		
3	Preliminary Investigation		Job		40,000		
4	Construction Fee	3,348,000	%	4.0	134,000		
15E	LAW EXPENDITURES DURING CONSTRUCTION	3,496,000	%	0.5		17,000	
15A	TAXES DURING CONSTRUCTION	3,496,000	%	0.5		17,000	
16A	INTEREST DURING CONSTRUCTION	3,530,000	%	4.0		141,000	
	TOTAL COST WITHOUT LANDS OR TRANSMISSION LINES	20,000	kw	165.55		3,671,000	
	LANDS PURCHASED					20,000	
	TOTAL COST WITHOUT TRANSMISSION LINE					3,671,000	

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D-20000

FURNISHED HAYDENITE
CHECKED G.E. PHILLIPS

W.N. BACK JR

Cost Analysis

UTAH POWER & LIGHT COMPANY
MINK CAVA HYDRO - ELECTRIC PROJECT
CAVA DEVELOPMENT
13,400 KW INSTALLATION

June 27, 1924

Sheets No 1

INDEX C	INDEX D	INDEX I	ARTICLE	Quantity	UNIT Used	UNIT Cost $	TOTALS Item	TOTALS Division	TOTALS Group	DESCRIPTION AND EXPLANATIONS
311			DAM RESERVOIR AND INTAKE	13,400	Kw	46.50			625,000	
312			POWER STATION STRUCTURES	13,400	Kw	45.00			603,000	
313			ROADS TRAILS AND BRIDGES	13,400	Kw	4.48			60,000	
314			TURBO GEN. UNITS & ACCESSORIES	13,400	Kw	25.18			337,000	
315			ELECTRICAL EQUIPMENT	13,400	Kw	6.05			81,000	
316			GENERATION EQUIPMENT	13,400	Kw	11.88			159,000	
341			GENERAL EQUIPMENT	13,400	Kw	2.24			30,000	1,870,000 sub total
150			CONSTRUCTION SUSPENSE ACCOUNTS	13,400	Kw	14.91			200,000	
			OMISSIONS AND CONTING NCIES	13,400	Kw	7.85			105,000	
151			ENGINEERING AND SUPERVISION	13,400	Kw	21.48			288,000	
152			LAW EXPENDITURES DURING CONSTRUCTION	13,400	Kw	.90			12,000	
154			TAXES DURING CONSTRUCTION	13,400	Kw	.90			12,000	
155			INTEREST DURING CONSTRUCTION	13,400	Kw	11.20			150,000	
			TOTAL COST WITHOUT LANDS OR TRANSMISSION LINE	13,400	Kw	198.81			2,660,000	

Approved:

Engineer

This estimate is a part of the application for license made by the undersigned this day of 1924.

UTAH POWER & LIGHT COMPANY
BY

Vice President.

FORM G 1 -19999

PREPARED
CHECKED
Cost Analysis

UTAH POWER & LIGHT COMPANY
BIRK LAVA HYDRO ELECTRIC PROJECT
LAVA DEV ELOPMENT
1 400 KW INSTALLATION

June 27, 19[illegible]

INDEX	ARTICLE	QUANTITY	UNIT	Cost	Cost $	TOTALS Items	Division	Group	DESCRIPTION AND REMARKS
111	Dam, Embankment and Appurtenances	13,400	CY	46.60				623,000	
1	Reservoir						6,000		
7	Maintaining test unless used		Job		6,000				
2	Dam	13,400	CY	41.10			550,000		Mass concrete dam to elev. [illegible] ft, substructure integral with [illegible] spillway contains 3-14' x 20' [illegible] gates and one 11' x 10' trash gate. The method of unwatering [illegible] consists of a crib dam [illegible] River" above the [illegible] and a timber flow 16' x 50' with [illegible] capacity of approximately [illegible] cfs. The flume transverse below [illegible] which is constructed [illegible] 16' x 16' crib and [illegible]
	Unwatering								
	.01 Crib dam		Job		6,000				
	.02 Flume	45	Lin. Ft.	100.00	4,500				
	.03 Dyke	2,000	Cu. Yd.	1.50	3,000				
	.04 Maintenance and Keeping		Job		2,000				
	.06 Dismantling		"		1,000				
	.09 Miscellaneous		"		500				
8	Excavation								Earth [illegible] solid [illegible] in place [illegible]
	.02 Earth and loose rock	8,000	C.Y.	2.50	20,000				
	.04 Solid rock	4,000	C.Y.	3.00	12,000				
	Miscellaneous		Job		4,000				
4	Concrete	34,000	C.Y.	20.00	680,000				Typical [illegible]
6	Auxiliary structures								
	.02 Gate operating bridge		Job		1,000				
8	Misc operating equipment								
	.01 Gates & Guides		"		10,000				Three 11' x [illegible] 10 x 11' [illegible] Delivered [illegible]
	.02 Gate operating motor		"		1,000				
9	Miscellaneous				17,000				

20-10

Preliminary [illegible]

Form No. 0000

PREPARED BY [illegible] H. H. MAGEE.
CHECKED BY [illegible]

Cost Analysis

UTAH POWER & LIGHT COMPANY
BLACK CANYON HYDRO ELECTRIC DEVELOPMENT
LAVA DEVELOPMENT
12,400 KW INSTALLATION

June 27 1924

Sheets No. 3

INDEX	ARTICLE	Quantity	UNIT Used	UNIT Cost $	TOTALS Item	TOTALS Division	TOTALS Group	DESCRIPTION AND EXPLANATIONS
9	Intake	13,400	KW	5.10		68,000		The intake, located at the center of the dam, forms a part of substructure of the power house. The water after passing the screens, flows thru 10'0" I.D. pivot valves (acting as gates) into a concrete well which leads to the steel scroll case.
8	Intake operating equipment							
	.01 Gates & Guides & Screens							
	.011 Equip. F.O.B. Siding	205	Ton	280.00	57,400			2-10'-0" I.D. pivot valves, 1-8'0" I.D. pivot valve, 1-2'-6" I.D. pivot valve.
	0.18 Installation	205	"	30.00	6,150			
	.02 Hoist							Cost of gates include operating mechanism
	.09 Miscellaneous		Job		1,450			60ft gantry handles screens.
8	Miscellaneous		"		3,000			
114	WATERWAYS							No expenditure in this account, small amount of tailrace excavation included in power house.
96	POWER STATION STRUCTURES	13,400	KW	45.00			603,000	
1	Improvement to site	13,400	KW	1.13		15,000		
1	Clearing, Grading & Drainage				5,000			No definite plans
2	Road cuts and Fences				2,000			" " "
4	Sewerage Water Supply & Light				6,000			" " "
9	Miscellaneous				2,000			
3	Station building					464,000		
1	Unwatering and excavation							Included in dam
2	Backfill		Job		2,000			
4	Concrete	24,000	C.Y.	18.00	432,000			1,316 concrete lb. [illegible]
8	Operators cottages	4	Each	6,000		24,000		

11-9c

Drawing No. [illegible]

Prepared D.T. Gordon
Checked D.R. Phillips

W.O. No. [illegible]

Cost Analysis

UTAH POWER & LIGHT COMPANY
[illegible]
[illegible]

June 27, 1944 (9)

Sheets No 4

INDEX Q	INDEX B	INDEX I	ARTICLE	Quantity	UNIT Cost	UNIT Cost $	TOTALS Item	TOTALS Division	TOTALS Group	DESCRIPTION AND EXPLANATIONS
	6		Superstructure	120,000	cu.ft.	.650		60,000		Superstructure built of concrete consisting of two floors in front of the substructure and over generators
	7		Main outdoor crane	75	Ton	500.00		37,500		75 Ton gantry.
	8		Warehouse		Job			4,000		
	9		Miscellaneous		"			9,500		
115			ROADS TRAILS AND RAILROADS	13,400	KW	4.48			60,000	
	1		Railroad connections	1.8	Mile	30,000		45,000		Railroad from end of steel at Grace siding, to Lava Bridge.
	2		Private road to station	1.5	"	10,000		15,000		
116			TURBO GENERATOR UNITS AND ACCESSORIES	13,400	KW	28.15			377,000	
	1		Main turbines					125,000		
		1	Contract Price	2	Each	45,000	90,000			
		3	Freight	8,000	Cwt.	2.50	20,000			
		6	Installation	400	Ton	30.00	12,000			
		9	Miscellaneous				3,000			
	1A		1400 KW Turbine		Job			20,000		
	3		Exciter turbine					7,000		Complete in place.
	4		Main Generators	13,400		11.94		160,000		Two 6600 KW, 150 rpm and one 1400 KW, 6600 v, 3 ph., 300 rpm, 60 cycle vertical [illegible]
		1	Contract Price	13,400	KW	8.58	115,000			
		3	Freight	5,000	Cwt	2.50	12,500			
		5	Hauling & Handling	250	Ton	10.00	2,500			
		6	Installation		Job		10,000			
		7	Cooling System (Air Duct)				10,000			
		9	Miscellaneous				5,000			

R1-06

Drawing # 3-[illegible]

PREPARED C.L. CHILTON
CHECKED C.B. PHILLIPS

Wells MARKER

UTAH POWER & LIGHT COMPANY
MARK LAVA HYDRO-ELECTRIC PLANT
LAVA CANYON, ID
13,400 KW INSTALLATION

June 27, 1924

Sheet No. 5

Cost Analysis

INDEX U	INDEX D	INDEX I	ARTICLE	Quantity	UNIT Unit	UNIT Cost $	TOTALS Item	TOTALS Division	TOTALS Group	DESCRIPTION AND EXPLANATION
	8		Turbine Driven Exciter	90	Kw	111.11		10,000		One 90 Kw r.p.m. vertical [illegible] exciter.
		1	Contract Price	90	Kw	7.90	7,000			
		2	Freight	80	Cwt	2.50	200			
		3	Hauling & Handling	4	Ton	10.00	40			
		6	Installation		Job		2,300			
		9	Miscellaneous				460			
	6		Auxiliary Equipment	13,400	Kw	1.12		15,000		
		2	Lubricating Oil System		Job		6,000			
		3	Service Water System		"		6,000			
		6	Gages and Indicating Devices		"		2,000			
		9	Miscellaneous		"		1,000			
316			[illegible] EQUIPMENT	13,400	Kw	4.85			61,000	
			Main Switching Station and Power-ix Equipment	13,400	"	3.36		45,000		
	3		Oil Circuit Breakers	8	each	2,250.00	18,000			4 - [illegible] Oil Circuit [illegible]
	2		Disconnecting Switches	32	"	100.00	3,200			32 [illegible]
	8		Switchboard Lock, Relays and Instrument Transformers				15,000			7 Panels [illegible]
	6		Buses, compartments and supports incl. switch and instrument transformer compartments.		Job		5,000			
	7		Wiring							
		.01	Conduit		"		1,000			
		.02	Cable, Insulators & Supports		"		3,000			
		.03	Control Wiring (incl. special conduit)		"		1,000			

Drawing [illegible]

81-82

PREPARED BY: C.E. CRUTER
CHECKED BY: D.E. PHILLIPS

Cost Analysis

UTAH POWER & LIGHT COMPANY
MINK CREEK HYDRO ELECTRIC PROJECT
LAVA DEVELOPMENT
13,400 KW INSTALLATION

June 27, 1924
Sheet No. 6

INDEX	ARTICLE	QUANTITY	UNIT	COST	TOTALS	Division	Group	DESCRIPTION AND REMARKS
0	Voltage Regulators							Included with G. E.
0	Miscellaneous		Job		1600			
2	Auxiliary Elec. Equip.	13,400	Kw	1.86		25,000		
1	Station Service Trans.	480	Kva	7.00	6000			4 - 200 Kva power transformers and 2 - 25 Kva Ltg. Transf. 6600/220-110 V, 3 phase, 60 cycle.
3	Motor Gen. Sets Exciters	280	Kw	56.00	13,000			2 - 90 Kw and 1-50 Kw 125 V Gen. and 220 V, 3 phase, 60 cycle motor.
5	Storage Batteries and Charging Sets				3,000			1 - 2½ Kw battery Charger and 2-11 Kw. Battery.
9	Miscellaneous				4,000			
3	Aux. Switching, Control and Protective Equip.	13,400	Kw	.82		11,000		
1	Oil Circuit Breakers	3	Each	3,000	9,000			1 - [illegible] oil circuit breakers
2	Disconnecting Sws.	6	"	100	600			
5	Switchboard (Incl.Relays & Instr. Transf.)	3	"	1,000	3,000			1 - Benchboard section 2 - vertical sec.
6	Buses, conductors and supports (incl. switch and instr. transf. conns.)		Job		800			
7	Wiring							
	.01 Conduit		"		600			
	.02 Cable insulators and supports		"		2,000			
	.03 Control wiring (incl.special conn.)		"		600			
9	Miscellaneous				600			
4	[illegible]							
1	Outdoor Structures	13,400	Kw	1.19		16,000		
1	Improvements to Yard Site		Job		6,000			
2	Yard overhead structure		"		10,000			

Drawing 4-1000

PREPARED [illegible]
CHECKED [illegible]

Cost Analysis

UTAH POWER & LIGHT COMPANY
MARYSVALE HYDRO ELECTRIC PROJECT
LAVA DAM NORTH
13,400 KW INSTALLATIONS

June 27, 1924

Sheet No. 7

INDEX	ARTICLE	Quantity	UNIT Used	Cost $	TOTALS Item	Division	Group	DESCRIPTIONS AND CALCULATIONS
3	Transformers	13,400	kw	4.48		60,000		
3 1	Contract Price	13,000	Kva		50,000			4-3,000 Kva, 1 phase, 60 cycle transfo 6600/130,000 v.
3 2	Freight	940	Cwt.	2.50	2,350			
3 3	Hauling & Handling	27	Ton	1000	270			
3 4	Special Foundations				2,000			
3 5	Installation		Job		2,000			
3 9	Miscellaneous				4,380			
5	High Voltage Switching Control & Protective Equip.	13,400	kw	5.82		78,000		
5 1	Oil Circ. Breakers		Job		55,000			3 PK - 136 Oil Circuit Breakers
5 2	Air Break & Disc. Swe.		"		6,000			
5 5	Switchboard (Meas.)		"		1,000			
5 7	Conductors & Insulators		"		1,000			
5 9	Miscellaneous		"		5,000			
9	Miscellaneous Substations Equip.					5,000		
161	[illegible]						30,000	Sub total 1,093,000
169	CONSTRUCTION SUSPENSE ACCOUNTS						200,000	
1	Construction Equipment					100,000		
2	Constr. Building & Facilities					30,000		
3	Incidental labor expense					70,000		
3 1	Camp & Commissary loss	2,023,000	$	1.0	20,000			
3 2	Hosp. Exp. & Injuries not included in Insurance	2,023,000	$	.5	10,000			
3 3	Cost of securing labor	2,023,000	$	1.0	20,000			
3 4	Compensation Insurance	2,023,000	$	1.0	20,000			
							105,000	
183	COMMISSION & CONTINGENCIES ENGINEERING AND SUPERVISION	2,023,000	$	5.0			405,000	

51-04

Drawing [illegible]

PREPARED B.W. GRIMM
CHECKED C.B. PHILLIPS
E.H. MARSH

Cost Analysis

UTAH POWER & LIGHT COMPANY
MEKJAYA HYDRO ELECTRIC PROJECT
JAVA
18,400 KW INSTALLATION

June 27, 1954
Sheets No 8

INDEX	ARTICLE	QUANTITY	UNIT		TOTALS			DESCRIPTIONS AND EXPLANATIONS
			Used	Cost $	Item	Division	Group	
	3 N.Y. Office Engineering	2,100,000	%	4.0		80,000		
	3 Local Office Engineering	2,100,000	%	3.0		66,000		
	3 Preliminary Investigation		Job			36,000		
	4 Construction Svc	2,000,000	%	4.0		96,000		
182	LAND EXPENDITURES DURING CONSTRUCTION	2,666,000	%	.5			12,000	
183	TAXES DURING CONSTRUCTION	2,666,000	%	.5			12,000	
184	INTEREST DURING CONSTRUCTION	2,510,000	%	6.0			150,000	
	TOTAL COST WITHOUT LANDS OR TRANSMISSION LINES	13,400	Kw	190.51			2,660,000	

91-04

Drawing No. B-19999

X

EXHIBIT O

Mink-Lava Project

STATEMENT OF TIME REQUIRED FOR CONSTRUCTION

Construction work on the Mink Development, which gives an estimated capacity of 3170 hp as set forth in this application as Exhibit "I", will be commenced as soon as practical after the license is secured and, it is hoped, completed two years after that date.

Construction work on the Lava Development will be started within such time after the completion of the Mink Development as the needs of the market require and it is expected can be completed two years after date of commencement.

This statement is a part of the application for license made by the undersigned this 11th day of July, 1924.

UTAH POWER & LIGHT COMPANY

By _____

Vice-President

UTAH POWER & LIGHT COMPANY

APPLICATION TO FEDERAL POWER COMMISSION FOR LICENSE UNDER ACT OF JUNE 10, 1920 (41 STATS., 1063) FOR MIDDLE SNAKE PROJECT IDAHO

POOR QUALITY
DOCUMENT
NOT ON FILM

ACCESSION NO: 8403070358

REQUEST FROM CENTRAL FILES

NUMBER OF PAGES 7

said Lava and said Revised Mink units, whereby the Licensee may be authorized to construct, maintain, and operate in the vicinity of Alexander, in the Counties of Caribou and Bannock, and in the vicinity of Preston, in the County of Franklin, respectively, State of Idaho, certain project works, as hereinafter described, necessary or convenient for the development, transmission, and utilization of power, and to occupy and use therefor certain lands of the United States, as hereinafter described, together with all riparian rights appurtenant thereto which are necessary or useful for the purposes of said Lava and said Revised Mink units; and

WHEREAS, the Licensee has submitted to the Commission satisfactory evidence of its compliance with the laws of the State of Idaho, as required by section 9, subsection (b) of the Act, and the Commission is satisfied as to the ability of the Licensee to carry out the plans for said Lava and Revised Mink units of the project as filed with said application; and

WHEREAS, notice of said application has been given and published by the Commission, as required by section 4 of the Act; full opportunity has been given to all interested parties to be heard, and no application for said project, or in conflict therewith, has been filed by any State or municipality; and

WHEREAS, the maps, plans, and specifications of said Lava and Revised Mink units of the project and of said project works, as hereinafter described, have been approved by the Commission, and the Commission has found that said Lava and Revised Mink units of the project, as hereinafter described, will be best adapted to a comprehensive scheme of improvement and utilization for the purposes of water-power development and of other beneficial public uses, and that the license therefor will not interfere or be inconsistent with the purpose for which any reservation affected thereby was created or acquired; and

45

WHEREAS, it appears desirable to confer the desired authority by amendment of said license of July 5, 1923, in order that all units of said project, as covered by said preliminary permit of July 19, 1921, may be embraced within the same license;

NOW, THEREFORE, the license issued to the Licensee on July 5, 1923, as aforesaid, is hereby amended as follows, upon the express condition, however, that such amendment shall not operate to alter or amend said license in any other respect than as herein specified, and shall not in any way constitute a waiver of any other part, provision or condition of said license:

PARAGRAPH I. Article 1 of said license is amended by adding thereto the list of exhibits descriptive of the said Lava and Bevised Mink units and by making certain minor modifications in wording so that said article shall read as follows:

> 'Article 1. This license is issued for a period of fifty (50) years from the date hereof for a project located on Bear River, Idaho, and partly on public lands of the United States and partly within the Cache National Forest, consisting of—
>
> A. All lands constituting the project area and included, or the location of which is shown, by the project boundary, and/or interests in such lands necessary or useful for the purposes of the project, whether such lands or interests therein are owned or held by the Licensee or by the United States; such project area and project boundary being more fully shown and described by certain exhibits which accompanied said application for License and which are designated and described as follows:
>
> EXHIBIT
>
> EXHIBIT B: Statement of the nature, extent and ownership of water rights and lands, signed by E. V. Hill, Vice President, and received in the office of the Federal Power Commission on August 16, 1923;

Exhibit J: General map of entire project (Serial No. P-13792), in two sheets, as follows:
Sheet 1 (revised
Signed by E. W. Hill, Vice Pres., Jan. 9, 1923;
Sheet 2. Signed by E. W. Hill, Vice Pres., Aug. 10, 1922;

Exhibit K: Detailed map, as follows:
General plan of development (Serial No.P-13793);
General contour map and schedules of foundations (Serial No. P-13794);
Revised and signed by E. W. Hill, Vice Pres., Jan. 9, 1923.

LAWA AND REVISED MINK UNITS

Exhibit F: Statement of the nature, extent and ownership of Lands, signed by E. W. Hill, Vice President, and received in the office of the Federal Power Commission, July 17,1924;

Exhibit J: A general map of Lawa and Mink developments, signed by E. W. Hill, Vice President, and received in the office of the Federal Power Commission, April 3, 1925 (Serial No.P-13567);

Exhibit K: A detail map of Lawa and Mink developments, signed by E. W. Hill, Vice President, and received in the office of the Federal Power Commission, April 3, 1925 (Serial No. P-13793);

3. All water rights, reference to which is made in a certain exhibit accompanying application for license for the Lawa Unit, designated as Exhibit H, said exhibit being signed by E. W. Hill, Vice President, and received in the office of the Federal Power Commission on August 16, 1922.

4. All project works, consisting of—

(1) Lawa Unit,
A gravity concrete dam about 70 feet high in Bear River, a reservoir, and a concrete power house built integral with the dam, the location, nature and character of which project works are more fully shown and described by certain exhibits which accompanied application for license applicable to Lawa Unit and which are designated and described as follows:

Exhibit K: Detailed map, as follows:
General plan of development (Serial No.P-13795);
General contour map and character of foundations (Serial No.P-13794); revised and signed by E.W.Hill, Vice Pres., Jan.9,1933;

Exhibit L: Plans of power house and dam in 2 drawings, as follows:
No. 1. Elevation and sections (Serial No.P-13797);
No. 2. Plan, sectional plans and section E-E (Serial No.P-13796); revised and signed by E. W. Hill, Vice Pres., Jan. 9, 1933;

Exhibit M: Specifications, as follows:
Two typewritten sheets, filed with original application for license and signed by E. W. Hill, Vice Pres., Aug. 10, 1932, as modified by paragraphs 1 to 5, pages 1 and 2, of instrument designated 'Application for Amendment to License ***** Soda Project, Bear River, Idaho, Utah Power & Light Company'. Signed by E. W. Hill, Vice Pres., Jan. 9, 1933.

(3) Lava and Cleveland Mink Units.

(a) Lava Unit
A gravity concrete dam in Bear River, a reservoir, and a concrete power house built integral with the dam.

(b) Cleveland Mink Unit
An earth fill dam in Bear River, a reservoir, a concrete lined tunnel, surge tank and penstocks, and a concrete power house, the location, nature and character of which project works are more fully shown and described by certain exhibits which accompanied application for license applicable to Lava and Cleveland Mink Units and which are designated and described, as follows:

Exhibit K: A detail map of Lava and Mink developments, signed by E. W. Hill, Vice President, and received in the office of the Federal Power Commission, April 3, 1933 (Serial No. P-13799);

Exhibit L: Design drawings in six sheets, designated Drawings Nos. 1 to 6, in-

Exhibit L:(cont)
clusive, signed by E. W. Hill, Vice President, sheets 1 to 5, inclusive, having been received in the office of the Federal Power Commission, July 17, 1924,(Serial Nos. P-13564, P-13568,P-13581-2-3) and sheet #6 on April 3, 1925 (Serial No. P-14535);

Exhibit M: Description of mechanical, electrical and transmission equipment on three typewritten sheets, signed by E. W. Hill, Vice President, pages 2 and 3 having been received in the office of the Federal Power Commission, July 17, 1924, and page 1, April 3, 1925.

D. All other structures, fixtures, equipment, or facilities used or useful in the maintenance and operation of the project, whether owned by the Licensee or by the United States, and located upon the project area, including such portable property as may be used and useful in connection with the project or any part thereof, whether located on or off the project area, if and to the extent that the inclusion of such property as a part of the project works is approved or acquiesced in by the Commission; also all other rights, easements, or interests, including said riparian rights, the ownership, use, occupancy or possession of which is necessary or appropriate in the maintenance and operation of the project or appurtenant to the project area.

E. The maps, plans, specifications, and statements designated and described in paragraphs A, B, C, and D hereof, and approved by the Executive Secretary for the Commission in accordance with its authorizations of August 17, 1923, February 5,1925, and October 10,1927, are hereby made a part of this license, and no substantial change shall hereafter be made in said exhibits, or any of them, until such change shall have been approved by the Commission: Provided, however, that if the Licensee deems it necessary or desirable that said approved maps, plans, specifications and statements, or any of them, be changed, there shall be submitted to the Commission, for approval, amended, supplemental, or additional maps, plans, specifications and statements covering the proposed changes, and upon approval by the Commission of such proposed changes, such amended, supplemental or additional maps, plans, specifications and statements shall become a part of this license and shall supersede, in whole or in part, such map, plan, specification, or statement, or part thereof, thereto/fore made a part of this license as may be specified, respectively, in the order of endorsement of approval."

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PARAGRAPH II. Article 2 of said license is amended by adding thereto requirements respecting the time of commencement and of completion of the Revised Mink and Lava units, so that the article shall read as follows:

"Article 2. Subject to the provisions of section 13 of the Act, the Licensee shall begin the construction of the project works of the Soda Unit on or before August 1, 1923; of the Revised Mink Unit on or before July 1, 1929, and of the Lava Unit on or before July 1, 1933, and shall in good faith and with due diligence prosecute and complete the Soda Unit on or before July 1, 1926, the Revised Mink Unit on or before July 1, 1932, and the Lava Unit on or before July 1, 1936."

PARAGRAPH III. Article 4 of said license is amended to provide for supervision of the operations under the license by a field representative of United States Geological Survey, appointed by the Director of the United States Geological Survey, so that the article shall read as follows:

"Article 4. The work of construction under this license, whether or not conducted upon lands of the United States, shall be subject to the inspection and approval of a field representative of the United States Geological Survey, appointed by the Director of the United States Geological Survey, or of such other officer or agent as the Commission may designate, who shall be the authorized representative of the Commission for such purposes. The Licensee shall notify such representative of the date upon which work will begin, and as far in advance thereof as said representative may reasonably specify, and shall notify him promptly, in writing, of any suspension of construction for a period of more than one week, and of its resumption and completion."

PARAGRAPH IV. Article 7 of said license is amended to provide for additional gaging stations required in the reservoirs and tailraces of the Revised Mink and Lava units, so that the article shall read as follows:

"Article 7. For the purpose of determining the stage and flow of the stream or streams from which water is to be diverted for the operation of said project works and of the amount of water held in and drawn from storage, the Licensee shall install gages to show the elevation of the water surface in the reservoirs and the discharge of Bear River in or below the tailraces of the respective units of power development covered by this license and shall provide for the required readings of such gages and for the adequate rating of said station or stations. The Licensee shall also install and maintain standard meters adequate for the determination of the amount of electric energy generated by said project works. The number, character, and location of gages, meters or other measuring devices, and

the method of operation thereof may be altered from time to time if necessary to secure adequate determinations, but such alteration shall not be made except with the approval of the Commission or its authorized representative or upon the specific direction of the Commission. The installation of gages, the ratings of said stream or streams, and the determination of the flow thereof shall be under the supervision of the District Engineer of the United States Geological Survey having charge of stream gaging operations in the region of said project, and the Licensee shall reimburse the said United States Geological Survey for costs incurred in such supervision or for such part thereof as said District Engineer may deem equitable in the circumstances. The Licensee shall keep accurate and sufficient record of the foregoing determinations to the satisfaction of the Commission, shall make return of such records annually, at such time and in such form as the Commission may prescribe."

PARAGRAPH V. Article 14 of said license is amended by striking out said article in toto and substituting therefor the following:

"Article 14. The Licensee hereby agrees as a condition of this license, that the amount to be entered upon the fixed capital accounts of said project with respect to said Revised Mink and Lava units, respectively, and reported to the Commission as representing the actual legitimate cost thereof and the actual legitimate investment therein up to July 1, 1927, whether consisting of expenditures actually made, of charges accrued, or of liabilities or obligations incurred, shall be determined by the Commission in accordance with the provisions of the Act and of the regulations established thereunder, and that as an aid to the Commission in making such determination, the Licensee shall present to the Commission for its consideration such available documentary or other evidence, or statements, or exhibits as the Commission may require, together with such additional evidence, if any, as the Licensee may consider relevant to such determination; and, in order to aid the Commission in determining the net investment of the Licensee in said project and in each unit thereof, it is further agreed by the Licensee that upon completion of the construction of Revised Mink and Lava units, respectively, and, as to the Soda Unit, when called for by the Commission, or upon the completion of the construction of any additions to or betterment of any of said units of said project, the Licensee shall file with the Commission a statement, under oath, in duplicate, in such detail as the Commission may require, showing the actual legitimate cost of construction thereof, together with the price paid for water rights, rights of way, lands or interest in lands constituting any part of the project property subject to the provisions of this license, all as specified in regulation 20, section 2, of said rules and regulations. Such statement or statements shall include all proper and legitimate costs, whether incurred prior to July 1, 1928, with respect to the Soda Unit, or to July 1, 1927, with respect to the Revised Mink and Lava units, or subsequent to said dates, and the Licensee shall, if requested by the Commission, show separately on such statement or statements the items and amounts of cost incurred prior

to and subsequent to said dates, respectively, with such other detail with respect to the cost of the project or any part thereof as the Commission may require. Each and every item of cost included in such statements shall be supported by proper voucher or other record; and any such voucher or record, or certified copy thereof, in support of any item properly includible in said cost shall become a part of the permanent records of said project and shall be kept and retained by the Licensee in the manner required by the Commission."

PARAGRAPH VI. Article 15 of said license is amended by adding thereto the following:

"for Soda Unit, 6,700 horsepower for Lava Unit, and 8,000 horsepower for Revised Mink Unit";

so that the article shall read as follows:

"Article 15. The Licensee shall pay to the United States reasonable annual charges for the purpose of reimbursing the United States for the costs of the administration of the Act and for recompensing it for the use, occupancy, and enjoyment of its lands or other property hereinbefore described. The payment by the Licensee of such annual charges for any calendar year shall be made to the United States at the end of the year, or within thirty days thereafter, upon bills rendered or approved by the Commission. Such charges shall be determined in accordance with the provisions of regulation 14 of said rules and regulations of the Commission, and for the purposes of such determination, the power capacity upon which shall be based the charges for reimbursing the United States for the costs of administration of the Act, and for recompensing it for the use, occupancy, and enjoyment of lands of the United States, shall, subject to the provisions of section 3 of said regulation 14, be taken as 5,120 horsepower for Soda Unit, 6,700 horsepower for Lava Unit, and 8,000 horsepower for Revised Mink Unit."

IN WITNESS WHEREOF, the Federal Power Commission has caused its name and seal to be hereto signed and affixed by O. C. Merrill, its Executive Secretary, this 14th day of December, 1927, pursuant to authority given by the Commission at its meeting on December 10, 1927, a certified copy of the record thereof being hereto attached.

FEDERAL POWER COMMISSION

By O. C. Merrill
Executive Secretary.

IN TESTIMONY OF ACCEPTANCE of all the terms and conditions of the Federal water power act of June 10, 1920 (41 Stat., 1063), and of the further conditions imposed in the foregoing instrument, the Licensee, this 28th day of November, 1927, has caused its name and corporate seal to be hereto signed and affixed by Lafayette Hanchett, its President, pursuant to a resolution of its Board of Directors, passed on the 28th day of November, 1927, a certified copy of the record thereof being hereto attached.

UTAH POWER & LIGHT COMPANY

By Lafayette Hanchett
President.

ATTEST:

Secretary.

253

THIS IS TO CERTIFY that the Board of Directors of Utah Power & Light Company, at a meeting thereof duly and regularly called and held at the Company's office in Salt Lake City, Utah, on Monday, the 28th day of November, 1927, adopted a resolution with its preamble, of which the following is a correct and accurate copy.

"WHEREAS, the Company made application to the Federal Power Commission for a preliminary permit covering Soda, Lava, Narrows and Mink Sites on Bear River, which preliminary permit was issued on July 19, 1921; and

"WHEREAS, the Company, on August 16, 1922, made application under said preliminary permit for a license covering the Soda Project only, which was granted by the Commission on July 5, 1923, and on July 19, 1924 the Company made application to said Power Commission for license covering the Lava and revised Mink Projects, the latter of which included the Narrows project above referred to, and

"WHEREAS, the Federal Power Commission has tendered to the Company an amendment of the Soda license, entitled 'Amendment of License No. 1, Project No. 20, Idaho,' whereby the same will include the Narrows and revised Mink Projects, the terms and conditions of which amended license have been noted and considered.

"NOW, THEREFORE, BE IT RESOLVED:

"That all the terms and conditions of the Federal Water Power Act of June 10, 1920, and the modifications thereof, together with the further terms and conditions imposed by said Amended License No. 1, be, and the same are hereby, accepted by this Company, and in evidence of such acceptance the President of this Company be, and he is hereby, authorized and directed on this Company's behalf to execute an endorsement upon said amended license to that effect to which the Secretary shall affix and attest the Company's seal; and the Secretary shall be, and he is hereby, further directed to certify and deliver to said Commission a copy of this Resolution."

Secretary.

Dated at Salt Lake City, Utah,
November 28th, 1927.

Lee
.54

UTAH POWER & LIGHT COMPANY

71 BROADWAY

NEW YORK April 1, 1925

Executive Secretary
Federal Power Commission
Washington, D. C.

Dear Sir:

Reference is made to your letter of December 5th, 1924, Project, Idaho (No. 20), Utah Power & Light Company:

Herewith and under separate cover are returned the several parts of the Mink-Lava application which have been corrected in compliance with the suggestions made in your letter above referred to. The parts returned herewith are:

(a) Photostat copies of Exhibits J, K and L in triplicate;

(b) Triplicate copies of page 2 of the application;

(c) Triplicate copies of Exhibit L;

(d) Triplicate copies of the first page of Exhibit M;

(e) Sheets 1, 8 and 9 of the Mink cost estimate under Exhibit M.

Will you kindly substitute these sheets for their equivalent in the copies of the application now in your office and also remove and destroy Sheet No. 10 of the cost estimate which is now of no purport.

Under separate cover are being sent revised tracings with duplicate blueprints as follows:

(a) Exhibit J, Drawing #1;

(b) Exhibit K, Drawing #1;

(c) Exhibit L, Drawings #1, 2, 3, 4, 5 and 6.

It is believed that the application will, when the above requested substitutions have been made, be in compliance with your letter of December 5th.

Yours very truly,

WOL:EW

W. O. Leighton

For the Utah Power & Light Co.

(b) Water Conduits - Mink Development

The intake will contain the screens together with a cylinder gate 25-ft in diameter. The water will be conducted from the intake to the units through a 21-ft diameter concrete lined tunnel, having a 40-ft diameter surge tank near the lower end, and then through two 14-ft diameter steel penstocks to the units. There will be a valve in each penstock to control the flow of water to the units.

(c) Power House - Mink Development

The power house for this development will be built on the easterly side of the river below and apart from the dam. There will be a superstructure to this station, including a traveling crane provided to run over the generator floor to handle all heavy station equipment, transformers, etc.

The station substructure will house two 15,000 hp vertical water turbines to operate at approximately 150 rpm under a normal head of 110-ft. The turbines will be direct connected to vertical 10,000 kw, 6600 v, 3 ph, 60 cyc generators. The substructure will also contain all the auxiliary equipment such as switchboard, waterwheel driven exciter, motor generator exciter sets, oil switches, station transformers, governors, lubricating oil and governor oil systems. Plans, elevations and sections of the power house and dam are shown on drawings under Exhibit "L", these drawings being as follows:

Exhibit "L" - Mink - General Plan
Exhibit "L" - Mink Power House - Sections and Details
Exhibit "L" - Mink Dam - Sections and Details

(d) Transmission Lines - Mink Development

The only transmission lines included under this application will be a stub about 60-ft long running from the station transformers to the adjoining sectionalizing switchyard. This switchyard will be a part of the interconnected transmission system and located on lands owned in fee by applicant.

EXHIBIT L

Link-Lava Project

GENERAL DESIGN DRAWINGS

This exhibit, consisting of:

No. 1 - Link - General Plan

No. 2 - Link - Power House Sections and Details

No. 3 - Link Dam - Sections and Details

No. 4 - Lava - General Plan and Downstream Elevation

No. 5 - Lava - Power House and Dam - Sections and Details

No. 6 - Link - Plan and Section - Showing Character of Foundations

has been presented in roll form as defined by Regulation 2, Section 4, Paragraph C of the Rules and Regulations of the Power Commission. One tracing and two blueprints of each drawing are submitted and in addition, photoprints are hereto attached.

This statement is a part of the application for license made by the undersigned this 11th day of July, 1924.

UTAH POWER & LIGHT COMPANY

By _____

Vice President

THIS EXHIBIT... M ...CONSISTING OF 3 PAGES ...SUBMITTED WITH AND MADE A PART OF APPLICATION OF THE UTAH POWER & LIGHT CO. FOR AN LICENSE FOR PROJECT NO. 20 IDAHO IS RECOMMENDED FOR APPROVAL.

...CHIEF ENGINEER

APPROVED OCTOBER 19 1927
BY ORDER OF THE FEDERAL POWER COMMISSION

...EXECUTIVE SECRETARY

{AMENDMENT OF LICENSE ISSUED DECEMBER 14 1927

...EXECUTIVE SECRETARY

(For sheets 2+3 see application proper)

EXHIBIT H

Mink-Lava Project

DESCRIPTION OF MECHANICAL, ELECTRICAL AND
TRANSMISSION EQUIPMENT

Mink Development

There will be installed in the substructure of the power house two vertical water turbines direct connected to vertical water-wheel generators. These turbines will be designed to develop 15,000 hp under a head of 110 ft when running at a speed of 150 rpm. They will be controlled and regulated by oil pressure governors with motor for switchboard control.

The station superstructure will house an electrically operated travelling crane for handling all mechanical equipment. The crane will have a capacity of 75 tons with auxiliary hoist of 10 ton capacity.

The auxiliary mechanical equipment will consist of lubricating and governor oil pumps, oil sump tanks, oil filter, and air compressor.

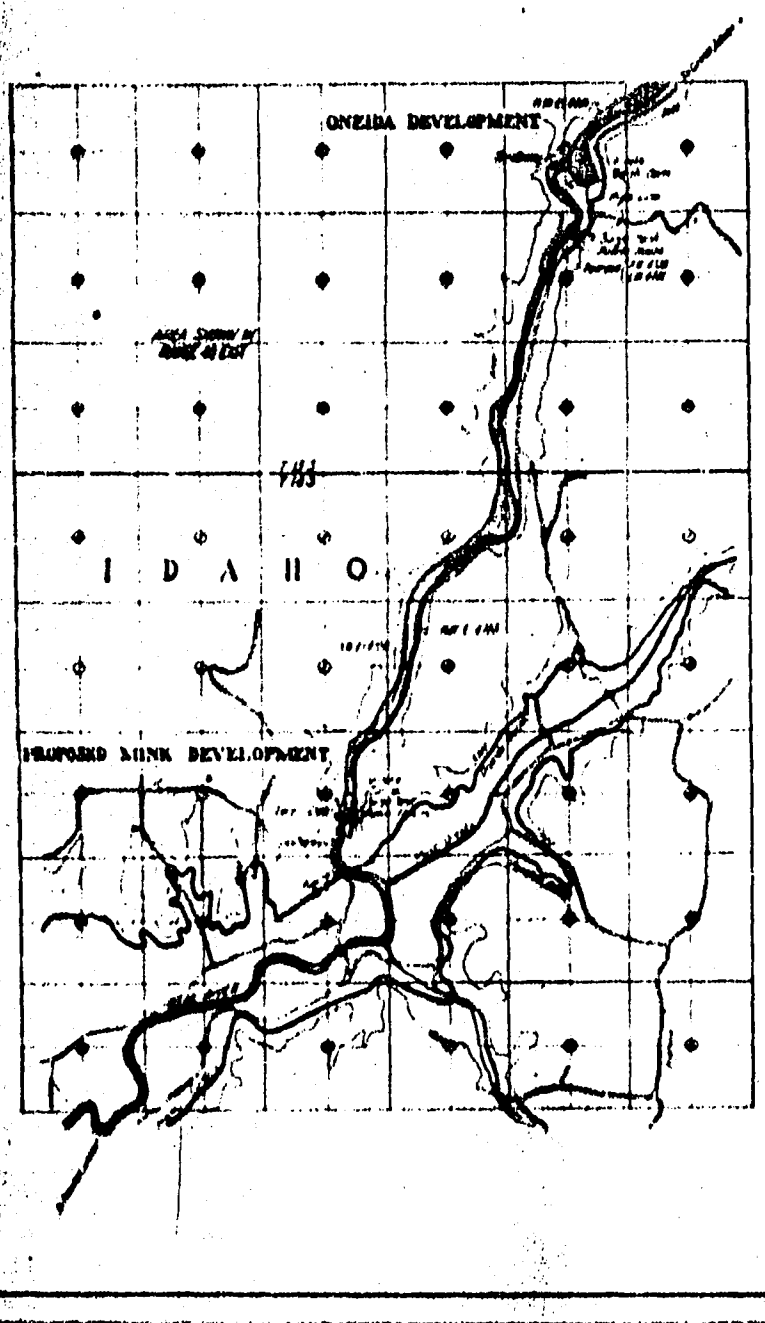
Electrical Equipment

The generators to be installed will be 10,000 kw, 6600 v, 3 ph, 60 cyc, 150 rpm, vertical shaft waterwheel type. There will be a 350 kw waterwheel driven exciter together with two 175 kw motor driven exciters. The 6600 v oil switches and control switchboard for generator, transformers and outgoing lines will be placed in the operating room below the generator floor level. A storage battery will be provided for control of the oil circuit breakers.

Facilities for storage of oil, for storage of materials and for making repairs to equipment will be provided as indicated on drawings.

Transmission Lines

The only transmission lines included under this application will be a stub about 50 feet long running from the station transformers to the adjoining sectionalizing switchyard. This switchyard will be a part of the interconnected transmission system and located on lands owned in fee by applicant.



