

OIL CONSERVATION DIVISION

STATE OF NEW MEXICO
ENERGY AND MINERALS DEPARTMENTP. O. BOX 2088
SANTA FE, NEW MEXICO 87501Form C-122
Revised 10-1-78

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Type Test ☒ Initial ☐ Annual ☐ Special						Test Date 2-3-81			
Company El Paso Natural Gas Company				Connection El Paso Natural Gas Company					
Pool Blanco				Formation Mesa Verde				Unit San Juan 27-5	
Completion Date 1-27-81		Total Depth 5966		Plug Back TD 5949		Elevation 6540 G.L.		Farm or Lease Name San Juan 27-5 Unit	
Csq. Size 7.000	Wt. 20.0	d 6.456	Set At 3709	Perforations: From 5045 To 5907		Well No. #52A			
Tbg. Size 2.375	Wt. 4.7	d 1.995	Set At 5894	Perforations: From To		Unit Sec. Twp. Rge. E 4 27 5			
Type Well - Single - Bradenhead - G.G. or G.O. Multiple G. G. Dual						Packer Set At 3603		County Rio Arriba	
Producing Thru Tbg.		Reservoir Temp. °F β		Mean Annual Temp. °F		Baro. Press. - P _a 12		State New Mexico	
L	H	Gg 0.65	% 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.	Temp. °F	
SI							978				7 Days
1.	Choke	0.750		322		60					3 Hours
2.											
3.											
4.											
5.											

RATE OF FLOW CALCULATIONS							
NO.	Coefficient (24 Hour)	$\sqrt{h_w P_m}$	Pressure P _m	Flow Temp. Factor Ft	Gravity Factor Fg	Super Compress. Factor Fpv	Rate of Flow Q, Mcfd
1	12.365		334	1.000	0.9608	1.038	4119
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 _____ X X X X X X X X			
3.					Specific Gravity Flowing Fluid _____ X X X X X			
4.					Critical Pressure _____ P.S.I.A. _____ P.S.I.A.			
5.					Critical Temperature _____ R _____ R			

P _c 990		P _c ² 980100			
NO.	P _f ²	P _w	P _w ²	P _c ² - P _w ²	
1	111556	690	476100	504000	
2					
3					
4					
5					

(1) $\frac{P_c^2}{P_c^2 - P_w^2} = 1.9446$

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 6783$

(2) $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 1.6468$

Absolute Open Flow 6783 Mcfd @ 15.025		Angle of Slope 0.75	
---------------------------------------	--	---------------------	--

Remarks: * 4.500 Liner from 3592 to 5966. Gas Vented = 540 MCF

Approved By Division	Conducted By: Mel Wileman	Calculated By: H. E. McAnally	Checked By:
----------------------	------------------------------	----------------------------------	-------------