

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Type Test ☒ Initial ☐ Annual ☐ Special				Test Date 2-6-81	
Company Southland Royalty Company				Connection Southern Union Gathering	
Pool Blanco				Formation Mesa Verde	
Completion Date 1-27-81		Total Depth 7192'		Plug Back TD 7170'	
				Elevation 6089' GR	
Farm or Lease Name Grenier "A"					
Csg. Size 7.625 5.500		Wt. 26.40# 15.5#		Perforations: From To	
Tbg. Size 1.900		Wt. 2.76#		Perforations: From 4282' To 4947'	
Type Well - Single - Bradenhead - G.G. or G.O. Multiple Dual - GG				Packer Set At 4983'	
Producing Thru tbg				Baro. Press. - P _g 12.2	
Reservoir Temp. °F p				State New Mexico	
L		H		Gg	
				.700	
				% CO ₂	
				% N ₂	
				% H ₂ S	
				Prover	
				Meter Run	
				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.	
SI							1004		1002	
1.	2" x 3/4"						202		718	1 hr.
2.							121		680	2 hrs.
3.							119		672	3 hrs.
4.										
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	12.365		131.2	1.0000	.9258	1.0000	1502
2.							
3.							
4.							
5.							

NO.	P _f	Temp. °R	T _f	Z	Gas Liquid Hydrocarbon Ratio _____ Mcf/bbl.
1.					A.P.I. Gravity of Liquid Hydrocarbons _____ Deg.
2.					Specific Gravity Separator Gas _____ XXXXXX
3.					Specific Gravity Flowing Fluid _____ XXXXXX
4.					Critical Pressure _____ P.S.I.A. _____ P.S.I.A.
5.					Critical Temperature _____ R _____ R

NO.	P _i ²	P _w	P _w ²	P _c ² - P _w ²
1		684.2	468129.6	564532.8
2				
3				
4				
5				

(1) $\frac{P_c^2}{P_c^2 - P_w^2} = 1.8292$

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 2362$

(2) $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 1.5729$

Absolute Open Flow _____ 2362 _____ Mcfd @ 15.025	Angle of Slope @ _____	Slope, n _____ 75 _____
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Remarks: _____ Misty H₂O and trace of oil throughout test.

Approved By Division _____	Conducted By: Kelly Maxwell	Calculated By: James Smith	Checked By: L.O. Van Ryan
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