

EL PASO NATURAL GAS COMPANY  
OPEN FLOW TEST DATA

DATE 12/28/72

|   |                      |                           |                          |
|---|----------------------|---------------------------|--------------------------|
| Operator<br>EL PASO NATURAL GAS COMPANY       |                      | Lease<br>Koch #1 (OWWO)   |                          |
| Location<br>1800/N, 890/E. Sec. 3, T30N, R10W |                      | County<br>San Juan        | State<br>NM              |
| Formation<br>Mesaverde                        |                      | Pool<br>Blanco            |                          |
| Casing: Diameter<br>4.500                     | Set At: Feet<br>5749 | Tubing: Diameter<br>2.375 | Set At: Feet<br>5659     |
| Pay Zone: From<br>4692                        | To<br>5598           | Total Depth:<br>5749      | Shut In<br>12/21/72      |
| Stimulation Method<br>SWF                     |                      | Flow Through Casing       | Flow Through Tubing<br>X |

|   |                                  |  |                                      |                                      |  |
|---|----------------------------------|--|--------------------------------------|--------------------------------------|--|
| Choke Size, Inches<br>4" MR, 2.750" plate             |                                  | Choke Constant: C<br>41.10                   |                                      | Tested through a 3/4" variable choke |  |
| Shut-In Pressure, Casing, PSIG<br>780                 | + 12 = PSIA<br>792               | Days Shut-In<br>7                            | Shut-In Pressure, Tubing PSIG<br>530 | + 12 = PSIA<br>542                   |  |
| Flowing Pressure: P PSIG<br>250 WH, 96 meter          | + 12 = PSIA<br>262 WH, 108 meter | Working Pressure: P <sub>w</sub> PSIG<br>707 | + 12 = PSIA<br>719                   |                                      |  |
| Temperature:<br>T = 77 °F      F <sub>t</sub> = 98.40 | n =<br>.75                       | F <sub>pv</sub> (From Tables)<br>1.008       | Gravity<br>.667                      | F <sub>g</sub> = 1.2244              |  |

$$\text{CHOKE VOLUME} = Q = C \times P_i \times F_i \times F_g \times F_{pv}$$

$$Q = \text{Calculated from orifice meter readings} = 3401 \text{ MCF/D}$$

$$\text{OPEN FLOW} = Aof = Q \left( \frac{P_c^2}{P_c^2 - P_w^2} \right)^n$$

$$Aof = Q \left( \frac{627264}{110303} \right)^n = (3401)(5.6867)^{.75} = (3401)(3.6825)$$

$$Aof = 12524 \text{ MCF/D}$$

NOTE: The well produced 26.57 bbl of 40 API gravity oil during the test.

TESTED BY CRW and RH

WITNESSED BY

*William D. Welch*  
William D. Welch  
Well Test Engineer

