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**LOST CREEK ISR, LLC**

January 27, 2017

40-9068

ATTN: Document Control Desk  
U.S. Nuclear Regulatory Commission  
Washington, DC 20555-0001

**Re: Semi-Annual Reporting Pursuant to License Condition 11.1(B)  
2nd Half 2016  
Lost Creek ISR Project, License SUA-1598**

To Whom It May Concern:

The following semi-annual report has been submitted in accordance with License Condition 11.1(B) for Lost Creek ISR, LLC's (LCI) Lost Creek ISR Project (LC-ISR) License SUA-1598. License Condition 11.1(B) requires semi-annual reporting of:

- Status of production areas in operation,
- Status of production areas in restoration,
- Status of any long-term excursions, and
- A summary of Mechanical Integrity Testing (MIT) of wells.

The reporting period for this report is July 1 through December 31, 2016.

**Status of Production Areas in Operation**

During the reporting period, thirteen (13) header houses were in operation as approved by Wyoming Department of Environmental Quality – Land Quality Division (WDEQ-LQD). The following table (**Table 1**) provides a status of production for operating mine units as of the end of the reporting period:

NM5301

**Table 1: Operational Status Summary**

Mine Unit	Header Houses	Status	Start Date	Average Number Wells Injecting*	Average Number Wells Producing*
Mine Unit 1	HH1-1	In Operation	02Aug2013	34	8
	HH1-2	In Operation	15Aug2013	39	5
	HH1-3	In Operation	18Sep2013	36	5
	HH1-4	In Operation	04Feb2014	38	4
	HH1-5	In Operation	11Mar2014	27	4
	HH1-6	In Operation	16Jul2014	40	7
	HH1-7	In Operation	11Dec2014	43	10
	HH1-8	In Operation	10Jan2015	41	10
	HH1-9	In Operation	12Feb2015	47	15
	HH1-10	In Operation	18Jun2015	52	15
	HH1-11	In Operation	02Sep2015	51	19
	HH1-12	In Operation	17Nov2015	47	23
	HH1-13	In Operation	25May2016	45	26
Mine Unit 2	N/A	Not constructed	N/A	N/A	N/A
Mine Unit 3	N/A	Not constructed	N/A	N/A	N/A

\*Average number of wells in operation per the reporting period

HH 1-1 and 1-2 had suspended injection for part of November and through December. Injection from HH1-6 in the area of MO-108 was terminated in response to the excursion and HH1-6 was eventually fully shut-in in November through the end of the reporting period.

### Status of Production Areas in Restoration

No restoration activities had been initiated during the reporting period.

### Long-Term Excursions

Well MO-108 was on excursion status as of the end of the reporting period. The excursion status had existed for more than 60 days. Details of the excursion status is described in the Quarterly Excursion Monitoring Report submitted concurrently with this report to the NRC.

### Summary of MITs

During the reporting period, a total of 39 MITs were performed in accordance with the approved NRC License Application Technical Report Section 3.2.5. Results are summarized on **Attachment I**. The MITs resulted in 37 successful tests with 2 failures. Most of the MITs conducted during the period were associated with the MO-108 excursion investigation. The 2 wells that failed testing were associated with the MO-108 investigation and were recompleted to the FG horizon to be used for monitoring in the excursion area.

If you have any questions regarding this letter or require additional information please feel free to contact me at the Casper office.

Sincerely,



Michael D. Gaither  
Manager EHS and Regulatory Affairs  
Ur-Energy USA, Inc

### Attachments: **Attachment 1: Mechanical Integrity Testing**

Cc: Deputy Director, Division of Decommissioning  
Uranium Recovery and Waste Programs  
Office of Nuclear Material Safety and Safeguards  
U.S. Nuclear Regulatory Commission  
Mail Stop T-8F5  
11545 Rockville Pike, Two White Flint North  
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John Saxton, NRC Project Manager (via e-mail)  
Brian Wood, WDEQ-LQD, Lander (via e-mail)  
Theresa Horne, Ur-Energy, Littleton (via e-mail)

**Attachment 1: Mechanical Integrity Testing**  
**2nd Half 2016**  
**Lost Creek ISR Project SUA-1598**

	Well ID	Well Type	MIT <sup>(1)</sup> Date	P/F	P&A <sup>(2)</sup> Date	Comments
1	1I145A	I	12/20/2016	Pass	N/A	Re MIT due to MO-108 Exc.
2	1I146A	I	12/20/2016	Pass	N/A	Re MIT due to MO-108 Exc.
3	1I147A	I	12/20/2016	Pass	N/A	Re MIT due to MO-108 Exc.
4	1I150	I	11/10/2016	Pass	N/A	Re MIT due to MO-108 Exc.
5	1I153	I	11/11/2016	Pass	N/A	Re MIT due to MO-108 Exc.
6	1I161	I	11/7/2016	Pass	N/A	Re MIT due to MO-108 Exc.
7	1I162	I	11/8/2016	Pass	N/A	Re MIT due to MO-108 Exc.
8	1I163	I	12/28/2016	Pass	N/A	Re MIT due to MO-108 Exc.
9	1I164	I	12/29/2016	Pass	N/A	Re MIT due to MO-108 Exc.
10	1I170	I	12/30/2016	Pass	N/A	Re MIT due to MO-108 Exc.
11	1I171	I	11/10/2016	Pass	N/A	Re MIT due to MO-108 Exc.
12	1I181	I	11/8/2016	Fail	Recompleted	Re MIT due to MO-108 Exc.
13	1I284	I	11/10/2016	Fail	Recompleted	Re MIT due to MO-108 Exc.
14	1I285	I	11/11/2016	Pass	N/A	Re MIT due to MO-108 Exc.
15	1I286	I	11/15/2016	Pass	N/A	Re MIT due to MO-108 Exc.
16	1I299	I	12/21/2016	Pass	N/A	
17	1I302	I	12/21/2016	Pass	N/A	Re MIT due to MO-108 Exc.
18	1I303	I	11/11/2016	Pass	N/A	Re MIT due to MO-108 Exc.
19	1I304	I	12/22/2016	Pass	N/A	Re MIT due to MO-108 Exc.
20	1I305A	I	11/9/2016	Pass	N/A	Re MIT due to MO-108 Exc.
21	1I306	I	11/8/2016	Pass	N/A	Re MIT due to MO-108 Exc.
22	1I307	I	11/7/2016	Pass	N/A	Re MIT due to MO-108 Exc.
23	1I328A	I	12/21/2016	Pass	N/A	
24	1I521	I	8/24/2016	Pass	N/A	
25	1I524	I	12/30/2016	Pass	N/A	Re MIT due to MO-108 Exc.
26	1I525	I	11/10/2016	Pass	N/A	Re MIT due to MO-108 Exc.
27	1I526	I	12/28/2016	Pass	N/A	Re MIT due to MO-108 Exc.
28	1I527	I	11/8/2016	Pass	N/A	Re MIT due to MO-108 Exc.
29	1P076A	P	11/21/2016	Pass	N/A	Re MIT due to MO-108 Exc.
30	1P079A	P	11/21/2016	Pass	N/A	Re MIT due to MO-108 Exc.
31	1P234	P	8/5/2016	Pass	N/A	Retest
32	1P258	P	8/22/2016	Pass	N/A	
33	1P259	P	8/23/2016	Pass	N/A	
34	1P293A	P	12/12/2016	Pass	N/A	
35	1P317A	P	9/7/2016	Pass	N/A	
36	1P350	P	8/22/2016	Pass	N/A	Retest after well was gravel packed
37	KPW-2	M	11/7/2016	Pass	N/A	Re MIT due to MO-108 Exc.
38	M-FG11	M	9/2/2016	Pass	N/A	
39	MP-108	M	11/1/2016	Pass	N/A	Re MIT due to MO-108 Exc.

39 Total MITs

37 Pass

2 Fail

39 Wells Tested

2 Net Wells Failed

(1) MIT method for "Monitoring Wells" as described in NRC License Application Technical Report Section 3.2.5. Test performed by using packer(s) to isolate casing interval and then pressurize well.

(2) Plugging and abandonment (P&A) performed according to NRC License Application Technical Report Section 6.3.2

I = Class III Injection Well

P = Class III Production Well

M = Monitor Well