

NEW MEXICO OIL CONSERVATION COMMISSION
MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Form C-122
Revised 9-1-65

RECEIVED

SEP 5 1975

Type Test ☒ Initial ☐ Annual ☐ Special				Test Date 8-26-75		SEP 5 1975	
Company PENROC OIL CORP.				Connection NONE		O.C.C. ARTESIA, OFFICE	
Pool UNDESIGNATED				Formation MORROW		Unit	
Completion Date 8-26-75		Total Depth 11,154		Plug Back TD 10,980		Elevation 3323 ft.	
Csg. Size 4 1/2		Wt. 11.6 & 13.5		Set At 11,154		Perforations: 10,882 To 10,894	
Thq. Size 2 3/8		Wt. 4.7		Set At 10,767		Perforations: OPEN To END	
Type Well - Single - Bradenhead - G.G. or G.O. Multiple Single				Packer Set At 10,767		County Eddy	
Producing Thru TBG		Reservoir Temp. °F 168° 10,940		Mean Annual Temp. °F		Baro. Press. - P _a N.M.	
L 10,767		H 10,767		G _g .620		% CO ₂ % N ₂ % H ₂ S Prover Meter Run Taps 3" Flg.	

FLOW DATA						TUBING DATA		CASING DATA		Duration of Flow	
NO.	Prover Line Size	X	Orifice Size	Press. p.s.i.g.	Diff. h _w	Temp. °F	Press. p.s.i.g.	Temp. °F	Press. p.s.i.g.		Temp. °F
SI							3360				72 Hr.
1.	3 x 1.250			585	17.64	118	2910				1 "
2.	3 x 1.250			600	20.25	107	2805				1 "
3.	3 x 1.250			610	34.81	86	2560				1 "
4.	3 x 1.250			620	67.24	72	2110				1 "
5.											

RATE OF FLOW CALCULATIONS							
NO.	Coefficient (24 Hour)	$\sqrt{h_w P_m}$	Pressure P _m	Flow Temp. Factor Ft.	Gravity Factor F _g	Super Compress. Factor, F _{pv}	Rate of Flow Q, Mcfd
1	7.577	102.72	598.2	.9485	1.270	1.036	971
2	7.577	111.43	613.2	.9577	1.270	1.037	1065
3	7.577	147.29	623.2	.9759	1.270	1.049	1451
4	7.577	206.34	633.2	.9887	1.270	1.056	2073
5							

NO.	P _r	Temp. °R	T _r	Z	Gas Liquid Hydrocarbon Ratio	Mcf/bbl.
1.	.89	578	1.58	.932	A.P.I. Gravity of Liquid Hydrocarbons	49.7 @ 60°
2.	.91	567	1.55	.930	Specific Gravity Separator Gas	.620
3.	.93	546	1.50	.908	Specific Gravity Flowing Fluid	X X X X X
4.	.94	532	1.46	.896	Critical Pressure	671 P.S.I.A.
5.					Critical Temperature	365 R

P _c 3373.2 P _c ² 11,378.5				
NO.	P _r ²	P _w	P _w ²	P _c ² - P _w ²
1		2929.4	8581.4	2797.1
2		2825.6	7984.0	3394.5
3		2586.8	6691.5	4687.0
4		2154.4	4641.4	6737.1
5				

(1) $\frac{P_c^2}{P_c^2 - P_w^2} = 1.689$

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 3.439$

(2) $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 1.659$

Absolute Open Flow	3,439 Mcfd @ 15.025	Angle of Slope θ	46	Slope, n	.966
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Remarks: **Made 2.45 BBLs condensate during test**

Approved By Commission:	Conducted By: R. Pagan	Calculated By: R. Reston	Checked By:
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