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O. C. D.

NEW MEXICO OIL CONSERVATION COMMISSION

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Form C-122
Revised 9-1-65

Type Test ☒ Multi-Point ☐ Artesia, Office ☐ Annual ☐ Special		Test Date 6-2-86	
Company SANTA FE ENERGY		Connection LANO	
Pool SOUTH CARLSBAD		Formation WOLFCAMP	
Completion Date 9-20-85		Total Depth 12018	
Well Size 5.0		Well No. 1	
Well Size 2.6750		Well No. K 28 22S 27E	
Type Well - Single - Blindhead - G.G. or G.O. Multiple SINGLE		Packer Set At 8468'	
Producing Thru TUBING		State NEW MEXICO	
Reservoir Temp. °F 188		Mean Annual Temp. °F 60°	
Baro. Press. - P _a 13.2		Prover 0	
L 9021		H 9021	
C _g 0.685		% CO ₂ 0.29	
% N ₂ 1.03		% H ₂ O 0	
Motor Run 3.1		Taps FLANGE	

FLOW DATA						TUBING DATA		CASING DATA		Duration of Flow	
NO.	Prover Line Size	X	Orifice Size	Press. p.s.i.g.	Diff. In. H ₂ O	Temp. °F	Press. p.s.i.g.	Temp. °F	Press. p.s.i.g.		Temp. °F
51							2639	92	3556	188	168.0
1.	3.07	X	0.500	625	9.0	87	2520	89	3457	188	1.0
2.	3.07	X	0.500	630	21.0	76	2355	89	3415	188	1.0
3.	3.07	X	0.500	625	34.0	68	2085	86	3372	188	1.0
4.	3.07	X	0.500	625	48.5	64	1810	85	3319	188	1.0
5.											

RATE OF FLOW CALCULATIONS							
NO.	Coefficient (24 Hour)	$\sqrt{h_w P_m}$	Pressure P _m	Flow Temp. Factor F _t	Gravity Factor F _g	Super Compress. Factor, F _{pv}	Rate of Flow Q, Mcfd
1	1.18	75.79	638.2	0.9750	1.2087	1.0605	112
2	1.18	116.22	643.2	0.9850	1.2087	1.0656	174
3	1.18	147.31	638.2	0.9924	1.2087	1.0694	224
4	1.18	175.93	638.2	0.9962	1.2087	1.0717	269
5							

NO.	P _r	Temp. °R	T _r	Z	Gas Liquid Hydrocarbon Ratio	A.P.I. Gravity of Liquid Hydrocarbons	Specific Gravity Separator Gas	Specific Gravity Flowing Fluid	Critical Pressure	Critical Temperature
1	0.96	547	1.43	0.889	52.421	0	0.685	XXXXXX	668	382
2	0.96	536	1.40	0.881				XXXXXX	664	406
3	0.96	528	1.38	0.874						
4	0.96	524	1.37	0.871						
5										

NO.	P _r ²	P _w ²	P _r ² - P _w ²	(1) $\frac{P_c^2}{P_r^2 - P_w^2} = 7.2211$	(2) $\left[\frac{P_c^2}{P_r^2 - P_w^2} \right]^n = 7.2211$
1	2582	6666	421		
2	2548	6493	595		
3	2514	6318	770		
4	2471	6106	981		
5					

Absolute Open Flow 1940 Mcfd @ 15.025
 Angle of Slope @ 45.0
 Slope, n 1.000

Remarks: MEASURE WITH AMERADA PRESSURE ELEMENTS

Approved By Commission	Conducted By BENNETT & CATHEY	Calculated By RICHARD TOWNLEY	Checked By
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