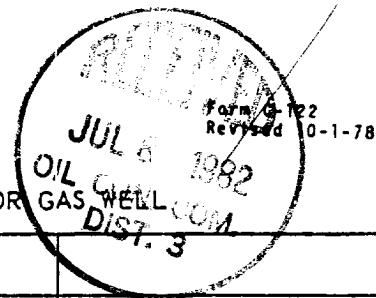


STATE OF NEW MEXICO
ENERGY AND MINERALS DEPARTMENT

OIL CONSERVATION DIVISION

P. O. BOX 2088
SANTA FE, NEW MEXICO 87501



MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS

Type Test ☒ Initial ☐ Annual ☐ Special				Test Date 6-24-82	
Company Southland Royalty Company			Connection Southern Union Gathering		
Pool Bloomfield			Formation Chacra		Unit
Completion Date 6-18-82		Total Depth 3220'		Plug Back TD 3190'	Elevation 5884' GL
Farm or Lease Name Cain					
Csg. Size 2.875	Wt. 6.5#	d 2.441	Set At 3212'	Perforations: From 3002' To 3127'	
Well No. 23					
Tbg. Size ---	Wt. ---	d ---	Set At ---	Perforations: From To	
Unit A	Sec. 16	Twp. 28N	Rge. 10W		
Type Well - Single - Bradenhead - G.G. or G.O. Multiple Single				Packer Set At ---	
Producing Thru Casing		Reservoir Temp. °F @		Mean Annual Temp. °F 12.2	
Baro. Press. - P _a 12.2		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									933	
1.	2"	X	3/4"						332	1 hr
2.									198	2 hrs
3.									169	3 hrs
4.										
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, Mc/d
1	12.365		181.2	1.0000	.9258	1.0000	2074
2.							
3.							
4.							
5.							

NO.	P _r	Temp. °R	T _r	Z	Gas Liquid Hydrocarbon Ratio _____ Mcf/bbl.	
1					A.P.I. Gravity of Liquid Hydrocarbons _____ Deg.	
2.					Specific Gravity Separator Gas _____ XXXXXXXXXX	
3.					Specific Gravity Flowing Fluid _____ XXXXX	
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 _i ² - P _w ²
1	945.2	181.2	32833.4	860569.6
2				
3				
4				
5				

(1) $\frac{P_c^2}{P_i^2 - P_w^2} = 1.0382$

(2) $\left[\frac{P_i^2}{P_i^2 - P_w^2} \right]^n = 1.0285$

AOF = Q $\left[\frac{P_i^2}{P_i^2 - P_w^2} \right]^n = 2133$

Absolute Open Flow 2133 Mc/d @ 15.025

Angle of Slope ϕ _____

Slope, n .75

Remarks: _____

Approved By Division	Conducted By: Steve Kellenaers	Calculated By: James Smith	Checked By: R. E. Fielder
----------------------	-----------------------------------	-------------------------------	------------------------------