

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

REVISED 9-1983

dsf
File

Type Test ☒ Initial ☐ Annual ☐ Special						Test Date 6-27-84		RECEIVED BY JUL 30 1984	
Company TXO PRODUCTION COMPANY ✓						Connection Delhi		O. C. D.	
Pool E. Burton Flat Woman						Formation Manure		Unit ARTESIA, OFFICE	
Completion Date 6-27-84		Total Depth 11,874'		Plug Back TD 11,731'		Elevation 3272.6		Farm or Lease Name Williamson Fed. "A"	
Cas. Size 4 1/2"	Wt. 11.6	d	Set At 11,876'	Perforations: From 11,412 To 11,500		Well No. 3			
Thg. Size 2 3/8"	Wt. 4.7	d	Set At 11,395'	Perforations: From Open To		Unit L 8/16		Sec. Twp. Rge. 20S 29E	
Type Well - Single - Brdenhead - G.C. or G.O. Multiple SINGLE						Packer Set At 11,395'		County Eddy	
Producing Thru Tubing		Reservoir Temp. °F 188° @ 11,395'		Mean Annual Temp. °F 60°		Baro. Press. - P _a 13.2		State New Mexico	
L 11,395	H 11,395	G _g .6182	% CO ₂ .636	% N ₂ .303	% H ₂ S	Prover	Meter Run 3,082	Taps Flange	

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							3227		PKR	CHOKE	24 Hrs
1.	3	x	1.500	610	4"	86°	2690			8/64	1 Hr.
2.	3	x	1.500	615	7.84	67	2320			11/64	1 Hr.
3.	3	x	1.500	640	11.6	49	1822			14/64	1 Hr.
4.	3	x	1.500	655	30.3	69	1075			18/64	1 Hr.
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	11.13	49.93	623.2	.9759	1.272	1.048	723
2	11.13	70.18	628.2	.9933	1.272	1.056	1042
3	11.13	87.05	653.2	1.011	1.272	1.065	1327
4	11.13	142.29	668.2	.9915	1.272	1.059	2115
5							

NO.	P _r	Temp. °R	T _r	Z	Gas Liquid Hydrocarbon Ratio	Mcf/bbl.
1	.93	546	1.51	.910	24.106	
2	.94	527	1.46	.897	A.P.I. Gravity of Liquid Hydrocarbons 53.6 @ 60°	Deg.
3	.97	509	1.41	.882	Specific Gravity Separator Gas .618	XXXXXXXXXX
4	1.00	529	1.46	.892	Specific Gravity Flowing Fluid XXXXX	G 171x .758
5					Critical Pressure 671 P.S.I.A.	667 P.S.I.A.
					Critical Temperature 362	408 R

P _r 3240.2 P _c ² 10498.9		(1) $\frac{P_c^2}{P_r^2 - P_w^2} = 1.1447$		(2) $\left[\frac{P_c^2}{P_r^2 - P_w^2} \right]^n = 1.1447$	
NO.	P _r ²	P _w ²	P _c ²	P _c ² - P _w ²	
1	2702.2	7328.9	3170.0		
2	2451.1	6007.9	4491.0		
3	1850.4	3424.0	7074.9		
4	1152.1	1327.3	9171.6		
5					

AOF = Q $\left[\frac{P_c^2}{P_r^2 - P_w^2} \right]^n = 2.421$

Absolute Open Flow 2,421 Mcfd @ 15.025		Angle of Slope 45°		Slope, n 1.00	
Remarks: Made 9 Bbls. of condensate during test.					
Approved By Commission:		Conducted By: W.S.		Calculated By: R.R.	
				Checked By: R.R.	