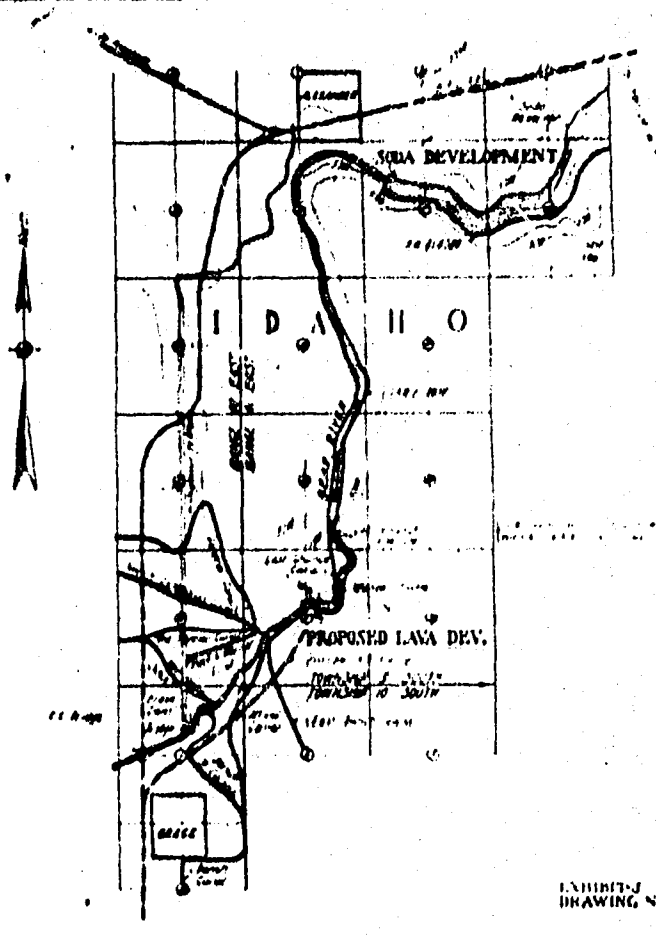
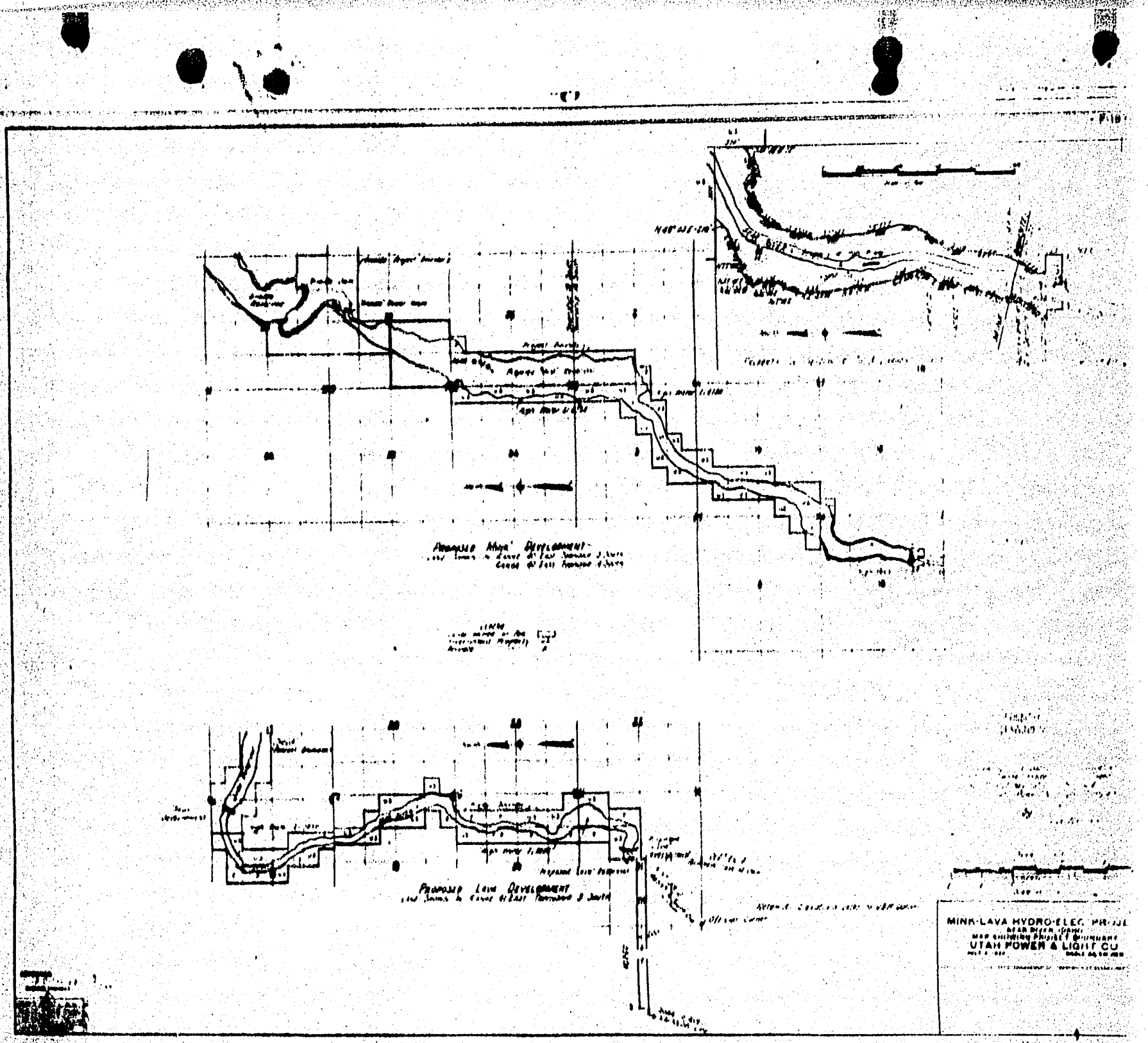
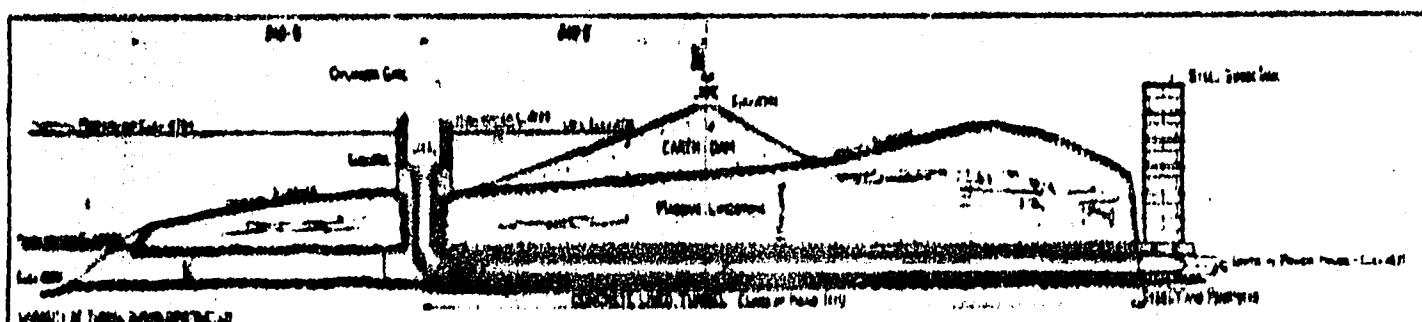


EXHIBIT-J
DRAWING NO-1

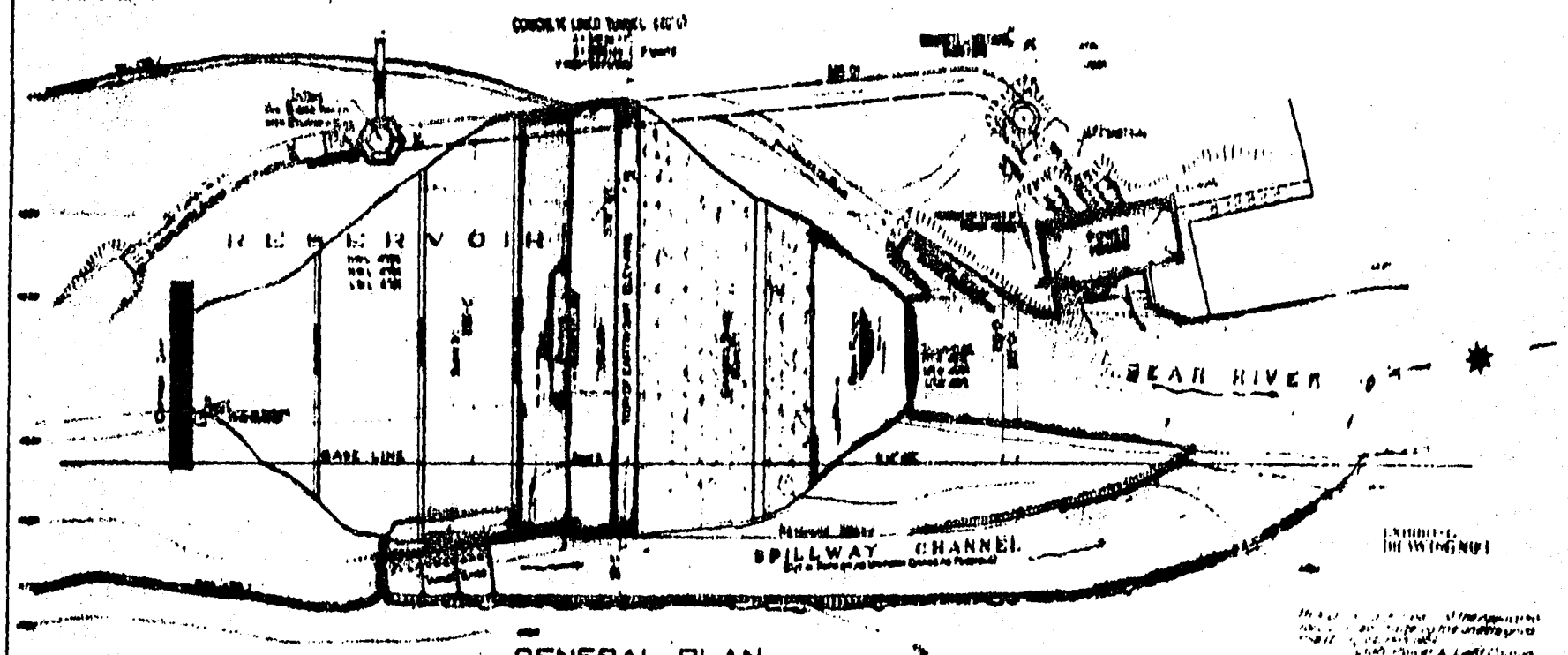
SCALE 1" = 20000'

MINK-LAVA HYDROELEC. PROJECT
SNAKE RIVER, IDAHO
SCALE OF ENTIRE PROJECT
UTAH POWER & LIGHT CO.

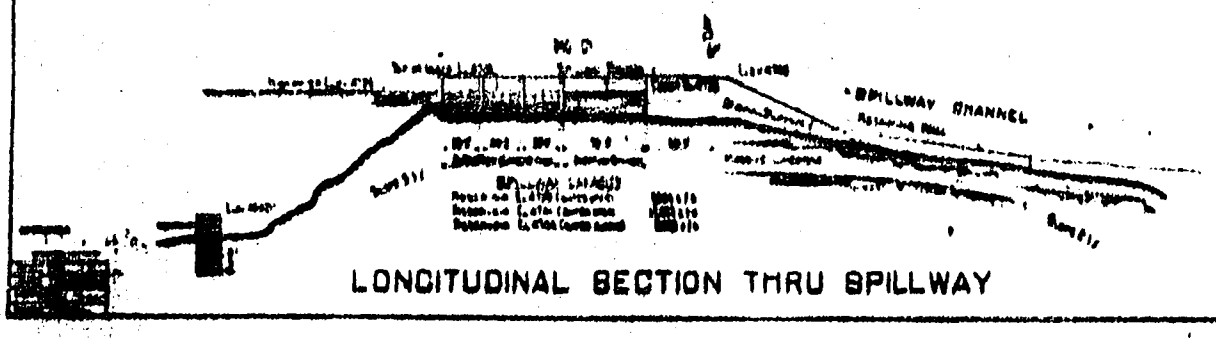

MINK-LAVA HYDRO-ELEC. PROJECT
UTAH POWER & LIGHT CO.



LONGITUDINAL SECTION THRU TUNNEL

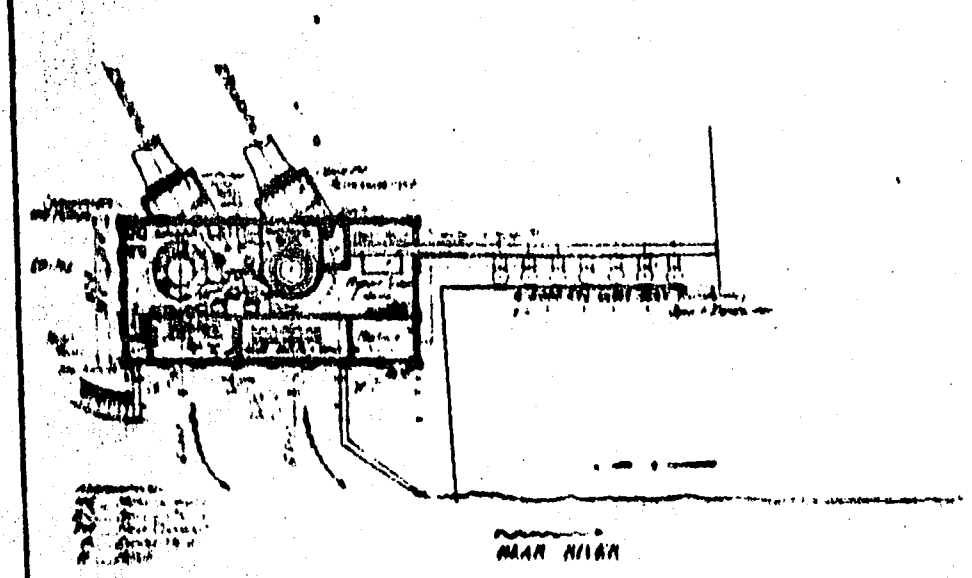


GENERAL PLAN



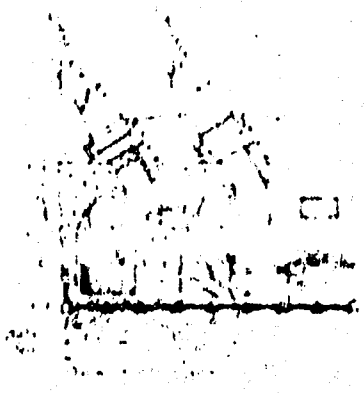
LONGITUDINAL SECTION THRU SPILLWAY

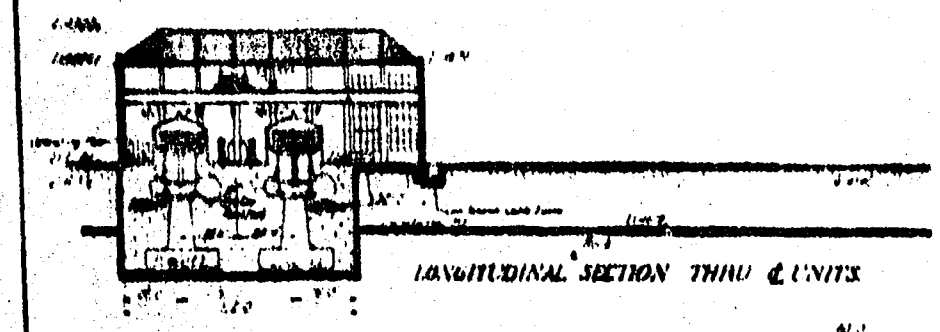
MINK-LAVA HYDRO-ELEC PROJECT
BEAR RIVER BASIN
UTAH POWER & LIGHT CO.



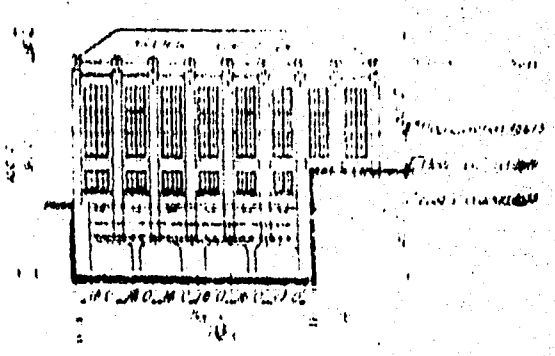
MAIN RIVER

OPERATING FLOOR PLAN

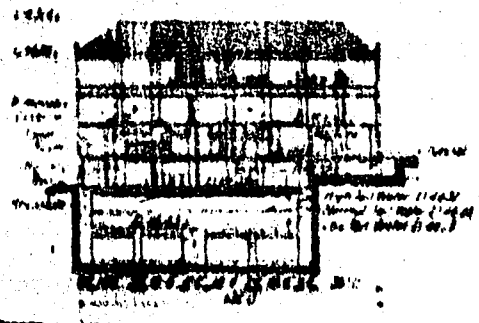


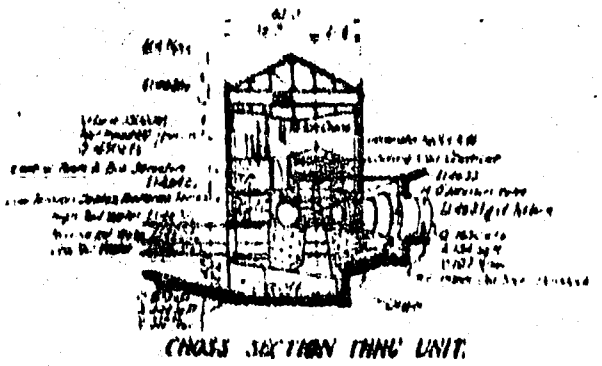


LONGITUDINAL SECTION THRU ℄ UNITS



DOWNSTREAM ELEVATION



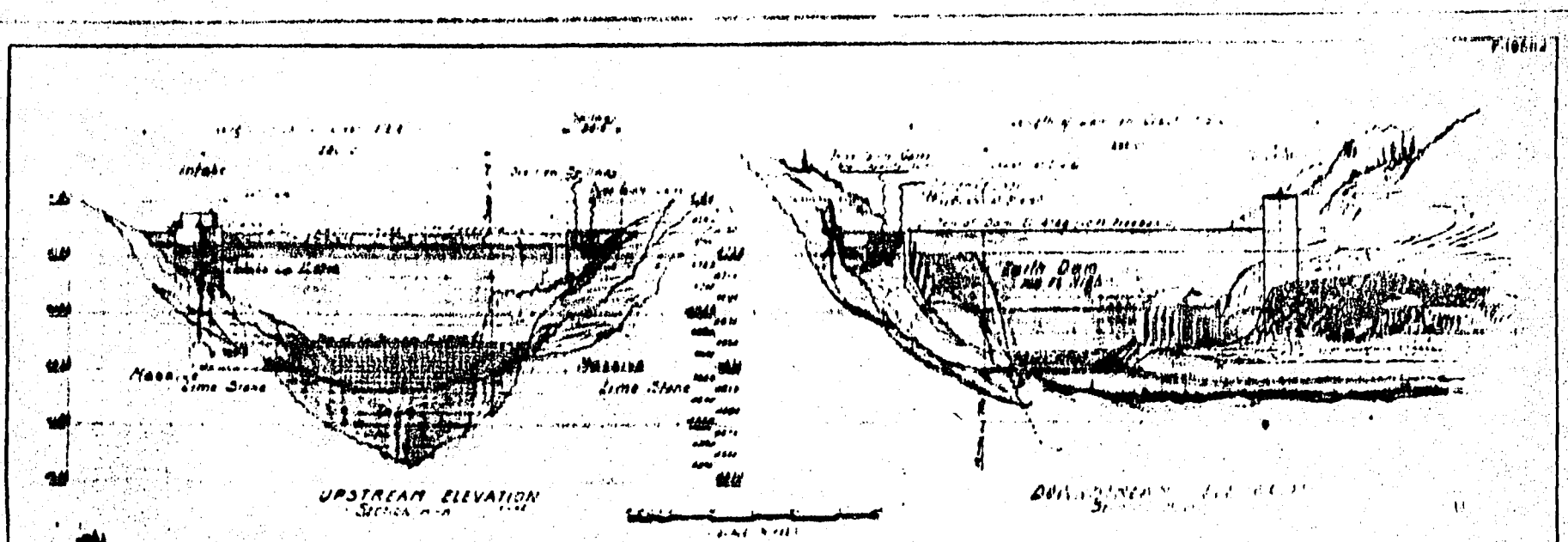


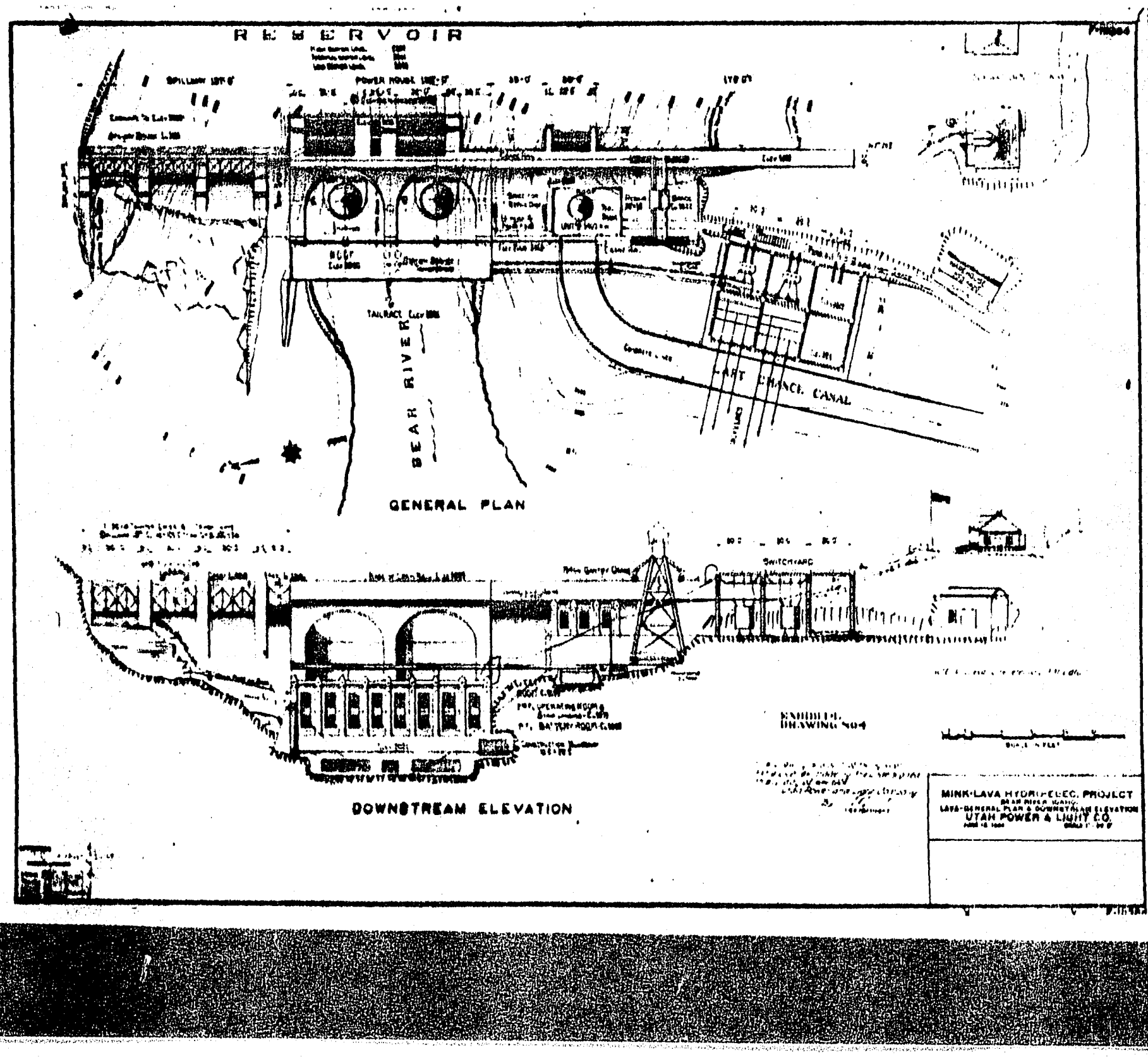
CROSS SECTION THRU UNIT

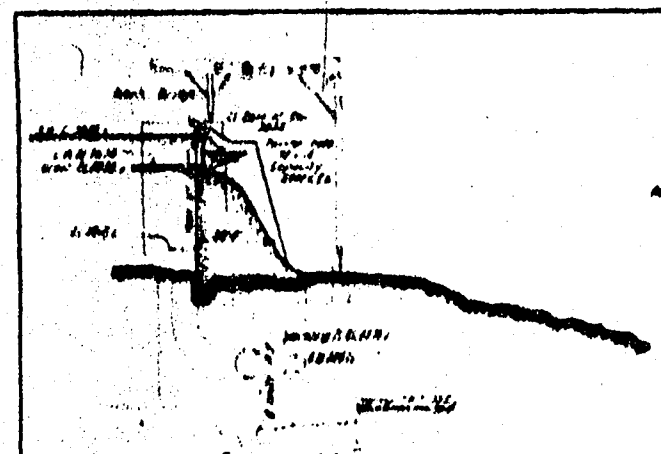
EXHIBIT
DRAWING NO 8

MINK - LAVA HYDRO ELEC. PROJECT

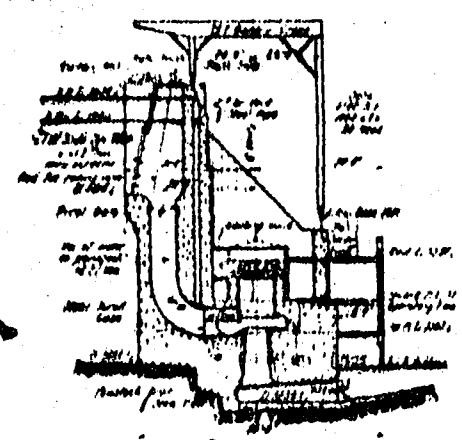
F-10681


Intake
Haas Lime Stone
Paradise Lime Stone
UPSTREAM ELEVATION
Earth Fill
SECTION C-C
SECTION D-D
SCALE IN FEET
KEY PLAN
TYPICAL SECTION THRU EARTH DAM
SCALE IN FEET
CYLINDER GATE 25'ϕ FOR INTAKE
SCALE IN FEET
MINK-LAVA HYDRO-ELEC. PROJECT
UTAH POWER & LIGHT CO.

