



Northwest Power Services, Inc.

July 23, 2004

Mr. Mike Reynolds
Hydroelectric Licensing Specialist
Water Resources Department
North Mall Office Building
725 Summer Street NE, Suite A
Salem, OR 97301-1271

Re: Preliminary Permit Application for the Dorena Lake Dam Hydroelectric Project, HE 559,
FERC# 11945.

Dear Mr. Reynolds,

Per your letter dated July 19, 2004 please find enclosed an original and 3 copies of the revised Preliminary Permit Application for the Dorena Lake Dam Hydroelectric Project. Also enclosed is a copy of the Preliminary Permit Application on CD and a check for \$2,158 for the first stage of the application fee.

If you have any questions feel free to contact me at (208) 745-0834, bsmith@nwpwrservices.com.

Sincerely,

NORTHWEST POWER SERVICES, INC.

A handwritten signature in dark ink that reads 'Brent L. Smith'. The signature is written in a cursive, flowing style.

Brent L. Smith
President

**OREGON WATER RIGHT PRELIMINARY
PERMIT APPLICATION**

FOR THE

**DORENA LAKE HYDROELECTRIC
PROJECT**

HE 559

PREPARED FOR:

**Symbiotics LLC
Rigby, Idaho**

July 2004

**OREGON WATER RIGHT PRELIMINARY
PERMIT APPLICATION**

FOR THE

DORENA LAKE HYDROELECTRIC PROJECT

PREPARED FOR:

Symbiotics LLC

PREPARED BY:

Northwest Power Services, Inc

P.O. Box 535

Rigby, Idaho 83442

July 23, 2004

Oregon Water Right Preliminary Permit Application
for the
Dorena Lake Hydroelectric Project

1. The amount of water in cubic feet per second (cfs) that would be used by the Project.

A maximum of 1,800 cfs would be used by the project in a run-of-river mode. Due to flood control operations at Dorena Lake Dam the reservoir pool elevations change during flood seasons. At high head operations the proposed facility will operate with 850 cfs with a Francis Type Turbine. During lower head operations a Kaplan Type turbine will use 950 cfs. As a run-of-river facility the power plant will use only water released by the U.S. Army Corps of Engineers. The proposed facility will not change the reservoir pool elevations or downstream river flow.

2. The hydraulic head (measured in feet) to be utilized and the number of theoretical horsepower (thp) to be developed. The number of THP shall be determined by multiplying the quantity of water to be diverted in cubic feet per second by the vertical head in feet and dividing the product by 8.8.

	Francis Unit	Kaplan Unit
Hydraulic Head (ft)	85.3	65.6
Design Flow (cfs)	850	950
Design Capacity (mW)	4.5	3.8
Theoretical Horsepower	8239	7082

3. The name and address of the applicant including every person, association of persons, domestic corporation or municipality that has any proprietary right or interest in the project.

GENERAL:

The applicant for the proposed Dorena Lake Hydroelectric Project is Symbiotics LLC, consisting of members that are familiar with all aspects of hydroelectric development from the initial licensing process through design, construction and ongoing operations. The members of Symbiotics LLC have been and are currently involved in various phases of numerous projects in the past fifteen years including projects in Idaho, Utah, Montana and Hawaii.

The applicant, Symbiotics LLC, is not claiming municipal preference under section 7(a) of the Federal Power Act.

The official name, address and phone number of the applicant is:

Symbiotics LLC
P.O. Box 535
Rigby, Idaho 83442
Phone: (208) 745-0834

The project liaison for all correspondence is:

Mr. Brent L. Smith, President
Northwest Power Services, Inc.
P.O. Box 535
Rigby, Idaho 83442
Phone: (208) 745-0834
Fax: (208) 745-0835
E-mail: npsi@nwpwrservices.com

Secondary contact:

Dr. Vincent Lamarra, Director
Ecosystems Research Institute, Inc.
975 South State Highway
Logan, Utah 84321
Phone: (435) 752-2580
Fax: (435) 752-2581
E-mail: vincel@ecosysres.com

The applicant is requesting a preliminary permit for a period of three years from the date of issuance to conduct preliminary environmental reviews, environmental impact statement, feasibility study and preliminary design.

