

OCC Artes
Bill Grier
1-Galloway
2-Galloway
1-Smith
2-File

Internal Deliverability
Test

Form C-122-A
Revised April 20, 1955

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 Mesa Verde County Rio Arriba
Purchasing Pipeline PACIFIC NORTHWEST PIPELINE Date Test Filed 10-21-58
Operator PACIFIC NORTHWEST PIPELINE Lease San Juan 29-5 Well No. 28-20
Unit N Sec. 20 Twp. 29N Rge. 5W Pay Zone: From 6008' To 5468'
Casing: OD 5 1/2" WT. Set At 6087' Tubing: OD 1 1/2" WT. 2.44 T. Perf. 5992'
Produced Through: Casing Tubing xxx Gas Gravity: Measured .680 Estimated
Date of Flow Test: From 9-7-58 To 9-15-58 * Date S.I.P. Measured 6-24-58
Meter Run Size Orifice Size 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): 463
Normal chart average reading psig + 12 = 475 psia (g)
Square root chart average reading () ² x sp. const. = 475 psia (g)
Corrected seven day avge. meter press. (p_f) (g) + (e) = 475 psia (h)
P_t = (h) + (f) = 475 psia (i)
Wellhead casing shut-in pressure (Dwt) 1091 psig + 12 = 1103 psia (j)
Wellhead tubing shut-in pressure (Dwt) 1091 psig + 12 = 1103 psia (k)
P_c = (j) or (k) whichever well flowed through = 1103 psia (l)
Flowing Temp. (Meter Run) 70 °F + 460 = 530 ° Abs (m)
P_d = 1/2 P_c = 1/2 (l) = 551.5 psia (n)

Q = 871 X $\left(\frac{\text{FLOW RATE CALCULATION}}{\frac{\sqrt{(c)}}{\sqrt{(d)}}} = \frac{\text{ }{\text{ }}}{\text{ }} = \text{ } \right) = \text{ } \text{MCF/da}$
(Integrated)

DELIVERABILITY CALCULATION

D = Q 871 $\left[\frac{P_c^2 - P_d^2}{P_c^2 - P_w^2} \right]^{.75} = \frac{912,457}{873,264}^{.75} = \frac{901}{1.034} \text{MCF/da.}$

SUMMARY

P_c = 1103 psia
Q = 871 Mcf/day
P_w = 586 psia
P_d = 551.5 psia
D = 901 Mcf/day

Company PACIFIC NORTHWEST PIPELINE
By Original signed by G. H. Peppin
Title District Production Engineer
Witnessed by
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
4075	0.256	459.845	117.720	223.673	343.345	586