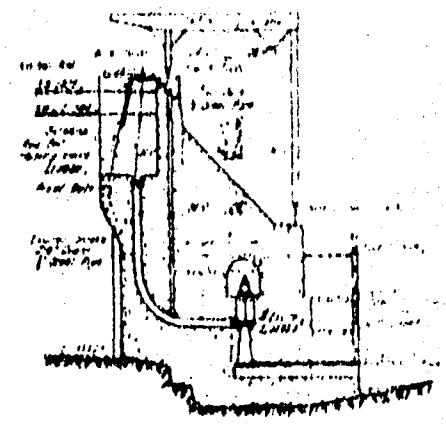

RESERVOIR
POWER HOUSE
TAILRACE
BEAR RIVER
EAST LYNNE CANAL
GENERAL PLAN
SWITCHYARD
DOWNSTREAM ELEVATION
MINK-LAVA HYDRO-ELEC. PROJECT
UTAH POWER & LIGHT CO.



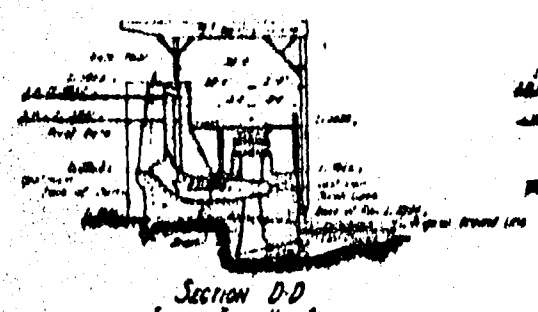
SECTION A-A
Main Spillway Section



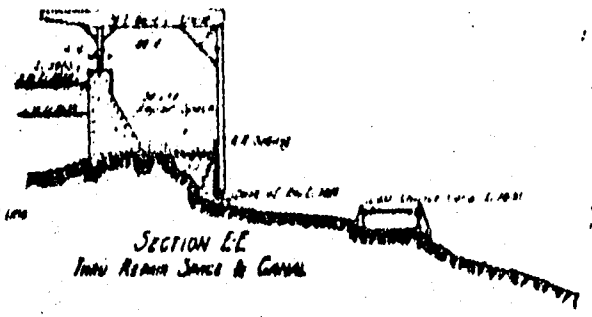
SECTION B-B
Section Thru Units



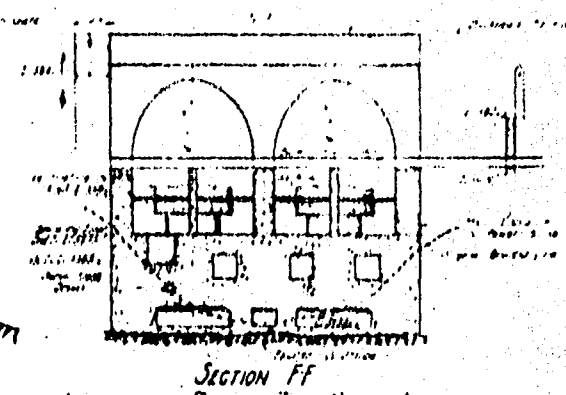
SECTION C-C
Section Thru Section



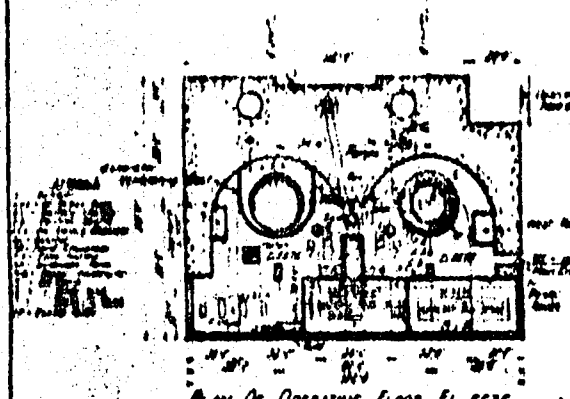
SECTION D-D
Section Thru Unit 3



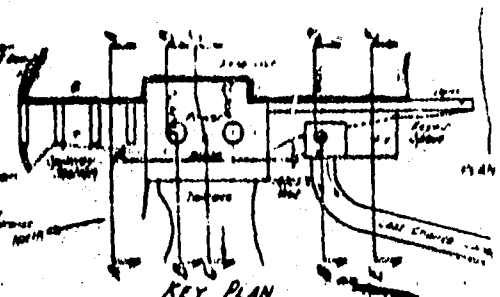
SECTION E-E
Thru Return Spill & Canal



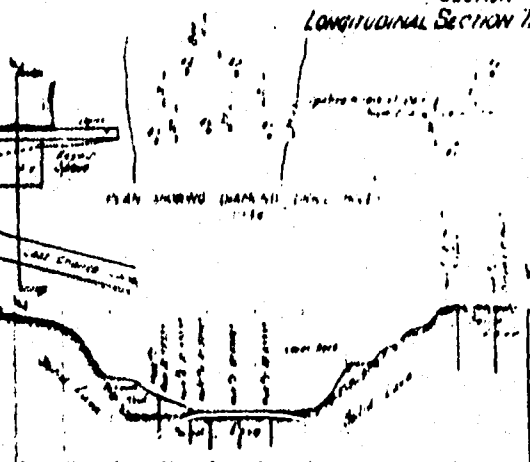
SECTION F-F
LONGITUDINAL SECTION THRU POWER HOUSE



PLAN OF OPERATING FLOOR EL. 3515

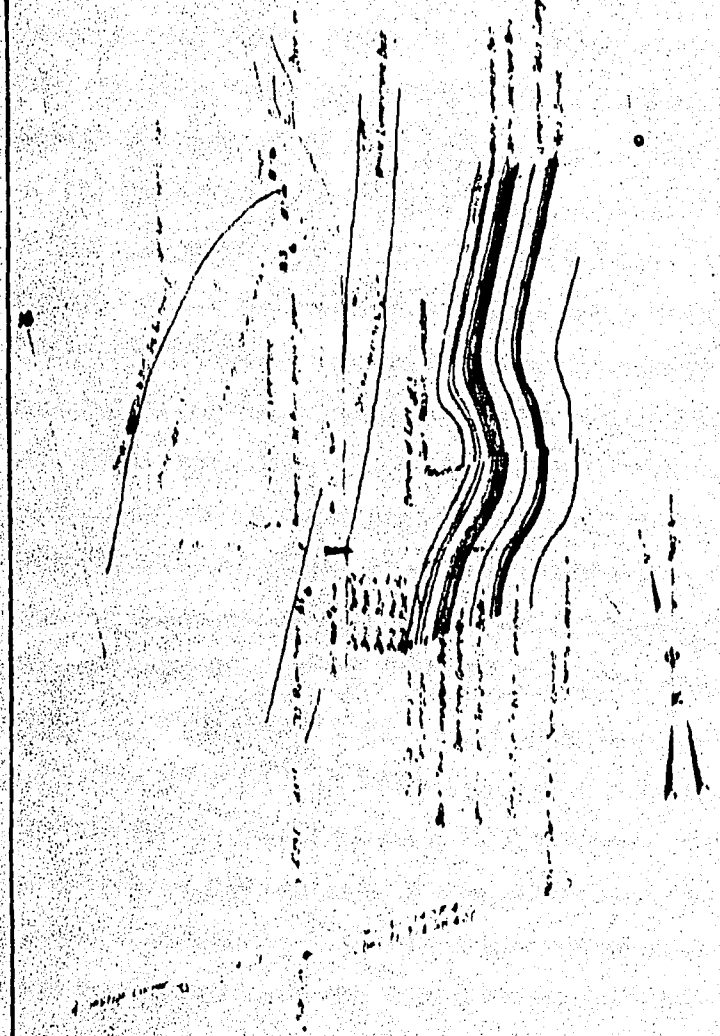


KEY PLAN

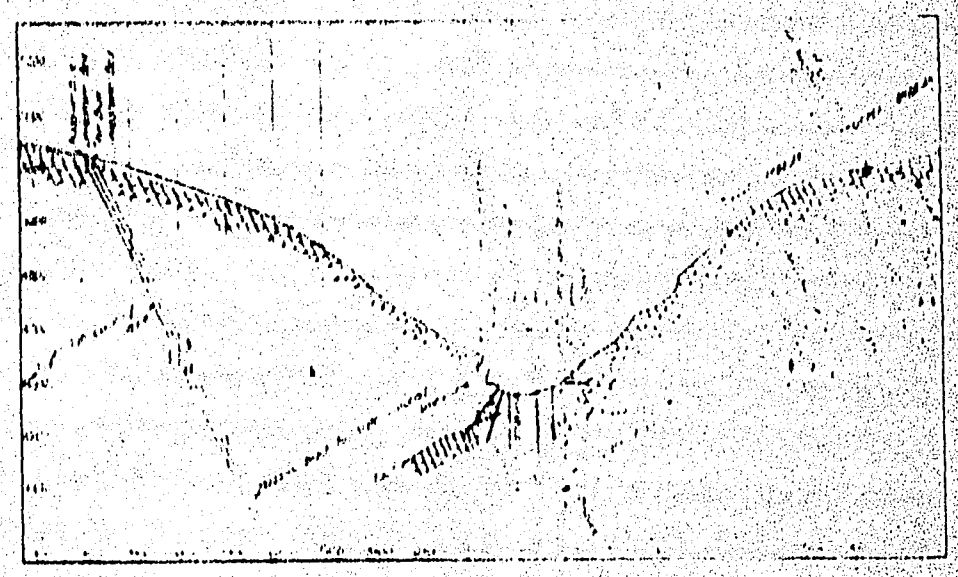


CROSS SECTION ON UPSTREAM FACE OF DAM
1"=10'

MINK-LAVA HYDRO-ELEC. PROJECT
UTAH POWER & LIGHT CO.



Plan & Geological Formation at Damsite



Scale Feet

This drawing is part of the Specification for construction submitted to the undersigned this 17th day of July 1954

Utah Power & Light Company

By

Vice President

EXHIBIT L

6 DRAWINGS No. 6

LAVA
MINK BASIN ELECTRIC PROJECT
PLAN RIVER SECTION
LOCATION PLAN AND SECTION
GEOLOGICAL CHARACTER OF FOUNDATIONS
UTAH POWER & LIGHT COMPANY

[illegible] G. T. Gibbs
[illegible]

J. H. Phillips
T. C. Coppell

[illegible] Power & Light Company
Turk Lava Beds Plant in Project
Turk Development
20,000 KW Installation

ARTICLE

111	DAMS, RESERVOIRS & INTAKE					
2	Reservoir	20,000	kw	31.81		
3	Earth Dam	20,000	kw	1.25		777,000
4	Spillway	20,000	kw	22.25	25,000	
7	Intake	20,000	kw	7.50	465,000	
112	[illegible]	20,000	kw	1.35	187,000	
96	[illegible]	20,000	kw	24.03	117,740	
113	ROADS, TRAILS AND BRIDGES	20,000	kw	23.65		496,000
115	[illegible]	20,000	kw	5.00		470,000
116	[illegible]	20,000	kw	21.91		100,100
122	[illegible]	20,000	kw	[illegible]		439,000
141	[illegible]	20,000	kw	7.77		151,000
159	[illegible]	20,000	kw	1.00		155,000
	[illegible]	20,000	kw	16.15		30,[illegible]
161	[illegible]	20,000	kw	7.50		522,000
112	[illegible]	20,000	kw	17.31		145,000
164	[illegible]	20,000	kw	.85		364,000
166	[illegible]	20,000	kw	.86		17,000
	TOTAL COST WITHOUT LANDS OR TRANSMISSION LINE	20,000	kw	7.05		136,000
	LANDS PURCHASED	20,000	kw	183.55		All [illegible]
	TOTAL COST WITHOUT TRANSMISSION LINE					3,993,000
						20,000
						3,613,000

This estimate is a [illegible] application for [illegible] approval of a [illegible] 1934.

[illegible]
By [illegible]

B-20000

Prepared C.F.Cruise
Checked

W.C.CROWELL
C.F.WILLIAMS

UTAH POWER & LIGHT COMPANY
BEAR LAKE STEAM ELECTRIC PROJECT
UNIT DEVELOPMENT
40,000 KW INSTALLATION

Date 8

Unit No.	ARTICLE							
3	Auxiliary switching Control & Protective equipment					11,000		
	1 Oil Circuit Breakers				600			
	2 Air Break & Disc. Switches				300			10.6 KV
	5 Switchboard (Incl. Relays and Instrument transformers	2	panel	1,500	3,000			
	6 Buses Compt's Supports (Incl. Sw. & Instr. Transf. Compt.'s)				2,000			
	7 Wiring .01 Conduit				1,500			
	.02 Cable Insulator & Supports				1,500			
	.03 Control wiring (Incl. Spec. Cond.)				1,500			
	9 Miscellaneous				400			
9	Misc. Electrical Equip.					8,000		
122	SUBSTATION EQUIPMENT	35,000	kva	4.43			155,000	
2	Transformers	35,000	"	3.80		133,000		
	1 Cost f.o.b. factory	35,000	"	3.00	105,000			7-5000 kva single phase [illegible], 6600/130,000 v water cooled. One spare
	2 Freight	6,000	cwt	2.50	12,500			
	3 Hauling	250	tons	10.00	2,500			
	8 Special foundations & compt.'s		job		8,000			
7	Auxiliary Substation Equipment					18,000		
	2 Transformer handling equipment				7,000			Includes transfer car and track
	3 Transf. Cooling water System				4,000			
	4 Oil storage & Handling Facilities				4,000			
	9 Miscellaneous				3,000			
9	Miscellaneous substation equipment					4,000		
141	GENERAL EQUIPMENT		job				20,000	Includes furniture, storehouse and shop equipment, laboratory and transportation. Sub total 1,564,500

B-20000

Cost Analysis

PREPARED G.V. GRUISS
CHECKED

C. GRIFFEL
C.E. PHILLIPS

PUBLIC SERVICE & LIGHT COMPANY
KIEK LAVA HIGH ELECTRIC PROJECT
KIEK DIVERSION
20,000 KW INSTALLATION

June 20, 1955

INDEX	ARTICLE	Quantity	UNIT	Cost $	Item	TOTALS Division	Group
150	CONSTRUCTION SUBSIDIARY ACCOUNTS						329,000
1	Construction Equipment		Job			200,000	
2	Constr. Buildings & Facilities		"			30,000	
	Incidental Labor Expense					98,000	
1	Camp and Commissary Loss	2,794,000	$	1.0	28,000		
2	Hospital Expense & Injuries not included in Insurance	2,794,000	"	0.5	14,000		
3	Cost of securing labor	2,794,000	"	1.0	28,000		
4	Compensation Insurance	2,794,000	"	1.0	28,000		
	[illegible]	2,892,000	"	5.0			145,000
151	[illegible]						304,000
1	New York Office Engineering	3,037,000	"	4.0	121,000		
2	Local Office Engineering	3,037,000	"	3.0	91,000		
3	Preliminary Investigation		Job		40,000		
4	Construction Fee	3,289,000	$	4.0	132,000		
152	[illegible]	3,421,000	$	0.5			17,000
153	[illegible]	3,421,000	$	0.5			17,000
154	[illegible]	3,458,000	$	4.0			138,000
	[illegible]						
	[illegible]	20,000	kw	163.65			3,593,000
	[illegible]						20,000
	[illegible]						3,613,000

FEDERAL POWER COMMISSION

WASHINGTON, D. C.

AGREEMENT OF LICENSE NO. 1

PROJECT NO. 20 - IDAHO

UTAH POWER & LIGHT COMPANY

I, J. J. Morrill, Executive Secretary of the Federal Power Commission, do hereby certify that the following is a true and correct copy from the record of the proceedings of the Commission in my custody, of that part of the minutes of the ninety-first meeting of the Commission, held on the 18th day of January, 1928 which refers to the approval of issuance of amendment No. 1 of the license for project No. 20:

> "The Executive Secretary presented the following list of instruments which have been executed since the meeting of the Commission on October 10, 1927 and recommended that the action of the Executive Secretary in issuing these instruments, pursuant to authority in each case given by the Commission, be approved:
>
> "The Commission thereupon took action as follows:
>
> "In order that the minutes of the Commission may contain record of the formal approval by the Commission of the licenses, amendment, and transfer of license executed and issued by the Executive Secretary under authority of the Commission's Orders, No. 2, it was voted that the following licenses, amendment of license, and transfer of license, accepted and/or issued, on the dates respectively named, be and the same are hereby approved by the Commission:
>
> . . . . .
>
> "Amendment of license:
>
> Project No. 20
>
> Utah Power & Light Company
> Bear River
> Cache National Forest
> Cassia, Caribou, and Franklin Counties, Idaho
> Original license issued July 5, 1923
> Amendment No. 1 authorized October 10, 1927
> Accepted by licensee November 28, 1927
> Issued December 14, 1927."
>
> . . . . .

Witness my hand and the seal of the Federal Power Commission at Washington, D. C., this 13th day of February, 1928.

J. J. Morrill

Executive Secretary.

I, C. B. Merrill, Executive Secretary of the Federal Power Commission, do hereby certify that the following is a true and correct copy from the record of the proceedings of the Commission in my custody, of that portion of the minutes of the ninetieth meeting of the Commission, held on the 18th day of October, 1927, which refers to the action taken by the Commission on the application of the Utah Power & Light Company for amendment of license for project No. 20:

"In the matter of the application of Utah Power & Light Company, Salt Lake City, Utah, for license for two proposed power developments on Bear River, Idaho, designated as "Lava" and "Revised Mink" units, respectively, consideration having been given to the circumstances as presented by the Executive Secretary, especially with respect to the desirability of conferring the desired authority by an amendment of a license granted by the Commission to said company on July 5, 1923, for a power development on said Bear River, designated as "Soda" unit, which development has been constructed and is now in operation, such amendment to include said Lava and Revised Mink units, thereby covering by one license the entire project formerly covered by a preliminary permit issued to said company on July 9, 1921; Said company having submitted satisfactory evidence of its compliance with the laws of the State of Idaho with respect to said proposed developments, as required by section 9, subjection (b) of said act and of its ability to finance the construction of the proposed project works; no application for said proposed developments or in conflict therewith having been filed by any State or municipality; the maps, plans and specifications of the proposed project works having been approved by the Commission; and the Commission finding that said project, as amended by including said proposed developments, will be best adapted to a comprehensive scheme of improvement and utilization for the purposes of water-power development and other beneficial public uses, and that the license, as amended, will not interfere or be inconsistant with the purpose for which any reservation affected thereby was created or acquired; It was voted that said license for Soda unit be amended to include Lava and Revised Mink units, subject to the provisions of said act and to the rules and regulations of the Commission pursuant thereto."

Witness my hand and the seal of the Federal Power Commission at Washington, D. C., this 31st day of October, 1927.

C. B. Merrill

Executive Secretary.

