

EL PASO NATURAL GAS COMPANY  
**OPEN FLOW TEST DATA**

DATE August 23, 1978

Operator El Paso Natural Gas Company		Lease Hughes #3-A (PC)	
Location SE 20-29-08		County San Juan	State New Mexico
Formation Pictured Cliffs		Pool Blanco	
Casing: Diameter 4.500	Set At: Feet 5762'	Tubing: Diameter 1 1/4	Set At: Feet 3053'
Pay Zone: From 3020	To 3064	Total Depth: 5762'	Shut In 8-7-78
Stimulation Method Sandwater Frac		Flow Through Casing XXX	Flow Through Tubing

Choke Size, Inches .750		Choke Constant: C 12.365			
Shut-In Pressure, Casing, PSIG 943	+ 12 = PSIA 955	Days Shut-In 16	Shut-In Pressure, Tubing PSIG 943	+ 12 = PSIA 955	
Flowing Pressure: P PSIG 98	+ 12 = PSIA 110		Working Pressure: P <sub>w</sub> PSIG 100	+ 12 = PSIA 112	
Temperature: T = 68 °F	F <sub>t</sub> = .9924	n = .85	F <sub>pv</sub> (From Tables) 1.008	Gravity .670	F <sub>g</sub> = .2463

CHOKE VOLUME = Q = C x P<sub>t</sub> x F<sub>t</sub> x F<sub>g</sub> x F<sub>pv</sub>

Q = 12.365(110)(.9924)(.2463)(1.008) = 1288 MCF/D

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

Aof =  $1288 \left( \frac{912025}{899481} \right)^{.85} = (1.0139)^{.85} = (1.0118)(1288)$

Aof = 1303 MCF/D

Note: Well blew dry gas throughout test.  
 Well vented 166 MCF to the atmosphere during test.

TESTED BY N. Waggoner

WITNESSED BY \_\_\_\_\_

C. R. Wagner  
 Well Test Engineer