

EL PASO NATURAL GAS COMPANY
OPEN FLOW TEST DATADATE October 22, 1973

Operator <u>El Paso Natural Gas Company</u>		Lease <u>Vaughn #24 (PC)</u>	
Location <u>790/S, 1450/E, Sec. 27, T26N, R6W</u>		County <u>Rio Arriba</u>	State <u>New Mexico</u>
Formation <u>Pictured Cliffs</u>		Pool <u>So. Blanco</u>	
Casing: Diameter <u>2.875</u>	Set At: Feet <u>2700'</u>	Tubing: Diameter <u>No Tubing</u>	Set At: Feet
Pay Zone: From <u>2578</u>	To <u>2598'</u>	Total Depth: <u>3596</u>	Shut In <u>9-26-73</u>
Stimulation Method <u>Sandwater Frac</u>		Flow Through Casing <u>X</u>	Flow Through Tubing

Choke Size, Inches <u>.750</u>		Choke Constant: C <u>12.365</u>		Tubingless Completion	
Shut-In Pressure, Casing, PSIG <u>904</u>	+ 12 = PSIA <u>916</u>	Days Shut-In <u>26</u>	Shut-In Pressure, Tubing PSIG <u>No Tubing</u>	+ 12 = PSIA	
Flowing Pressure: P PSIG <u>157</u>	+ 12 = PSIA <u>169</u>		Working Pressure: P _w PSIG <u>Calculated</u>	+ 12 = PSIA <u>207</u>	
Temperature: T = <u>61</u> °F F _t = <u>.9990</u>	n = <u>.85</u>		F _{pv} (From Tables) <u>1.016</u>	Gravity <u>.670</u>	F _g = <u>.9463</u>

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

$$Q = (12.365)(169)(.9990)(.9463)(1.0016) = \underline{1979} \text{ MCF/D}$$

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

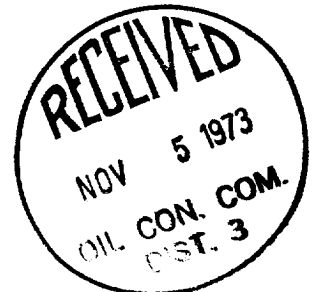
$$Aof = Q \left(\frac{839056}{796207} \right)^n = 1979 (1.0538)^{.85} = 1979 (1.0456)$$

$$Aof = \underline{2069} \text{ MCF/D}$$

Note: Dry gas.

TESTED BY Rhames

WITNESSED BY _____



William D. Welch
 William D. Welch
 Well Test Engineer