Facility Well Name ONEOK (Bushton) #4 **UIC Permit #** KS-01-053-003 **Month** September **Year** 2019

Submitted 10/18/2019 **Approved** 10/25/2019 **KOLAR Document ID** 1476250

Class I-V Injection Well Monthly Monitoring

Summary of Monthly Report

Number of days injection occurred: 28

Barrels per Day Maximum: 30,952

			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	4,275	2.97	85	85	-27.2	-26.3	0
Monthly Maximum	13,484	9.36	87	87	-25.0	-6.5	0
Monthly Minimum	0	0.00	83	83	-29.0	-28.4	0
Monthly Total	128,251						0

Summary of Continuous Recorder Data

Maximum Annulus Pressure psig	Minimum Annulus Pressure psig	Maximum Injection Pressure psig	Minimum Injection Pressure psig
93.04	82.45	-3.17	-30.37

Comments:

On 10.27.19, the vac line salted off resulting in an inaccurate C.R. pressure reading.

ONEOK (Bushton) #4 09/2019

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	06:21	4,749.93	3.31	84	82.9	-28	-26.7	15		0	KJ		
2	07:06	4,268.90	2.98	84	84.5	-27	-26.6	15		0	TS		
3	06:01	4,629.95	3.21	84	84.2	-27	-26.4	15		0	KJ		
4	05:50	4,229.33	2.93	84	83.6	-28	-27.2	15		0	TS		
5	06:09	4,249.43	2.95	83	82.8	-27	-27.1	15		0	KJ		
6	06:06	4,036.79	2.81	84	83.2	-27	-26.6	15		0	WW		
7	05:38	4,577.33	3.19	83	83.4	-27	-26.8	15		0	WW		
8	06:38	4,828.29	3.36	85	84.7	-27	-26.7	15		0	KJ		
9	05:57	4,654.50	3.24	84	84.0	-27	-26.3	15		0	WW		
10	06:08	4,339.21	3.02	84	83.8	-28	-27.2	15		0	TS		
11	05:44	4,379.29	3.05	83	83.5	-27	-26.4	15		0	WW		
12	06:10	4,546.40	3.17	83	83.1	-27	-27.2	15		0	TS		
13	05:45	4,751.93	3.31	84	83.6	-28	-26.9	15		0	CK		
14	06:26	4,886.64	3.40	87	87.1	-28	-26.7	15		0	TS		
15	05:59	1,711.05	1.19	87	87.2	-29	-28.4	15		0	CK		
16	05:58	0.00	0.00	86	86.0	-28	-28.4	15		0	TS		
17	05:37	4,454.98	3.10	87	86.8	-27	-26.8	15		0	CK		
18	05:58	5,660.48	3.93	86	86.1	-27	-26.7	15		0	TS		
19	06:01	6,439.64	4.48	85	85.4	-26	-26.3	15		0	JI		
20	05:59	5,829.26	4.05	85	84.8	-27	-26.8	15		0	JC		
21	05:55	8,779.50	6.10	83	83.3	-27	-26.8	15		0	JI		
22	06:40	13,483.86	9.36	84	84.0	-27	-27.0	15		0	JC		
23	05:52	10,505.79	7.29	84	83.9	-27	-27.2	15		0	JI		
24	06:33	6,139.12	4.26	86	86.4	-27	-27.3	15		0	JC		
25	06:07	2,096.00	1.45	85	85.5	-27	-27.4	15		0	JC		
26	06:36	0.00	0.00	85	84.2	-27	-27.4	15		0	JE		
27	10:14	2.76	0.00	85	86.3	-28	-6.5	15		0	JE		
28	09:46	0.57	0.00	84	84.0	-27	-27.2	15		0	JE		
29	09:32	15.74	0.00	85	86.4	-25	-25.4	15		0	JE		
30	06:10	4.29	0.00	85	86.4	-27	-27.9	15		0	JE		
31													

ONEOK (Bushton) #4 09/2019

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	69.20	09/01/2019	6.66	09/01/2019	154,000.0	09/01/2019	09/16/2019		
2	70.80	09/08/2019	6.08	09/08/2019	167,000.0	09/08/2019	09/19/2019		
3	77.20	09/15/2019	7.03	09/15/2019	169,000.0	09/15/2019	09/25/2019		
4	75.30	09/22/2019	6.57	09/22/2019	192,000.0	09/22/2019	09/30/2019		
5	70.10	09/29/2019	7.11	09/29/2019	30,100.0	09/29/2019	10/02/2019		

No monthly injectate samples required.

ONEOK (Bushton) #4 09/2019

Quarterly Injectate Samples

Quarter 3
Date Sample Collected 08/15/2019
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
Benzene	0.014	mg/l
Calcium	1,810.000	mg/l
Conductivity	230,000.000	Mmhos
Iron	1.000	mg/l
Magnesium	202.000	mg/l
Sulfate	2,460.000	mg/l
Total Alkalinity as CaCO3	84.000	mg/l
Total Dissolved Solids	19,900.000	mg/l
Total Hardness as CaCO3	5,340.000	mg/l