

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Revised 9-1-65

Type Test ☒ Initial ☐ Annual ☐ Special						Test Date 2-20-72	
Company Continental Oil Company				Connection Unconnected			
Pool Undesignated				Formation Mesa Verde		Unit OIL CON. COM. DIST. 3	
Completion Date 2-20-72		Total Depth 5325' RB		Plug Back TD 5290' RB		Elevation 6674' GRD	
Csg. Size 5.500		Wt. 14#		Set At 5324' RB		Perforations: From 4989' To 5214' RB	
Tub. Size 2.375"		Wt. 4.70#		Set At 4930' GRD		Perforations: From To	
Type Well - Single - Fractured - G.G. or G.O. Multiple Gas-Gas Dual						Packer Set At 4930' GRD	
Producing Thru Tubing		Reservoir Temp. °F 113° 5101' RB		Mean Annual Temp. °F 50°		Baro. Press. - P _a 12.2	
L 4930		H 4930		Gg .680		% CO ₂ --	
				% N ₂ ---		% H ₂ S ---	
3/4" Choke Nipple							

FLOW DATA							TUBING DATA		CASING DATA		Duration of Flow
NO.	Prover Line Size	X	Orifice Size	Press. p.s.i.g.	Diff. hw	Temp. °F	Press. p.s.i.g.	Temp. °F	Press. p.s.i.g.	Temp. °F	
SI							1237	50°			SI 7 Days
1.	3/4" Choke Nipple			27		52°	27	52			3 Hrs.
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 F _g	Super Compress. Factor, F _{pv}	Rate of Flow Q, Mcfd
1	9.604		39.2	1.008	1.087	1.008	416
2							
3							
4							
5							

NO.	P _r	Temp. °R	T _r	Z	Gas Liquid Hydrocarbon Ratio	A.P.I. Gravity of Liquid Hydrocarbons	Specific Gravity Separator Gas	Specific Gravity Flowing Fluid	Critical Pressure	Critical Temperature
1	.0958	553	1.263	.984	17,958	49	.680	.847		
2				(Est.)						
3										
4										
5										

NO.	P _r	P _w	P _r ²	P _w ²	P _r ² - P _w ²	(1) $\frac{P_r^2}{P_r^2 - P_w^2} =$	(2) $\left[\frac{P_r^2}{P_r^2 - P_w^2} \right]^n =$
1	1.527	76.1	5.795	1.555		1.0038	1.0028
2							
3							
4							
5							

Absolute Open Flow 417 Mcfd @ 15.025				Angle of Slope °		Slope, n .75	
Remarks: Estimated 3 bbls. oil in 3 hrs.							
Approved By Commission:		Conducted By:		Calculated By:		Checked By:	
		E. B. Errett		E. B. Errett		D. B. Barnes	

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

Revised 9-1-65

RECEIVED

MAR 10 1972

OIL CON. COM.
DIST. 3

Type Test ☒ Initial ☐ Annual ☐ Special						Test Date 2-20-72					
Company Continental Oil Company						Connection Unconnected					
Pool Otero						Formation Chacra					
Completion Date 2-20-72			Total Depth 5325' KB			Plug Back TD 5259' KB		Elevation 6674' GR		Farm or Lease Name AXI Apache "J"	
Csg. Size 5.5	Wt. 14#	d 5.012	Set At 5324' RB	Perforations: From 3726' To 3748' RB				Well No. 24			
Tbg. Size 1.66"	Wt. 2.40	d 1.380	Set At 3745' GR	Perforations: From To				Unit P	Sec. 8	Twp. 25	Rge. 5
Type Well - Single - Bradenhead - G.G. or G.O. Multiple Gas-Gas Dual						Packer Set At 4930' GR		County Rio Arriba			
Producing Thru Tubing			Reservoir Temp. °F 96° @ 3737' RB		Mean Annual Temp. °F 50°		Baro. Press. - P _a 12.2		State New Mexico		
L 3745	H 3745	Gg .680	% CO ₂ ---	% N ₂ ---	% H ₂ S ---	XXXXX XXXXX XXXXX 3/4" Choke Nipple					

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							615		650		SI 7 Days
1.	3/4" Choke Nipple			45		50	45	50	311		3 Hrs.
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	9.604		57.2	1.010	1.213	1.000	674
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 .680 XXXXXXXXXX
3.					Specific Gravity Flowing Fluid XXXXXX .680
4.					Critical Pressure _____ P.S.I.A. _____ P.S.I.A.
5.					Critical Temperature _____ R _____ R

P _c 662.2 P _c ² 438.5				(1) $\frac{P_c^2}{P_c^2 - P_w^2} = \underline{\underline{1.3129}}$	(2) $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = \underline{\underline{1.2265}}$
NO.	P _c ²	P _w ²	P _c ² - P _w ²		
1		323.2	104.5		
2					
3					
4					
5					

$ADP = Q \left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = \underline{\underline{827}}$

Absolute Open Flow 827 Mcfd @ 15.025	Angle of Slope θ _____	Slope, n .75
---	-------------------------------	---------------------

Remarks: _____

Approved By Commission:	Conducted By: E. B. Errett	Calculated By: E. B. Errett	Checked By: D. B. Barnes
-------------------------	--------------------------------------	---------------------------------------	------------------------------------