

ILLECIBLE

NEW MEXICO OIL CONSERVATION COMMISSION

Form C-122

Revised 12-1-55

MULTI-POINT BACK PRESSURE TEST FOR GAS WELLS

AB 000

Pictured 01/1/56

San Juan

Pool 1 Formation 1 County 1 4/1/59
Initial 1 Annual 1 Special 1 Date of Test 1
Company 0 12 30-41 Lease 11 Well No. 1
Unit 1.5 Sec. 9.5 Twp. 1.090 Rge. 2596 Purchaser 2576 2614
Casing 1" Wt. 1.7 I.D. 1.049 Set at 2614 Perf. 2609 To 2619
Tubing 1" Wt. 2576 I.D. 2614 Set at 2609 Perf. 2576 To 1
Gas Pay: From 1 To 1 L 1 xG 1 -GL 1 Bar. Press. Single Gas
Producing Thru: Casing 1 Tubing 1 Type Well Single-Bradenhead-G. G. or G.O. Dual
Date of Completion: 1 Packer 1 Reservoir Temp. 1

OBSERVED DATA

Tested Through (Prover) (Choke) (Meter) Type Taps 1

Flow Data						Tubing Data		Casing Data		Duration of Flow Hr.
No.	(Prover) (Line) Size	(Choke) (Orifice) Size	Press. psig	Diff. h _w	Temp. °F.	Press. psig	Temp. °F.	Press. psig	Temp. °F.	
SI		.750				592 g 134	2 F. -	952 g 156	2 F. 60	3
1.										
2.										
3.										
4.										
5.										

FLOW CALCULATIONS

No.	Coefficient (2/h _w)	√ h _w P _f	Pressure psia	Flow Temp. Factor	Gravity Factor	Compress. Factor	Rate of Flow Q-MCFPD @ 14.7 psia
	12.395		178	1.000	.968	1.016	2119
1.							
2.							
3.							
4.							
5.							

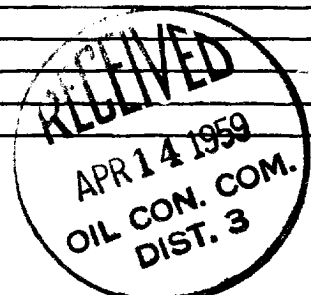
PRESSURE CALCULATIONS

Gas Liquid Hydrocarbon Ratio 1 cf/bbl. Specific Gravity Separator Gas .650
Gravity of Liquid Hydrocarbons 1 deg. Specific Gravity Flowing Fluid 1
F_c 1 (1-e^{-S}) P_c 1 P_c 1

No.	P _w P _t (psia)	P _t ²	F _c Q	(F _c Q) ²	(F _c Q) ² (1-e ^{-S})	P _c ²	P _c ² - P _w ²	Cal. P _w	P _w P _c
1.	106					3016	327,509		
2.									
3.									
4.									
5.			2362			.95			

Absolute Potential 1 MCFPD; n 1
COMPANY BOX 700, ALBUQUERQUE, NEW MEXICO
ADDRESS Donald L. Bryant Engineer
AGENT and TITLE 1
WITNESSED 1
COMPANY 1

REMARKS



2.

The log log paper used for plotting the back pressure curve shall be of at least three inch cycles.

Q = Actual rate of flow at end of flow period at W. H. working pressure (P_w).
MCF/da. @ 15.025 psia and 60° F.

P_c = 72 hour wellhead shut-in casing (or tubing) pressure whichever is greater.
psia

P_w = Static wellhead working pressure as determined at the end of flow period.
(Casing if flowing thru tubing, tubing if flowing thru casing.) psia

P_t = Flowing wellhead pressure (tubing if flowing through tubing, casing if
flowing through casing.) psia

P_f = Meter pressure, psia.

h_w = Differential meter pressure, inches water.

F_g = Gravity correction factor.

F_t = Flowing temperature correction factor.

F_{pv} = Supercompressibility factor.

n = Slope of back pressure curve.

Note: If P_w cannot be taken because of manner of completion or condition of well, then P_w must be calculated by adding the pressure drop due to friction within the flow string to P_f .

[illegible]