

STATE OF IDAHO
DEPARTMENT OF WATER RESOURCES
BENEFICIAL USE FIELD REPORT

A Beneficial Use Field Report is prepared by a water right examiner as the result of an examination to clearly confirm and establish the extent of the beneficial use of water established in connection with a permit during the development period authorized by the permit and any extensions of time previously approved.

A. GENERAL INFORMATIONPermit No. 65-234591. Owner Stephen M. and Claire D. RybergPhone No. 208-634-3856Current address PO Box 86, McCall, ID 836382. Examiner's name Terry Scanlan, P.E. (Examiner No. 12-129)EXAM DATE July 25, 2012

3. Accompanied by _____

Email _____

Address _____

Relationship to permit holder _____

Phone No. _____

4. Source Payette Laketributary to North Fork Payette River**B. OVERLAP REVIEW**1. Other water rights with the same place of use 65-234582. Other water rights with the same source and point of diversion None**C. DIVERSION AND DELIVERY SYSTEM**

1. Point(s) of Diversion:

Ident. No.	Gov't Lot	¼	¼	¼	Sec	Twp	Rge	County	Method of Determination/Remarks
	3		NE	SW	28	19N	3E	Valley	2011 Photo, Exam

2. Place(s) of Use:

Method of determination 2011 Photo, Exam

Twp	Rge	Sec	NE				NW				SW				SE				Totals
			NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	
19N	3E	28									D								
											Lt 3								

3. **Delivery System Diagram:** Indicate all major components and distances between components. Indicate weir size/ditch size/pipe diameter (inside), as applicable. Use the space provided or ☒ see attached.

Scale: 1" = _____

- ☒ Copy of USGS Quadrangle attached showing location(s) of point(s) of diversion and place(s) of use (required)
☒ Aerial photo attached (required for irrigation of 10+ acres)
☒ Photo of diversion and system attached

4.

Well or Diversion Identification No.*	Motor Make	Hp	Motor Serial No.	Pump Make	Pump Serial No. or Discharge Size
domestic jet pump	Grundfos	1	5KC39QN1002BX	Grundfos	1 inches

*Code to correspond with no. on map and aerial photo

D. FLOW MEASUREMENTS

1.

Measurement Equipment	Type	Make	Model No.	Serial No.	Size	Calib. Date

2. **Measurements:** _____

bucket and stop watch - 5 gallons in 1 minute

E. NARRATIVE/REMARKS/COMMENTS

The diversion system from the Payette Lake consists of a 1 hp jet pump and approximately 310 feet of 1.25 inch intake pipe used to lift water to Lot 222 of Amended Payette Lake Cottage Sites for internal domestic uses. A separate pump system from the same source is used for external domestic use under water right 65-23458. No other water rights are used.

The pump is a 1 hp Grundfos jet pump that is located in the basement of the house. The lift from the lake to the pump is approximately 10 feet. Water from the pump is discharge through a water conditioner, four parallel filter cartridges, and a UV water treatment system before entering the plumbing system for the home.

Has the permit holder met all conditions of permit approval, including any mitigation requirements and/or measuring device installation requirements? ☒ Yes ☐ No If no, what must be done to meet the permit requirements?

1. Internal domestic use for one home has been developed.
2. Lot description of developed place of use is correct.
3. Water District 65 Watermaster was notified and confirmed that currently the District is not keeping track of diversions below 0.08 cfs, but plans to do so in the future (see attachment D). The permit holder is aware of the condition requirements.

F. FLOW CALCULATIONS☐ Additional computation sheets attached

Measured Method:

Bucket and stopwatch - 5 gpm = 0.01 cfs

Theoretical - $\text{gpm} = (\text{hp} \times 3960 \times \text{eff}) / (\text{pressure} + \text{lift} + \text{head loss});$

$$18 \text{ gpm} = (1.0 \text{ hp} \times 3960 \times 0.6) / ((50 \text{ psi} \times 2.31 \text{ psi/ft}) + 10 \text{ ft} + 10 \text{ ft})$$

Pump Curve - Grundfos Model JPS4 pump, 1 hp - 14 gpm at 40 psi and 20 feet suction lift

G. VOLUME CALCULATIONS

1. Volume Calculations for Irrigation:

$$V_{I.R.} = (\text{Acres Irrigated}) \times (\text{Irrigation Requirement}) = \underline{\hspace{2cm}}$$

$$V_{D.R.} = [\text{Diversion Rate (cfs)}] \times (\text{Days in Irrigation Season}) \times 1.9835 = \underline{\hspace{2cm}}$$

$$V = \text{Smaller of } V_{I.R.} \text{ and } V_{D.R.} = \underline{\hspace{2cm}}$$

2. Volume Calculations for Other Uses:

Internal domestic uses for 1 home = 0.6 afa Department standard

H. RECOMMENDATIONS

1. Recommended Amounts

Beneficial Use	Period of Use		Rate of Diversion Q (cfs)	Annual Volume V (afa)
	From	To		
Domestic	1/1	12/31	0.01 cfs	0.6 afa
Totals:			0.01 cfs	0.6 afa

2. Recommended Amendments

☐ Change P.D. as reflected on page 1☐ Add P.D. as reflected on page 1☒ None☐ Change P.U. as reflected on page 1☐ Add P.U. as reflected on page 1☐ Other**I. AUTHENTICATION**

Field Examiner's Signature

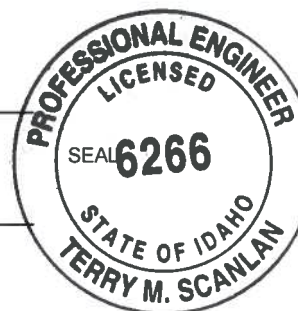
Terry M. Scanlan

Date

9/5/12

Reviewer

Date



ATTACHMENT A

PERMIT RECORD AND PROOF OF BENEFICIAL USE

[Close](#)IDAHO DEPARTMENT OF WATER RESOURCES
Water Permit Report

6/15/2012

WATER RIGHT NO. 65-23459

<u>Owner Type</u>	<u>Name and Address</u>
Current Owner	CLAIRE D RYBERG
Current Owner	STEPHEN M RYBERG
	PO BOX 86
	MCCALL, ID 83638
	(307)679-7610
Representative	SPF WATER ENGINEERING LLC
	C/O LORI GRAVES
	300 E MALLARD DR STE 350
	BOISE, ID 83706
	(208)383-4140

Priority Date: 07/26/2011

Status: Active

<u>Source</u>	<u>Tributary</u>
PAYETTE LAKE	NORTH FORK PAYETTE RIVER

<u>Beneficial Use</u>	<u>From</u>	<u>To</u>	<u>Diversion Rate</u>	<u>Volume</u>
DOMESTIC	01/01	12/31	0.04 CFS	
Total Diversion			0.04 CFS	

Location of Point(s) of Diversion:

PAYETTE LAKE|NESW Lt 3|Sec. 28|Township 19N|Range 03E|VALLEY County

DOMESTIC Use:
Number of homes: 1

Place(s) of use:

Place of Use Legal Description: DOMESTIC VALLEY County

<u>Township</u>	<u>Range</u>	<u>Section</u>	<u>Lot</u>	<u>Tract</u>	<u>Acres</u>	<u>Lot</u>	<u>Tract</u>	<u>Acres</u>	<u>Lot</u>	<u>Tract</u>	<u>Acres</u>	<u>Lot</u>	<u>Tract</u>	<u>Acres</u>
19N	03E	28	3	NESW										

Conditions of Approval:

- | | |
|--------|--|
| 1. WBS | Domestic use is for 2 homes and does not include lawn, garden, landscape, or other types of irrigation. |
| 2. X60 | Place of use is located within Lot 222, Amended Payette Lake Cottage Sites. |
| 3. 185 | The right holder shall contact the watermaster by June 15 each year for authorization to continue diverting and using water. The right holder shall not divert water after June 15 each year unless the watermaster authorizes continued diversion and use of water under this water right. When the watermaster informs the right holder that water is not available to fill this right, the right holder shall cease diversion, shall rent water from the Payette River Rental Pool, or shall otherwise mitigate for the depletion of water caused by this water use. The department may amend the contact date listed in this administrative provision to more closely coincide with the date when water is not available to fill this water right. |

Dates:

Proof Due Date: 12/01/2012

Proof Made Date:

Approved Date: 12/07/2011

Moratorium Expiration Date:

Enlargement Use Priority Date:

Enlargement Statute Priority Date:

Application Received Date: 07/26/2011

Protest Deadline Date: 11/21/2011

Number of Protests: 0

Field Exam Date::

Date Sent to State Off:

Date Received at State Off:

Other Information:

State or Federal:

Owner Name Connector:

Water District Number:

Generic Max Rate per Acre:

Generic Max Volume per Acre:

Swan Falls Trust or Nontrust:

Swan Falls Dismissed:

DLE Act Number:

Cary Act Number:

Mitigation Plan: False

[Close](#)

COPY

STATE OF IDAHO
DEPARTMENT OF WATER RESOURCES
STATEMENT OF COMPLETION
FOR SUBMITTING PROOF OF BENEFICIAL USE

Amt. of Fee \$: _____
Receipt No. _____
Receipt By: _____
Date Received: _____

The Idaho Department of Water Resources considers this form a statement by the permit holder(s) that development of a water right has been **completed** and that water has been applied to beneficial use to the extent described below. **This form must be accompanied by an examination fee, when necessary, or by a completed Beneficial Use Field Report prepared by a certified water right examiner.** Please refer to the instructions and fee schedule for this form. If ownership of the permit has changed, please contact any Department office or visit the Department's website at: www.idwr.idaho.gov for an *Assignment of Permit* form. If you wish to relinquish your permit because you have not established the authorized use of the water and are not applying for an extension, please notify the Department in writing.

1. Permit No.: 65-23459 Telephone No.: 208-634-3856

2. Name of Permit Holder(s): Stephen M. and Claire D. Ryberg

3. Mailing Address: PO Box 86 City: McCall

State: ID Zip: 83638 Email: smryberg@cableone.net

4. Source of Water: Payette Lake If **GROUND WATER** (well), Date Drilled: mo. _____ / yr. _____

Well Driller: _____ Drilling Permit Number: _____

5. Extent of use(s) completed (as authorized by the water right permit):

Internal

Domestic (No. of households): 1 Stockwater (No. and type of stock): _____

Irrigation (No. of acres): _____ Other: _____

6. Total rate of diversion or storage volume for which proof is submitted: 0.04 cfs OR _____ acre-feet.

7. Compliance with a measuring device requirement, lockable controlling device requirement, and/or other conditions of permit: **Refer to the approval conditions on your permit and respond accordingly. The Department will not issue a license if permit conditions are not met.**

Measuring Device: Is a measuring device required?

If yes, has the measuring device been installed?

Yes ☐	No ☒
Yes ☐	No ☐

Lockable Controlling Device: Is a lockable device required to control the diversion?

If yes, has the lockable device been installed?

Yes ☐	No ☒
Yes ☐	No ☐

Other Conditions of Permit: Do the approval conditions on your permit require you to submit additional information in connection with your proof of beneficial use? If yes, list the conditions below and attach documents with the required information.

_____ Completed?

Yes ☐	No ☐
------------------------------	-----------------------------

8. Fee Enclosed: \$n/a See fee schedule on back of the instructions for filing proof of beneficial use. Proofs filed without an appropriate fee, will be considered incomplete.

9. Person to contact to accompany the Department representative during field examination of the water system.

Name: _____ Telephone Number: _____

Mailing Address: _____ City: _____

State: _____ Zip: _____ Email: _____

The information given on this form is my true statement of the extent to which the above numbered permit has been developed and water has been diverted and applied to a beneficial use. I understand that any undeveloped portion of the permit is relinquished to the State of Idaho.

Signature of permit holder: _____

(Include your title, if on behalf of company or organization)

Date: 8/17/12

Mail to: Idaho Department of Water Resources, PO Box 83720, Boise, ID 83720-0098

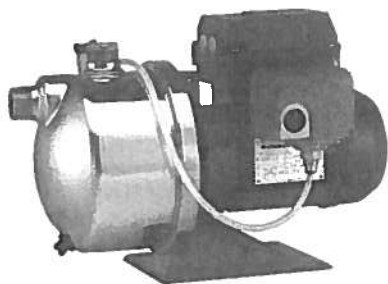
ATTACHMENT B

PUMP CURVES

BASIC LINE JET PUMP

TECHNICAL DATA

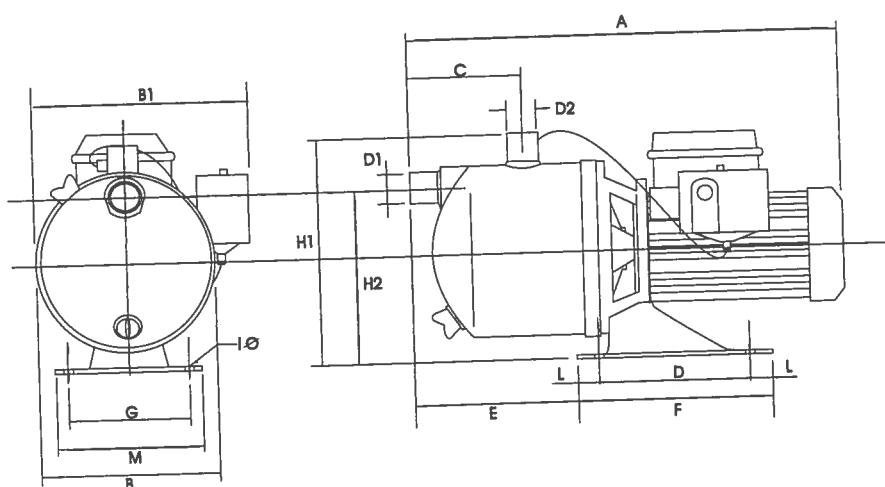
JPS
STAINLESS STEEL



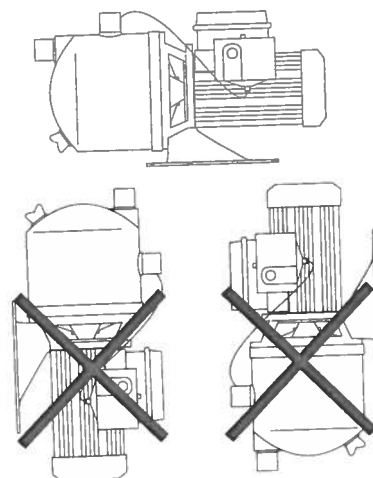
Technical Data

60 Hertz
FLOW RANGE: 2.6 - 30 GPM
MOTOR: I.E.C
MAX. FLUID TEMPERATURE: 95°F
DEPTH TO WATER (LIFT): to 25 ft
MAX. WORKING PRESSURE: 110 psig
RPM: 3400

Dimensions



Mounting Position



Electrical Data, Dimensions, and Weights:

Pump Type	Motor				D1 Suct. NPT	D2 Disch. NPT	Dimension (inches)												Ship Wt. (Lbs)	Ship Vol. (Cu F)
	HP	S.F.	PH	Volts			A	B	B1	C	D	E	F	G	H1	H2	L	IØ		
JPS2	½	1.5	1	115 or 230	1"	1"	14.8	7.5	9.3	3.7	5.4	4.8	7.1	4.3	9.1	7.0	0.83	0.42	24.0	1.5
JPS4	1	1.36	1	115 or 230	1"	1"	15.6	7.5	9.3	3.7	5.4	4.8	7.1	4.3	9.1	7.0	0.83	0.42	30.0	1.5

Stainless Steel Jet Performance Chart

MODEL	HP	Depth To Water	Discharge Pressure (PSI)							Shut-off (PSI)	Pressure Switch Setting (PSI)
			20	30	35	40	45	50	55		
			Capacity (GPM)*								
JPS2	1/2	5	15	13	11	8	6	4	2	62	30-50
		10	14	12	10	7	5	3	1	59.5	
		15	13	11	9	6	4	2		57	
		20	10	10	8	5	3	1		54.5	
		25	8	8	7	4	2			52	
JPS4	1	5	30	27	22	17	14	10	7	68	30-50
		10	26	23	21	16	13	9	6	65.5	
		15	22	21	20	15	12	8	5	63	
		20	18	17	16	14	11	7	4	60.5	
		25	14	13	13	12	11	6	3	58	

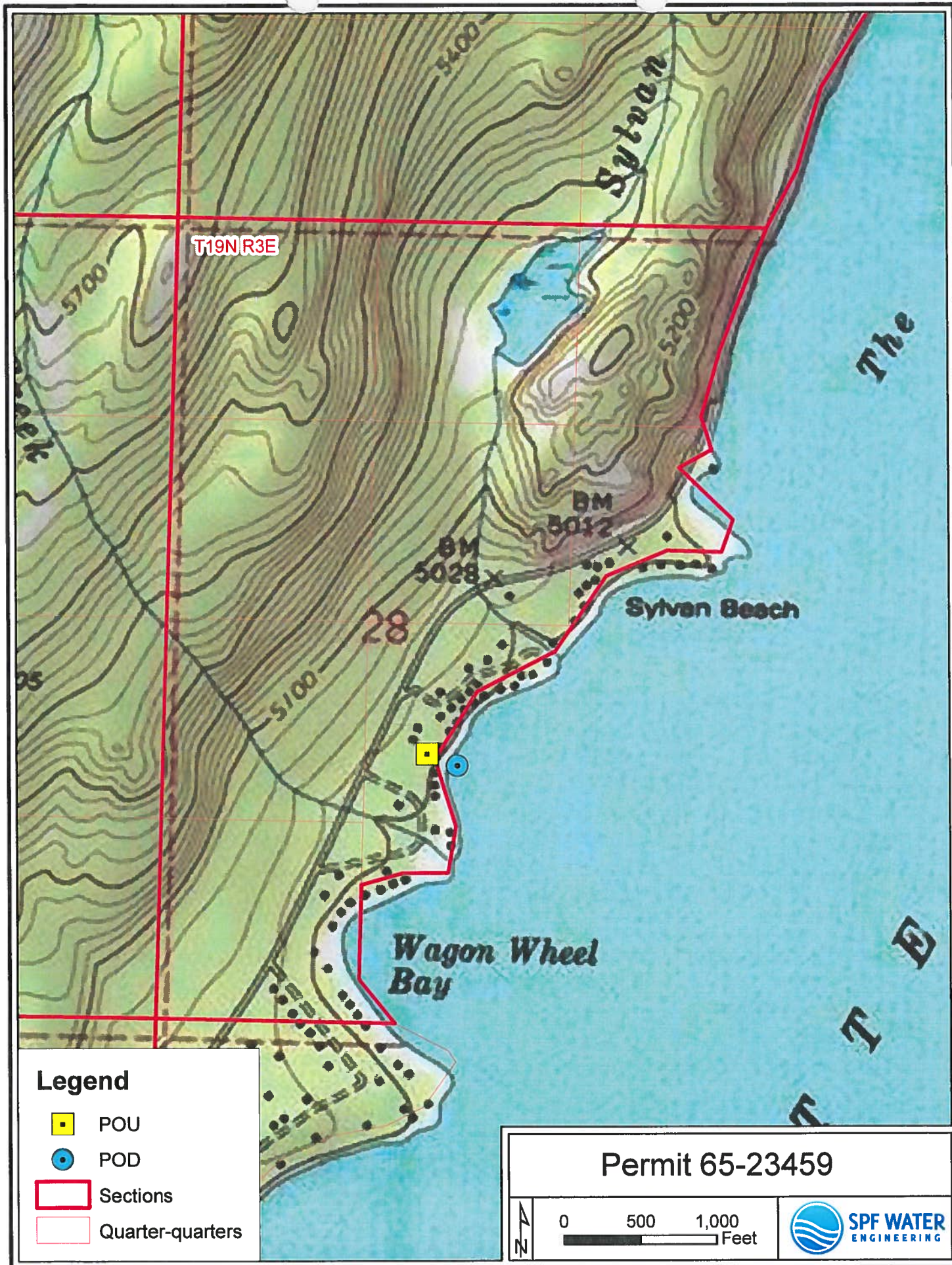
NOTES: *Capacities given are for near sea level installations.

