

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Type Test ☒ Initial ☐ Annual ☐ Special						Test Date 10-02-80			
Company Caulkins Oil Company				Connection					
Pool Otero Chacra- Blanco Mesa Verde				Formation Commingled Chacra - Mesa Verde				Unit	
Completion Date 9-25-80		Total Depth 7389		Plug back TD 7389		Elevation 6465		Farm or Lease Name Breech A	
Gas. Size 7" & 4 1/2"	Wt. 23# 11.6	d 6.366 4.000	Set At 6591 6532-7389	Perforations: From 3744 To 5276		Well No. 204E			
Tub. Size 1 1/4"	Wt. 2.3	d 1.380	Set At 5160	Perforations: From 5160 To		Unit Sec. Twp. Rge. L 9 26N 6W			
Type Well - Single - Bradenhead - G.G. or G.O. Multiple Gas - Gas Multiple				Packer Set At 5322		County Rio Arriba			
Producing Thru Tubing		Reservoir Temp. °F		Mean Annual Temp. °F		Baro. Press. - P _a		State New Mexico	
L	H	Gg	% CO ₂	% N ₂	% H ₂ S	Prover	Meter Run	Tape	

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
51							1201		1353		7 Days
1.							81		673		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 F _t	Gravity Factor F _g	Super Compress. Factor F _{pv}	Rate of Flow Q, Mcfd
1	14.1605		93	1.000	1.000	1.000	1.317
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

P _c 1365	P _c ² 1,863,225		
NO.	P _i ²	P _w	P _i ² - P _w ²
1		685	469,225
2.			
3.			
4.			
5.			

$$(1) \frac{P_c^2}{P_i^2 - P_w^2} = 1.337$$

$$(2) \left[\frac{P_c^2}{P_i^2 - P_w^2} \right]^n = 1.2431$$

$$AOF = Q \left[\frac{P_i^2}{P_i^2 - P_w^2} \right]^n = 1.637$$

Absolute Open Flow	1,637	Mcf/d @ 15.025	Angle of Slope @	75	Slope, n
Remarks: 40% of all gas to Chacra zone 60% of all gas to Mesa Verde zone					
Approved By Division	Conducted By:	Calculated By:	Checked By:		