

EL PASO NATURAL GAS COMPANY
OPEN FLOW TEST DATA

DATE Oct. 18, 1979

Operator El Paso Natural Gas Company		Lease Mudge 1 A (PM)	
Location SE 21-31-11		County San Juan	State New Mexico
Formation Pictured Cliff		Pool Aztec Ext.	
Casing: Diameter 4.500	Set At: Feet 5153	Tubing: Diameter 1 1/4	Set At: Feet 2587
Pay Zone: From 2438	To 2574	Total Depth: 5153	Shut In 10-3-79
Stimulation Method Sand Water Frac		Flow Through Casing XXX	Flow Through Tubing

Choke Size, Inches .750		Choke Constant: C 12.365	
Shut-In Pressure, Casing, PSIG 738	+ 12 = PSIA 750	Days Shut-In 15	Shut-In Pressure, Tubing PSIG 729
Flowing Pressure: P PSIG 70	+ 12 = PSIA 82	Working Pressure: P _w PSIG 124	+ 12 = PSIA 136
Temperature: T = 50 °F	F _t = 1.010	n = .85	F _{pv} (From Tables) 1.010
		Gravity .670 F _g = .9463	

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

$$Q = (12.365)(82)(1.010)(.9463)(1.010) = 979 \text{ MCF/D}$$

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

$$Aof = Q \left(\frac{562500}{544004} \right)^n = (1.0340)^{.85} (979) = (1.0288)(979)$$

NOTE: Well Blew Dry Gas Throughout Test
and Vented 116 MCF To The Atmosphere.

$$Aof = 1007 \text{ MCF/D}$$

TESTED BY C. Rhames

WITNESSED BY _____

C. R. Wagner
Well Test Engineer

