

Initial Deliverability
Test

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)

Pool BLANCO Formation MESAVERDE County RIO ARriba
Purchasing Pipeline PACIFIC NORTHWEST PIPELINE CORP. Date Test Filed SEPT. 2, 1959
Operator OCCIDENTAL PETROLEUM CORP. Lease "K" Well No. 2-27
Unit K Sec. 27 Twp. 26N Rge. 3W Pay Zone: From 6140 To 6256
Casing: OD 7-5/8 WT. 26.40 Set At 4206 Tubing: OD 2-3/8 WT. 4.7 T. Perf. 6110
Produced Through: Casing _____ Tubing X Gas Gravity: Measured .673 Estimated _____
Date of Flow Test: From 3-30-59 To 4-7-59 * Date S.I.P. Measured 12-23-58
Meter Run Size 4.067 Orifice Size 0.250 Type Chart L-10 Type Taps F1.

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 483 psig + 12 = 495 psia (g)
Square root chart average reading (_____)² x sp. const. _____ = _____ psia (g)
Corrected seven day avge. meter press. (p_f) (g) + (e) _____ = 495 psia (h)
P_t = (h) + (f) _____ = 495 psia (i)
Wellhead casing shut-in pressure (Dw) _____ psig + 12 = _____ psia (j)
Wellhead tubing shut-in pressure (Dwt) 1169 psig + 12 = 1181 psia (k)
P_c = (j) or (k) whichever well flowed through _____ = 1181 psia (l)
Flowing Temp. (Meter Run) 44 °F + 460 _____ = 504 °Abs (m)
P_d = ½ P_c = ½ (l) _____ = 590 psia (n)

FLOW RATE CALCULATION

$$Q = \frac{\text{(integrated)}}{\text{(integrated)}} \times \left(\frac{\sqrt{P_c} - \sqrt{P_d}}{\sqrt{P_c} - \sqrt{P_w}} \right) = \text{_____ MCF/day}$$

DELIVERABILITY CALCULATION

$$D = Q \times \left[\frac{P_c^2 - P_d^2}{P_c^2 - P_w^2} \right]^n = \text{_____ MCF/day}$$

30 1,046,661 0.9320 28
1,149,715 (0.9104)ⁿ

SUMMARY

P_c = 1181 psia Company OCCIDENTAL PETROLEUM CORP.
Q = 30 Mcf/day By M. B. JONES MB JONES, NORTHWEST PRODUCTION
P_w = 495 psia Title AGENT CORP.
P_d = 590 psia Witnessed by _____
D = 28 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
4112	0.258	0.080	21	245,025	245,046	495.0

F_c = 9.402

