IMA

.

TEXAS MUD AND CHEMICAL CO.

P. O. BOX 1968 PHONE A/C 915/381-0400

ODESSA, TEXAS 79760

January 17, 1980

Depco, Inc. 800 Central Odessa, Texas 79761

Attn: Mr. C. O. Bizzell

Dear Carl;

We are pleased to submit a Mud Program for your No. 1 Papalotes Federal drilled in Sec.14, T-15S, R-28E in Chaves County, New Mexico.

0 - 350' T.M.C. Gel and Lime Vis. 40-45 for hole conditions.

350 - 2150 Drill with native mud, circulating reserve. Add Mud Seal as needed for seepage. Caustic for P.H. control. 9.5 - 10. Sweep hole with 100 bbl. slug. 45-50 Vis. to run pipe.

- 2150 5500 Drill with fresh water, circulating reserve. Caustic for P.H. control, adding Mud Seal if needed for seepage.
- 5500 6500 Add brine if needed to raise chloride to 100,000 P.P.M. Add Salt Gel and Visbestos to raise Vis. 33-34. Add 2-3% oil, also, 2-3% K.C.L. to go into Abo shale.
- 6500 9,000' Maintain Vis. 33-34, Lower W/L 20 cc or less for D.S.T. in Wolfcamp. Maintain 2-3% oil.
- 9,000 T.D. Maintain same characteristic and lower W/L to 5 cc to go into Marrow.
- Drlg. Hazards: Possible Abo shale heaving.

Est. Mud Cost: \$20,000.00

Engineer: Ronnie Koonce - Odessa 915/381 0400

Stock Point: Lovington, New Mexico - call Odessa - 915/381-0400