## LAGUNA GRANDE UNIT (FEDERAL) #3 1980' FNL, 1980' FEL, SEC 29, T23S, R29E EDDY COUNTY, NEW MEXICO

1. The geologic name of the surface formation is: Recent

2. The estimated tops of important geologic markers are:

Rustler	210'
Bell Canyon	3000'
Cherry Canyon	3890'
Brushy Canyon	50601
Bone Springs	6720'
Wolfcamp	9950 <b>'</b>
Strawn	11700'
Atoka	11890'
Morrow	12730'

3. The estimated depths at which anticipated water, oil, gas or other mineral bearing strata are expected to be encountered are:

Water - Surface water above 350'. Gas and Oil - Bell Canyon, Cherry Canyon, Brushy Canyon, Bone Springs, Wolfcamp, Strawn, Atoka, and Morrow are all possible hydrocarbon bearing zones.

4. The proposed casing program including size, grade, and weight per foot of each string (and whether new or used) is as follows:

String	Size/Weight/Grade	<u>Condition</u>	Depth Interval
Conductor	20"	New	0 - 30'
Surface*	13 3/8"/54.5 ppf/K-55 STC	New or 2nd Cl	0 - 350'
Intermediate*	10 3/4"/45.5 & 51.0 ppf/K-55 STC	New or 2nd Cl	0 - 2900'
Production/ Protection*	7 5/8"/33.7 ppf/0-95 LTC 7 5/8"/29.7 ppf/0-95 LTC	New or 2nd Cl New or 2nd Cl	0 - 3000' 3000 - 10800'
Liner*	5"/18 ppf/SOO 95 LTC	New or 2nd Cl	10300 - 13600'

\*Casing string run will be at least as strong as string shown. Actual pipe run may be different depending on casing available at time.

- 5. Exxon's minimum specifications for pressure control equipment is as follows:
  - A. Casinghead equipment:

"A" Section: Flanged type 5000 psi WP for 10 3/4" x 7 5/8" casing program. Tubinghead: Flanged type 10,000 psi WP for 2 7/8" tubing string.