Attachment to Form 9-331 C Application for Permit to Drill

Sundance Oil Company, Cone-Federal 31 No. 1 660' FNL and 660' FEL of Section 31, T. 7S, R. 32E Roosevelt County, New Mexico

- 1. The geologic name of the surface formation is Triassic red beds.
- 2. The estimated tops of important geologic markers are as follows:
 - Rustler 1,670' Salado 1,720' Yates 2,170' San Andres 3,330' P-1, 4,040' P-2, 4,140'
- 3. The estimated depths at which anticipated water, oil, gas or other mineral bearing formations will be encountered are as follows:

Ogalala 150' water Salado 1,720' salt San Andres 3,330' Oil and Gas P-1 4,040' Oil and Gas P-2 4,140' Oil and Gas

4. The proposed casing program is as follows:

Surface - New 8 5/8", 32 lb/ ft., ST&C, Secondary 45 (J&L). Production - New 4 1/2", 10.5 lb/ ft., ST&C, K-55 and 11.6 lb/ ft., ST&C, JCW-36 (J&L).

- 5. A sketch of an API Series 900 Blowout Preventer is attached. Pipe rams and blinds will be checked to 1,000 PSI for 30 minutes when BOP is installed. BOP will be checked when casing string is set and operated daily for checks.
- 6. The proposed mud program is as follows:

0-3 <i>5</i> 0' spud m u d	8.5 – 9.0 lbs./ gal.
350-4,000' native mud	9.0 – 9.5 lbs./ gal.
4000- To ID salt gel	9.0 - 10.0 lbs./ gal.

- 7. The auxilliary equipment to be used is:
 - (1) Kelly cocks.
 - (2) Floats at the bit.
 - (3) Stabbing value on rig floor with sub to fit drill pipe.



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- 8. It is proposed to run 2" and 5" GR, CNL, FDC, DLL/MLL Logs from TD to 350'.
- 9. No abnormal pressures or temperatures are expected to be encountered in this well.
- 10. The anticipated starting date for this well is March 12, 1977. Estimated duration of drilling operations is 10 to 12 days.

B.O.P. HOOK-UP

Schaeffer Type E 10" Series 900 Hydraulic BOP. (3,000 PSI W.P.)