4. The quantity of water to be appropriated by the Project.

As a run-of-river proposed project there will be no storage of water. The project will generate power with whatever flow is released by the U.S. Army Corp of Engineers.

5. The approximate location of the point(s) of diversion and the quantity of water to be taken at each point.

6. The approximate location of the proposed power plant and the point where water will be returned to some natural stream.

The proposed project will use the existing hydraulic head created by the Dorena Lake Dam and discharge the water at the base of the dam. The point of diversion and return are approximately the same location.

The location of the proposed project is:

State:	Oregon
County:	Lane
Nearby Town:	Cottage Grove
Body of Water:	Row River
Meridian:	Willamette Meridian
Township:	T 20 S
Range:	R 2 W
Section:	Sec 32
Longitude:	W122° 57.375'
Latitude:	N43° 47.217'

7. *A legible map to be prepared on U.S. Geological Survey topographic quadrangle sheets showing the general location of the project including all dams, reservoirs, canals, pipelines, forebays, power plants, and streams, and the location of such data shall be given with respect to township and section lines. If on unsurveyed land, the location shall be with respect to projections of township and section lines.*

See Exhibit B

8. *A statement describing the proposed use or market for the power to be developed.*

Upon approval, the proposed Dorena Lake Hydroelectric Project will provide enhanced value to the region's water resources. As well as to provide new renewable environmentally sustainable hydroelectric generation urgently needed to relieve a growing energy need. The electrical energy produced at the Dorena Lake Dam Hydroelectric Project will be marketed to electric utilities servicing this region of Oregon such as PacifiCorp.

9. *The name and mailing address of all property owners:*
 - (a) *Within 300 feet of the project boundary if the project is within an urban growth boundary; or*
 - (b) *Within 1,000 feet if the project is outside of an urban growth boundary giving also the amount of land under the adjacent property owners ownership in acres or hectares.*

The following are the name and mailing address of all property owners within 1,000 feet of the project boundary:

Geoffrey W. Cutting & Judy McCarthy Cutting
35235 Row River Rd.
Cottage Grove, OR 97424

Part of the Dorena Reservoir Reservation is owned by:
The U S Government, Army Corps of Engineers
PO Box 2946
Portland, OR 97208

O P & E Railroad Right of Way is owned by:
The U S Department of the Interior BLM
PO Box 10226
Eugene, OR 97440

10. *As an exhibit, the application must contain a description of the proposed Project, specifying and including, to the extent possible:*

See Exhibit A

- 11. To the extent the proposed Project will be located on property not owned by the applicant, provide a description or copy of the easement or other legal authority allowing the hydroelectric project to be located on such property.*

The propose Project in located on lands of the U.S. Army Corps of Engineers. Symbiotics LLC has been in consultation with U.S. Army Corps of Engineers, once the FERC license has been issued Symbiotics LLC will enter into a legal agreement with USACE that will specify the site use agreement and other terms and conditions.

Exhibit A

10. As an exhibit, the application must contain a description of the proposed Project, specifying and including, to the extent possible:

(a) The number, physical composition, dimensions, general configuration and, where applicable, age and condition, of any dams, spillways, penstocks, powerhouses, tailraces, or other structures, whether existing or proposed, that would be part of the project;

The proposed Dorena Lake hydroelectric generating facility would be located on an existing dam owned by USACE, on the Row River in Lane County, Oregon. The contact individual for Lane County is Annette Newingham, County Clerk, at 125 E 8th Avenue, Eugene, Oregon 97401. Part of the project would be on lands administered by USACE.

The proposed project would use an existing earthfill dam 145 feet in height, with a crest length of 2,600 feet and a hydraulic head of 85 feet. This existing dam does not have any power producing facilities. Dorena Lake has a surface area of 1,749 acres, with a storage capacity of 77,600 acre-feet at a Full pool water surface elevation of 835 feet.