Materials of Construction

DESCRIPTION	MATERIAL
Motor Stool	Cast Iron
Shaft Seal	Carbon/Ceramic/NBR
O-Rings & Gaskets	NBR
Base Plate	Steel
Pump Housing (Cap)	Stainless Steel AISI304
Impeller	Technopolymer A
Tubing	Polyethylene
Seal Plate	Stainless Steel AISI304
Ejector/Guide Vane	Technopolymer A

ATTACHMENT C

TOPO MAP, 2011 AERIAL PHOTO AND PLAT MAP



2011 Photo

T19N R3E

Legend

-  POU
-  POD
-  Sections
-  Quarter-quarters

Permit 65-23459

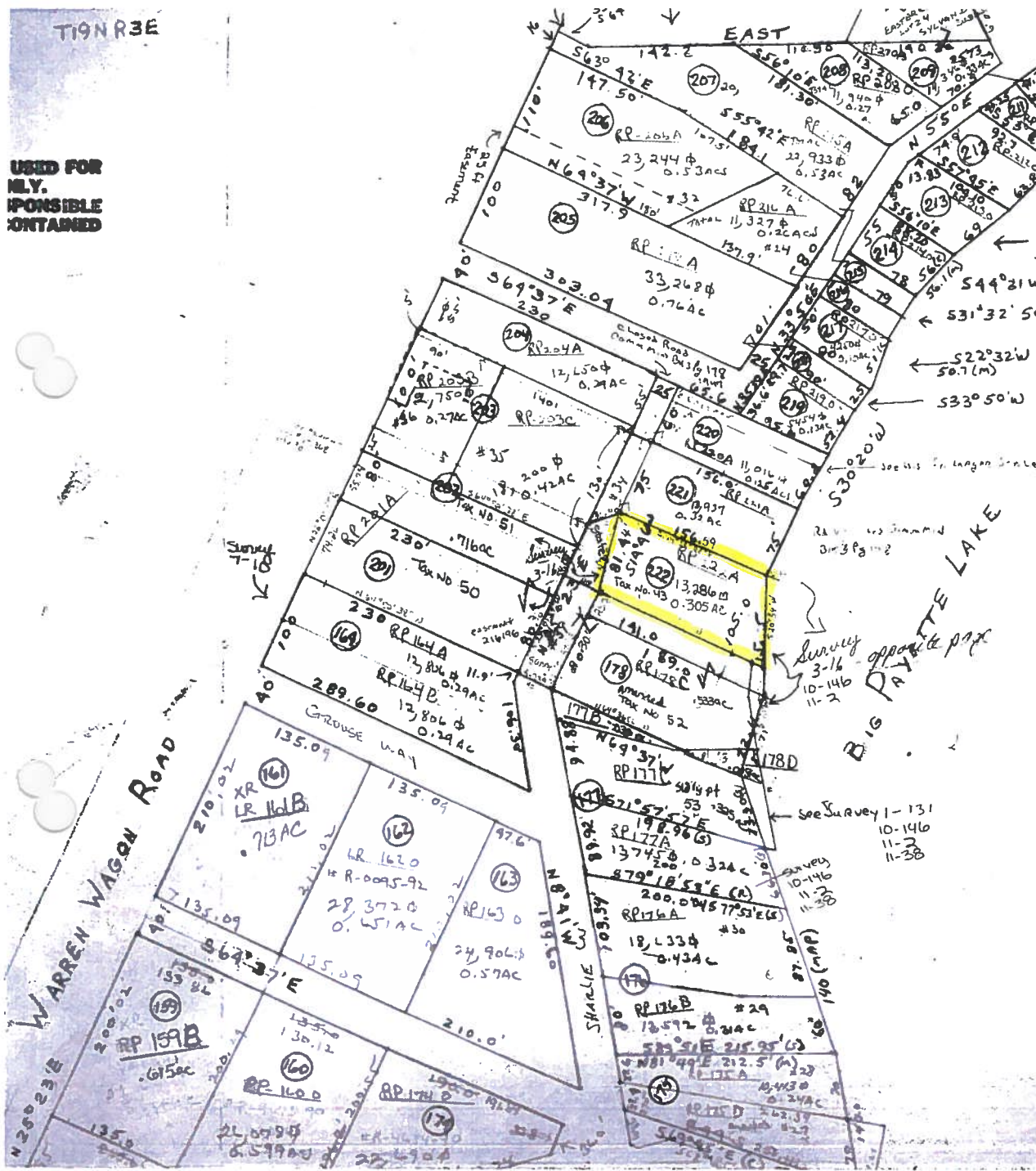


0 500 1,000 Feet



T19N R3E

USED FOR
M.Y.
IPONSIBLE
ONTAINED



SCALE 1" = 100'

- LOT NUMBER
- M MAP
- C CALCULATED
- R ROTATED
- S SURVEY

BASIS OF BEARINGS - PLATMAP 193

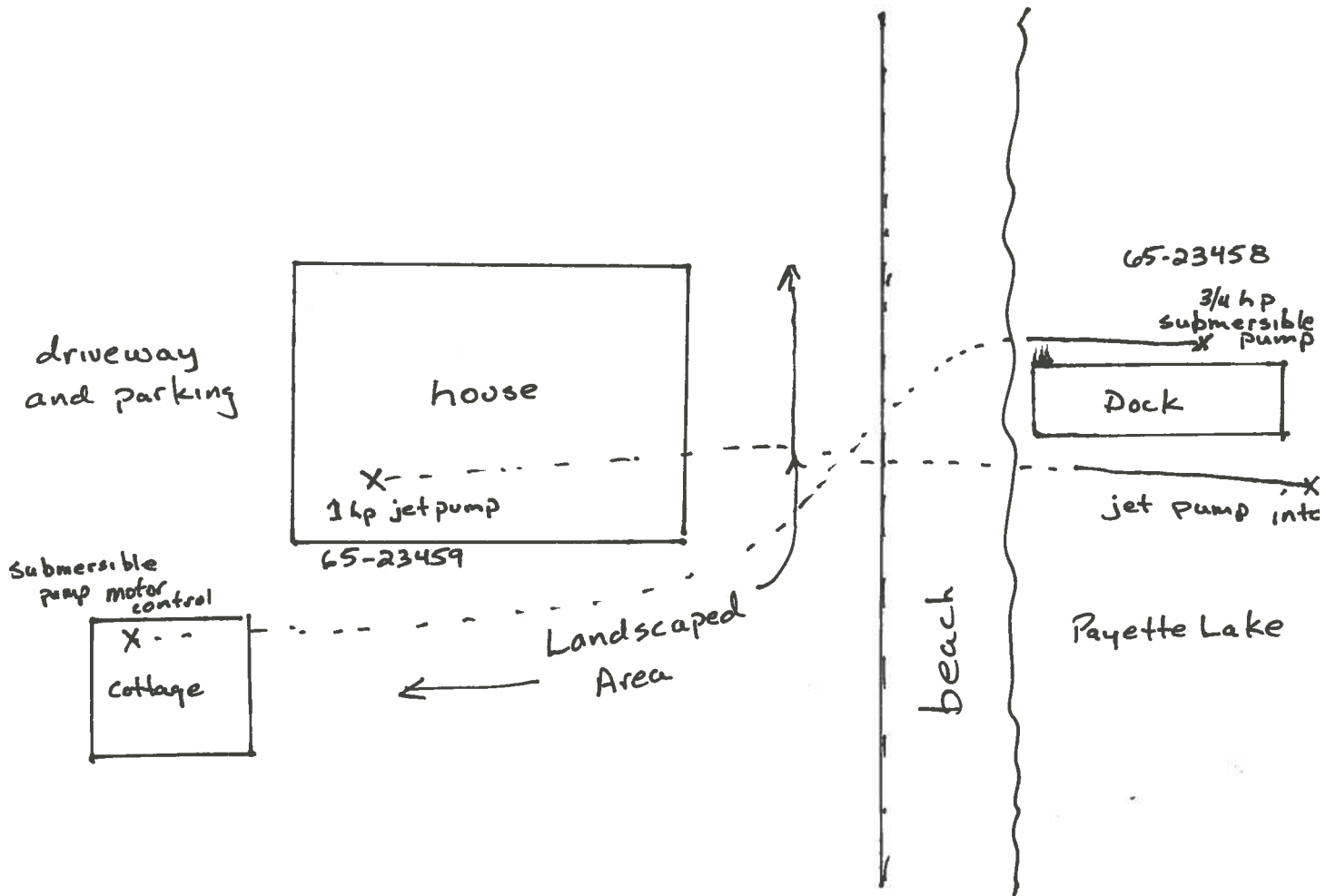
MAFS

- 1924 FAYETTE LAKE COTTAGE SITES Lot 178
- 1932 AMENDED FAYETTE LAKE COTTAGE SITES
LOTS 188 thru 194 and Lots 174 thru 177
- 1942 AMENDED PLAT AND RESURVEY OF FAYETTE LAKE
COTTAGE SITES OLD LOT 165 thru 170 and
LOTS 179 thru 185 and PART of 186
DESIGNATED AS Lot 201 thru 222
- 1943 AMENDED PLAT AND RESURVEY OF Lot 201 thru 222



SPF WATER
ENGINEERING, LLC

By TS Date 7-25-2012 Client Ryberg Sheet 1 of 1
Chkd By _____ Description System Schematics 65-23458 & 23459 Job No _____



not to scale

↑ north

ATTACHMENT D
PHOTOS



Grundfos jet pump and motor located in basement of house.



1 hp jet pump motor.



Filters on discharge from pump.



Ultraviolet water treatment.



View of house from dock. Pump intake pipe was visible along Lake bottom to the left (south) of dock.



Pump intake is beyond end of dock.



View of house looking east.

ATTACHMENT E
WATER DISTRICT 65 NOTIFICATION

Lori Graves

From: waterdist65 [waterdist65@srvinet.com]
Sent: Saturday, September 01, 2012 4:46 PM
To: Lori Graves
Subject: RE: Ryberg Permits 65-23458 and 65-23459

Lori,

I was unable to escape surgery on my back this time I hurt it one too many times. I am recovering very well however.

As far as our procedure at Big Payette Lake, we have no difficulty supplying new water rights however every new right will depend upon rented water after the day of allocation.

At this time we are not keeping track of diversions below .08 CFS (4 Acres) because of a shortage of manpower. We just do not have the time to gather data from no many small accounts and with our minimal fees the process would net a negative return to the district.

I believe all new water right owners should be informed that in the future all water rights will be brought into the accounting system and become subject to the Annual Water District Assessment and the rental pool fees for out of priority usage.

I hope to devise a system where we can be fair to our storage owners who are supplying these new rights and also fair to the junior rights by introducing a fee that will include the assessment and the rental pool fee in single invoicing. I expect the rental rate to be based on typical usage of the flow rate stated on the Water Right, rather than trying to get data from each user. I am also expecting the rental rate to at an elevated rate for the accounts below the .08 flow rate.

I hope this is helpful. We just can't seem to get everything done that should be accomplished around here.

Good to hear from you!

Ron Shurtleff
State Water District No. 65
102 N. Main
Payette, ID 83661
Phone: 208-642-4465
Fax: 208-642-1042
E-mail: waterdist65@srvinet.com

-----Original Message-----
From: Lori Graves [mailto:LGraves@spfwater.com]
Sent: August 23, 2012 14:31
To: waterdist65@srvinet.com
Cc: Stephen Ryberg
Subject: Ryberg Permits 65-23458 and 65-23459

Ron,

I am sorry to hear about your back troubles. I hope you can heal up with therapy and not surgery.

We have a client who recently received approval under the above two permits to divert from the Payette Lake for use at his Lake cottage. Permit 65-23458 allows diversion of 0.02 cfs for external domestic use consisting of <1/10th acre of lawn area outside the cottage and permit 65-23459 allows diversion of 0.04 cfs for non-consumptive domestic uses inside the cottage. Both permits require authorization from you to divert water after June 15th of each year and to rent water from the Payette River Rental Pool if water is not available.

SPF is doing the licensing exams for the permits and would like to address the above condition with regards to compliance. Do you require these minor uses rent water on an annual basis? If so, what is the procedure? Thanks Ron.

Lori Graves

Water Rights Specialist

300 E. Mallard, Ste 350

Boise, ID 83706

208.383.4140 x219

fax 208.383.4156

e-mail lgraves@spfwater.com

www.spfwater.com