THE FEDERAL POWER COMMISSION

AMENDMENT OF LICENSE NO. 1

PROJECT NO. 20 - IDAHO

UTAH POWER & LIGHT COMPANY

(To include Lava and Revised Mink Units - so-called)

WHEREAS, under authority of the Federal water power act of June 10, 1920 (41 Stat., 1063), the Federal Power Commission, hereinafter called "the Commission", on July 9, 1921, issued a preliminary permit to Utah Power & Light Company, hereinafter called "the Licensee", a corporation organized and existing under and by virtue of the laws of the State of Maine, and having its office and principal place of business in Salt Lake City, in the State of Utah, for a power project designated as Project No. 20 on the records of the Commission, said project including four (4) proposed distinct units of power development on Bear River, Idaho, designated as "Soda", "Lava", "Narrows", and "Mink" units, respectively; and

WHEREAS, in pursuance of applications therefor, the Commission, on July 5, 1923, issued to the Licensee a license for said Soda Unit, which unit is now constructed and in operation, and on March 3, 1923, authorized issuance of license to the Licensee for said Mink Unit, which license so authorized was not accepted by the Licensee because subsequent investigation showed that on account of foundation conditions, it was desirable to combine said Narrows and Mink units in one development, hereinafter designated as "Revised Mink Unit"; and

WHEREAS, in pursuance of the provisions of said preliminary permit, the Licensee has made application in due and proper form for a license for

FEDERAL POWER COMMISSION

A P P L I C A T I O N

OF

UTAH POWER & LIGHT COMPANY

PROJECT No. 20 - IDAHO

---

1. UTAH POWER & LIGHT COMPANY, a corporation organized and existing under and by virtue of the laws of the State of Maine, and having its office and principal place of business at Salt Lake City, in the State of Utah, to which an amended license for a power project designated as Project No. 20 was issued by the Federal Power Commission on the 14th day of December, 1927, made an application to said Commission under date of March 23rd, 1929, for an amendment of said amended license requesting in effect a postponement of the dates specified in said amended license for the beginning and the completion of construction of the so-called Revised Mink and Lava units. In response to inquiry made by the Commission as to present and prospective power supply and power demand in and under said Company's system, the facts have been subjected to further study, and in consequence thereof the licensee desires to substitute the following for the text proposed in the application of March 23, 1929:

2. That Article 2 of said amended license be amended to read as follows:

"Article 2. Subject to the provisions of Section 13 of the Act, the licensee shall begin the construction of the project works of the Soda Unit on or before August 1, 1923; of the Revised Mink Unit on or before January 1, 1934, and of the Lava Unit on or before July 1, 1935, and shall in good faith and with due diligence prosecute and complete the Soda Unit on or before July 1, 1936, the Revised Mink Unit on or before [illegible]

3. The foregoing substitutions for the original text of the [illegible] in response to certain changes that have been made manifest since the date of the original application for [illegible] for electric power, which changes

amendment. It now appears necessary to provide for additional power sources at earlier dates than specified in the application of March 23, 1929. In this connection the licensee desires to emphasize the fact that in making estimates of prospective power demand it is possible to utilize only the facts and evidences at that time in hand, and if at a later date conditions unforeseen arise to give new aspect to the situation, the only thing that licensee may do is to make its plans conform to the more recent prospects. It will be appreciated that such changes are quite as likely to suggest a further postponement of power developments as to require a hastening of the schedule.

Since the license for the Revised Mink and Lava units of Project No. 20 was originally granted it has been found possible to supply the growing demand for power in the region served by the licensee by utilizing power sources that involve a more effective capital investment than will be required by the development of said Lava and Mink Units; also that improve and render more economical certain operations throughout the system. These additional sources of power are as follows:

(a) The Warm Springs development on Snake River, Idaho, which at date of acquisition was only partially developed and which has been increased to full capacity at low cost.

(b) The Cutler Plant on Bear River which, in addition to furnishing additional power, was needed in the operation of the Bear River system to supply the irrigation requirements of the largest diversion on the river for irrigation purposes and also to supply peak demands for power.

(c) The purchase of surplus power from the system of Idaho Power Company, for which a special transmission line was built under the authority of a license granted by the Power Commission designated Project No. 775, which power has been utilized by the licensee without any additional capital investment except that required for the construction of said transmission line.

(d) The increase in capacity at the Jordan steam plant secured during 1929 by changes in the steam turbines, which materially increased their capacity, and the addition of new boilers operating at higher pressure to make possible the driving of the turbines at higher loads. These changes, made at relatively low cost per kilowatt of increased capacity obtained, will further make possible the more economical operation of the steam plant for base load normal operation, as well as increasing the margin of reserve capacity for the system as a whole.

The utilization of the above named sources of power in preference to the construction of the Mink and Lava units has provided increased capacity at a substantially lower cost per kilowatt. The action has conformed to the principle laid down in Section 10 of the Federal Power Act to the effect that the project adopted shall be that best adapted to a comprehensive scheme of improvement and utilization.

In support of the foregoing the following facts concerning Utah Power and Light Company's generating system and its load demand are presented:

Sources of power for this system may be divided into two classes: (a) major generating plants, consisting of / hydro-electric plants and one steam plant, the average monthly reliable load carrying capacity being as shown in Table 1 hereof. The power available from the hydro plants depends on available water supply. The steam plant has an installed capacity of 41,000 kw, 15,000 kw of which is reserved for emergency use and 7,000 kw considered reliable load carrying capacity.

(2) Small hydro generating plants and power purchased from Idaho Power Company. These must be considered together; combined they are used to provide for the deficiency between total system load requirement and power from major sources as shown in Table I. The many small hydro plants comprised in the system of the licensee are supplied from small streams whose unregulated supplies of water depend upon precipitation and run-off from year to year. The output from these plants is completely utilized and such additional power as may then be necessary is purchased from Idaho Power Company. The amount of these purchases, therefore, varies from month to month and year to year, and no separate prediction of reasonable accuracy can be made as to the amounts of power derived from each of these two general sources. The increasing demand in the region served by the Idaho Power Company will continuously reduce the amount of power available to the Utah system from that source, and this is reflected in the decreasing available capacity as shown in Column 2 of Table II. This table also shows the prospective demand estimated according to present information and also the dates at which additional power will be required from the Revised Mink and the Lava units of Project No. 20.

The effect of the amendment here requested will be to postpone the prescribed dates of beginning of construction of the Mink and Lava units for a period of 3½ and 2 years respectively. Postponement for such period will, so far as can be foreseen by the licensee, conform to the most carefully determined prospective need for additional power under the licensee's system. The licensee has conformed to that part of Section

[illegible] of the Federal Power Act which requires that the commencement of

construction shall take place within two years from the date of license, such construction having been commenced and completed in the Soda unit. The extension here requested is in conformity with that part of said section which prescribes that the licensee "shall from time to time thereafter construct such portion of the balance of such development as the Commission may direct, so as to supply adequately the reasonable market demands until such development shall have been completed".

IN WITNESS WHEREOF, the applicant has caused its name and corporate seal to be hereunto signed and affixed by G. M. Gadsby, its President, thereunto duly authorized, this 14th day of December, 1929.

UTAH POWER & LIGHT COMPANY

G. M. Gadsby
President.

ATTEST:

Secretary.

TABLE I
AVERAGE MONTHLY KW
FOR ALL YEARS

MONTH	SODA	GROUSE	COVE	ONEIDA	CUTLER	ASHTON	OLMSTED	JORDAN STEEL	[illegible]
January	3900	24000	6800	9500	14200	3400	6000	25000	[illegible]
February	3600	21800	5900	9200	15100	3300	6100	25000	[illegible]
March	2800	16100	3800	7500	13700	3400	7700	25000	[illegible]
April	3200	13800	4400	9300	20800	4500	8400	25000	[illegible]
May	3300	13900	3500	8500	15500	5500	8200	25000	[illegible]
June	4100	16300	3800	7500	14200	5100	7700	25000	[illegible]
July	5600	30400	7100	11800	8200	4200	5200	25000	[illegible]
August	6600	34400	7500	13100	[illegible]	3900	4500	25000	[illegible]
September	6300	33900	7500	13000	[illegible]	3800	4600	25000	[illegible]
October	5400	16400	4300	8400	11200	3800	5900	25000	[illegible]
November	3300	12700	3000	6600	[illegible]	3700	6600	25000	[illegible]
December	4600	27400	6400	10900	14600	3500	6600	25000	[illegible]
Installed Generating Capacity	14000	44300	7500	30000	30000	5800	12700	41000	[illegible]

TABLE II

AVERAGE MONTHLY K.W.

MONTH	(1) TOTAL FROM TABLE I	(2) HYDRO POWER CO. & STEAM HYDRO PLANTS	(3) AVERAGE AVAILABLE FROM EXISTING PLANTS	(4) ESTIMATED AVG. LOAD REQUIREMENTS AT GENERATING STATIONS	(5) DEFICIT FROM EXISTING PLANTS	(6) AVERAGE AVAILABLE POWER FROM NEW	(7) AVERAGE AVAILABLE POWER FROM	( ) AVERAGE AVAILABLE FROM
				1930				
Jan.	91600	47300	138900	1	-			
Feb.	90000	46400	136400	1	-			
March	82800	53300	136100	1	-			
April	94200	71700	165900	1	-			
May	87500	60100	147600	1	-			
June	84000	54900	138900	1	-			
July	98500	47300	145700	114500	-			
Aug.	103400	43700	147100	117400	-			
Sept.	105000	39700	144700	115100	-			
Oct.	80400	67100	147500	113600	-			
Nov.	70500	64400	134900	113000	-			
Dec.	99000	53000	152000	113700	-			
				1931				
Jan.	91600	46300	137900	113000	-			
Feb.	90000	45500	135500	113600	-			
March	82800	51500	134300	1	-			
April	94200	70000	164200	1	-			
May	87500	59400	146900	109100	-			
June	84000	54400	138400	113500	-			
July	98500	46700	145200	116100	-			
Aug.	103400	43200	146600	1	-			
Sept.	105000	40200	145200	1	-			
Oct.	80400	66100	146500	1	-			
Nov.	70500	66300	136800	117200	-			
Dec.	99000	44000	143000	117000	-			

TABLE II

AVERAGE MONTHLY K.W.

MONTH	(1) TOTAL FROM TABLE I	(2) ILLEGIBLE POWER CO. & SMALL HYDRO PLANTS	(3) AVERAGE AVAILABLE FROM EXISTING PLANTS	(4) ESTIMATED AVG. LOAD REQUIREMENTS AT GENERATING STATIONS	(5) DEFICIT FROM EXISTING PLANTS	(6) AVERAGE AVAILABLE POWER FROM MIRK	(7) AVERAGE AVAILABLE POWER FROM LAVA	(8) TOTAL MIRK & LAVA K.W.
				1932				
Jan.	91600	45300	136900	115600	-			
Feb.	90000	44600	134600	113600	-			
March	82800	50600	133400	112400	-			
April	94200	49100	133600	109200	-			
May	87500	58000	145500	112200	-			
June	84000	52600	136600	116900	-			
July	98500	45100	143600	121700	-			
Aug.	103400	41600	145000	124900	-			
Sept.	105000	38900	143900	122300	-			
Oct.	80400	65200	145600	119500	-			
Nov.	70500	62500	133000	120700	-			
Dec.	99000	42900	141900	120600	-			
				1933				
Jan.	91600	44200	135800	119100	-			
Feb.	90000	43600	133600	117000	-			
March	82800	49700	132500	115600	-			
April	94200	68300	162500	112300	-			
May	87500	56200	143700	115400	-			
June	84000	50900	134900	120300	-			
July	98500	43100	141600	123300	-			
Aug.	103400	39600	143000	128700	-			
Sept.	105000	36200	141200	126000	-			
Oct.	80400	63200	143600	123300	-			
Nov.	70500	60500	131000	124300	-			
Dec.	99000	40700	139700	124100	-			

TABLE II

AVERAGE MONTHLY K.W.

MONTH	(1) TOTAL FROM TABLE I	(2) IDAHO POWER CO. & SMALL HYDRO PLANTS	(3) AVERAGE AVAILABLE FROM EXISTING PLANTS	(4) ESTIMATED AVG. LOAD REQUIREMENTS AT GENERATING STATIONS	(5) DEFICIT FROM EXISTING PLANTS	(6) AVERAGE AVAILABLE POWER FROM MEM.	(7) AVERAGE AVAILABLE POWER FROM LAVA	(8) TOTAL MEM. & LAVA K.W.	REMARKS
				1934					
Jan.	91600	42900	134500	132400	-				
Feb.	90000	42300	132300	120200	-				
March	82800	48600	131400	118800	-				
April	94200	66900	161100	115300	-				
May	87500	54300	141800	118600	-				
June	84000	48900	132900	123600	-				
July	98500	41100	139600	126900	-				
Aug.	103400	37600	141000	132400	-				
Sept.	105000	34600	139600	129600	-				
Oct.	80400	61900	142300	126600	-				
Nov.	70500	59200	129700	127700	-				
Dec.	99000	39300	138300	127600	-				
				1935					
Jan.	91600	41500	133100	125700	-				
Feb.	90000	41100	131100	123400	-				
March	82800	47400	130200	121900	-				
April	94200	66100	160300	118300	-				
May	87500	52900	140400	121700	-				
June	84000	47400	131400	127000	-				
July	98500	39600	138100	132500	-				
Aug.	103400	36100	139500	136100	-				
Sept.	105000	33500	138500	133200	-				
Oct.	80400	60700	141100	130300	-				
Nov.	70500	58000	128500	131300	2800	4900			...ded
Dec.	99000	37900	136900	131200	-	9700			

TABLE II

AVERAGE MONTHLY K.W.

MONTH	(1) TOTAL FROM TABLE I	(2) ISLAND POWER CO. & SMALL HYDRO PLANTS	(3) AVERAGE AVAILABLE FROM EXISTING PLANTS	(4) ESTIMATED AVG. LOAD REQUIREMENTS OF GENERATING STATIONS	(5) DEFICIT FROM EXISTING PLANTS	(6) AVERAGE AVAILABLE POWER FROM MINE	(7) AVERAGE AVAILABLE POWER FROM LAVA	(8) TOTAL AVAILABLE K.W.
				1936				
Jan.	91600	40500	131900	129000	-	8500		
Feb.	90000	39600	129600	126700	-	8200		
March	92800	43300	136100	129[illegible]	-	8800		
April	94200	66100	160300	1[illegible]	-	8300		
May	87500	53700	141200	1[illegible]	-	7700		
June	84000	48[illegible]	132000	1[illegible]	-	6700		
July	96500	39[illegible]	137500	1[illegible]	-	10200		
Aug.	103400	3[illegible]	1[illegible]	1[illegible]	200	11800		
Sept.	105000	33[illegible]	138400	1[illegible]	-	11700		
Oct.	80400	59[illegible]	1[illegible]	1[illegible]	-	7600		
Nov.	70500	56800	127300	1[illegible]	7600	4900		
Dec.	99000	36[illegible]	135000	1[illegible]	-	9700		
				1937				
Jan.	91600	3[illegible]	130300	132300	2000	8500		
Feb.	90000	36[illegible]	126400	129900	1500	8200		
March	92800	44900	137700	138300	600	6800		
April	94200	62500	156700	124400	-	8300		
May	87500	47[illegible]	134900	126100	-	7700		
June	84000	41700	125700	133800	8100	6700	4100	10[illegible]
July	96500	33[illegible]	132400	139700	7300	10200	6800	17[illegible]
Aug.	103400	30[illegible]	133800	143600	9800	11800	7700	19[illegible]
Sept.	105000	27[illegible]	132900	140400	7500	11700	7400	19[illegible]
Oct.	80400	58000	138400	137600	-	7600	4000	11[illegible]
Nov.	70500	55[illegible]	126800	1384[illegible]	12600	4900	3400	8[illegible]
Dec.	99000	35000	134000	1382[illegible]	4200	9700	6000	15[illegible]

OF

UTAH POWER & LIGHT COMPANY

PROJECT NO. 20 - IDAHO

---

1. UTAH POWER & LIGHT COMPANY, a corporation organized and existing under and by virtue of the laws of the State of Maine, and having its office and principal place of business at Salt Lake City, in the State of Utah, to which a license for a power project designated as Project No. 20 was issued by the Federal Power Commission on the 14th day of December, 1927, hereby makes application to said Commission for an amendment of said license in the manner and to the extent described herein.

2. That Article 2 of said license be amended to read as follows:

"Article 2. Subject to the provisions of Section 13 of the Act, the licensee shall begin the construction of the project works of the Soda Unit on or before August 1, 1928; of the Revised Mink Unit on or before July 1, 1932, and of the Lava Unit on or before July 1, 1936, and shall in good faith and with due diligence prosecute and complete the Soda Unit on or before July 1, 1928, the Revised Mink Unit on or before July 1, 1935, and the Lava Unit on or before July 1, 1939."

3. The proposed changes are necessary and desirable for the following reasons:

It has been found possible to supply the growing demand for power in the region served by the licensee by utilizing power sources that involve a smaller capital investment than will be required by the development of said Lava and Mink Units; also that improve and render more economical certain operations throughout the system. These additional sources of power are as follows:

(a) The Warm Springs development on Snake River, Idaho, which at date of acquisition was only partially developed and which has been increased to full capacity at low cost.

of the Bear River System to supply the installation re-
quired for the largest 11 months' run of record for irri-
gation purposes and also to supply peak requirements for power.

(c) The purchase of surplus power from the system of Idaho Power Company, for which a special transmission line was built under the authority of a license given by the Power Commission Project No. 77B, which power has been utilized by the licensee without any additional capital investment except the relatively small one involved by the construction of said transmission line.

(d) The productive use of existing steam plants from which additional power has been obtained without increased capital expenditures.

The utilization of the above named sources of power in preference to the construction of the Mink and Lava units, has postponed a large increase in capital investment and in consequence has been a measure of economy from the standpoint of the consumer as well as of Utah Power & Light Company. The action is conformable to the principle laid down in Section 10 of the Federal Power Act to the effect that the project adopted shall be that best adapted to a comprehensive scheme of improvement and utilization.

The effect of the amendment here requested will be to postpone the prescribed dates of beginning of construction of the Mink and Lava units for a period of three years in each case. Postponement for such period will, so far as can be foreseen by the licensee, conform to the most carefully determined prospective need for additional power under the licensee's system. The licensee has conformed to that part of Section 13 of the Federal Power Act which prescribes that the commencement of construction shall take place within two years from the date of the license, such construction having been commenced and completed in the Soda unit. The extension here requested is in conformity with that part of said Section which prescribes that the licensee "shall from time to time thereafter construct such portion of the balance of such development as the Commission may direct, as to supply adequately the reasonable market demands until such development shall have been completed."

IN WITNESS WHEREOF, the applicant has caused its name and corporate seal to be hereunto signed and affixed by J. A. Caddey, its President, thereunto duly authorized this 13th day of March, 1929.

UTAH POWER & LIGHT COMPANY,

J. A. Caddey.

President.

I, J. H. Bonner, Executive Secretary of the Federal Power Commission, do hereby certify that the following is a true and correct copy of that portion of the minutes of the one hundred and fourth meeting of the Commission held on the 22nd day of March, 1930, which refers to the approval of issuance of amendment No. 2 of the license for project No. 20:

"The Executive Secretary presented the following list of instruments which have been executed since the meeting of the Commission on February 19, 1930, and recommended that the action in issuing these instruments, pursuant to authority in each case given by the Commission, be approved.

"The Commission thereupon took action as follows:

"In order that the minutes of the Commission may contain record of the formal approval by the Commission of the licenses and amendments of licenses executed and issued by the Executive Secretary, under authority of the Commission's Orders, No. 2, it was voted that the following licenses and amendments of licenses accepted and/or issued on the dates respectively named, be and the same are hereby approved by the Commission:

* * * *

"Amendments of licenses:

Project No. 20--

Utah Power & Light Company.
Bear River.
Cache National Forest.
Bannock, Caribou, and Franklin Counties, Idaho.
License issued July 5, 1923.
Amendment No. 2 authorized February 19, 1930.
Accepted by licensee February 18, 1930.
Issued March 13, 1930."

* * * *

Witness my hand and the seal of the Federal Power Commission at Washington, D. C., this 12th day of April, 1930.

Executive Secretary.

I, F. E. Bonner, Executive Secretary of the Federal Power Commission, do hereby certify that the following is a true and correct copy of that portion of the minutes of the one hundred and third meeting of the Commission held on the 19th day of February, 1930, which refers to the action taken by the Commission on the application of Utah Power & Light Company for amendment of license for project No. 20:

> "In the matter of the application of Utah Power & Light Company, of Maine, for amendment of license for a power project (No. 20) on Bear River, so as to extend for four and one-half years the time for beginning construction of Revised Mink unit and for two years the time for beginning construction of Lava unit, as prescribed in article 2 of the license as amended: Said extension being desired by the licensee because it has been found that its demand for power can be supplied more economically by the completion of other partially developed sites and interconnection with another utility company; it was voted that the license be amended so as to extend the time for beginning construction of Revised Mink unit from July 1, 1929, to January 1, 1934, and of Lava unit from July 1, 1933, to July 1, 1935, and for completing construction of each on or before November 1, 1935, and June 1, 1937, respectively."

Witness my hand and the seal of the Federal Power Commission at Washington, D. C., this 10th day of March, 1930.

Executive Secretary.

Instrument No. 3

FEDERAL POWER COMMISSION

AMENDMENT NO. 2 OF LICENSE

PROJECT NO. 20 - IDAHO

UTAH POWER & LIGHT COMPANY

WHEREAS, under authority of the Federal water power act of June 10, 1920 (41 Stat., 1063), the Federal Power Commission, hereinafter called "the Commission," on July 5, 1923, issued to the UTAH POWER & LIGHT COMPANY, a corporation existing under the laws of the State of Maine, hereinafter called "the Licensee," a license for a power project designated as project No. 20 on the records of the Commission; and on December 14, 1927, amended said license; and

WHEREAS, the Licensee made application, dated March 23, 1929, and revised December 14, 1929, to the Commission further to amend said license by extending the time for beginning and completing construction of Revised Mink and Lava units; and

WHEREAS, upon due consideration of said application it appears that the amendment requested is reasonable and necessary and will not be incompatible with the public interest, and that under the decision of the Commission of April 30, 1923, the amendment desired does not constitute an alteration of the license within the meaning of section 6 of said act so as to require the ninety days' public notice prescribed therein.

NOW, THEREFORE, the license issued to the Licensee, as aforesaid, is hereby further amended as follows, upon the express condition, however, that such amendment shall not operate to alter or amend said license in

any other respect than as herein specified, and shall not in any way constitute a waiver of any other part, provision or condition of said license:

PARAGRAPH I. Article 2 of said license, as amended, is hereby further amended by eliminating therefrom the dates for beginning and completing construction of Revised Mink and Lava units, and substituting in lieu thereof January 1, 1934, and July 1, 1935, for commencement of the respective units, and November 1, 1935, and June 1, 1937, for completion thereof; so that said article shall read as follows:

> "Article 2. Subject to the provisions of section 13 of the act, the Licensee shall begin the construction of the project works of the Soda unit on or before August 1, 1923; of the Revised Mink unit on or before January 1, 1934; and of the Lava unit on or before July 1, 1935; and shall in good faith and with due diligence prosecute and complete the Soda unit on or before July 1, 1926, the Revised Mink unit on or before November 1, 1935, and the Lava unit on or before June 1, 1937."