The project would consist of modifications to the existing facility by adding one 108-inch steel penstock approximately 350 feet long; a powerhouse containing two turbines capable of generating an estimated project capacity of 8.3 megawatts; a switchyard; and approximately 1 miles of proposed 15kV transmission line. It is anticipated at this time that the proposed project would interconnect into the utility distribution systems owned by PacifiCorp.

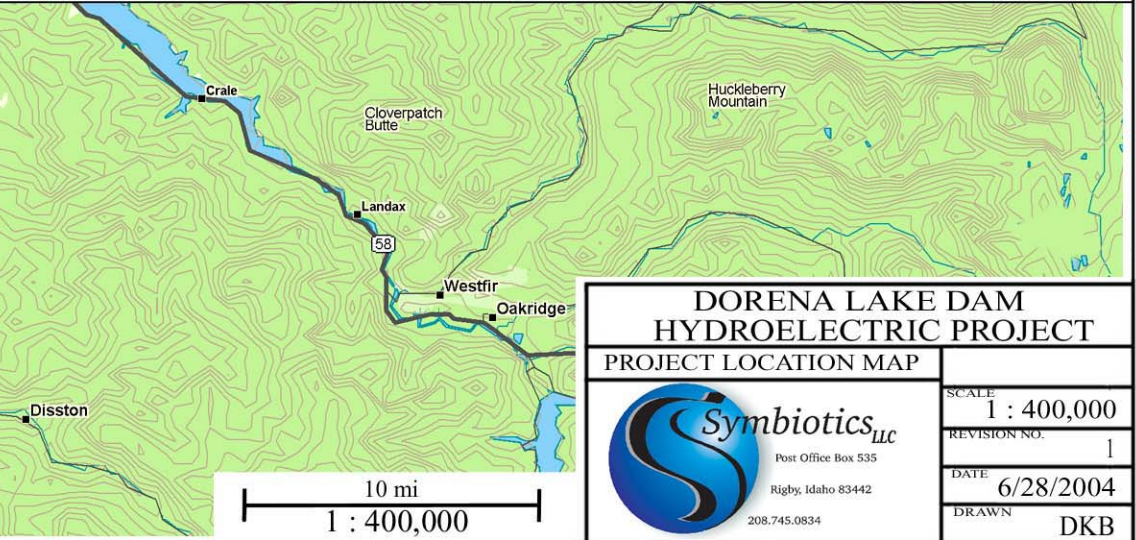
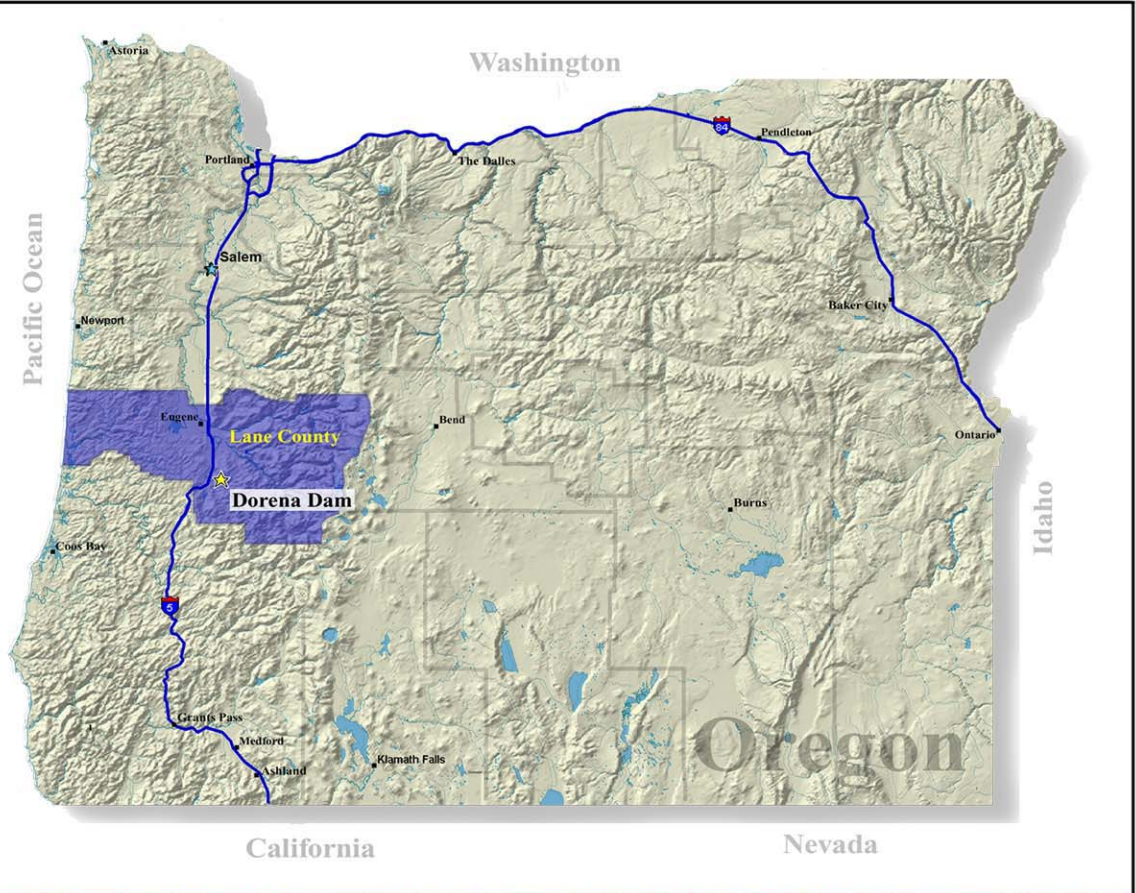
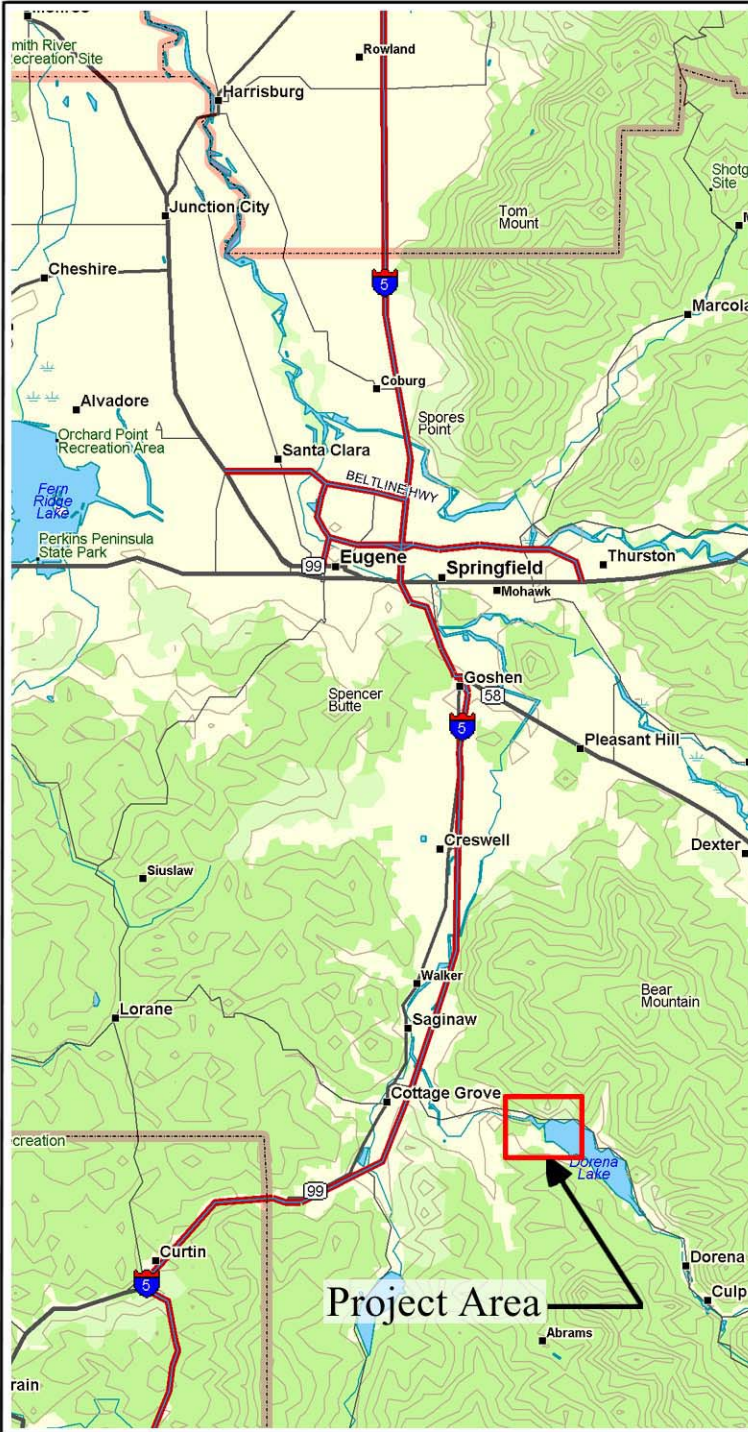
The project would operate in a run-of-the-river mode, using flows of the Row River, and would generate an estimated 17.5GWh annually. Existing roads would access the project.

