

MESA PETROLEUM COMPANY
OPEN FLOW TEST DATA

DATE July 3, 1978

Operator Mesa Petroleum Corp.		Lease Johns Federal #1-A	
Location NW 18-32N-11W		County San Juan	State New Mexico
Formation Mesa Verde		Pool Blanco	
Casing: Diameter 4.500	Set At: Feet 5847'	Tubing: Diameter 2 3/8	Set At: Feet 5697'
Pay Zone: From 4937'	To 5818	Total Depth: 5847'	Shut In 6-26-78
Stimulation Method Sandwater Frac		Flow Through Casing	Flow Through Tubing XX

Choke Size, Inches .750		Choke Constant: C 12.365	
Shut-In Pressure, Casing, PSIG 947	+ 12 = PSIA 959	Days Shut-In 7	Shut-In Pressure, Tubing PSIG 946
Flowing Pressure: P PSIG 327	+ 12 = PSIA 339		+ 12 = PSIA 958
Temperature: T = 80 °F	n = .75	Fpv (From Tables) 1.028	Gravity .650
Ft = .9813		Fg = .9608	

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

$$Q = 12.365(339)(.9813)(.9608)(1.028) = \underline{4063} \text{ MCF/D}$$

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

$$Aof = Q \left(\frac{919681}{265200} \right)^n = (3.4679)^{.75} (4063) = (2.5413)(4063)$$

$$Aof = \underline{10,325} \text{ MCF/D}$$

TESTED BY D. Green- Mesa Petroleum Corp.

WITNESSED BY C.R. Wagner- EPNG



C.R. Wagner
Well Test Engineer