

EL PASO NATURAL GAS COMPANY  
OPEN FLOW TEST DATADATE 4-30-71

|                                               |                      |                                     |                      |
|-----------------------------------------------|----------------------|-------------------------------------|----------------------|
| Operator<br>El Paso Natural Gas Company       |                      | Lease<br>San Juan 29-6 Unit No. 102 |                      |
| Location<br>1650' N, 1750' E, S 10, T29N, R6W |                      | County<br>Rio Arriba                | State<br>New Mexico  |
| Formation<br>Dakota                           |                      | Pool<br>Basin                       |                      |
| Casing: Diameter<br>4.000                     | Set At: Feet<br>7787 | Tubing: Diameter<br>1.990           | Set At: Feet<br>7777 |
| Pay Zone: From<br>7682                        | To<br>7787           | Total Depth:<br>7865                | Shut In<br>4-23-71   |
| Stimulation Method<br>S W F                   |                      | Flow Through Casing<br>XX           | Flow Through Tubing  |

|                                        |                     |                             |                                              |                     |            |
|----------------------------------------|---------------------|-----------------------------|----------------------------------------------|---------------------|------------|
| Choke Size, Inches<br>.750             |                     | Choke Constant: C<br>12.365 |                                              |                     |            |
| Shut-In Pressure, Casing, PSIG<br>2767 | + 12 = PSIA<br>2779 | Days Shut-In<br>7           | Shut-In Pressure, Tubing PSIG<br>2732        | + 12 = PSIA<br>2744 |            |
| Flowing Pressure: P PSIG<br>149        | + 12 = PSIA<br>161  |                             | Working Pressure: P <sub>w</sub> PSIG<br>363 | + 12 = PSIA<br>375  |            |
| Temperature:<br>T = 65 °F              | n =<br>Ft = .9952   |                             | Fpv (From Tables)<br>1.012                   | Gravity<br>.590     | Fg = 1.008 |

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

$$Q = 12.365 \times 161 \times .9952 \times 1.008 \times 1.012 = \underline{2021} \text{ MCF/D}$$

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

Note: Well blew medium fog of water for the last 2 1/2 hours of the test.

$$A_{of} = \left( \frac{7722841}{7582216} \right)^n = 2021(1.0185)^{.75} = 2021(1.0138)$$

$$A_{of} = \underline{2049} \text{ MCF/D}$$

TESTED BY R. E. Fielder

WITNESSED BY \_\_\_\_\_



*H. L. Kendrick*  
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