IN WITNESS WHEREOF, the Federal Power Commission has caused its name and seal to be hereto signed and affixed by F. E. Bonner, its Executive Secretary, this 13th day of March, 1930, pursuant to authority given by the Commission at its meeting of February 19, 1930, a certified copy of the record thereof being hereto attached.

FEDERAL POWER COMMISSION

By _____
Executive Secretary.

IN TESTIMONY OF ACCEPTANCE of all the terms and conditions imposed in the foregoing instrument, the Licensee this 14th day of February 1930, has caused its name and corporate seal to be hereto signed and affixed by Leone B. Thomas, its Secretary, pursuant to a resolution of its board of directors passed on the 12th day of February, 1930, a certified copy of the record thereof being hereto attached.

UTAH POWER & LIGHT COMPANY

By _____
President.

Attest:

_____
Secretary.

[illegible] to certified [illegible] of Directors

Power & Light Company at a meeting thereof duly and regularly called and held at the Company's office in Salt Lake City, Utah on Wednesday, the 12th day of February, 1930, adopted a resolution with its preamble, of which the following is a correct and accurate copy:

"WHEREAS, the Federal Power Commission on July 5, 1923 issued to this Company License covering Project No. 20 Idaho (Soda Unit); and

"WHEREAS, said Commission on December 14, 1927 issued to said Company an amendment of said License entitled 'Amendment of License No. 1 Project No. 20 Idaho,' thereby including in said License the Revised Mink and Lava units; and

"WHEREAS, the Company made application dated March 23, 1929 and revised December 14, 1929, to the Commission further to amend said License by extending the time for beginning and completing construction of said Revised Mink and Lava units of said Project No. 20; and

"WHEREAS, the Federal Power Commission has tendered to the Company an amendment of said License entitled 'Amendment No. 2 of License, Project No. 20 Idaho', whereby the time for commencement of construction on the Revised Mink unit is extended from July 1, 1929 to January 1, 1934, and for the completion thereof from July 1, 1932 to November 1, 1935; and the time of commencement of construction on said Lava unit is extended from July 1,

1930 to July 1, [illegible], and [illegible] July 1, [illegible], [illegible] License have been noted and considered.

"NOW, THEREFORE BE IT RESOLVED:

"That all the terms and conditions of the Federal Water Power Act of June 10, 1920, and the modifications thereof, together with the further terms and conditions imposed by Amendment of License No. 2, be and the same are hereby, accepted by this Company, and in evidence of such acceptance the President of this Company be and he is hereby, authorized and directed on this Company's behalf to execute an endorsement upon said amended License to that effect, to which the Secretary shall affix and attest the Company's seal, and the Secretary shall be, and he is hereby further directed to certify and deliver to said Commission a copy of this resolution.

[signature]
Secretary.

Dated at Salt Lake City, Utah,

February 17, 1930."

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FEDERAL POWER COMMISSION

WASHINGTON, D. C.

AMENDMENT NO. 2 OF LICENSE

Project No. 20, Idaho

Utah Power & Light Company

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FEDERAL POWER COMMISSION
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[illegible] Federal
[illegible] and
[illegible]
[illegible]
[illegible] Sec. 4 thereof. This application is also intended for the Licensee to be in compliance with Regulation 12, Section 2 D, of the Rules and Regulations of the Federal Power Commission, and does in fact constitute the filing of plans and specifications prescribed thereunder. The changes from time to time made during the period of construction were approved by the Power Commission's officers and representatives before being effected, but the terms of the license have not, to date, been formally amended accordingly.

2. The following outlines, in a general way, the principal changes made in the maps and plans:

(a) Exhibits J and K, Sheets 1 and 2 (Drawing F-13792, Sheets 1 and 2) are superseded by Exhibit K, Sheets 1 and 2 (Drawing F 13792, Sheets 1 and 2) to correct [illegible] 1/ show the project boundary and land ownership [illegible]

(b) Exhibit K, Sheets 3 and 4 (Drawings F-13794 and F-13795) and Exhibit L, Sheets 1 and 2 (Drawings F-13796 and F-13797) are superseded by Exhibit L, Sheets 1, 2, 3 and 4 (Drawings F-13794 to F-13797 inclusive) to show the design and construction details of the dam and power house as actually built [illegible]

3. The proposed changes are necessary and desirable for the following reasons:

The drawings, maps and exhibits have been revised and/or completed to show the development as actually constructed. The principal change made since filing the original application [illegible] was the relocation of the power house and dam 1,000 ft. upstream from the original location to avoid geological defects ascertained at the site of the original location. Other alterations are of a character of changes in detail rather than in major conception.

4. The following exhibits are filed herewith and are hereby made a part of this application for amendment of license:

Exhibit K, Sheets 1 and 2, F-13792 - General Map of Entire Project.

...n and Downstream Elevation,

Exhibit B, Sheet 4, F-1[illegible] - Power House and Dam -

...ections and Details

...WITNESS, WHEREOF the applicant has caused its name and corporate seal to be hereunto affixed and attested by D. [illegible] Hill its Vice-President thereunto duly authorized, this [illegible]th day of August 1952

...ATION

Vice-President

Attest:

...Secretary.

FEDERAL POWER COMMISSION
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STATEMENT AS TO FINAL FIELD NOTES OR
DESCRIPTION OF FINAL LOCATION SURVEY OF
PROJECT BOUNDARY AND TRANSMISSION LINE

The location of the project boundary is shown by Drawing F 13792, Sheets 1 and 2, filed as Exhibit K, Sheets 1 and 2 of this application for amendment of license. With very few exceptions the project boundary follows legal subdivision lines of the public land surveys.

This statement is a part of the application for amendment of license made by the undersigned this 8th day of August, 1932.

TAH POWER & LIGHT COMPANY

By [signature]
Vice President

FEDERAL POWER COMMISSION
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[illegible] Paper, Idaho

DETAILED MAP [illegible] OF BOUNDARY,
PROJECT WORKS AND STATUS OF LAND OWNERSHIP

Drawing F 10-20, Sheets 1 and 2, filed as Exhibit K, Sheets 1 and 2, of this application for amendment of license, shows the location of the project boundary, the location of the project works, and the status of land ownership

Applicant owns in fee simple all lands within the [illegible] except [illegible] lands of the United States, each [illegible]

This statement is a part of the application for amendment of license made by the undersigned this 8th day of August, 1932

[illegible]

Exhibit L
Bear River, Idaho

FEDERAL POWER COMMISSION
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GENERAL DESIGN DRAWINGS

Exhibit L, Sheets 1, 2, 3 and 4, (Drawings F-13794 to F-13797 inclusive) shows the character of the foundations under the dam and power house, and the general and detailed plans, elevation and sections of the dam, power house and switchyard.

This statement is a part of the application for permit [illegible] made [illegible] 1932.

UTAH POWER & LIGHT COMPANY

By [signature]
Vice President

Instrument No. 4

FEDERAL POWER COMMISSION

AMENDMENT NO. 3 TO LICENSE

PROJECT NO. 20, IDAHO

UTAH POWER & LIGHT COMPANY

WHEREAS, under authority of the Federal water power act of June 10, 1920 (41 Stat. 1063), the Federal Power Commission, hereinafter called "the Commission," on July 5, 1923, issued to Utah Power & Light Company, hereinafter called "the Licensee," a corporation organized and existing under the laws of the State of Maine, and having its office and principal place of business in Salt Lake City, Utah, a license for a power project (No. 20), and on December 14, 1927 and March 13, 1930, amended said license by instruments Nos. 2 and 3, respectively; and

WHEREAS, the Licensee has made application, dated August 8, 1932, to the Commission further to amend said license so as to embody therein maps and plans designed to show the correct project boundary and the project works as actually constructed; and

WHEREAS, upon due consideration of said application, it appears that the amendment requested is reasonable and necessary and not incompatible with the public interests, and does not constitute such a substantial modification of the general scheme of development or of the original terms of the license within the meaning of section 6 of the act as to require the ninety days' public notice prescribed therein.

NOW, THEREFORE, the license issued to the Licensee, as aforesaid, is hereby further amended as follows, upon the express condition, however, that such amendment shall not operate to alter or amend said

license in any other respect than as herein specified, and shall not in any way constitute a waiver of any other part, provision, or condition of said license:

PARAGRAPH I. Article 1A of said license is further amended by eliminating under the heading "Soda Unit" reference to Exhibits J and K, and substituting therefor the following:

Exhibit K, sheets 1 and 2 (drawing F-13792, sheets 1 and 2, F.P.C. No. 20-25 and 26) "Soda Hydro-Electric Project, Bear River, Utah, General Map of Entire Project," said Exhibit K, sheets 1 and 2 superseding Exhibit J and K in two sheets (F.P.C. No. 20, 6 and 7).

PARAGRAPH II. Article 1C of said license is further amended by eliminating under the heading "Soda Unit" reference to Exhibits K, L, and M, and substituting therefor the following:

Exhibit L, in 4 sheets, as follows:

Sheet No.	Licensee's No.	F.P.C. No.	Title
1	F-13794	20-27	General Contour Map and Character of Foundations.
2	F-13795	20-28	General Plan of Development.
3	F-13796	20-29	Power House and Dam, Plan, and Downstream Elevation.
4	F-13797	20-30	Sections and Details.

Exhibit M: "General Description of Mechanical and Electrical Equipment," two typewritten sheets, signed by E. W. Hill, Vice President, and received in the office of the Federal Power Commission September 7, 1932.

PARAGRAPH III. Article 1E of said license, lines 1 to 5, is further amended to read as follows:

"The maps, plans, specifications, and statements designated and described in paragraphs A, B, C, and D hereof, and approved by the Executive Secretary of the Commission in accordance with its authorizations of August 17, 1922, February 5, 1923, and October 10, 1927, and by the Commission on November 25, 1932, are hereby made a part of this license."

-2-

IN WITNESS WHEREOF, the Federal Power Commission has caused its name and seal to be hereto signed and affixed by [illegible], its [illegible], this 24th day of [illegible], 1933, pursuant to an order of the Commission dated November 25, 1932.

FEDERAL POWER COMMISSION

By _____
Chairman.

IN TESTIMONY OF ACCEPTANCE of all the terms and conditions of the Federal water power act of June 10, 1920 (41 Stat. 1063), and of the further conditions imposed in the foregoing instrument, the Licensee, this 14th day of January, 1933, has caused its name and corporate seal to be hereto signed and affixed by George D. Thomas, its Secretary, pursuant to a resolution of its board of directors passed on the 5th day of January, 1932, a certified copy of the record thereof being hereto attached.

UTAH POWER & LIGHT COMPANY

By _____
President.

ATTEST:

_____
Secretary.

RESOLVED: That the President or any Vice President of this Company be and hereby is authorized and empowered to accept, for and on behalf of this Company, subject to the terms and conditions of the Federal Water Power Act of June 10, 1920, and the modifications thereof, Preliminary Permits and Licenses tendered by the Federal Power Commission pertaining to the construction, operation, and maintenance of project works necessary or convenient for the development, transmission and utilization of electrical power, which said President or Vice President may deem proper and for the best interests of this Company; further, said President or Vice President is likewise authorized and empowered to execute an endorsement upon such Preliminary Permits or Licenses, indicating the acceptance of the same for and on behalf of this Company.

RESOLVED FURTHER: That the President or any Vice President of this Company be and hereby is authorized and empowered to execute any and all documents, certificates or other instruments in writing necessary or proper to be executed with the furnishing of acceptance of such Permits or Licenses, and for the construction, maintenance or operation of the project works thereunder, and to make and enter into agreements with the Federal Power Commission or its representatives pertaining to the adjustment, establishment and keeping of project accounts thereunder, which said President or Vice President may deem proper and for the best interests of this Company.

RESOLVED FURTHER: That the Secretary or an Assistant Secretary of this Company be and hereby is authorized and empowered to affix and attest the Company's corporate seal to such application, Permits, Licenses or other instruments, and is hereby authorized and empowered to [illegible] on behalf of the Company such reports as may be required by the Federal Power Commission or any of its officials from time to time with respect to the premises.

- - - - - - - -

I, Geo. D. Thomas, Secretary of the Utah Power & Light Company, do hereby certify that the foregoing is a true and correct copy of a resolution adopted by the Board of Directors of this company at a meeting held in Salt Lake City, Utah, February 6, 1922.

_____
Secretary

JAN 20 1933

FEDERAL POWER COMMISSION

WASHINGTON, D. C.

AMENDMENT NO. 3 OF LICENSE

Project No. 20, Idaho

Utah Power & Light Company

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BEFORE THE

FEDERAL POWER COMMISSION

Project No. 20, Idaho. (Soda).
UTAH POWER & LIGHT COMPANY,
licensee.

ORDER DETERMINING COST

This matter comes before the Commission for the determination, so far as now practical, of the actual legitimate cost of construction of the above entitled project as of December 31, 1925:

And the Commission having before it:

(1) Statement by licensee filed January 5, 1930, claiming such cost in the total amount of $3,560,372.19:

(2) The Preliminary Accounting Report of the Commission's Examiner, dated July 29, 1930:

(3) Licensee's protest to said Report, filed October 19, 1930:

(4) A stipulation dated March 17, 1933, between the Solicitor for the Commission and counsel for the licensee, with respect to the cost of electric energy used during construction:

(5) Transcript of proceedings before the Commission held February 23 and 24, 1932:

And the Commission having caused a full investigation and examination of licensee's accounts and records, properties and business, pertinent to the determination of such cost, and being informed of the results thereof, and otherwise fully advised in the premises,

NOW, THEREFORE, upon full consideration of all of said evidence and other matters of record before it, and upon the licensee's consent and agreement to the entry hereof without further hearing, the Commission hereby finds and determines:

(1) That the aforesaid stipulation is hereby ratified and approved;

(2) That expenditures for preliminary work relating to the project began in January, 1917, and continued through January, 1918; that such preliminary work was then practically suspended until August 1, 1922, when it was resumed and continued thereafter until the beginning of actual physical construction of the project April 1, 1923; and that the operation of the project for commercial purposes was begun November 1, 1924. The period reasonably necessary for the construction of the project, including preliminary work, is accordingly found to be equivalent to that beginning July 1, 1921, and ending October 30, 1924; and interest on construction costs allowable as part of fixed capital, together with any credit for power generated at the project during its construction, is limited to said period;

(3) That the proper, reasonable and legitimate costs actually incurred for the construction of said project as of December 31, 1925, were as shown in column headed "Amounts allowed" in the following table, with reference to the correspondingly indicated items and treatment thereof in said Preliminary Accounting Report for a fuller explanation of the amounts embraced in said items and of the treatment herein accorded them:

P.W.R. Item		Amounts allowed	Amounts disallowed	Amounts reserved
I.	1. Lands:			
	Items (a), (b), (d), as claimed, total	243,378.52		
	(c) Taxes	2,867.18	205.29	
	(e) Other expenditures	2,482.49	6.05	
	(f) Deduction for value of non-project lands	18,813.32 (Cr.)	3,886.40	
	1-a Water Rights	871.60		
	1-b Expenses, right of way agent	503.19		
	2 Materials, supplies, and permanent plant equipment	1,064,772.56		
	3 Labor (and materials and expenses consumed by labor):			
	(a) Labor, etc.	883,599.14	2,098.68	
	(b) Power purchased	4,155.31	27,584.85	
	4 Temporary construction facilities	495,831.38		
	5 Charges by management, engineering, and construction firms under contract:			
	Items (a), (c), (d), (f), and (h), as claimed, total	58,027.98		
	(b) Electric Bond & Share Company overhead			52,892.1[illegible]
	(e) Blueprints and office supplies	236.34	4.40	
	(g) Fees, Phoenix Utility Company		17.35	9[illegible]
	6 Other engineering, superintendence, and legal charges:			
	Items (a)-(h), and (j)-(m), as claimed, total	250,400.64		
	(i) Taxes during construction	13,016.27	1,759.39	
	7 Annual charges	153.23		
	8 Preliminary investigations, surveys, etc.:			
	Items (a), (b), and (d)-(i), as claimed, total	118,516.65		
	(c) Electric Bond & Share Company overhead			1,[illegible]
	9 Interest during construction	226,999.01	56,251.26	6,[illegible]
	10 Deduction for power produced during construction	22,019.20 (Cr.)	12,688.20 (Cr.)	
II.	Deferred charges added:			
	1 Electric Bond & Share Company charges, 10/31/25—7/31/26:			
	(a) Engineering salaries	202.27		
	(b) Overhead			143.05
	(c) Blueprints	45.14	14.78	
	Net totals	$3,325,226.38	79,140.25	1[illegible]

(4) That the foregoing is without prejudice to the later allowance of such portions of items shown in the above table under the caption "Amounts reserved" as the Commission may find proper; and said items are hereby expressly reserved for further consideration and determination by the Commission;

(5) That the amounts shown in the foregoing table under the caption "Amounts disallowed" do not represent proper and reasonable costs for the construction of said project, and are hereby disallowed as indicated.

WHEREFORE, pursuant to such findings and determinations, the Commission hereby orders:

(1) That the licensee establish and maintain control ledger sheets or accounts with reference to said project showing a total debit balance in its fixed capital accounts beginning with an entry of $3,325,226.35 as actual legitimate original costs of said project as of December 31, 1925;

(2) That said licensee establish and maintain subsidiary ledger sheets or accounts or records, showing and substantiating all entries in such control account, and classifying the total for fixed capital in appropriate detail and in accordance with the Commission's rules and regulations;

(3) That licensee comply with this order within sixty (60) days of its service.

Executed at Washington, D. C., this 25th day of March, 1933.

BY THE COMMISSION

Geo. Otis Smith

Chairman

The entry of the foregoing determination and order, and the stipulation therein referred to, are hereby consented to and agreed to for and on behalf of the licensee without further hearing, such hearing being hereby expressly waived, without prejudice, however, to any right of the licensee to a judicial review of said determination as to "Power Purchased", Item I, 3, [illegible] Paragraph (3) above, and to further hearing on items under caption "Amounts reserved"

Counsel for licensee.

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FEDERAL POWER COMMISSION

WASHINGTON, D. C.

PROJECT NO. 20, IDAHO (SODA),
UTAH POWER & LIGHT CO., licensee.

ORDER DETERMINING COST

(Orig).

FEDERAL POWER COMMISSION
JUL 22 1933
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FEDERAL POWER COMMISSION

APPLICATION

OF

UTAH POWER & LIGHT COMPANY

FOR

AMENDMENT OF LICENSE, NO. 4

UNDER ACT OF JUNE 10, 1920 (41 STAT. 1063)

PROJECT NO. 20 - IDAHO

TO INCLUDE LAVA AND PALISADE TANK SITES

BEAR RIVER,

IDAHO.

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(1) Utah Power & Light Company, a corporation organized and existing under and by virtue of the laws of the State of Maine, and having its office and principal place of business in Utah, at Salt Lake City, in said State, to which a license for a power project, designated as Project No. 20, was issued by the Federal Power Commission on the 5th day of July, 1923, which said license was duly amended by Amendments Nos. 1, 2 and 3, granted by said Federal Power Commission on December 14, 1927, March 13, 1930, and January 24, 1933, respectively, hereby makes application to said Commission for an amendment of said license as so amended in the manner and to the extent described herein.

(2-A) That Articles 1, 2, 7, 14 and 15, of said license as amended be changed and amended to read as follows:

> Article 1. This license is issued for a period of fifty (50) years from the date hereof for a project located on Bear River, Idaho and partly on public lands of the United States and partly within the Cache National Forest, consisting of:
>
> A. All lands constituting the project area and enclosed, or the location of which is shown, by the project boundary, and/or interests in such lands necessary or useful for the purpose of the project, whether such lands or interests therein are owned or held by the Licensee or by the United States; such project area and project boundary being more fully described by the following Exhibits:
>
> Exhibit K: Sheets 1 and 2 (Drawing F-13792, sheets 1 and 2, F.P.C. No. 20-25 and 35) "Soda hydro-electric project, Bear River, Idaho, general map of entire project," said Exhibit K sheets 1 and

[illegible]

Said Exhibit K having been filed with the Commission in connection with Amendment of License No. 3, authorized January 24, 1933.

E. All water rights, reference to which is made in a certain exhibit accompanying application for license for the Soda unit, designated as Exhibit E, said exhibit being signed by E. W. Hill, Vice President, and received in the office of the Federal Power Commission on August 16, 1932.

C. All project works consisting of a gravity concrete dam about ninety feet high in Bear River, a reservoir, and a concrete power house built integral with the dam, the location, nature and character of which project works are fully shown and described by the following exhibits:

Exhibit L, in 4 sheets, as follows:

Sheet No.	Licensee's No.	F.P.C. No.	Title
1	F-13794	20-27	General Contour Map and Character of Foundations.
2	F-13795	20-28	General Plan of Development.
3	F-13796	20-29	Power House and Dam, Plan, and Downstream Elevation.
4	F-13797	20-30	Sections and Details.

Exhibit M: "General Description of Mechanical and Electrical Equipment," two typewritten sheets, signed by E. W. Hill, Vice President, and received in the office of the Federal Power Commission September 7, 1932.

Said exhibits having been filed with the Commission in connection with Amendment of License, No. 3, authorized January 24, 1933.

D. All other structures, fixtures, equipment, or facilities used or useful in the maintenance and operation of the project, whether owned by the Licensee or by the United States, and located upon the project area, including such portable property as may be used and useful in connection with the project or any part thereof, whether located on or off the project area, if and to the extent that the inclusion of such property as a part of the project works is approved or acquiesced in by the Commission; also all other rights, [illegible]

[illegible]

E. The maps, plans, specifications and statements [illegible] and approved by the Commission in accordance with paragraphs A, B, C and D hereof, and approved by the Commission on August 27, 1923, and on February 1, 1926, and by the Commission on November 10, 1930, are hereby made a part of this license, and no substantial change shall hereafter be made in said exhibits or any of them until such change shall have been approved by the Commission: Provided, however, that if the Licensee deems it necessary or desirable that said approved maps, plans, specifications and statements, or any of them be changed, there shall be submitted to the Commission, for approval, amended, supplemental, or additional maps, plans, specifications, and statements covering the proposed changes, and upon approval by the Commission of such proposed changes, such amended, supplemental or additional maps, plans, specifications and statements shall become a part of this license and shall supersede in whole or in part such map, plan, specification or statement or part thereof theretofore made a part of this license as may be specified respectively in order or endorsement of approval.

