

STATE OF IDAHO
DEPARTMENT OF WATER RESOURCES
BENEFICIAL USE FIELD REPORT

A. GENERAL INFORMATION

Permit No: 29-8162

Exam Date: 4/24/2014

1. Current Owner: CRAIG LYON
2730 NORTH 2400 WEST
BRIGHAM CITY UT 83402
(801)391-8333

And

VICKIE LYON
2730 NORTH 2400 WEST
BRIGHAM CITY UT 83402
(801)391-8333

2. Accompanied by: Craig Lyon

3. **SOURCE**

WASTE WATER

TRIBUTARY

PORTNEUF RIVER

B. OVERLAP REVIEW

1. Other water rights with the same place of use: 29-7847
2. Other water rights with the same point of diversion: 29-7847

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

WASTE WATER L7 NW1/4SE1/4 Sec. 21, Twp 09S, Rge 38E, B.M.

BANNOCK County

Method of Determination: GPS and aerial photos

2. **PLACE OF USE:**

FISH PROPAGATION STORAGE

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>	
09S	38E	21									X								
											L 6								

Method of Determination: Aerial photos and site visit

D. FLOW MEASUREMENTS

System was not operating at capacity at the time of the exam. Physical evidence suggested higher flows were possible than existed on the day of the exam. Difficult to obtain measurement because waste water flows are inconsistent.

E. FLOW CALCULATIONS

According to Lava Hot Springs Foundation reports, design capacity of the system is 1.74 cfs.

F. VOLUME CALCULATIONS

Fish Propagation Storage

Pond size = 0.5 acre-feet – 0.2 acre-feet (covered by 29-7847) = 0.3 acre-feet

Diversion to Storage

Assuming one full rotation of pond every 24 hours: 0.5 acre-feet x 365 days = 182.5 acre-feet

G. NARRATIVE/REMARKS/COMMENTS

Waste water from Lava Hot Springs Foundation heat exchange system is captured as wastewater at a valve box on the west side of the Foundation property. Waste water is diverted from the valve box through a 6 inch pvc pipe and discharged underwater into the permit holders pond. Overflow from pond runs through a small channel to the Portneuf River. Right holder said that the full flow of the waste water system runs through the pond.

Water right 29-7847 (0.06 cfs, 0.2 af) shares the same waste water point of diversion and covers the same pond. Permit 29-8162 was filed to cover additional rate and volume diverted through the wastewater pond. Field exam report for 29-7847 provides the dimensions for the pond and a description of the system.

Pond capacity = 0.5 acre-feet. Right 29-7847 authorizes 0.2 acre-feet of storage. License 29-8162 will be issued for 0.3 acre-feet. Engineer for Lava Hot Springs reported that the capacity of the waste water system is 1.74 cfs. Right 29-7847 authorizes 0.06 cfs. License 29-8162 will be issued for 1.68 cfs.

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>
FISH PROPAGATION STORAGE	01/01 to 12/31		0.3 AF
DIVERSION TO STORAGE	01/01 to 12/31	1.680 CFS	182.5 AF
<u>Totals:</u>		1.680 CFS	182.5 AF

