

EL PASO NATURAL GAS COMPANY
OPEN FLOW TEST DATA

DATE August 23, 1967

Operator El Paso Natural Gas Company		Lease San Juan 27-5 Unit No. 102	
1145'S, 1715'W, Sec. 12, T-27-N, R-5-W		County Rio Arriba	State New Mexico
Well No. 10		Pool Basin	
Casing: Diameter 4.000	Set At: Feet 8264	Tubing: Diameter 2.375	Set At: Feet 7996
Pay Zone: From 1010	To 8220	Total Depth: 8265	Shut In 8-20-67
Stimulation Method Sand Water Frac		Flow Through Casing	Flow Through Tubing X

Choke Size, Inches .50		Choke Constant: C 12.365			
Shut-In Pressure, Casing, PSIG 2470	+ 12 = PSIA 2482	Days Shut-In 8	Shut-In Pressure, Tubing PSIG 2528	+ 12 = PSIA 2540	
Flowing Pressure: P PSIG 320	+ 12 = PSIA 332		Working Pressure: P _w PSIG 1122	+ 12 = PSIA 1134	
Temperature: T = 74 °F	Ft = .9868	n = .75	F _{pv} (From Tables) 1.026	Gravity .615	F _g = .9877

$$\text{CHOKE VOLUME} = Q = C \times P_f \times F_f \times F_g \times F_{pv}$$

$$Q = (12.365)(332)(.9868)(.9877)(1.026) = 4105 \text{ MCF/D}$$

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

$$Aof = \left(\frac{6451600}{5165644} \right)^n = (4105)(1.2489)^{.75} = (4105)(1.1813)$$

NOTE: The well produced a light spray of dist. throughout the test.

$$Aof = 4849 \text{ MCF/D}$$



TESTED BY R. F. Headrick

CALCULATED BY H. E. McAnally

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