

EL PASO NATURAL GAS COMPANY OPEN FLOW TEST DATA

DATE 10/11/72

Operator EL PASO NATURAL GAS COMPANY		Lease Mudge #31	
Location 1293 1400/N, 1100/E, Sec. 23-T31N-R11W		County San Juan	State NM
Formation Pictured Cliffs		Pool Blanco	
Casing: Diameter 2.875	Set At: Feet 2596	Tubing: Diameter No tubing	Set At: Feet
Pay Zone: From 2498	To 2544	Total Depth: 2596	Shut In 10/4/72
Stimulation Method SWF		Flow Through Casing X	Flow Through Tubing

Choke Size, Inches .750	Choke Constant: C 12.365		Tubingless Completion	
Shut-In Pressure, Casing, PSIG 879	+ 12 = PSIA 891	Days Shut-In 7	Shut-In Pressure, Tubing PSIG No tubing	+ 12 = PSIA
Flowing Pressure: P PSIG 196	+ 12 = PSIA 208		Working Pressure: Pw PSIG Calculated	+ 12 = PSIA 255
Temperature: T = 67 °F	Ft = .9933	n = .85	Fpv (From Tables) 1.021	Gravity .635 Fg = .9721

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

$$Q = (12.365)(208)(.9933)(.9721)(1.021) = 2536 \text{ MCF/D}$$

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

$$Aof = \left(\frac{793 \ 881}{728 \ 856} \right)^n = (2536)(1.0892)^{.85} = (2536)(1.0753)$$

$$Aof = 2727 \text{ MCF/D}$$

NOTE: Well produced a light spray of distillate and water throughout test.

TESTED BY Roger Hardy

WITNESSED BY

J. A. Jones
J. A. Jones
Well Test Engineer

