

TRETOLITE®

Chemicals and Services

PETROLITE

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C. C. D.

WATER ANALYSIS REPORT

Company : YATES PETROLEUM
Address : ARTESIA, NEW MEXICO
Lease : PATHFINDER "AFT"
Well : SWD #7, #13 F-21-10-27
Sample Pt. : TANK

Date : 10/28/92
Date Sampled : 10/25/92
Analysis No. : 207

ANALYSIS		mg/L	* meq/L	
-----		----	-----	
1.	pH	7.1		
2.	H ₂ S	20 PPM		
3.	Specific Gravity	1.030		
4.	Total Dissolved Solids	50086.6		
5.	Suspended Solids	NR		
6.	Dissolved Oxygen	NR		
7.	Dissolved CO ₂	NR		
8.	Oil In Water	NR		
9.	Phenolphthalein Alkalinity (CaCO ₃)			
10.	Methyl Orange Alkalinity (CaCO ₃)			
11.	Bicarbonate	HCO ₃ 890.0	HCO ₃	14.6
12.	Chloride	Cl 28755.0	Cl	811.1
13.	Sulfate	SO ₄ 1375.0	SO ₄	28.6
14.	Calcium	Ca 2720.0	Ca	135.7
15.	Magnesium	Mg 196.1	Mg	16.1
16.	Sodium (calculated)	Na 16150.5	Na	702.5
17.	Iron	Fe 0.0		
18.	Barium	Ba 0.0		
19.	Strontium	Sr 0.0		
20.	Total Hardness (CaCO ₃)	7600.0		

PROBABLE MINERAL COMPOSITION

*milli equivalents per Liter				Compound	Equiv wt	X meq/L	=	mg/L
+-----+				-----				
136	*Ca	<-----	*HCO3	15	Ca (HCO3) 2	81.0	14.6	1182
-----	/	----->	-----	-----	CaSO4	68.1	28.6	1949
16	*Mg	----->	*SO4	29	CaCl2	55.5	92.5	5133
-----		<----->	/	-----	Mg (HCO3) 2	73.2		
703	*Na	----->	*Cl	811	MgSO4	60.2		
+-----+				-----				
Saturation Values Dist. Water 20 C				MgCl2	47.6	16.1	768	
CaCO3 13 mg/L				NaHCO3	84.0			
CaSO4 * 2H2O 2090 mg/L				Na2SO4	71.0			
BaSO4 2.4 mg/L				NaCl	58.4	702.5	41054	

REMARKS:

----- L. MALLETT / FILE

Petrolite Oilfield Chemicals Group

Respectfully submitted,
STEVE TIGERT