709 W. INDIANA MIDLAND, TEXAS 79701 PHONE 683-4521

RESULT OF WATER ANALYSES

| | | ORATORY NO | 985382 | |
|--|---|---------------------------------------|-----------------|-------------------------------------|
| o: Mr. Mark Nearburg | SAMI | ORATORY NO | 9-29-85 | |
| P.O.Box 31405, Dallas, Texas | DEC | ULTS REPORTE | 10-1-85 | |
| | ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,, | DE 13 NEFORTE | U | |
| OMPANY Chama Petroleum Corp. | LEASE! | forrison Con | 1. #1 | |
| TELD OR POOL | Dayton | | | |
| ECTION SLOCK SURVEY | COUNTY | Eddy s | TATE NM | |
| DURCE OF SAMPLE AND DATE TAKEN: | | | | |
| No. , Produced water - taken from | m Morrison Com. + | l (wellhead | 1). 9-27-85 | |
| | | | | |
| NO. 2 | < | ection 5. | | |
| NO. 3 | | | | |
| NO. 4 | d by Leo B. Prate | | | |
| EMARKS: Sample Submitte | u by Leo B. Frate | er, hallibur | Con | |
| CHEMICA | L AND PHYSICAL PR | OPERTIES | | · · · - · · · · · · · · · · · · · · |
| | NO. 1 | NO. 2 | NO. 3 | NO. 4 |
| Specific Gravity at 60° F. | 1.1188 | | ļ | |
| pH When Sampled | | | | <u> </u> |
| pH When Received | 6.93 | | ļ | |
| Bicarbonate as HCO3 | 525 | | | |
| Supersaturation as CaCO3 | | · · · · · · · · · · · · · · · · · · · | | |
| Undersaturation as (IaCO3 | 11 100 | · · · · · · · · · · · · · · · · · · · | | ļ |
| Total Hardness as CaCO3 | 11,100 | | | |
| Calcium as Ca | 3,100 | | | |
| Magnesium as Mg Sodium and/or Potassium | 814 | | | |
| Sulface as SO ₂ | 68,046 | | 1 | |
| Chloride as CI | 4,216 109,369 | | | |
| iron as Fe | 11.3 | | | |
| Barrum as Ba | | | | |
| Turbidity, Electric | | BEFORE | EXAMINER S | TOGNER |
| Color as Pt | | | | 1 |
| Total Solids, Calculated | 186.070 | Oil Co | nservation D | vision |
| Temperature °F. | | 3.13.44 | P* 1 11 1 1 1 1 | ./ |
| Carbon Dioxide, Calculated | | CHANA | Exhibit No. | 4 |
| Dissolved Oxygen, Winkler | | Casal | 0 6730 | <i>i</i> - |
| Hydrogen Sulfide | 68.8 | Case N | 0. 0130 | |
| Resistivity, ohms/m at 77° F. | 0.061 | L | | |
| Suspended Oil | | | | |
| Filtrable Solids as mg/ | | | | |
| Volume Filtered, ml | | | | |
| | | | | |
| | | | | |
| | | | <u> </u> | |
| | Its Reported As Milligrams I | | | |
| Additional Determinations And Remarkive have I | | | | |
| ecords of the Abo, and this wate | | | | |
| oted that this water shows decid | | | | • |
| ack of records in the area, we s | sould be reluctat | it to sugges | t the most p | robable ori |
| in herein. | ···· | | | |
| | | | | |
| | · | | | |
| | | | | |

m. m 10 - 1

Form No. 3

2cc: Mr. Burl Reynolds, Hobbs, NM

Waylan C. Martin, M. A.