

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

Form C-122
Revised 9-1-65

RECEIVED

Type Test: <input checked="" type="checkbox"/> Initial <input type="checkbox"/> Annual <input type="checkbox"/> Special		Test Date 12-26-74		DEC 31 1974	
Company Monsanto Company			Connection None		O. C. C. ARTESIA OFFICE
Pool Burton Flat			Formation Morrow		Unit 0
Completion Date 12-26-74		Total Depth 11,560		Plug Back TD 11,500	Elevation 3235 KB
Farm or Lease Name Burton Flat Deep Unit					
Casing Size 5 1/2	Wt. 17#	d 4.892	Set At 11,560	Perforations: From 11,412 To 11,416	
Well No. 13					
Casing Size 2 7/8 LUL	Wt. 6.5	d 2.331	Set At 11,175	Perforations: From To	
Unit 0 28 28 20-S 28-E					
Type Well - Single - Bradenhead - G.G. or G.O. Multiple Single				Packer Set At 11,175	County Eddy
Producing Thru Tubing		Reservoir Temp. °F 158 @ 11,560	Mean Annual Temp. °F 60	Baro. Press. - P _a 13.2	State New Mexico
L 11414	H 11414	G _g .610	% CO ₂	% N ₂	% H ₂ S
Prover				Meter Run X	Taps

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
1.	4.0		1.75	210	17.5	70	1140	50			1 Hr
2.	4.0		1.75	190	5.0	80	689	53			1 Hr
3.	4.0		1.75	195	8.0	85	579	54			1 Hr
4.	4.0		1.75	210	12.0	88	476	65			1 Hr
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	14.93	62.498	223.2	.9905	1.2804	1.020	1207
2	14.93	31.874	203.2	.9813	1.2804	1.016	607
3	14.93	40.811	208.2	.9768	1.2804	1.016	774
4	14.93	51.753	223.2	.9741	1.2804	1.017	980
5							

NO.	P _r	Temp. °R	T _r	Z	Gas Liquid Hydrocarbon Ratio	None Produced	Met/Std.
1	.33	530	1.46	.962	A.P.I. Gravity of Liquid Hydrocarbons		Dec.
2	.30	540	1.49	.968	Specific Gravity Separator Gas .601		XXXXXXXXXX
3	.31	545	1.51	.969	Specific Gravity Flowing Fluid XXXXX		
4	.33	548	1.51	.967	Critical Pressure 671 P.S.I.A.		671 P.S.I.A.
5					Critical Temperature 362 R		362 R

NO.	P _r ²	P _w	P _w ²	P _c ² - P _w ²
1	2855.2	1159.8	1345	6807
2		705.2	497	7655
3		598.1	358	7794
4		500.9	251	7901
5				

(1) $\frac{P_c^2}{P_c^2 - P_w^2} = \frac{8152}{6807}$ (2) $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 1.1975$

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 1445$

checked 1-17-75

Absolute Open Flow 1445 Mcfd @ 15.025 Angle of Slope @ 45° Slope, n 1.0

Remarks: Well Shut-In 46 Hours prior to start of this test.
Choke Sizes 12/64"; 16/64"; 20/64" & 24/64".

Approved by Commission:	Conducted By: R G Roberson WEST TEXAS CONSULTING SERVICE, INC.	Calculated By: H L Hagler	Checked By:
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