2. Recommended Amendments

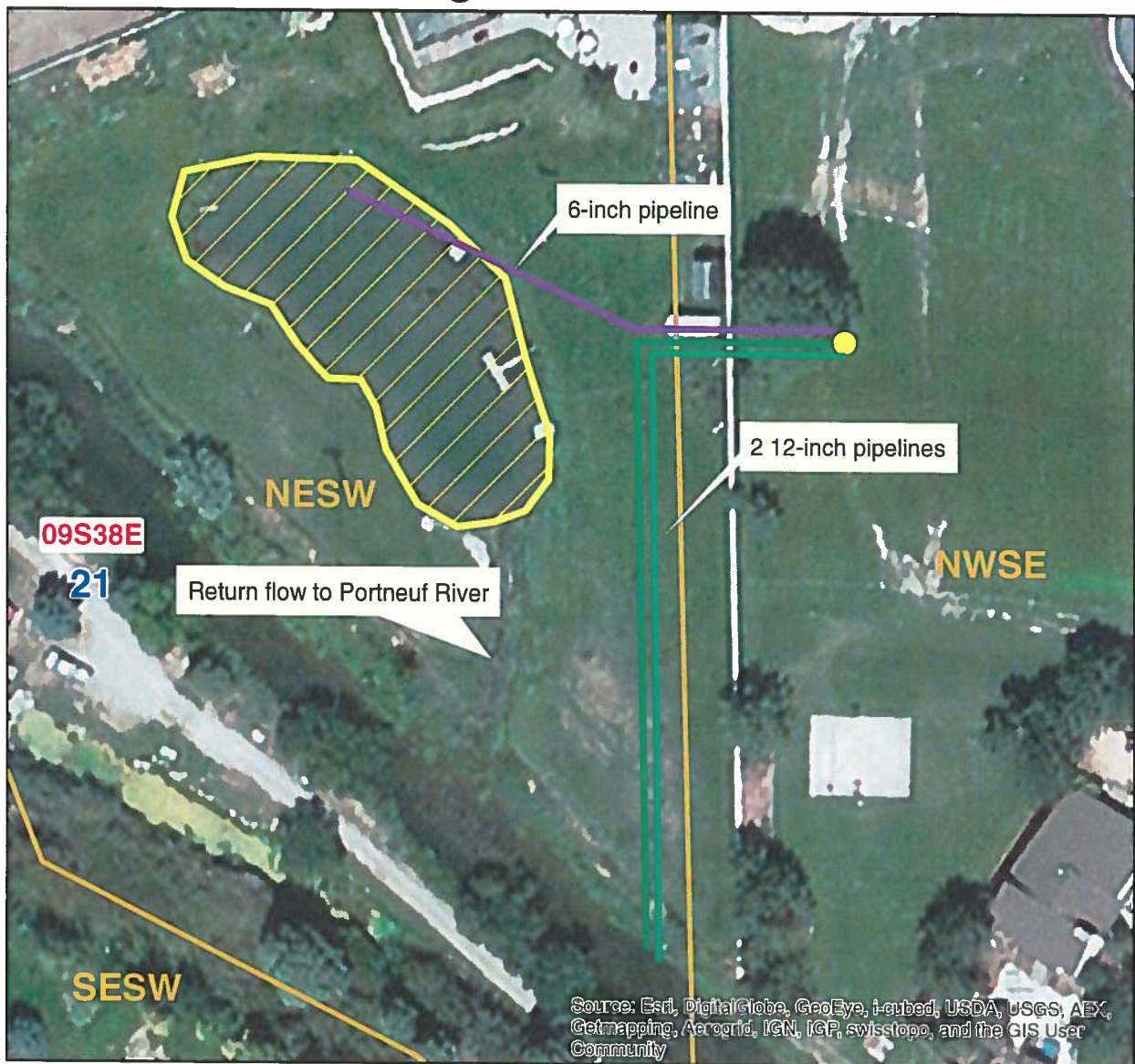
☐ Change P.D. as reflected above ☐ Add P.D. as reflected above ☒ None

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

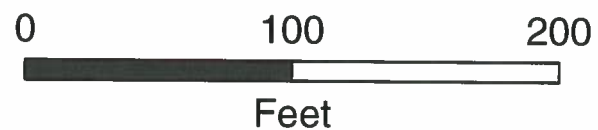
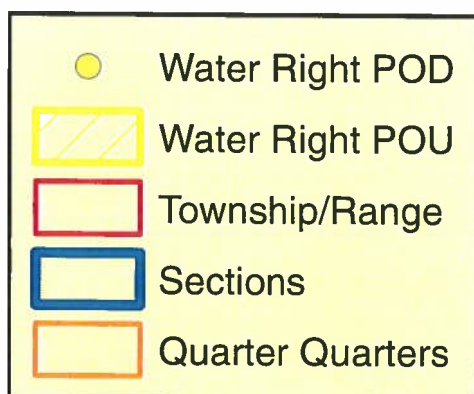
I. AUTHENTICATION

Field Examiner's Name James Cefalo Date June 12, 2014
 Reviewer _____ Date _____

Water Right License 29-8162



2010 Aerial Photography





ditch from pond to Portneuf River



Valve box - point of diversion



outflow end of 6-in pipe



beginning of return ditch