Lands within the project area include lands owned and/or operated by USACE.

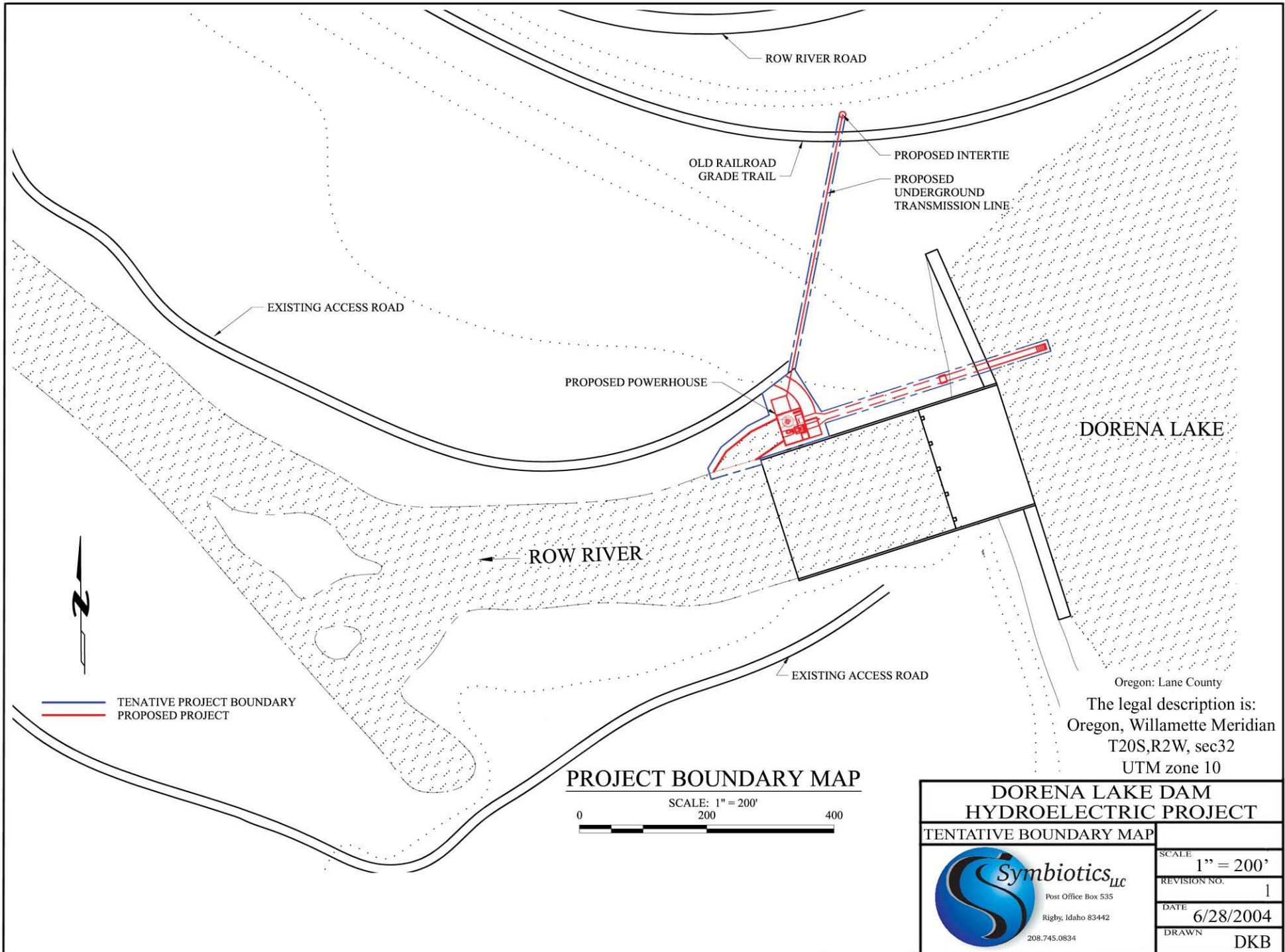
(b) Any other information demonstrating how the proposed project would develop, conserve, and utilize in the public interest the water resources of the state.

