



**ANNUAL REPORT OF PRESSURE MONITORING,
 FLUID INJECTION AND ENHANCED RECOVERY**

Complete all blanks - add pages if needed. Copy to be retained for five (5) years after filing date.

OPERATOR: License # _____
 Name: _____
 Address 1: _____
 Address 2: _____
 City: _____ State: _____ Zip: _____ + _____
 Contact Person: _____
 Phone: (_____) _____
 Lease Name: _____
 Well Number: _____

API No.: _____
 Permit No.: _____
 Reporting Year: _____
 (January 1 to December 31)
 _____ - _____ - _____ - _____ Sec. _____ Twp. _____ S. R. _____ E W
 (a/a/a/a)
 _____ feet from N / S Line of Section
 _____ feet from E / W Line of Section
 County: _____

I. Injection Fluid:

Type (Pick one): Fresh Water Treated Brine Untreated Brine Water/Brine
 Source: Produced Water Other (Attach list)
 Quality: Total Dissolved Solids: _____ mg/l Specific Gravity: _____ Additives: _____
 (Attach water analysis, if available)

II. Well Data:

Maximum Authorized Injection Pressure: _____ psi Injection Zone: _____
 Maximum Authorized Injection Rate: _____ barrels per day
 Total Number of Enhanced Recovery Injection Wells Covered by this Permit: _____ (Include TA's)

III.	Month:	Total Fluid Injected BBL	Maximum Fluid Pressure	Total Gas Injected MCF	Maximum Gas Pressure	# Days of Injection
	January	_____	_____	_____	_____	_____
	February	_____	_____	_____	_____	_____
	March	_____	_____	_____	_____	_____
	April	_____	_____	_____	_____	_____
	May	_____	_____	_____	_____	_____
	June	_____	_____	_____	_____	_____
	July	_____	_____	_____	_____	_____
	August	_____	_____	_____	_____	_____
	September	_____	_____	_____	_____	_____
	October	_____	_____	_____	_____	_____
	November	_____	_____	_____	_____	_____
	December	_____	_____	_____	_____	_____
	TOTAL	_____	_____	_____	_____	_____



WATER ANALYSIS REPORT

Company: Haach Operating

Sample Point:

Source: Lowe-Jones

Date Sampled: 5/29/2014

Well No: 8

Date Analyzed: 6/9/2014

pH:	6.50	Total Dissolved Solids (mg/L):	90,798
Dissolved H ₂ S:	N/A	Total Ionic Strength:	1.777
Dissolved CO ₂ :	N/A	Specific Gravity:	1.080
Resistivity @ 75°F(Ohm-Meters):	0.07950	Density, (lbs/gal):	9.01

Cations	mg/L	Meq/L	Anions	mg/L	Meq/L
Calcium:	5,011	251	Carbonate:	0	0
Magnesium:	1,621	133	Bicarbonate:	293	5
Sodium:	27,573	1,199	Chloride:	56,000	1,577
Barium:	300		Sulfate:	0	0
Strontium:	0		Total Hardness:	19,200	
Total Dissolved Iron:	0.32				

PROBABLE MINERAL COMPOSITION

	mg/L	Meq/L
Calcium Bicarbonate:	389	5
Calcium Sulfate:	0	0
Calcium Chloride:	13,640	246
Magnesium Bicarbonate:	0	0
Magnesium Sulfate:	0	0
Magnesium Chloride:	6,328	133
Sodium Bicarbonate:	0	0
Sodium Sulfate:	0	0
Sodium Chloride:	70,083	1,199

Remarks



SCALE DEPOSITION POTENTIAL ANALYSIS

Company: Haach Operating

Source: Lowe-Jones

Well No: 8

Sample Point:

Date Sampled: 5/29/2014

Date Analyzed: 6/9/2014

Brine Composition

pH:	6.50	Ca, mg/L:	5,011	Total Hardness, mg/L:	19,200
Specific Gravity:	1.080	Mg, mg/L:	1,621	Total Dissolved Solids, mg/L:	90,798
HCO ₃ , mg/L:	293	Na, mg/L:	27,573	Total Ionic Strength:	1.777
Cl, mg/L:	56,000	Ba, mg/L:	300	Total Dissolved Iron, mg/L:	0.3
SO ₄ , mg/L:	0	Sr, mg/L:	0		

Calcium Carbonate Scale Indices

Temperature, °F:	75	100	125	150	Specified Temperatures	
Stiff-Davis Index:	0.000	0.134	0.515	0.976	40	180
Deposition, lbs/1,000 Bbls:	0.0	39.8	112.6	149.2	0.000	1.585
					0.0	163.3

Calcium Sulfate Scale Indices

Temperature, °F:	75	100	125	150	Specified Temperatures	
Supersaturation Ratio:	0.000	0.000	0.000	0.000	40	180
Deposition, lbs/1,000 Bbls:	0.0	0.0	0.0	0.0	0.000	0.000
					0.0	0.0

Barium Sulfate Scale Indices

Temperature, °F:	75	100	125	150	Specified Temperatures	
Supersaturation Ratio:	0.000	0.000	0.000	0.000	40	180
Deposition, lbs/1,000 Bbls:	0.0	0.0	0.0	0.0	0.000	0.000
					0.0	0.0



SCALE DEPOSITION POTENTIAL TRENDS

Company: Haach Operating

Source: Lowe-Jones

Well No: 8

Sample Point:

Date Sampled: 5/29/2014

Date Analyzed: 6/9/2014

