

**FORM**  
**17**  
Rev  
11/20

**State of Colorado**  
**Energy & Carbon Management Commission**



Document Number:  
403843553

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**BRADENHEAD TEST REPORT**

Step 1. Before opening any valves, record all tubing and casing pressures as found.  
 Step 2. Collect liquid and gas samples as required; consult Bradenhead Testing and Reporting Instructions and Guidance for field specific Orders at <http://ecmc/reg.html#/opguidance>  
 Step 3. Conduct Bradenhead test.  
 Step 4. Submit Form 17 within 10 days of test. Attach a wellbore diagram if not previously submitted or if wellbore configuration has changed since last wellbore diagram was submitted.  
 Step 5. Submit sample analytical results via Form 43.

1. ECMC Operator Number: 10433      3. BLM Lease No: \_\_\_\_\_  
 2. Name of Operator: LARAMIE ENERGY LLC  
 4. API Number; 05-077-09163-00      5. Multiple completion?  Yes  No  
 6. Well Name: WOODS-SPANGLER      Number: 21-1  
 7. Location (QtrQtr, Sec, Twp, Rng, Meridian): SWSW,15,9S,94W,6  
 8. County MESA      9. Field Name: BRUSH CREEK  
 10. Minerals:  Fee  State  Federal  Indian

11. Date of Test: 06/30/2024  
 12. Well Status:  Flowing  
 Shut In  Gas Lift  
 Pumping  Injection  
 Clock/Intermitter  
 Plunger Lift  
 13. Number of Casing Strings:  
 Two  Three  Liner?

**14. EXISTING PRESSURES**

Record all pressures as found	Tubing: <u>98</u> Fm: _____	Tubing: _____ Fm: _____	Prod Csg <u>190</u> Fm: _____	Intermediate Csg: _____	Surf. Csg <u>8</u>
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**BRADENHEAD TEST**

With gauges monitoring production, intermediate casing and tubing pressures, open surface casing (Bradenhead) valve (if no intermediate casing, monitor only the production casing and tubing pressures.) Record pressures at five minute intervals.  
 Describe character of flow in "Bradenhead Flow" column: O = No Flow; C = Continuous; D = Down to 0; S = Surge; W = Whisper  
 Describe fluid type in "Bradenhead Fluid" column: H = Water H2O; M = Mud; G = Gas; V = Vapor; L = Liquid Hydrocarbon; H & M = Water & Mud; H & G = Water & Gas; H & V = Water & Vapor; M & G = Mud & Gas; M & V = Mud & Vapor; G & V = Gas & Vapor; H & L = Water & Liquid Hydrocarbon; M & L = Mud & Liquid Hydrocarbon; G & L = Gas & Liquid Hydrocarbon; V & L = Vapor & Liquid Hydrocarbon; N = None

Elapsed Time (Min:Sec)	Fm: Tubing	Fm: Tubing:	Prod Csg PSIG	Intermedia Csg PSIG	Bradenhead Flow:	Bradenhead Fluid:
00:00	98		190		DOWN TO 0	GAS
05:00	109		192		NO FLOW	
10:00	113		193		NO FLOW	
15:00	117		193		NO FLOW	
20:00	120		194		NO FLOW	
25:00	123		194		NO FLOW	
30:00	125		194		NO FLOW	
REQUIRED - Instantaneous Bradenhead Pressure at End of Test: <u>0</u> PSIG						

Buried valve?  Yes  No  
 Confirmed open?  Yes  No  
 BRADENHEAD SAMPLE TAKEN?  
 Yes  No  Gas  Liquid  
 Character of Bradenhead fluid:  
 Clear  Fresh  
 Sulfur  Salty  Black  
 Other:(describe)  
 \_\_\_\_\_

## INTERMEDIATE CASING TEST

With gauges monitoring production, intermediate casing and tubing pressures, open the intermediate casing valve. Record pressures at five minute intervals.

Describe character of flow in "Intermediate Flow" column: O = No Flow; C = Continuous; D = Down to 0; S = Surge; W = Whisper

Describe fluid type in "Intermediate Fluid" column: H = Water H<sub>2</sub>O; M = Mud; G = Gas; V = Vapor; L = Liquid Hydrocarbon; H & M = Water & Mud; H & G = Water & Gas; H & V = Water & Vapor; M & G = Mud & Gas; M & V = Mud & Vapor; G & V = Gas & Vapor; H & L = Water & Liquid Hydrocarbon; M & L = Mud & Liquid Hydrocarbon; G & L = Gas & Liquid Hydrocarbon; V & L = Vapor & Liquid Hydrocarbon; N = None.

Buried valve? <input type="checkbox"/> Yes <input type="checkbox"/> No	Elapsed Time (Min:Sec)	Fm: Tubing	Fm: Tubing:	Prod Csg PSIG	Intermediate Csg PSIG	Intermediate Flow:	Intermediate Fluid:
Confirmed open? <input type="checkbox"/> Yes <input type="checkbox"/> No	00:00						
INTERMEDIATE SAMPLE TAKEN? <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Gas <input type="checkbox"/> Liquid	05:00						
	10:00						
	15:00						
	20:00						
Character of Intermediate fluid: <input type="checkbox"/> Clear <input type="checkbox"/> Fresh <input type="checkbox"/> Sulfur <input type="checkbox"/> Salty <input type="checkbox"/> Black Other:(describe) _____	25:00						
	30:00						
	REQUIRED - Instantaneous Intermediate Casing Pressure at End of Test: _____ PSIG						

Comments:

I hereby certify all statements made in this form are, to the best of my knowledge, true, correct, and complete.

Test Performed By: Cisco Hayes Title: Lease Operator Phone: (970) 312-6479

Signed: Lori Muhr Title: Regulatory Analyst Date: 7/2/2024

Witnessed By: \_\_\_\_\_ Title: \_\_\_\_\_ Agency: \_\_\_\_\_