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Form C-122
Revised 9-1-65

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

ORIGINAL

RECEIVED
DEC 17 1974
O. C. C.
ARTESIA, OFFICE

Type Test: XX Initial ☐ Annual ☐ Special			Test Date: 11-26-74	
Company: Mark Production Company	Connection:			
Pool: ~~West Red Lake~~ Wildcat	Formation: Morrow			Unit:
Completion Date: 11-22-74	Total Depth: 9248	Plug Back TD: 9209	Elevation: 3290 Gr	Farm or Lease Name: Federal "B"
Csg. Size: 5.5 / Wt.: 17# / d: 4.892 / Set At: 9248	Perforations: From 9039-9076 To			Well No.: 1
Tbg. Size: 2 3/8 / Wt.: 4.70 / d: 1.995 / Set At: 8965	Perforations: From To			Unit: P / Sec.: 1 / Twp.: 18-S / Rge.: 26-E
Type Well – Single – Bradenhead – G.G. or G.O. Multiple: Single		Packer Set At: 8965		County: Eddy
Producing Thru: Tubing	Reservoir Temp. °F: 172 @ 9058	Mean Annual Temp. °F: 60	Baro. Press. – P_a: 13.2	State: New Mexico
L: 9058 / H: 9058	Gg: .695	% CO_2:	% N_2:	% H_2S: / Prover: / Meter Run: X / Taps:

	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					60	2860	49			
1.	3.0	2.25	260	23	37	2780	69			1 Hr
2.	3.0	2.25	180	17.5	6	2830	76			1 Hr
3.	3.0	2.25	580	53	34	2420	89			1 Hr
4.	3.0	2.25	690	64	43	2221	91			1 Hr
5.	3.0	2.25	980	73	64	1710	87			.25 Hr

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	28.78	79.2692	273.2	1.0229	1.1995	1.038	2906
2	28.78	58.1464	193.2	1.0564	1.1995	1.031	2186
3	28.78	177.3122	593.2	1.0260	1.1995	1.090	6845
4	28.78	212.1433	703.2	1.0168	1.1995	1.092	8131
5	28.78	269.2649	993.2	.9962	1.1995	1.123	10,399

NO.	P_t	Temp. °R	T_r	Z
1	.41	497	1.28	.929
2	.29	388	1.20	.940
3	.89	494	1.27	.842
4	1.00	503	1.30	.838
5	1.48	524	1.35	.793

Gas Liquid Hydrocarbon Ratio: None Produced Mcf/bbl.
A.P.I. Gravity of Liquid Hydrocarbons: Deg.
Specific Gravity Separator Gas: XXXXXXXXXX
Specific Gravity Flowing Fluid: XXXXX
Critical Pressure: 669 P.S.I.A. P.S.I.A.
Critical Temperature: 388 R R

P_c 2672.2 P_c^2 8249

NO	P_t^2	P_w	P_w^2	$P_c^2 - P_w^2$
1		2834.4	8034	215
2		2865.5	8211	38
3		2696.8	7273	976
4		2622.9	6879	1370
5		2445.4	5980	2054

(1) $\frac{P_c^2}{P_c^2 - P_w^2} = \frac{8249}{2054}$ (2) $\left[\frac{P_c^2}{P_c^2 - P_w^2}\right]^n = 2.267657$

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2}\right]^n =$ 23581

Absolute Open Flow: 23581 Mcfd @ 15.025 | Angle of Slope θ: 59° 30' | Slope, n: .588

Remarks:

Approved By Commission:	Conducted By: R G Roberson, WEST TEXAS CONSULTING SERVICE, INC.	Calculated By: H L Hagler	Checked By: