Facility Well Name Northern (Cunningham) #3 **UIC Permit #** KS-05-151-003 **Month** June **Year** 2022

Submitted 07/11/2022 **Approved** 07/28/2022 **KOLAR Document ID** 1655776

Class I-V Injection Well Monthly Monitoring

Summary of Monthly Report

Number of days injection occurred: 30

Barrels per Day Maximum: 4,000

			Annulus Pressure psig min 60		Injection Pressure		
	Injection Volume Barrels per Day	Injection Rate Barrels per Minute	Gauge psig	Cont. Record psig	Gauge psig	Cont. Record psig	Amount Added to Seal Pot
Monthly Average	564	0.50	103	104	-23.2	-22.8	0
Monthly Maximum	649	0.69	107	108	-21.0	-18.7	0
Monthly Minimum	456	0.45	100	99	-25.0	-24.4	0
Monthly Total	16,930						0

Summary of Continuous Recorder Data

Maximum Annulus Pressure psig	Minimum Annulus Pressure psig	Maximum Injection Pressure psig	Minimum Injection Pressure psig
113.18	98.61	-7.07	-29.35

Comments:

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Daily Recorder Data

Day	Time 24 hr	Injection Volume Barrels Per Day	Injection Rate Barrels Per Minute	Annulus Pressure (Gauge) psig	Annulus Pressure (Continuous Recorder) psig	Injection Pressure (Gauge) + / -	Injection Pressure (Continuous Recorder) + / -	Seal Pot Fluid Level inches	Type of Fluid Added to Seal Pot	Amount of Fluid Added to Seal Pot gallons	Initials of Collector of Field Recordings		
1	09:50	597.86	0.50	100	100.6	-22	-23.0	18		0	DV		
2	08:30	574.45	0.48	100	99.3	-23	-23.0	19		0	HS		
3	09:10	575.19	0.45	102	101.5	-22	-22.0	19		0	DV		
4	09:35	494.33	0.69	101	100.2	-23	-23.0	18		0	HS		
5	08:35	574.36	0.48	102	102.2	-23	-23.0	19		0	DV		
6	10:25	575.98	0.48	102	102.8	-22	-23.0	19		0	AB		
7	16:10	594.40	0.48	104	104.9	-25	-23.0	19		0	AB		
8	08:40	579.76	0.45	102	102.3	-21	-23.0	21		0	AB		
9	13:10	569.69	0.48	102	102.3	-23	-23.0	19		0	AB		
10	08:15	537.86	0.48	101	101.1	-23	-23.0	19		0	AB		
11	07:15	616.88	0.48	104	104.1	-23	-22.0	19		0	AB		
12	08:00	589.74	0.48	105	106.4	-23	-22.0	19		0	AB		
13	09:31	616.55	0.48	105	107.3	-24	-23.0	19		0	CWA		
14	09:20	601.31	0.48	105	106.5	-24	-23.0	19		0	GKB		
15	14:05	573.26	0.48	105	106.7	-25	-23.0	19		0	GKB		
16	08:50	566.88	0.48	102	104.9	-24	-23.0	19		0	CWA		
17	08:55	540.05	0.50	101	105.3	-24	-23.0	19		0	KS		
18	07:25	511.81	0.50	104	104.4	-23	-23.0	19		0	CWA		
19	10:21	489.67	0.48	104	104.0	-25	-23.0	19		0	GKB		
20	09:40	488.81	0.48	105	103.1	-24	-23.0	18		0	KS		
21	10:00	468.90	0.50	101	103.4	-24	-24.4	19		0	KS		
22	10:30	456.14	0.48	101	101.4	-24	-23.0	18		0	KS		
23	08:10	473.50	0.50	101	100.3	-23	-23.0	18		0	KS		
24	09:25	620.52	0.52	100	100.4	-22	-23.0	18		0	KS		
25	08:30	648.88	0.50	102	108.3	-22	-23.0	19		0	KS		
26	07:45	637.67	0.52	100	104.2	-21	-18.7	20		0	KS		
27	10:55	565.81	0.52	103	103.1	-23	-23.0	19		0	JM		
28	09:48	616.12	0.52	105	104.8	-23	-23.0	20		0	DMH		
29	08:45	613.07	0.52	106	106.7	-23	-23.0	20		0	DMH		
30	09:25	560.55	0.52	107	107.5	-24	-23.0	20		0	DMH		
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Weekly Injectate Samples

Kansas Lab Certificate Number E-10146

Week	**Temperature**		**pH**		**Chloride**				
	Degrees Fahrenheit	Date	Standard Units	Date	Cl concentration (mg/l)	Date Sample Collected	Date Sampl Analysed		
1	87.50	06/06/2022	6.80	06/06/2022	N/A				
2	96.80	06/13/2022	7.00	06/13/2022	N/A				
3	89.70	06/20/2022	7.00	06/20/2022	N/A				
4	72.30	06/27/2022	6.82	06/27/2022	N/A				
5					N/A				

No monthly injectate samples required.

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Quarterly Injectate Samples

Quarter 2
Date Sample Collected 04/06/2022
Kansas Lab Certificate Number E-10146
Lab Name Pace Analytical-Salina

These samples shall be representative of injection activity and shall therefore be collected on days of injection.

Constituent	Value	Units
Calcium	2,400.000	mg/l
Chloride	29,600.000	mg/l
Conductivity	70.800	Mmhos
Magnesium	657.000	mg/l
Sodium	18,000.000	mg/l
Sulfate	2,360.000	mg/l
Total Alkalinity as CaCO3	285.000	mg/l
Total Dissolved Solids	57,400.000	mg/l
Total Suspended Solids	302.000	mg/l