The proposed project would use the water in a non-consumptive method in a run-of-river mode. As a run-of-river facility the power plant will not change the reservoir pool elevations or downstream river flow. Once the preliminary permit is issued, environmental studies complete, and an Environmental Analysis finished the proposed project will hopefully be qualified as a new renewable environmentally sustainable hydroelectric project urgently needed to relieve a growing energy demand at an affordable cost.

Exhibit B



DORENA LAKE DAM HYDROELECTRIC PROJECT	
PROJECT LOCATION MAP	
 <p>Symbiotics_{LLC} Post Office: Box 535 Rigby, Idaho 83442 208.745.0834</p>	SCALE 1 : 400,000
	REVISION NO. 1
	DATE 6/28/2004
	DRAWN DKB



DORENA LAKE

ROW RIVER

ROW RIVER ROAD

EXISTING ACCESS ROAD

OLD RAILROAD GRADE TRAIL

PROPOSED INTERTIE

PROPOSED UNDERGROUND TRANSMISSION LINE

PROPOSED POWERHOUSE

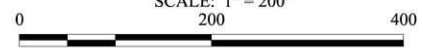
EXISTING ACCESS ROAD

Oregon: Lane County

The legal description is:
Oregon, Willamette Meridian
T20S,R2W, sec32
UTM zone 10

PROJECT BOUNDARY MAP

SCALE: 1" = 200'



— TENATIVE PROJECT BOUNDARY
— PROPOSED PROJECT

DORENA LAKE DAM HYDROELECTRIC PROJECT	
TENTATIVE BOUNDARY MAP	
 Symbiotics_{LLC} Post Office Box 535 Rigby, Idaho 83442 208.745.0834	SCALE: 1" = 200' REVISION NO. 1 DATE 6/28/2004 DRAWN DKB

