

NEW MEXICO OIL CONSERVATION COMMISSION
GAS WELL TEST DATA SHEET - - SAN JUAN BASIN

(TO BE USED FOR FRUITLAND, PICTURED CLIFFS, MESAVERDE, & ALL DAKOTA
EXCEPT BARKER DOME STORAGE AREA)

70-049-01

Pool Blanco Formation Mesa Verde County San Juan
Purchasing Pipeline El Paso Natural Gas Date Test Filed _____

Operator El Paso Natural Gas Lease Howell Well No. 3-K
Unit B Sec. 15 Twp. 30 Rge. 8 Pay Zone: From 4483 To 5205
Casing: OD 5-1/2 WT. 17 Set At 4430 Tubing: OD 2 WT. 4.6 T. Perf. 4404
Produced Through: Casing _____ Tubing X Gas Gravity: Measured .669 Estimated _____
Date of Flow Test: From 10/30/58 To 11/7/58 * Date S.I.P. Measured 5/22/58
Meter Run Size _____ Orifice Size 1.250 Type Chart _____ Type Taps _____

OBSERVED DATA

Flowing casing pressure (Dwt) _____ psig + 12 = _____ psia (a)
Flowing tubing pressure (Dwt) _____ psig + 12 = _____ psia (b)
Flowing meter pressure (Dwt) _____ psig + 12 = _____ psia (c)
Flowing meter pressure (meter reading when Dwt. measurement taken):
Normal chart reading _____ psig + 12 = _____ psia (d)
Square root chart reading (_____) ² x spring constant _____ = _____ psia (d)
Meter error (c) - (d) or (d) - (c) _____ ± _____ psi (e)
Friction loss, Flowing column to meter:
(b) - (c) Flow through tubing: (a) - (c) Flow through casing _____ = _____ psi (f)
Seven day average static meter pressure (from meter chart):
Normal chart average reading _____ psig + 12 = _____ psia (g)
Square root chart average reading (5.90) ² x sp. const. 15 = 522 psia (g)
Corrected seven day avge. meter press. (p_f) (g) + (e) _____ = 522 psia (h)
P_t = (h) + (f) _____ = 522 psia (i)
Wellhead casing shut-in pressure (Dwt) 1045 psig + 12 = 1057 psia (j)
Wellhead tubing shut-in pressure (Dwt) 789 psig + 12 = 801 psia (k)
+ P_c = (j) or (k) whichever well flowed through _____ = 1057 psia (l)
Flowing Temp. (Meter Run) 67 °F + 460 _____ = 527 °Abs (m)
P_d = 1/2 P_c = 1/2 (l) _____ = 529 psia (n)

FLOW RATE CALCULATION

Q = _____ X $\left(\frac{\sqrt{(c)}}{\sqrt{(d)}} \right)^n = \underline{1210}$ MCF/day
(Integrated)

DELIVERABILITY CALCULATION

D = Q 1210 $\left[\frac{P_c^2 - P_d^2}{P_c^2 - P_w^2} \right]^n = \underline{1229}$ MCF/day
837408 819788 1.0214 1.0160

SUMMARY

P_c = 1057 psia Company El Paso Natural Gas
Q = 1210 Mcf/day By _____ Original Signed
P_w = 545 psia Title _____
P_d = 529 psia Witnessed by _____
D = 1228 Mcf/day Company _____

* This is date of completion test.
* Meter error correction factor

REMARKS OR FRICTION CALCULATIONS

GL	(1-e ^{-S})	(F _c Q) ²	(F _c Q) ² (1-e ^{-S}) R ²	P _t ² (Column i)	P _t ² + R ²	P _w
2946	.193	129.413	24.977	272,484	297,461	545

+ SIPC used for P_c (Highest). Tubing Perf. on 10/10/58

D at 500 = 1221

OTC

