Copy of C-122

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

Form C-122
Revised 9-1-65

RECEIVED
MAR 1 1973
O. C. C.
ARTESIA, OFFICE

Type Test: [x] Initial [ ] Annual [ ] Special				Test Date: 2-16-73	
Company: El Paso Natural Gas Company			Connection: None		Unit
Pool: Wildcat			Formation: Morrow		
Completion Date: 2-16-73	Total Depth: 14,890		Plug Back TD: 14,768	Elevation: 3315.5 GL	Farm or Lease Name: Mobil Federal
Csg. Size: 5 1/2 / Wt.: 20 / d: / Set At: 14,890			Perforations: From 14,376 To 14,599		Well No.: 1
Tbg. Size: 3 1/2 / Wt.: 9.2 / d: 2.932 / Set At: 12,015			Perforations: From Open To End		Unit: J / Sec.: 29 / Twp.: 23 / Rge.: 31
Type Well – Single – Bradenhead – G.G. or G.O. Multiple: Single			Packer Set At: 12,015		County: Eddy
Producing Thru: Tubing	Reservoir Temp. °F: 225 @ 14,499	Mean Annual Temp. °F:	Baro. Press. – P_a: 13.2		State: New Mexico

L	H	Gg	% CO_2	% N_2	% H_2S	Prover	Meter Run	Taps
14,599	14,599	.576					4"	Flg.

	FLOW DATA					TUBING DATA		CASING DATA		
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	Duration of Flow
SI						5128		616		78 hrs.
1.	4	x 2.000	605	4.50	60	4615	48	616		1 hr.
2.	4	x 2.000	630	7.50	60	4275	48	616		1 hr.
3.	4	x 2.000	655	14.00	50	3700	48	616		1 hr.
4.	4	x 2.000	660	20.00	50	3113	49	616		1 hr.
5.	4	x 2.000	650	22.00	34	2355	48	700		4 hrs.

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	19.81	52.74	618.2	1.000	1.318	1.049	1,444
2.	19.81	69.46	643.2	1.000	1.318	1.051	1,906
3.	19.81	96.72	668.2	1.010	1.318	1.053	2,686
4.	19.81	116.03	673.2	1.010	1.318	1.054	3,225
5.	19.81	120.79	663.2	1.026	1.318	1.068	3,456

NO.	P_t	Temp. °R	T_t	Z
1.	.92	520	1.50	.909
2.	.96	520	1.50	.905
3.	.99	510	1.47	.902
4.	1.00	510	1.47	.901
5.	.99	494	1.43	.876

Gas Liquid Hydrocarbon Ratio _____ Mcf/bbl.
A.P.I. Gravity of Liquid Hydrocarbons _____ Deg.
Specific Gravity Separator Gas .576 XXXXXXXXX
Specific Gravity Flowing Fluid XXXXX
Critical Pressure 672 P.S.I.A. _____ P.S.I.A.
Critical Temperature 346 R _____ R

P_c 5141.2 P_c^2 26431.9

NO	P_t^2	P_w	P_w^2	$P_c^2 - P_w^2$
1	*	4803.1	23069.8	3362.1
2	*	4463.9	19926.4	6505.5
3	*	3893.5	15159.3	11272.6
4	*	3322.4	11038.3	15393.6
5	*	2549.0	6497.4	19943.5

(1) $\frac{P_c^2}{P_c^2 - P_w^2} = 1.717$ (2) $\left[\frac{P_c^2}{P_c^2 - P_w^2}\right]^n = 1.384$

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2}\right]^n = 4.463$

Absolute Open Flow 4,463 Mcfd @ 15.025 Angle of Slope θ 59 Slope, n .601

Remarks: Made .59 bbls. water and trace of condensate throughout test.
* Calculated from known B.H.P. that were run by Tom Hansen Company

Approved By Commission:	Conducted By: R. Reston, R. Kiker, J.C. Roberts	Calculated By: J. B. Murray	Checked By: