

STATE OF IDAHO
DEPARTMENT OF WATER RESOURCES
IN-OFFICE REVIEW/BENEFICIAL USE FIELD REPORT

A. GENERAL INFORMATIONPermit No: 75-14895

Exam Date: Nov. 7, 2018

1. Does this qualify for an in-office field exam (IDAPA 035.02.r)? x Y N
- Irrigation of 5 acres or less
 - Storage of up to 14.6 AF for stockwater purposes only
 - Any use other than irrigation or storage, if the combined diversion rate is 0.24 cfs or less
 - Other < >

2. Current Owner: Name: Kelly G and Patricia A Garside
 Owner of Record Correct? x Y N
 Address of Record Correct? x Y N
 If No:

3. Fees have been paid: x Y N Receipt No: C105803

4. **SOURCE** **TRIBUTARY**
 Waste Water Salmon River
 Method of Determination: Permit, Proof and ArcMap
 Change in Source: Y X N

B. OVERLAP REVIEW

1. Other water rights with the same place of use:

Water Right No.	Source	Purpose of Use	Basis
75-10162	Ground Water	Domestic	ArcMap

Comments:

2. Other water rights with the same point of diversion: None

Water Right No.	Source	Purpose of Use	Basis

Comments: < >

C. DIVERSION AND DELIVERY SYSTEM

1. **LOCATION OF POINT(S) OF DIVERSION:**

Source	Govt. Lot	¼	¼	¼	Sec	Twp.	Rge.		County
Waste Water	9		SE	SE	18	22N	22E	B.M.	LEMHI
Waste Water	9		SE	SE	18	22N	22E	B.M.	LEMHI
								B.M.	

Method of Determination: PERMIT FILE AND COUNTY RECORDS

Change in POD? Y X N Amendment Required? Y X N

2. PLACE OF USE: Use: IRRIGATION

TWP	RGE	Sec	NE				NW				SW				SE				Totals
			NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	NE	NW	SW	SE	
22N	22E	18																5.0 L 9	5.0
Total Acres =																			5.0

Method of Determination: PERMIT FILE & ARCMAP

Change in POU? Y X N Amendment Required? Y X N3. Delivery System Diagram Attached (required). Indicate all major components and distances between components. Indicate weir size/pipe as applicable. 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

*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: < >**E. FLOW CALCULATIONS**

Measured Method:

 Additional Computation Sheets Attached

License recommend for 0.10 CFS

F. VOLUME CALCULATIONS

1. Volume Calculations for Irrigation: No volume. R63 condition of approval

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

$$V_{D.R.} = [\text{Diversion Rate (cfs)}] \times (\text{Days in Irrigation season}) \times 1.9835 =$$

$$V = \text{Smaller of } V_{I.R.} \text{ and } V_{D.R.} =$$

2. Volume Calculations for Other Uses:

G. PURPOSE OF USEIrrigation X Y N # Stock Domestic # of Homes

Other: < >

Change in Purpose of Use? ___Y___N

Method of Determination: PERMIT FILE

If Yes: From Use _____ To Use _____ Amount _____ CFS _____ AFA _____

H. NARRATIVE/REMARKS/COMMENTS

John ~~DOMESTIC USE~~: Assessor information per ArcMap parcel information: Owner listed as Kelly G Garside. Parcel RP22N22E189002.

IRRIGATION USE: ArcMap confirms irrigation of 5.0 acres. See attached Sentinel imagery. The License will reflect this. Point of diversion is a buried drain that collects wastewater from the county fairgrounds. The drain crosses permit holders property and has permission from county to tie into the drain. The pipe does not usually flow full and the permit holder will install a hot tap and brought above ground. Application states a 3-5 HP gas pump with a 2" discharge will be used to pump the water which is sufficient. No volume will be on the license but it will have an R63 condition.

Have conditions of permit approval been met? ☒ Yes ☐ No**I. RECOMMENDATIONS****1. Recommended Amounts**

<u>BENEFICIAL USE</u>	<u>PERIOD OF USE</u>	<u>DIVERSION RATE</u>	<u>ANNUAL VOLUME</u>
IRRIGATION	04/01 TO 10/31	0.1 CFS	AF
<u>Totals:</u>		0.1 CFS	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 ☒ None

Other: NONE

J. AUTHENTICATIONField Examiner's Name Jan Husley Date 11-7-18Reviewer Daniel D. Nelson Date 11-8-18

THEORETICAL HORSEPOWER EQUATION WORKSHEET (cjh 1/92)

Water Right No.: 75-14895
 Reviewer: Jean Hersley
 Date of Review: 11/7/2018

P/D No.:

PUMP HORSEPOWER
 BOOSTER HORSEPOWER

PUMPING LEVEL

DISCHARGE PRESSURE

RATE OF FLOW (cfs)

North Well
3.5
0
10
85
0.10
47

The above calculates the formula =

$$Q = \frac{8.8 * (\text{Efficiency}) * \text{hp}}{\text{depth to water} + 2.31 * (\text{psi}) + \text{friction}}$$

Assumptions: %70 efficiency.
 No Friction

Examiners Notes:

The owner stated that the pump used was a 3.5 Hp Pump. The water is pumped from a drain, so I estimated the lift at 10 feet, which should be more than adequate for this area. I then used a variety of pressures to determine how much pressure a 3.5 Hp pump could produce in the these circumstances, and it appears as though the pump could provide up to 85 psi. Normal sprinkler systems operate at about 45 psi, so this pump system is more than adequate to supply the amount of water needed for a diversion rate of 0.10 cfs. Therefore, I am recommending the 0.10 cfs allowed by the permit.









