

EL PASO NATURAL GAS COMPANY
OPEN FLOW TEST DATA

DATE December 30, 1968

Operator El Paso Natural Gas Company		Lease San Juan 28-4 Unit No. 33	
Location 890'S, 990'W, Sec. 33, T-28-N, R-4-W		County Rio Arriba	State New Mexico
Formation Dakota		Pool Basin	
Casing: Diameter 4.500	Set At: Feet 8697	Tubing: Diameter 2.375	Set At: Feet 8626
Pay Zone: From 8484	To 8670	Total Depth: 8697	Shut In 12-21-68
Stimulation Method Sand Water Frac		Flow Through Casing	Flow Through Tubing X

Choke Size, Inches .75		Choke Constant: C 12.365			
Shut-In Pressure, Casing, PSIG 2672	+ 12 = PSIA 2684	Days Shut-In 9	Shut-In Pressure, Tubing PSIG 2672	+ 12 = PSIA 2684	
Flowing Pressure: P PSIG 160	+ 12 = PSIA 172		Working Pressure: P _w PSIG 779	+ 12 = PSIA 791	
Temperature: T = 65 °F F _t = .9952	n = .75		F _{pv} (From Tables) 1.018	Gravity .670 F _g = .9463	

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

$$Q = (12.365)(172)(.9952)(.9463)(1.018) = \underline{2039} \text{ MCF/D}$$

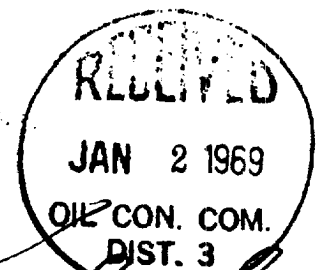
$$\text{OPEN FLOW} = Aof = Q \left(\frac{P_c^2}{P_c^2 - P_w^2} \right)^n$$

$$Aof = \left(\frac{7203856}{6578175} \right)^n = (2039)(1.0951)^{.75} = (2039)(1.0704)$$

Note: Heavy slugs of water and distillate for the first 25 minutes and then a medium fog of water and distillate throughout the remainder of the test.

$$Aof = \underline{2183} \text{ MCF/D}$$

TESTED BY D. Norton

Calculated
WITNESSED BY H. E. McAnally

H. L. Kendrick
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