

STATE OF IDAHO
DEPARTMENT OF WATER RESOURCES
BENEFICIAL USE FIELD REPORT

A. GENERAL INFORMATION

Permit No: 72-16802

Exam Date: 7/17/2012

1. Current Owner: WENDY A RODGERS
PO BOX 659
CHALLIS ID 83226-0659
(208)879-4626

KENNETH J RODGERS
PO BOX 659
CHALLIS ID 83226-0659
(208)879-4626

2. Accompanied by: Kenneth Rodgers

3. **SOURCE**

SALMON RIVER

TRIBUTARY

SNAKE RIVER

B. OVERLAP REVIEW

1. Other water rights with the same place of use: None
2. Other water rights with the same point of diversion: 72-7455

C. DIVERSION AND DELIVERY SYSTEM1. **LOCATION OF POINT(S) OF DIVERSION:**

SALMON RIVER L8 SE1/4NW1/4SW1/4 Sec. 28, Twp 13N, Rge 19E, B.M.
CUSTER County

Method of Determination: A0005191 (GPS 44 25.493/114 13.807)

2. **PLACE OF USE:**

IRRIGATION

Twp	Rge	Sec	NE				NW				SW				SE				Totals
			<u>NE</u>	<u>NW</u>	<u>SW</u>	<u>SE</u>	<u>NE</u>	<u>NW</u>	<u>SW</u>	<u>SE</u>	<u>NE</u>	<u>NW</u>	<u>SW</u>	<u>SE</u>	<u>NE</u>	<u>NW</u>	<u>SW</u>	<u>SE</u>	
13N	19E	28										2.2							2.2
												L 8							

Total Acres: 2.2

PLACE OF USE: STOCKWATER

Twp	Rge	Sec	NE				NW				SW				SE				Totals
			<u>NE</u>	<u>NW</u>	<u>SW</u>	<u>SE</u>	<u>NE</u>	<u>NW</u>	<u>SW</u>	<u>SE</u>	<u>NE</u>	<u>NW</u>	<u>SW</u>	<u>SE</u>	<u>NE</u>	<u>NW</u>	<u>SW</u>	<u>SE</u>	
13N	19E	28										X							
												L 8							

Method of Determination:

3. ☐ Delivery System Diagram Attached (required). Indicate all major components and distances between components. Indicate weir size/pipe as applicable.
☒ Map Attached Showing Location(s) of point(s) of diversion and place(s) of use (required). Scale must be 1:24,000 or greater.
☒ Aerial Photo Attached (required for irrigation of 10+ acres).
☒ Photo of Diversion and System Attached

4.

<u>Well or Diversion</u> <u>ID No.*</u>	<u>Motor Make</u>	<u>Hp</u>	<u>Motor Serial No.</u>	<u>Pump Make</u>	<u>Pump Serial No. or Discharge</u> <u>Size</u>
_____	_Baldo_____	_5Hp	_JP1409T_____	_Berkley_	_JP1409T_____

D. FLOW MEASUREMENTS

1. Measurements: Property is watered with sprinkler hand line (13 sprinkler heads with 9/64" nozzles). Pressure checked at nozzles averaged 50 psi.

E. FLOW CALCULATIONS

Measured Method: Pitot tube for irrigation. Pressure at nozzles was 50 psi

Using equation: $Q(\text{gpm}) = 30.0 \times D(\text{in})^2 \times P(\text{psi})^{0.5}$

Where:

D=9/64 in

P=50 psi

$$Q(\text{gpm}) = 30.0 \times 9/64 \text{ in}^2 \times 50 \text{ psi}^{0.5} = 4.2 \text{ gpm}$$

$$4.2 \text{ gpm} \times 13 \text{ heads} = 54.6 \text{ gpm} / 449 \text{ gpm/cfs} = 0.12 \text{ cfs}$$

Allowed flow for irrigation based on 0.03 cfs/acre:

$$2.2 \text{ acres} \times 0.03 \text{ cfs/acre} = \mathbf{0.07 \text{ cfs}}$$

$$\text{Flow for stockwater} = \mathbf{0.02 \text{ cfs}}$$

$$\text{Total flow} = 0.07 \text{ cfs (irrigation)} + 0.02 \text{ cfs (stockwater)} = \mathbf{0.09 \text{ cfs}}$$

F. VOLUME CALCULATIONS

1. Volume Calculations for Irrigation:

$$V = (\text{Acres Irrigated}) \times (\text{Irrigation Requirement}) = 2.2 \text{ acres} \times 3.5 \text{ afa/acre} = \mathbf{7.7 \text{ afa}}$$

2. Volume Calculations for Other Uses:

Stockwater: 10 head of livestock or less per field exam manual receives **0.1 afa**

G. NARRATIVE/REMARKS/COMMENTS

Water right 72-16802 is for irrigation and stockwater use, the point of diversion is the same as water right 72-7455. The ownership is the same on both water rights and the delivery system are risers off of the same mainline. The system is capable of providing 0.09 cfs and the owner has shown the irrigation of 2.2 acres and stockwater uses have been developed. It is recommended that the right be licensed for 0.09 cfs and 7.8 afa with the appropriate amounts allotted to each use as described above in the flow measurements section. Rights 72-7455 and 72-16802 when combined shall not exceed a total diversion rate of 0.13 cfs, a total annual maximum diversion volume of 16.8 af, and the irrigation of 4.7 acres.

Have conditions of permit approval been met? ☒ Yes ☐ No

H. RECOMMENDATIONS**1. Recommended Amounts**

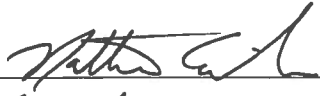
<u>BENEFICIAL USE</u>	<u>PERIOD OF USE</u>	<u>DIVERSION RATE</u>	<u>ANNUAL VOLUME</u>
IRRIGATION	04/15 to 10/15	0.070 CFS	7.70 AF
STOCKWATER	01/01 to 12/31	0.020 CFS	0.10 AF
<u>Totals:</u>		0.090 CFS	7.80 AF

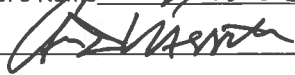
2. Recommended Amendments

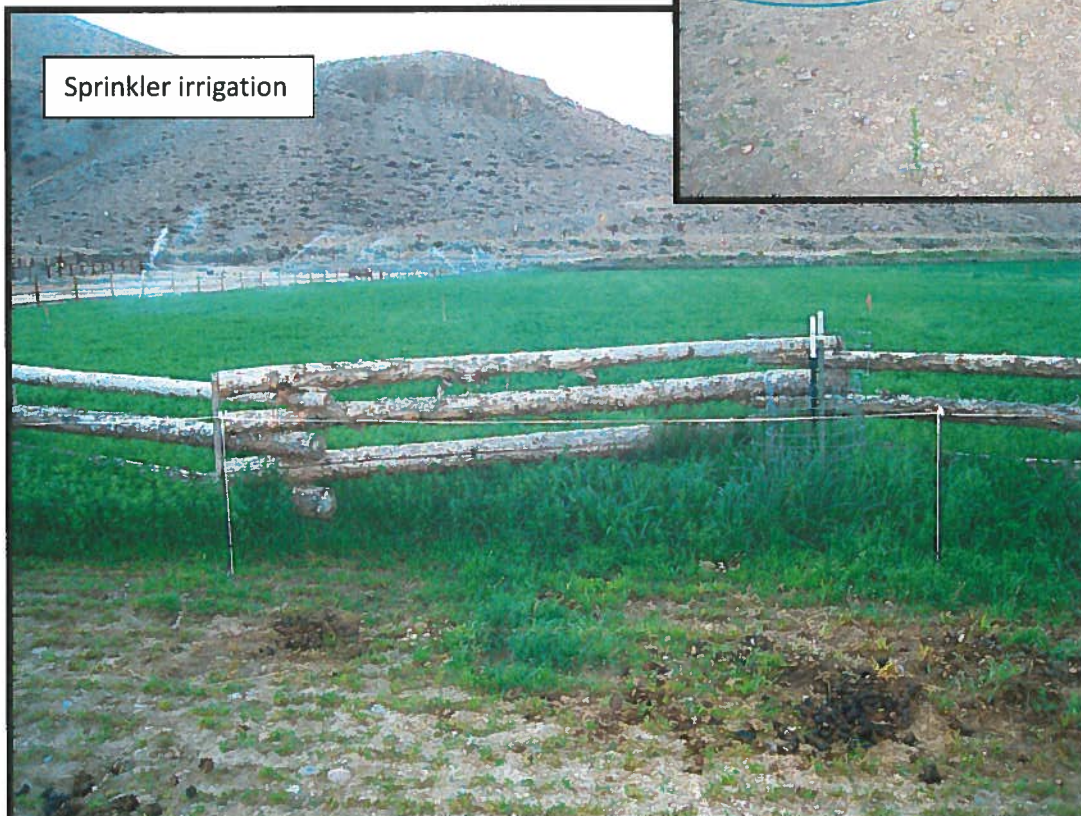
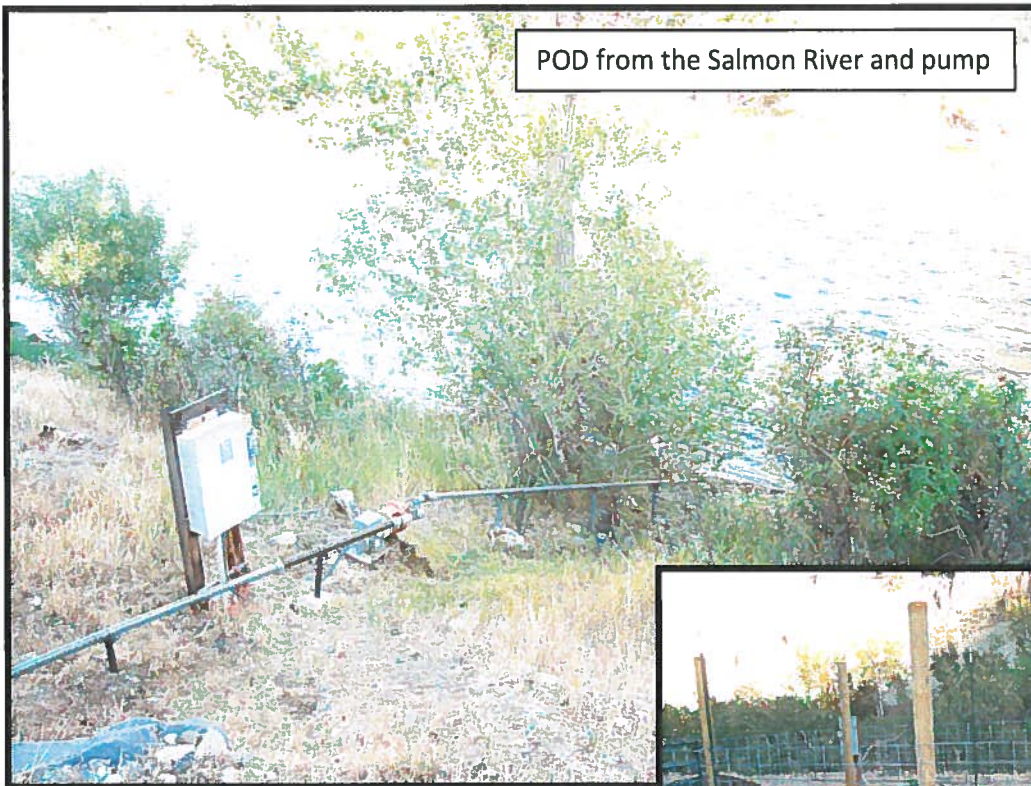
☐ Change P.D. as reflected above ☐ Add P.D. as reflected above ☒ None

☐ Change P.U. as reflected above ☐ Add P.U. as reflected above ☐ Other

I. AUTHENTICATION

Field Examiner's Name  Date 8/22/12

Reviewer  Date 8/23/12



State of Idaho
Department of Water Resources

Attachment To Water Right License 72-16802

This map depicts the IRRIGATION place of use boundary for this water right at the time of this approval and is attached to the approval document solely for illustrative purposes.

R19E



0 0.0325 0.065 0.13 Miles

-  Point of Diversion
-  Place Of Use Boundary
-  Townships
-  PLS Sections
-  Quarter Quarters



State of Idaho
Department of Water Resources

Attachment To Water Right License

72-16802

This map depicts the STOCKWATER place of use boundary for this water right at the time of this approval and is attached to the approval document solely for illustrative purposes.

R19E



0 0.0325 0.065 0.13 Miles

-  Point of Diversion
-  Place Of Use Boundary
-  Townships
-  PLS Sections
-  Quarter Quarters