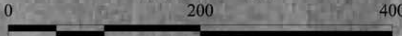


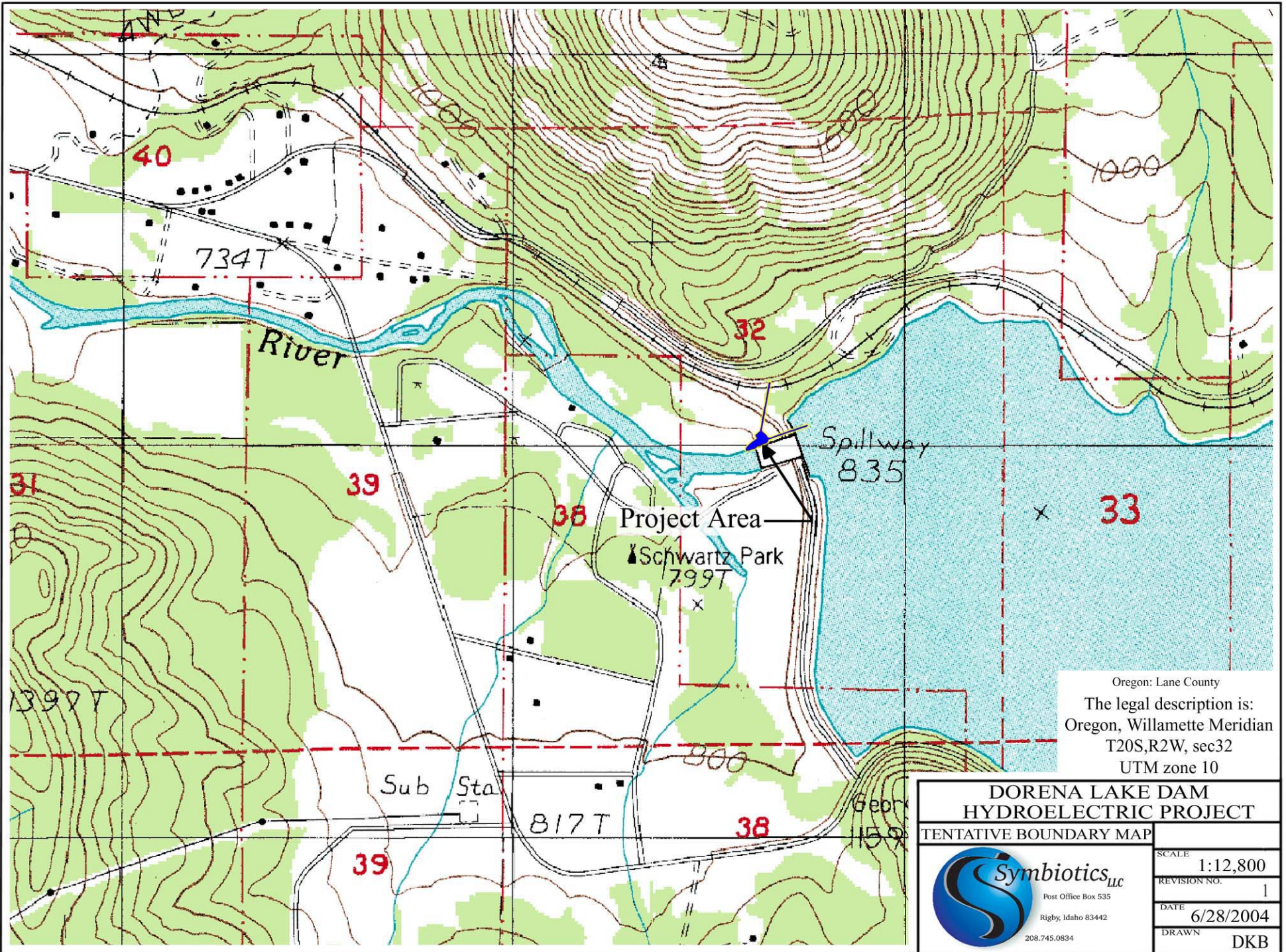
Oregon: Lane County
 The legal description is:
 Oregon, Willamette Meridian
 T20S,R2W, sec32
 UTM zone 10

DORENA LAKE DAM HYDROELECTRIC PROJECT	
AERIAL MAP	
 <p>Symbiotics_{LLC} Post Office Box 535 Rigby, Idaho 83442 208.745.0834</p>	SCALE: 1" = 200'
	REVISION NO. 1
	DATE 6/28/2004
	DRAWN DKB

AERIAL MAP

SCALE: 1" = 200'





Oregon: Lane County
 The legal description is:
 Oregon, Willamette Meridian
 T20S,R2W, sec32
 UTM zone 10

**DORENA LAKE DAM
 HYDROELECTRIC PROJECT**

TENTATIVE BOUNDARY MAP



SCALE	1:12,800
REVISION NO.	1
DATE	6/28/2004
DRAWN	DKB