N. MEXICO OIL CONSERVATION COMMISSION

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Form C-122
Revised 9-1-65

c/SF

RECEIVED
JAN 4 1982
O. C. D.
ARTESIA, OFFICE

Type Test: [X] Initial [ ] Annual [ ] Special			Test Date: 11-24-81	
Company: Mesa Petroleum Co.	Connection: Unconnected			Unit
Pool: Undesignated ABO	Formation: ABO			Farm or Lease Name: ACME
Completion Date: 11-24-81	Total Depth: 4814	Plug Back TD: 4794	Elevation: 3738	Well No.: 6
Csg. Size: 4 1/2 / Wt.: 1.5# / d: / Set At: 4810	Perforations: From 4404 To 4777			Unit: J / Sec.: 29 / Twp.: 8S / Rge.: 26E
Tbg. Size: 2 3/8 / Wt.: 4.7# / d: / Set At: 4290	Perforations: From open ended To			
Type Well – Single – Bradenhead – G.G. or G.O. Multiple: single		Packer Set At: None		County: Chaves
Producing Thru: tubing	Reservoir Temp. °F: 102 @ 4814	Mean Annual Temp. °F: 60	Baro. Press. – P_a: 13.2	State: New Mexico

L	H	Gg	% CO_2	% N_2	% H_2S	Prover	Meter Run	Taps
4290	4290	.65	1	1		2" ORIFICE WELL TESTER		

	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						900		860		48 hr SI
1.	2" OIFICE	1 1/4	10		20	790	58	760		1 hr.
2.	Well	1 1/4	22		20	650	61	635		1 hr.
3.	Tester	1 1/4	23		40	360	62	530		1 hr.
4.		1 1/4	24		47	250	63	450		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	753	2" ORIFICE	WELL	1.0409	.9608		753
2.	1320	TESTER		1.04708	.9608		1320
3.	1348			1.0198	.9608		1321
4.	1390			1.0127	.9608		1352
5.							

NO.	P_r	Temp. °R	T_r	Z
1.				
2.				
3.				
4.				
5.				

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

P_c 873 P_c^2 762

NO	P_t	P_w	P_w^2	$P_c^2 - P_w^2$
1		773	598	164
2		648	420	342
3		543	295	467
4		463	214	548
5				

(1) $\frac{P_c^2}{P_c^2 - P_w^2} = 1.3905$ (2) $\left[\frac{P_c^2}{P_c^2 - P_w^2}\right]^n = 1.1792$

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2}\right]^n = 1600$

Absolute Open Flow 1600 Mcfd @ 15.025 | Angle of Slope θ 63.5° | Slope, n .5

Remarks: Plot of Pc^2-Pw^2 vs. Q yielded a straight line with a θ greater than 63.5°. Drew 63.5° line through highest point.

Approved By Commission:	Conducted By:	Calculated By:	Checked By:
	James Craig	E.L. Buttross, Jr.	