

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

Form C-122
Revised 9-1974
JAN 20 1974

O. C. C.
ARTESIA, OFFICE

Type Test ☐ Initial ☐ Annual ☒ Special						Test Date 1-17-74		61-260-01	
Company El Paso Natural Gas Co.				Connection El Paso Natural Gas Company					
Pool Wildcat				Formation Morrow				Unit J	
Completion Date 11-10-71		Total Depth 9380		Plug Back TD 9353		Elevation		Farm or Lease Name Rocky Arroyo	
Csq. Size 5 1/2	Wt. 15.5	d	Set At 9380	Perforations: From 6593 To 6600		Well No. 1			
Teg. Size 2 3/8	Wt. 4.7	d	Set At 8959	Perforations: From 8956 To 9052		Unit J		Sec. 8	Twp. 22
Type Well - Single - Bradenhead - G.G. or G.O. Multiple Gas-Gas- Dual				Packer Set At 8906		County Eddy			
Producing Thru Tbg. 9004		Reservoir Temp. °F 168 @ 9004		Mean Annual Temp. °F 60		Baro. Press. - P _a 13.2		State New Mexico	
L .9004	H .9004	G _g .593	% 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							2448				24 hr S.I.
1.	4	X	1.000	383	11.6	70	2013	70			1 hr.
2.	4	X	1.000	385	16.0	76	1671	70			1 hr.
3.	4	X	1.000	390	20.3	80	1272	68			1 hr.
4.	4	X	1.000	390	24.0	86	825	70			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 F _g	Super. Compress. Factor, F _{pv}	Rate of Flow Q, Mcfd
1.	4.753	67.79	396.2	.9905	1.299	1.031	427
2.	4.753	79.82	398.2	.9850	1.299	1.031	500
3.	4.753	90.47	403.2	.9813	1.299	1.030	565
4.	4.753	98.37	403.2	.9759	1.299	1.029	610
5.							

NO.	P _t	Temp. °R	T _f	Z	Gas Liquid Hydrocarbon Ratio _____ Mcf/ubi.
1.	.59	530	1.50	.940	A.P.I. Gravity of Liquid Hydrocarbons _____ Deg.
2.	.59	536	1.51	.941	Specific Gravity Separator Gas _____ X X X X X X X X
3.	.60	540	1.53	.943	Specific Gravity Flowing Fluid _____ X X X X X
4.	.60	546	1.54	.944	Critical Pressure _____ 672 _____ P.S.I.A. _____ P.S.I.A.
5.					Critical Temperature _____ 354 _____ R _____ R

NO.	P _t ²	P _w ²	P _w ²	P _t ² - P _w ²
1	4105.5	2027.4	4110.3	1947.2
2	2836.5	1686.2	2843.2	3214.3
3	1651.7	1288.6	1660.6	4395.9
4	702.6	844.6	713.4	5344.1
5				

(1) $\frac{P_c^2}{P_c^2 - P_w^2} = 3.111$

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = .753$

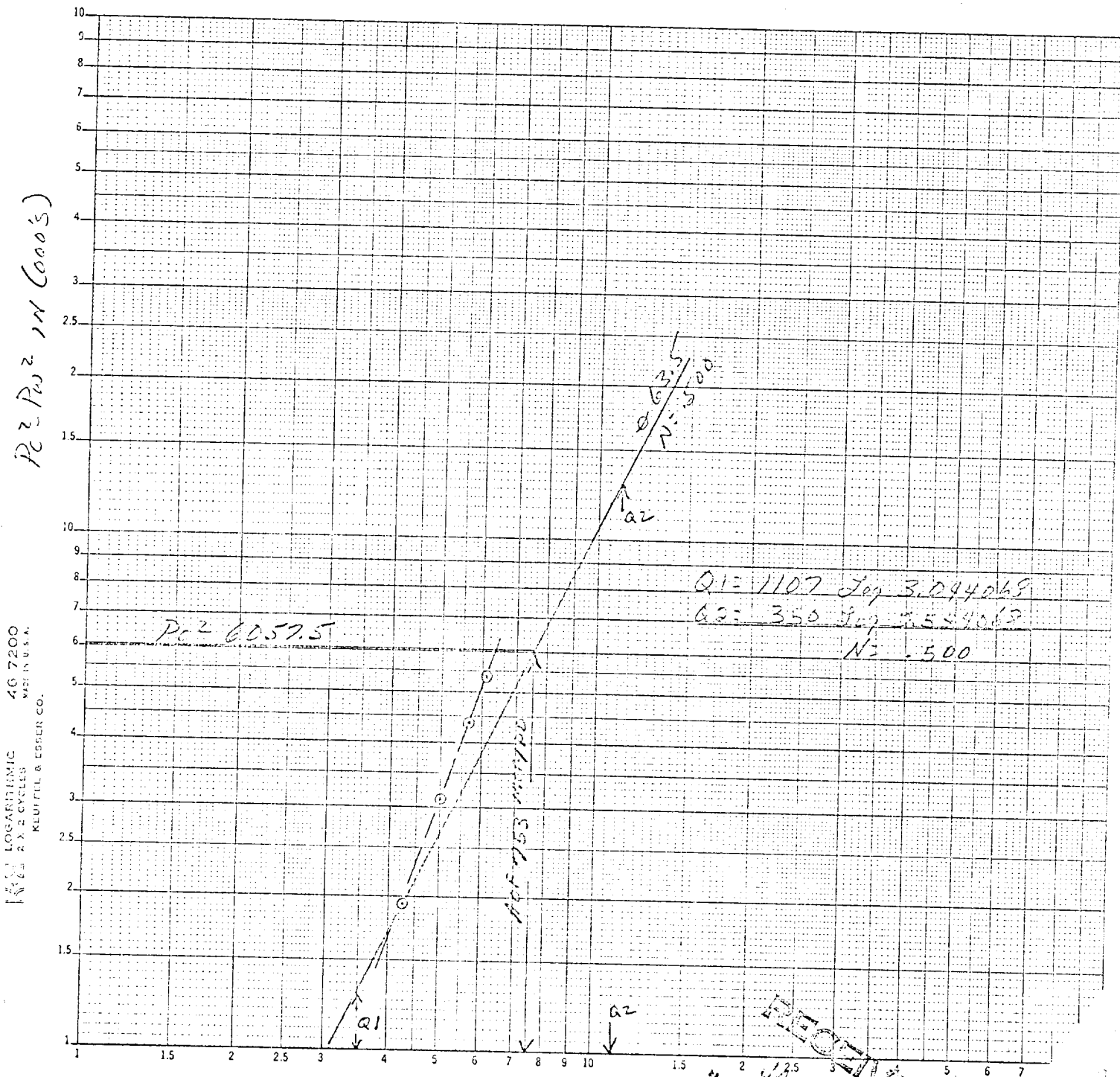
(2) $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 1.764$

Absolute Open Flow	753	Mcfd @ 15.025	Angle of Slope @	63.51	n	.500
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Remarks: No fluid made at these rates.

Approved By Commission:	Conducted By:	Calculated By:	Checked By:
	Randy Kiker, Reggie Reston	Reggie Reston	

EL PASO GAS CO.
Rocky Arroyo Unit #1
(MORROW)
J-8-22-22
Eddy Co., New Mexico
1-16-74


$$Q = McF / \text{per DAY}$$

RECEIVED
JAN 23 1974
U. S. GEOLOGICAL SURVEY
ARTESIA, NEW MEXICO

FIELD DATA SHEET (Not Required To File)

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