## APPLICATION FOR DRILLING

NATOMAS NORTH AMERICA, INC. Supron Federal "14" Com., Well No. 1 Lea County, New Mexico 1980' FWL & 1980' FSL, Sec. 14, T23S, R34E Lease No.: NM 15035

In conjunction with Form 9-331C, Application for Permit to Drill subject well, Natomas North America, Inc. submits the following items of pertinent information in accordance with USGS requirements:

- The geologic surface formation is alluvium and bolson deposits and other surficial deposits.
- 2. The estimated tops of geologic markers are as follows:

Delaware Limestone	5,060'	Upper Atoka Limestone	12,110'
Bone Springs	8,559'	Atoka Clastic	12,340'
Wolfcamp	11,667'	Atoka "EO" Limestone	13,032
Strawn	11,960'	Morrow Clastics	13,232

3. The estimated depths at which anticipated water, oil, or gas formations are expected to be encountered:

Water: At approximately 100' to 300'.

Oil and/or Gas: Upper Atoka Limestone at approximately 12,110'. Atoka "EO" Limestone at approximately 13,032'. Morrow Sandstones at approximately 13,110' - 13,900'.

- 4.. Proposed Casing Program: See Form 9-331C.
- 5.. Pressure Control Equipment: See Form 9-331C and Exhibit "C".
- 6.. Mud Program: See Form 9-331C.
- 7. Auxiliary Equipment: Blowout preventer, gas detector, kelly cock, pit level monitor, flow sensors and stabbing valve. The mud system monitoring equipment will be installed and operating before drilling into the Wolfcamp formation and used until production casing is run and cemented.
- 8. Testing Logging and Coring Program:

Drill Stem Tests: None

Logging: Dual Induction laterolog--5200' to T.D. FDC/CNL --5200' to T.D. Gamma Ray --Surface to T.D.

- 9. No abnormal temperatures are anticipated, but it is anticipated that there is a possibility that abnormally high pressure may be encountered. In that event, the proposed mud program will be modified to the increase the mud weight.
- 10. Anticipated Starting Date: March 20, 1980. Anticiapted Completion of drilling operations: Approximately 90 days.