

RECEIVED

JUL 30 1991

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

O. C. D.
ARTESIA, OFFICE

Type Test ☒ Initial ☐ Annual ☐ Special		Test Date 04-22-91	
Company Exxon U.S.A.		Connection Vented	
Pool W. Burton Flat Plaza		Formation Atoka	
Completion Date 4-17-91		Total Depth 11475	
Csg. Size 5 1/2		Set At 11475	
Perforations From 10385 To 10705		Well No. 1	
Csg. Size 2 3/8 2 7/8		Set At 2529 7707	
Type Well - Single - Brazenhead - G.G. or G.O. Multiple Single		Packer Set At 10299	
Producing Thru Tubing		Reservoir Temp. °F 177 @ 10299	
Mean Annual Temp. °F 60		Baro. Press. - P _a 13.2	
State New Mexico		County Eddy	
L 10299		H 10299	
C _g .651		% CO ₂ .42	
% N ₂ .91		% H ₂ S ---	
Prover 3.068		Meter Run 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							3225		PKR		72 hrs.
1.	3	X	.750	230	10.00	89	3003		PKR		1 hr.
2.	3	X	.750	240	23.00	80	2690		PKR		1 hr.
3.	3	X	.750	270	36.00	80	2335		PKR		1 hr.
4.	3	X	.750	400	43.00	78	1885		PKR		1 hr.
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 _{sp}	Rate of Flow Q, Mhd
1	2.672	49.32	243.2	.9732	1.239	1.022	162
2	2.672	76.31	253.2	.9813	1.239	1.024	254
3	2.672	100.97	283.2	.9813	1.239	1.024	336
4	2.672	133.30	413.2	.9831	1.239	1.041	452
5							

NO.	P _t	Temp. °R	T _r	Z	Gas Liquid Hydrocarbon Ratio H ₂ O RATIO = 12.14	Mcl/bbl.
1.	.36	549	1.46	.958	A.P.I. Gravity of Liquid Hydrocarbons H ₂ O	Dec.
2.	.37	540	1.44	.953	Specific Gravity Separator Gas .651	XXXXXXX
3.	.37	540	1.44	.953	Specific Gravity Flowing Fluid XXXXX	
4.	.61	538	1.43	.922	Critical Pressure 670	P.S.I.A.
5.					Critical Temperature 375	R

NO.	P _t	P _w	P _r	P _r ² - P _w ²	(1) $\frac{P_c^2}{P_r^2 - P_w^2} = 1.524$	(2) $\left[\frac{P_c^2}{P_r^2 - P_w^2} \right]^n = 1.364$
1	3021.3	9128.1	1357.9			
2	2703.4	7308.3	3177.6			
3	2398.6	5753.1	4732.9			
4	1899.0	3606.2	6879.7			
5						

AOF = Q $\left[\frac{P_c^2}{P_r^2 - P_w^2} \right]^n = .617$

Absolute Open Flow 617 Mhd @ 15.025 Angle of Slope 53.6 Slope, n .737

Remarks: WELL MADE 4.13 BBLS H₂O

Approved By Division	Conducted By: Pro Well Testers	Calculated By: BM	Checked By: BM
----------------------	-----------------------------------	----------------------	-------------------