

OPEN FLOW TEST DATA

CORRECTED COPY

DATE September 4, 1975

Operator El Paso Natural Gas Company		Lease Howell D #4-A	
Location 1175/S, 1460/E, Sec. 33, T31N, R8W		County San Juan	State New Mexico
Formation Mesa Verde		Pool Blanco	
Casing Diameter 4.500	Set At: Feet 5787'	Tubing Diameter 2.375	Set At: Feet 5676'
Pay Zone: From 4976'	To 5698'	Total Depth: PBD 5787 5771'	Shut In 8-26-75
Stimulation Method Sandwater Frac		Flow Through Casing	Flow Through Tubing XX

Choke Size, Inches 4" M.R 2.500" Plate		Plate Choke Constant: C 32.64		Well tested thru 3/4" variable choke	
Shut-In Pressure, Casing, PSIG 616	+ 12 = PSIA 628	Days Shut-In 9	Shut-In Pressure, Tubing PSIG 576	+ 12 = PSIA 588	
Flowing Pressure: P PSIG 58	+ 12 = PSIA 70		Working Pressure: P _w PSIG 544	+ 12 = PSIA 556	
Temperature: T = 66 °F	F _t = .9943	n = 0.75	F _{pv} (From Tables) 1.009	Gravity .660	F _g = 1.231

$$\text{CHOKE VOLUME} = Q = C \times P_t \times F_t \times F_g \times F_{pv}$$

$$Q = \text{Calculated from meter readings} = \underline{\hspace{2cm}} 2120 \text{ MCF/D}$$

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

$$Aof = Q \left(\frac{394384}{85248} \right)^n = (2120) (4.6263)^{.75} = (2120) (3.1545)$$

$$Aof = \underline{\hspace{2cm}} 6688 \text{ MCF/D}$$

Note: Well produced 6.71 Bbl. water and 256.44 MCF of gas during test.

TESTED BY R. Hardy & C. Dein

WITNESSED BY _____

H. E. McAnally
Well Test Engineer