(2-B) Article 6: Subject to the provisions of Section 13 of the Act, the Licensee shall begin the construction of said project works on or before August 1, 1923, shall thereafter in good faith and with due diligence prosecute such construction and shall complete the same on or before July 1, 1926.

(2-C) Article 7: For the purpose of determining the stage and flow of the stream from which water is to be diverted for the operation of said project works and of the amount of water held in and drawn from storage, the Licensee shall install a gage to show the elevation of the water surface in the reservoir created by said dam and the discharge of Bear River in or below the tailrace of said plant, and shall provide for the required readings of such gages, and for the adequate rating of said gaging stations. The Licensee shall also install and maintain standard meters adequate for the determination of the amount of electric energy generated by said project works. The number, character, and location of gages, meters or other measuring devices, and the method of operation thereof may be altered from time to time if necessary to secure adequate determinations, but such alteration shall not be made except with the approval of the Commission or its authorized representative or upon the specific direction of the Commission. The installation of gages, [illegible] of said stream for the determination

[illegible]
[illegible]
[illegible]
operations in the region of said project, and the
Licensee shall reimburse the United States Geological
Survey for costs incurred in such supervision or for
such part thereof as said District Engineer may deem
equitable in the circumstances. The Licensee shall
keep accurate and sufficient record of the foregoing
determinations to the satisfaction of the Commission,
shall make return of such records annually at such
time and in such form as the Commission may prescribe.

(2-D) Article 14: Upon the completion of the construction of said project the Licensee shall file with the Commission a statement, under oath, in duplicate, showing the actual legitimate cost of construction thereof as specified in Regulation 20, section 2 of said rules and regulations of the Commission. Such statement shall include all proper and legitimate costs, whether incurred prior to date of issuance of license or on and after such date; and the Licensee shall, if requested by the Commission, show separately on such statement the items and amounts of cost incurred prior to the date of issuance of license, with such other details with respect thereto as the Commission may require. Each and every item of cost included in such statement shall be supported by proper voucher or other evidence; and any such voucher or evidence or certified copy thereof, in support of any item properly includible in said cost shall become a part of the permanent records of said project and shall be kept and retained by the Licensee in the manner required by the Commission.

(2-E) Article 15: The Licensee shall pay to the United States reasonable annual charges for the purpose of reimbursing the United States for the costs of the administration of the Act and for recompensing it for the use, occupancy and enjoyment of its lands or other property hereinbefore described. The payment by the Licensee of such annual charges for any calendar year shall be made to the United States at the end of the year, or within thirty days thereafter, upon bills rendered or approved by the Commission. Such charges shall be determined in accordance with the provisions of Regulation 14 of said rules and regulations of the Commission, and for the purposes of such determination, the power capacity upon which shall be based the charges for reimbursing the United States for the cost of administration of the Act, and for recompensing it for the use, occupancy and enjoyment of lands of the United States, shall, subject to the provisions of Section 3 of said Regulation 14, be taken as 5,120 horsepower.

This license, Project No. 20, Idaho, was granted July 3, 1923, covering the "Soda Project" located on Soda River near Soda Springs, Idaho. It provided that the construction of the project works should commence on or before August 1, 1923 and should be completed on or before July 1, 1926. These terms and provisions of the license were complied with, said Soda project being completed and put into operation prior to December 31, 1925. This plant has been and now is operated by Licensee as a part of its interconnected system.

Previous to the issuance of that license, Utah Power & Light Company had obtained from the Federal Power Commission a Preliminary Permit covering the Soda, Lava, Narrows and Mink power sites all located on Bear River in Idaho. [illegible] on December 14, 1927 the Commission granted Amendment No. 1 of said license, Project No. 20, so amending the same as to include all of the sites in the one project, the Narrows and Mink sites being consolidated to be developed with one dam and power house; so that said license as amended covered the Soda, Lava and Revised Mink sites, all as units of one Project.

At the time this Amendment No. 1 was granted, the then increasing demands for power on the Licensee's interconnected system indicated that it would be necessary to construct the Lava and Revised Mink units within the time allowed in such amendment, i.e., the Revised Mink unit was to be commenced on or before July 1, 1929 and to be completed on or before July 1, 1932, and the Lava unit was to be commenced on or before July 1, 1933, and to be completed on or before July 1, 1936.

[illegible] 1929, revised in December 1929. Prior to the time of making this application, considerable amount of preliminary work had been done at these sites. The Licensee had expended more than $50,000 for engineering investigations, stream surveys, diamond drilling, etc., and the purchase of certain lands necessary to the development of these sites.

However, up to that time, Licensee had found it possible to supply the growing demands for power on its system by utilizing power sources in which a more effective capital investment could be made than would have been possible had these Lava and Revised Mink sites been developed instead; this was fully set out in said application for amendment, so that it was apparent that the prudent and economical development of Licensee's interconnected system in a manner best adapted to a comprehensive scheme of improvement and utilization, that would best supply the reasonable market demands of the territory served, required that additional time be granted Licensee within which to construct these units.

Attached to that application (as revised in December 1929) were estimates of the available power and probable load for the years 1930 to 1937 inclusive. These estimates were based on a forecast as accurate as it was then possible to make.

After due consideration by the Commission the amendment applied for was granted on March 13, 1930. By that amendment Licensee was required to commence the construction of the Revised Mink unit on or before January 1, 1934 and to complete the same on or before November 1, 1935;

[illegible] the time the above mentioned estimate of future power require-
[illegible] was made, [illegible] these the purpose and
[illegible] position that was to follow. The business of this licensee has increased considerably with that of other industries. Some of its largest consumers of electricity are engaged in mining and smelting copper, silver, lead and zinc ores, and their requirements for electrical energy as well as the requirements of almost all other of the company's industrial consumers, have been greatly curtailed.

The resumption of activity on the part of these customers is entirely problematical; it depends upon conditions entirely outside their control or the control of this licensee.

Attached hereto and [illegible] Exh. II. Table I shows a comparison of the average monthly available power from existing plants, and the actual load requirements on the company's system from 1928 to April 1933 inclusive. From this table it is evident that during this period applicant has had power available largely in excess of its requirements.

It is particularly difficult at this time for licensee to forecast the future power requirements, but it is certain that there is no present market for the power that would be produced by these plants, if built, and no one can say that there will be a future market.

Table II submitted herewith is a forecast of the licensee's probable future requirements. This table shows that Licensee at the present time has a very considerable excess capacity and indicates that the company's [illegible] to meet its customers'

- -

[illegible] had the [illegible] to forecast the [illegible] power [illegible], due to the unprecedented depression of 1931 and 1932, it would not have proceeded further with the obtaining of a license covering the Lava and Revised Link sites. However, so long as a market appeared to be available, which it seemed would in the then near future require the installation of additional generating plants, we both hoped and expected to proceed with the construction of the Lava and Revised Link developments.

Since, however, our best estimates indicate that our power requirements will [illegible] for several years to come, we believe that it is in conformity with the spirit of the act, and the best interests of the public to relinquish such priority.

We are, therefore, making this application to amend the license covering Project No. [illegible], so that it will cover only Soda project, for which said license was originally granted, which project is now being operated in connection with Licensee's [illegible] power system, and to exclude from said license the Lava and Revised Link units.

IN WITNESS WHEREOF, the Applicant has caused its name and corporate seal to be hereunto signed and affixed by S. M. Gadsby, its President, thereunto duly authorized, this 13th day of July, 1933.

UTAH POWER & LIGHT COMPANY

By S. M. Gadsby
President

ATTEST:

[signature]

TO ACCOMPANY APPLICATION FOR
CERTIFICATE OF PUBLIC CONVENIENCE NO. A-
DOCKET NO. G-

FEDERAL POWER COMMISSION
FILED 1933

EXHIBIT I

Actual average monthly available power from existing plants and actual average monthly load requirements
January 1 1930 to April 30 1933

Year and Month	Actual Average Monthly Available Power from Existing Plants-Kw	Actual Average Load Requirements Kw	Year and Month	Actual Average Monthly Available Power from Existing Plants-Kw	Actual Average Load Requirements Kw
1930			1932		
Jan.	141,300	101,000	Jan.	128,100	64,700
Feb.	127,200	87,300	Feb.	127,700	62,000
Mar.	122,900	82,900	Mar.	118,800	56,800
Apr.	142,800	82,900	Apr.	138,300	61,700
May	135,100	85,100	May	143,000	61,100
June	135,900	86,100	June	140,800	60,800
July	136,600	90,000	July	147,100	62,700
Aug.	140,800	89,300	Aug.	142,100	60,300
Sept	139,800	87,100	Sept	148,200	68,300
Oct.	115,200	92,300	Oct	131,700	64,700
Nov.	115,700	81,300	Nov	112,300	62,300
Dec.	142,400	81,300	Dec	139,700	68,800
1931			1933		
Jan.	125,500	81,800	Jan.	130,400	56,400
Feb.	121,300	78,800	Feb.	127,900	58,800
Mar.	117,400	73,000	Mar.	121,900	61,700
Apr	139,100	72,300	Apr.	142,700	67,300
May	138,100	73,400			
June	128,000	79,700			
July	136,700	78,900			
Aug	139,600	76,900			
Sept	127,400	74,300			
Oct.	115,600	75,400			
Nov.	104,600	75,500			
Dec	129,900	75,300			

TO ACCOMPANY APPLICATION FOR
LICENSE OR LICENSE TO [illegible]

EXHIBIT K

FEDERAL POWER COMMISSION
JUL [illegible] 1933

Estimated average monthly available power from existing plants and estimated average load requirements - May 1 1933 to December 31, 1940

Year and Month	Estimated Average Monthly Available Power from Existing Plants Kw	Estimated Average Load Requirements Kw	Year and Month	Estimated Average Monthly Available Power from Existing Plants Kw	Estimated Average Load Requirements Kw
1933			1936		
May	143,600	48,000	Jan.	131,900	88,000
June	134,900	42,000	Feb.	129,800	87,000
July	141,600	49,000	Mar.	129,100	85,000
Aug.	143,000	57,000	Apr.	180,300	85,000
Sept.	141,200	55,000	May	141,200	90,000
Oct.	143,600	55,000	June	138,000	95,000
Nov.	131,000	57,000	July	137,500	100,000
Dec.	139,700	60,000	Aug.	139,700	104,000
			Sept.	138,400	104,000
1934			Oct.	139,900	102,000
Jan.	134,600	60,000	Nov.	127,300	104,000
Feb.	132,400	57,000	Dec.	135,600	102,000
Mar.	141,400	56,000			
Apr.	161,100	56,000	1937		
May	141,600	60,000	Jan.	130,300	102,000
June	132,900	65,000	Feb.	128,400	102,000
July	139,600	70,000	Mar.	127,700	97,000
Aug.	141,000	75,000	Apr.	156,700	97,000
Sept.	139,600	78,000	May	134,000	97,000
Oct.	142,600	74,000	June	125,700	100,000
Nov.	129,700	76,000	July	132,400	102,000
Dec.	138,800	71,000	Aug.	135,600	105,000
			Sept.	132,900	105,000
1935			Oct.	138,400	103,000
Jan.	146,100	74,000	Nov.	125,900	105,000
Feb.	131,200	73,000	Dec.	134,000	103,000
Mar.	130,800	70,000			
Apr.	140,200	70,000			
May	140,400	75,000			
June	131,800	80,000			
July	138,100	85,000			
Aug.	139,500	90,000			
Sept.	138,500	90,000			
Oct.	141,100	88,000			
Nov.	128,500	90,000			
Dec.	136,900	88,000			

FEDERAL POWER COMMISSION
FEB 28 1933

Exhibit No. 15

Estimated average monthly available power
from existing plants and estimated average load
requirements May 1 1938 to December 31, 1940

Year and Month	Estimated Average Monthly Available Power from Existing Plants Kw	Estimated Average Load Requirements Kw	Year and Month	Estimated Average Monthly Available Power from Existing Plants Kw	Estimated Average Load Requirements Kw
1938			1940		
Jan.	128,700	103,000	Jan.	125,300	107,000
Feb.	128,900	103,000	Feb.	123,900	107,000
Mar.	126,400	100,000	Mar.	123,300	105,000
Apr.	154,900	100,000	Apr.	151,300	105,000
May	132,700	100,000	May	128,300	105,000
June	123,300	103,000	June	118,500	107,000
July	130,000	105,000	July	125,200	110,000
Aug.	131,400	107,000	Aug.	128,300	112,000
Sept.	130,500	107,000	Sept.	125,700	112,000
Oct.	136,900	105,000	Oct.	135,300	110,000
Nov.	124,000	107,000	Nov.	121,000	112,000
Dec.	132,300	105,000	Dec.	125,700	110,000
1939					
Jan.	127,100	105,000			
Feb.	125,400	105,000			
Mar.	125,100	103,000			
Apr.	153,100	103,000			
May	130,500	103,000			
June	120,100	105,000			
July	127,600	107,000			
Aug.	129,000	110,000			
Sept.	128,100	110,000			
Oct.	135,400	107,000			
Nov.	122,000	110,000			
Dec.	130,600	107,000			

UTAH POWER & LIGHT COMPANY

WHEREAS, under authority of the Federal Water Power Act of June 10, 1920 (41 Stat. 1063), the Federal Power Commission, hereinafter called "the Commission," on July 5, 1923, issued to UTAH POWER & LIGHT COMPANY, hereinafter called "the Licensee," a corporation existing under the laws of the State of Maine and having its office and principal place of business in Salt Lake City, Utah, a license for a power project (No. 20), and on December 14, 1927, March 13, 1930, and January 24, 1933, amended said license by instruments Nos. 2, 3, and 4, respectively; and

WHEREAS, the Licensee has filed application, dated July 13, 1933, to the Commission further to amend said license to exclude from the project the Lava and Revised Mink units of development; and

WHEREAS, notice of said application has been given and published by the Commission as required by section 4 of the Federal Water Power Act, and full opportunity has been given to all interested parties to be heard; and

WHEREAS, upon due consideration of said application, it appears that the amendment requested is reasonable and necessary and will not be incompatible with the public interest.

NOW, THEREFORE, the license issued to the Licensee, as aforesaid, is hereby further amended as follows, upon the express condition, however, that such amendment shall not operate to alter or amend said

of said license;

Part I, Article 1 of said license and sub-articles A and C thereof, as amended by Instruments Nos. 2 and 4, are further amended by deleting therefrom the list of exhibits descriptive of said Lava and Revised Mink units (F. P. C. No. 20-17 to 24), and by making certain minor modifications of wording; so that said article shall read as follows:

"Article 1. This license is issued for a period of fifty (50) years, terminating July 5, 1973, for a project located on Bear River, Idaho, and partly on public lands of the United States, consisting of:

"A. All lands constituting the project area and enclosed, or the location of which is shown by the project boundary, and/or interests in such lands necessary or useful for the purpose of the project, whether such lands or interests therein are owned or held by the Licensee or by the United States; such project area and project boundary being more fully described by the following exhibits:

Exhibit K - A general map of entire project in two sheets bearing Drawing No. F-13792 (F. P. C. No. 20-25 and 26) and entitled 'Sola Hydro-electric Project, Bear River, Idaho;

said exhibit having been filed with the Commission on September 7, 1922, and having been made a part of the license by Amendment No. 4 issued January 24, 1 33.

"B. All water rights, reference to which is made in a certain exhibit accompanying the application for license for the Sola unit, designated as Exhibit B, said exhibit being signed by E. J. Hill, Vice President, and received in the office of the Commission on August 16, 1922.

"C. All project works consisting of a gravity concrete dam about ninety feet high in Bear River, a reservoir, and a concrete power house built integral with the dam; the location, nature, and character of which project works are more fully shown and described by the following exhibits:

[illegible]

F. P. C. No. 20-29, entitled 'General
[illegible] of Development,' and bearing drawing
[illegible];

F. P. C. No. 20-30, entitled 'Power House and Dam - Sections and Details,' and bearing drawing No. F-13797;

F. P. C. No. 20-29, entitled 'Power House and Dam, Plan, and Downstream Elevation,' and bearing drawing No. F-13796;

F. P. C. No. 20-30, entitled 'Power House and Dam - Sections and Details,' and bearing drawing No. F-13797.

Exhibit M - In two typewritten sheets, entitled 'General Description of Mechanical and Electrical Equipment,' and signed by E. W. Hill, Vice President, and received in the office of the Commission September 7, 1932.

Said Exhibits L and M having been filed with the Commission on September 7, 1932, and having been made a part of the license by instrument No. --, issued January 24, 1933.

"D. All other structures, fixtures, equipment, or facilities used or useful in the maintenance and operation of the project, whether owned by the Licensee or by the United States and located upon the project area, including such portable property as may be used and useful in connection with the project or any part thereof, whether located on or off the project area, if and to the extent that the inclusion of such property as a part of the project works is approved or acquiesced in by the Commission; also all other rights, easements, or interests, including said riparian rights, the ownership, use, occupancy, or possession of which is necessary or appropriate in the maintenance and operation of the project or appurtenant to the project area.

"3. The maps, plans, specifications, and statements designated and described in paragraphs A, B, C, and D hereof, and approved by the Commission, are hereby made a part of this license, and no substantial change shall hereafter be made in said exhibits, or any of them, until such change shall have been approved by the Commission; provided, however, that if the Licensee deems it necessary or desirable that said approved maps, plans, specifications, and statements, or any of them, be changed, there shall be submitted to the Commission for approval, amended, supplemental, or additional maps, plans, specifications, and statements covering the proposed changes, and upon approval by the Commission of such

[illegible] ...s, plant, [illegible] ...ght of the license as shall [illegible] ...ich Act, plan, [illegible] ...therefore made a part of this license as may be specified, respectively, in the order or endorsement of approval."

PARAGRAPH II. Article 2 of said license as amended is further amended by striking out requirements respecting the time for commencement and completion of construction of the Lava and Revised Mink units; so that said article shall read as follows:

"Article 2. Subject to the provisions of section 13 of the Act, the Licensee shall begin the construction of said project works on or before August 1, 1923, shall thereafter in good faith and with due diligence prosecute such construction and shall complete the same on or before July 1, 1925."

PARAGRAPH III. The first sentence of article 7 of said license as amended December 14, 1927, is further amended to read as follows:

"Article 7. For the purpose of determining the flow of the stream from which water is to be diverted for the operation of said project works and of the amount of water held in and drawn from storage, the Licensee shall install a gage to show the elevation of the water surface in the reservoir created by said dam and the discharge of Bear River in or below the tailrace of said plant, and shall provide for the required readings of such gages and for the adequate rating of said gaging stations."

PARAGRAPH IV. Article 14 of said license as amended is further amended by striking out reference to the Lava and Revised Mink units; so that said article shall read as follows:

"Article 14. Upon completion of construction of said project for which a date of completion is specified in article 2 hereof, or of any addition to or betterment of said project, the Licensee shall file with the Commission a statement under oath in duplicate showing the actual legitimate cost of construction thereof and the price paid for water rights, lands, or interest in lands appurtenant to such construction as required by regulation 20, section 2, of said rules and regulations of the Commission. Any such statement shall include all proper and legitimate costs, whether incurred prior to July 1, 1923, or on and after such date; and the Licensee shall, if requested by the Commission, show separately on any such statement, or by a special report or [illegible] ...ions [illegible] ...ts [illegible] ...all

of the instrument records of said [illegible] shall be [illegible]
within [illegible] days in the manner provided [illegible]
[illegible] as may be [illegible] [illegible]
[illegible] [illegible] [illegible] [illegible]
of section [illegible] said regulation No. [illegible].

PARAGRAPH V. Article 17 of said license as amended is further amended by striking out references to the power capacity of the Iowa and Revised Statutes; so that said article shall read as follows:

"Article 17. The Licensee shall pay to the United States reasonable annual charges for the purpose of reimbursing the United States for the costs of the administration of the Act and for recompensing it for the use, occupancy, and enjoyment of its lands or other property hereinbefore described. The payment by the Licensee of such annual charges for any calendar year shall be made to the United States at the end of the year or within thirty days thereafter upon bills rendered or approved by the Commission. Such [illegible] as shall be determined in accordance with the provisions of regulation [illegible] of said rules and regulations of the Commission, and for the purposes of such determination the power capacity upon which shall be based the charges for reimbursing the United States for the costs of administration of the Act and for recompensing it for the use, occupancy, and enjoyment of lands of the United States shall, subject to the provisions of section 3 of regulation 14, be taken as 5,120 horsepower."

IN WITNESS WHEREOF, the Commission has caused its name and seal to be hereto signed and affixed by Frank R. McNinch, its Chairman this 27th day of February, 1935, pursuant to an order of the Commission issued at its meeting on December 12, 1933.

FEDERAL POWER COMMISSION

By Frank R. McNinch
Chairman.

Attest:
Leon M. Fuquay
Acting Secretary.

[illegible] ... [illegible]

[illegible] ... [illegible]

this 10th day of February, 1930, as a seal for the same and corporate seal to be hereto affixed by D. M. Cadsby, its President, pursuant to a resolution of its Board of Directors passed on the 8th day of January, 1930, a certified copy of the record thereof being hereto attached.

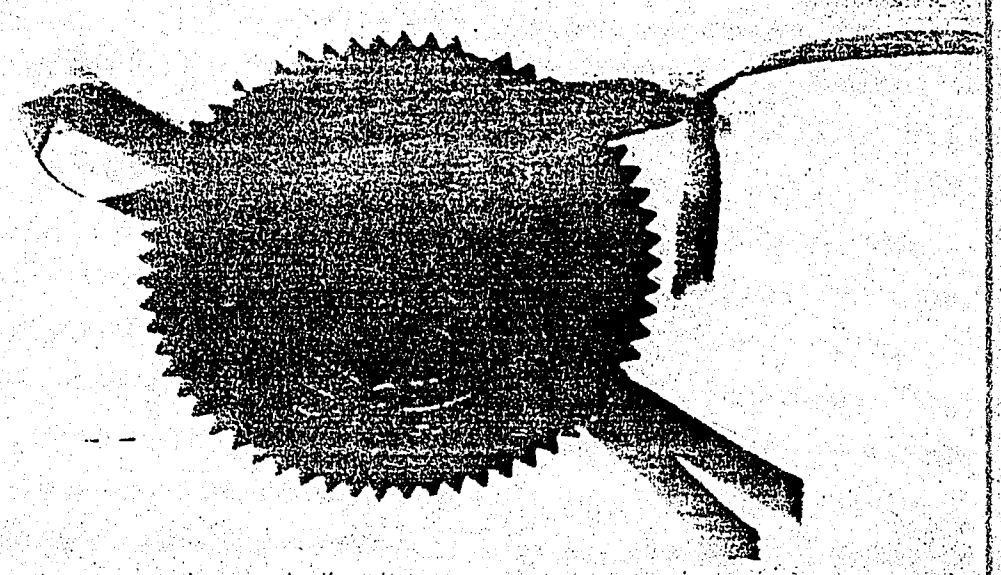
[illegible]

By D. M. Cadsby Jr.
President.

Attest:

Secretary.

(Affix seal here)



RESOLVED that the President or any Vice President of this Company be and hereby is authorized and empowered to make application for and on behalf of this Company, subject to the terms and conditions of the Federal Water Power Act of June 10, 1920, and the modifications thereof, Preliminary Permits and Licenses tendered by the Federal Power Commission pertaining to the construction, operation, and maintenance of project works necessary or convenient for the development, transmission and utilization of electrical power, which said President or Vice President may deem proper and for the best interests of this Company; further, said President or Vice President is likewise authorized and empowered to execute an endorsement upon such Preliminary Permits or Licenses, indicating the acceptance of the same for and on behalf of this Company.

RESOLVED FURTHER; That the President or any Vice President of this Company be and hereby is authorized and empowered to execute any and all contracts, affidavits, certificates or other instruments in writing necessary or required in connection with the issuance or acceptance of such Permits or Licenses, and/or the construction, maintenance or operation of the project works thereunder, and to make and enter into agreements with the Federal Power Commission or its representatives pursuant to the aforesaid Act and regulations thereunder, which said President or Vice President may deem proper and for the best interests of this Company.

RESOLVED FURTHER: That the Secretary or an Assistant Secretary of this Company be and hereby is authorized and empowered to affix and attest the Company's corporate seal to such application, Permits, Licenses or other documents, and is hereby authorized and empowered to certify the foregoing resolutions to the Secretary of the Federal Power Commission or other officer of the United States having authority in the premises.

- - - - - - - - - - -

I, Geo. P. Thomas, Secretary of the Utah Power & Light Company, do hereby certify that the foregoing is a true and correct copy of a resolution adopted by the Board of Directors of this Company at a meeting held in Salt Lake City, Utah, January 6, 1932.

Secretary

FEDERAL POWER COMMISSION

WASHINGTON, D. C.

AMENDMENT NO. 4 OF LICENSE

Project No. 20 - Idaho

Utah Power & Light Company

UTAH POWER & LIGHT COMPANY
1407 WEST NORTH TEMPLE STREET
SALT LAKE CITY, UTAH 84140

RECEIVED
APR 4 1990
Department of Water Resources

LEGAL DEPARTMENT
JODY L. WILLIAMS
ATTORNEY AT LAW
801-220-2851

April 2, 1990

RECEIVED
APR 0 6 1990

STATE OF IDAHO
DEPARTMENT OF WATER RESOURCES
1301 North Orchard Street
Boise, Idaho 83706-2237

Re: **Notice to Change Mailing Address**

Dear Dept. of Water Resources representative:

Please change your mailing records (~~which are currently as shown on the attached mailing label~~) to reflect the following corrected address (P.O. Box 899 is no longer being used by our Company):

Ms. Jody L. Williams
Utah Power & Light Company
1407 W. North Temple
Salt Lake City, Utah 84140

Thank you.

Very truly yours,

Jody L. Williams

JLW:cld

21-7363 13-4128
25-7403 4129
01-7051 21-4060
11-2081 27-7018
2084 35-2830
4004 + misc. decreed files - computer updated 4-17-90
SC

AGREEMENT
Regarding the Bear River System

This Agreement is entered into this 5th day of October, 1999, by and among PACIFICORP, an Oregon corporation ("PacifiCorp"); SCOTTISH POWER plc, a public limited company registered in Scotland ("ScottishPower"); the STATE OF IDAHO, by and through the Director of the Department of Water Resources ("Idaho"); the STATE OF UTAH, by and through the Director of the Division of Water Resources, ("Utah"); and the STATE OF WYOMING, by and through the State Engineer ("Wyoming"). PacifiCorp, ScottishPower, Idaho, Utah, and Wyoming are individually referred to as a "Party" and collectively as the "Parties."

RECITALS

A. PacifiCorp operates hydroelectric plants on the Bear River and holds water rights in the Bear River and Bear Lake (such hydroelectric plants and water rights referred to herein as "Bear River System"). PacifiCorp's water rights in the Bear River System are subject to the Amended Bear River Compact among the States of Idaho, Utah and Wyoming, as well as the laws of the three States, and other obligations.

B. PacifiCorp and ScottishPower are parties to a merger transaction that is currently the subject of approval proceedings before the public utility commissions in the States of Idaho, Utah and Wyoming.

C. The Parties recognize the need to assure the public utility commissions of the States of Idaho, Utah, and Wyoming, and the other public officials and water users of the three States that PacifiCorp's merger with ScottishPower will not affect the operation of the Bear River System or PacifiCorp's ownership or exercise of its Bear River water rights.

D. By this Agreement, PacifiCorp and ScottishPower intend to assure the States of Idaho, Utah and Wyoming that PacifiCorp or ScottishPower will not make any separate agreement with any State individually regarding PacifiCorp's or ScottishPower's water rights in the Bear River System.

NOW, THEREFORE, IT IS HEREBY AGREED BY THE PARTIES AS FOLLOWS:

1. Both ScottishPower and PacifiCorp agree that:

   a. PacifiCorp's water rights are constrained by the historic practice of not making a delivery call for hydropower generation; and

   b. Bear Lake is operated, consistent with long-standing historic practice and applicable laws, primarily as a storage reservoir to satisfy

contracts for existing irrigation uses and flood control needs in the three States, with the use of water for hydropower generation being incidental to the other purposes for which the water is being released.

2. The Parties agree to jointly negotiate an enforceable Bear River System Operations Agreement consistent with the provisions set forth in paragraph 1. With respect to the Bear River, the Operations Agreement shall confirm and continue PacifiCorp's historic practice of utilizing its water rights primarily for existing irrigation uses and contractual obligations. The Operations Agreement shall be made available for public review and comment in each of the three States.

3. This Agreement, the Operations Agreement, or any other agreement that may be entered into with PacifiCorp and/or ScottishPower concerning utilization of PacifiCorp's water rights in the Bear River System may be recorded in the County Recorders' Offices of the appropriate counties and shall be provided to the public utility commissions of the respective States within 10 days of execution of the document.

4. Approval and execution of the Operations Agreement by each of the States of Idaho, Utah, and Wyoming shall be required for the Operations Agreement to be effective.

5. The Parties commit to use their best efforts to complete negotiation, review, and execution of the Bear River System Operation Agreement within sixty (60) days of the execution of this Agreement.

6. No agreements between PacifiCorp and/or ScottishPower and one or more of the States concerning utilization of PacifiCorp's water rights in the Bear River System shall be effective unless jointly approved by all three States.

7. Nothing in this Agreement, nor in any Operations Agreement, shall be interpreted to modify, limit or enhance any rights or obligations of the three States under the laws of the States and the Amended Bear River Compact.

8. Consideration. ScottishPower and PacifiCorp acknowledge receiving sufficient consideration for the commitments contained in this Agreement and waive any argument that they might have in any judicial proceeding that no consideration exists to support this Agreement or that the consideration received is not sufficient.

9. Binding Effect of Agreement. This Agreement is intended to be a final and binding settlement agreement between the three States and ScottishPower and PacifiCorp, jointly and severally, and inures to the benefit of, and is binding upon, the representatives, successors in interest, and assigns of each entity.

10. Sovereign Immunity. Each of the three States and their various agencies do not waive their sovereign immunity by entering into this Agreement and fully retain all immunities and defenses provided by law with respect to any action based on or occurring as a result of this Agreement.

11. Capacity to Execute Agreement. ScottishPower and PacifiCorp each warrant and represent that the person executing this Agreement is empowered to do so on behalf of such company and thereby binds each entity by signing this Agreement.

12. Waivers. The failure to object to any breach of any term or condition in this Agreement shall not constitute a waiver and no failure to object shall be deemed a waiver of any prior or subsequent breach.

13. Entirety of Agreement. This Agreement represents the entire and integrated agreement between the Parties and supersedes all prior negotiations, representations and oral agreements. No promise or inducement has been offered or made except as herein set forth and this Agreement is executed without reliance upon any statement or representation by any other Party or their agent.

14. Modification. This Agreement may be amended or modified only by a written agreement signed by each of the Parties to this Agreement.

15. Execution of Agreement in Parts. Due to time constraints, the Parties acknowledge that it is not possible to have all Parties sign the same copy of this Agreement. Therefore, the Parties agree that this Agreement may be executed in any number of counterparts, each of which shall be deemed an original, but all of which together shall constitute one and the same instrument.

16. Signatures. In witness whereof, the Parties to this Agreement through their duly authorized representatives have executed this Agreement and certify that they have read, understood, and agreed to the terms and conditions of this Agreement as set forth herein.

IN WITNESS WHEREOF, the Parties have executed this Agreement the day and the year first above written.

PACIFICORP

By: _____
DENNIS P. STEINBERG
Senior Vice President of PacifiCorp

SCOTTISH POWER plc

By: _____
MATTHEW R. WRIGHT
Manager of Scottish Power plc

STATE OF IDAHO

By: _____
Karl J. Dreher, Director
Department of Water Resources

STATE OF UTAH

By: _____
Larry Anderson, Director
Division of Water Resources

STATE OF WYOMING

By: _____
Gordon W. Fassett
State Engineer

APPROVAL AS TO FORM:

By: _____
for Wyoming

ACKNOWLEDGMENTS

STATE OF Wyoming)
) ss.
COUNTY OF Laramie)

On this 5th day of October, 1999, before me, Diana M. Gorman, a notary public of the State of Wyoming, personally appeared DENNIS P. STEINBERG, a Senior Vice President of PacifiCorp, known or identified to me to be the person who executed the foregoing instrument on behalf of PacifiCorp, and he acknowledged to me that he executed the same.

DIANA M. GORMAN * NOTARY PUBLIC * LARAMIE COUNTY, WYOMING

Diana M. Gorman
NOTARY PUBLIC FOR WYOMING
residing at:
739 Cypress Lane
Cheyenne, WY 82009

My commission expires: 2/21/02

STATE OF Wyoming)
) ss.
COUNTY OF Laramie)

On this 5th day of October, 1999, before me, Diana M. Gorman, a notary public of the State of Wyoming, personally appeared MATTHEW R. WRIGHT, a Manager of Scottish Power plc, known or identified to me to be the person who executed the foregoing instrument on behalf of Scottish Power plc, and he acknowledged to me that he executed the same.

DIANA M. GORMAN * NOTARY PUBLIC * LARAMIE COUNTY, WYOMING

Diana M. Gorman
NOTARY PUBLIC FOR WYOMING
residing at:
139 Cypress Lane
Cheyenne, WY 82009

My commission expires: 2/21/02

Office of the Attorney General

Governor
Jim Geringer

Attorney General
Gay Woodhouse

Water & Natural Resources Division
123 Capitol Building
Cheyenne, Wyoming 82002
307-777-6946 Telephone
307-777-3542 Fax

Deputy Attorney General
Thomas J. Davidson

October 22, 1999

Mr. Norman K. Johnson
Utah Attorney General's Office
Natural Resources Division
Post Office Box 140855
Salt Lake City, Utah 84114-0855

Mr. Phillip J. Rassier
State of Idaho
Office of the Attorney General
Natural Resources Division
Water Resources Unit
1301 North Orchard Street
Boise, ID 83706-2237

Mr. Brent R. Kunz
Hathaway, Speight & Kunz, LLC
Post Office Box 1208
Cheyenne, WY 82003-1208

Mr. Paul J. Hickey
Hickey, Mackey & Evans
Post Office Box 467
Cheyenne, WY 82003-0467

Dear Norm, Phil, Brent, and Paul:

Enclosed please find one of five originals of the *Agreement Regarding the Bear River System*, dated October 5, 1999, with original signatures of each of the five signatories. On behalf of the Wyoming Attorney General's Office and the State Engineer's Office, we wish to express our sincere appreciation to each person involved in negotiating this agreement for their diligent efforts. We enjoyed working with you and look forward to doing so in the future.

Truly yours,

Thomas J. Davidson
Deputy Attorney General

Brian C. Shuck
Assistant Attorney General

Enclosure

cc: Jim Fell, Jody Williams, Jeff Fassett, Sue Lowry

RECEIVED
OCT 27 1999
Department of Water Resources

DRAFT January 28, 2000

PACIFICORP'S BEAR RIVER BASIN WATER RIGHTS
IDAHO

Bear Lake Storage water rights are underlined

RIGHT NO.	*AMOUNT*	*PRIORITY DATE*	*STATUS*	*TYPE OF USE*	*PLACE OF USE*
11-00248	3000 cfs	03/01/1911	Decree	Irrigation / Power Storage / Other	Bear Lake
11-00249	2500 cfs	09/11/1912	Decree	Irrigation / Power Storage / Other	Bear Lake
11-00250	300 cfs	09/01/1912	Decree	Irrigation / Power Storage / Other	Bear Lake
11-00251	200 cfs	09/01/1912	Decree	Irrigation / Power Storage / Other	Bear Lake
11-04004	0.5 cfs / 97.5 cfs	03/01/1894	Decree	Irrigation	Bear Lake
11-04355	0.12 cfs	09/03/1918	Claim	Domestic/ Irrigation	Lifton Pump
11-00228	0.94 cfs	05/01/1890	Decree	Irrigation	
11-00242	0.5 cfs	05/01/1902	Decree	Irrigation	
11-04356	1.4 cfs	07/08/1933	Claim	Irrigation	Soda Springs Golf Course
11-01096	7.5 cfs	03/14/1889	Decree	Irrigation	Ovid Creek

11-01114	7.5 cfs	06/01/1955	Decree	Irrigation	Ovid Creek
11-01116	1.660 cfs	06/01/1955	Decree	Irrigation	Ovid Creek

HYDRO PROJECTS

- **Bear River hydro water rights appear in bold print**

RIGHT NO.	*AMOUNT*	*PRIORITY DATE*	*STATUS*	*TYPE OF USE*	*PLACE OF USE*
11-00086	70 cfs	02/03/1910	Decree	Power	Paris Hydro
11-02081	**1500 cfs**	**06/12/1922**	**License**	**Power**	**Soda Hydro**
11-02084	1 cfs	06/09/1923	License	Domestic / Irrigation	Soda Hydro
11-04354	0.02 cfs	01/01/1922	Claim	Irrigation	Soda Hydro
11-04357	**400 cfs**	**01/01/1922**	**Claim**	**Power**	**Soda Hydro**
11-04358	0.08 cfs	01/01/1922	Claim	Domestic	Soda Hydro
13-04128	**600 cfs**	**01/01/1922**	**Claim**	**Power / Storage**	**Soda Hydro**
13-00957	**500 cfs**	**12/28/1905**	**Decree**	**Power**	**Grace Hydro**
13-00958	**500 cfs**	**07/06/1908**	**Decree**	**Power**	**Grace Hydro**

13-04333	0.04 cfs	06/01/1905	Claim	Domestic	Grace Hydro
13-04334	0.01 cfs	06/01/1905	Claim	Irrigation	Grace Hydro
RIGHT NO.	***AMOUNT***	***PRIORITY DATE***	***STATUS***	***TYPE OF USE***	***PLACE OF USE***
13-04335	0.06 cfs	05/01/1905	Claim	Irrigation	Grace Hydro
13-04336	0.25 cfs	05/01/1905	Claim	Domestic / Irrigation	Grace Hydro
13-00893	0.07 cfs	06/01/1913	Decree	Domestic	Oneida Hydro
13-00967	**1000 cfs**	**06/17/1910**	**Decree**	**Power**	**Oneida Hydro**
13-00968	**1500 cfs**	**01/18/1911**	**Decree**	**Power**	**Oneida Hydro**
13-04129	**700 cfs**	**01/01/1910**	**License**	**Power**	**Oneida Hydro**
13-04337	0.08 cfs	06/17/1910	Claim	Domestic	Oneida Hydro
13-04338	0.08 cfs	06/17/1910	Claim	Irrigation	Oneida Hydro
13-00962	**1500 cfs**	**03/09/1916**	**Decree**	**Power**	**Cove Hydro**
13-00963	**4000 af**	**03/28/1916**	**Decree**	**Power**	**Cove Hydro**
13-00976	**270 cfs**	**12/01/1903**	**Decree**	**Power**	**Cutler Hydro**

13-00977	**135 cfs**	**12/01/1906**	**Decree**	**Power**	**Cutler Hydro**
13-00978	**135 cfs**	**12/01/1908**	**Decree**	**Power**	**Cutler Hydro**
RIGHT NO.	***AMOUNT***	***PRIORITY DATE***	***STATUS***	***TYPE OF USE***	***PLACE OF USE***
13-00979	**500 cfs**	**12/12/1912**	**Decree**	**Power**	**Cutler Hydro**
11-02018	40 cfs	08/09/1907	License	Power Generation	Georgetown Hydro
13-02013	50 cfs	12/23/1905	License	Power Generation	High Creek Hydro

PACIFICORP'S BEAR RIVER BASIN WATER RIGHTS
UTAH

Bear Lake Storage water rights are underlined

WATER RIGHT	***AMOUNT***	***PRIORITY DATE***	***STATUS***	***TYPE OF USE***	***PLACE OF USE***
	3000 cfs	03/01/1911	Decree	Irrigation / Power Storage / Other	Bear Lake
	2500 cfs	09/11/1912	Decree	Irrigation / Power Storage / Other	Bear Lake
	300 cfs	09/01/1912	Decree	Irrigation / Power Storage / Other	Bear Lake

	200 cfs	09/01/1912	Decree	Irrigation / Power Storage / Other	Bear Lake
23-1844	0.6 cfs	00/01/1910	Diligence	Stockwater/ Storage	Swan Creek
25-9437	102.72 af	05/01/1880	Decree	Irrigation	Cutler Area
WATER RIGHT	***AMOUNT***	***PRIORITY DATE***	***STATUS***	***TYPE OF USE***	***PLACE OF USE***
25-9827	2 cfs / 162.4 af	10/11/1955	Application / WUC	Irrigation / Storage	Bear River
25-9828	91.2 af	07/26/1973	Application / WUC	Irrigation	Bear River
25-9829	52.4 af	03/24/1953	Certificate	Irrigation	Bear River
25-9830	16 af	12/26/1952	Certificate	Irrigation	Bear River
25-9831	16 af	02/18/1960	Application / WUC	Irrigation	Bear River
25-1844	25 cfs / 22.35 af	01/01/1901	Decree	Stockwater / Irrigation	Cutler Area
25-1867	25 cfs/663.54 af	05/01/1880	Decree	Stockwater / Irrigation	Cutler Area
25-2014		05/01/1880	Diligence	Stockwater	Cutler Area
25-2031	25 cfs / 693.3 af	01/01/1880	Decree	Stockwater / Irrigation	Cutler Area
25-2739	.006 cfs		Diligence	Stockwater	Cutler Area

25-2741	.002 cfs	01/01/1900	Diligence	Stockwater	Cutler Area
25-2743	.004 cfs	01/01/1900	Diligence	Stockwater	Cutler Area
25-4405		01/01/1858	Diligence	Stockwater	Cutler Area
WATER RIGHT	***AMOUNT***	***PRIORITY DATE***	***STATUS***	***TYPE OF USE***	***PLACE OF USE***
25-4406		01/01/1858	Diligence	Stockwater	Cutler Area
25-4408		01/01/1858	Diligence	Stockwater	Cutler Area
25-4411		01/01/1958	Diligence	Stockwater	Cutler Area
25-4413		01/01/1958	Diligence	Stockwater	Cutler Area
25-4688	0.05 cfs	05/01/1878	Decree	Stockwater / Irrigation	Cutler Area
25-4789	.01 cfs	01/01/1935	Diligence	Stockwater	Cutler Area
25-4928	20 af	10/13/1965	Application / WUCS	Irrigation / Storage	Spring
25-4930	40 af	02/16/1963	Application / WUCS	Irrigation / Storage	Spring
25-5883	136.8 af	05/01/1860	Decree	Stockwater / Irrigation	Cutler Area
25-6626	3 cfs / 160.4 af	05/01/1918	Decree	Irrigation	Pump

25-6852	.35 cfs/ 209.2 af	04/16/1976	Application / WUCS	Stockwater / Irrigation	BR Slough
25-6943	7.5 af	10/31/1965	Application / WUCS	Irrigation / Storage	Spring
25-7780		01/01/1860	Diligence	Stockwater	BR Project
WATER RIGHT	***AMOUNT***	***PRIORITY DATE***	***STATUS***	***TYPE OF USE***	***PLACE OF USE***
29-1953 (a21627)		01/01/1900	WUC	Stockwater	Cutler Area
25-9637		09/18/1995	Application	Stockwater	Cutler Area

HYDRO PROJECTS

- **Bear River hydro water rights appear in bold print**

WATER RIGHT	***AMOUNT***	***PRIORITY DATE***	***STATUS***	***TYPE OF USE***	***PLACE OF USE***
29-1506	**2500 cfs**	**12/19/1923**	**Certificate**	**Power**	**Cutler Hydro**
29-1855	**270 cfs**	**12/01/1903**	**Decree**	**Power**	**Cutler Hydro**
29-2146	**135 cfs**	**12/01/1906**	**Decree**	**Power**	**Cutler Hydro**
29-2147	**135 cfs**	**02/01/1908**	**Decree**	**Power**	**Cutler Hydro**
29-2148	**500 cfs**	**12/02/1912**	**Decree**	**Power**	**Cutler Hydro**

25-8186	32.5 cfs	08/11/1980	Application	Power	High Creek Hydro