NEW MEXICO OIL CONSERVATION COMMISSION

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

RECEIVED BY
OCT 14 1983
O. C. D.
ARTESIA, OFFICE

Type Test: [X] Initial 4-POINT [ ] Annual [ ] Special	Test Date: 10-7-83		
Company: POGO PRODUCING CO	Connection: AIR NEW WELL		Unit: B
Pool: ~~Undesignated~~ Malaga Atoka	Formation: ~~Strawn~~ Atoka		
Completion Date: 10-4-83	Total Depth: 13000	Plug Back T.D.: 11590	Elevation: 2977
Farm or Lease Name: LIGHTFOOT COM	Well No.: #1		
Csg. Size: 5.5 / Wt.: 20 / d: / Set At: ~~11590~~ 12882	Perforations: From 11520 To 11526		
Tbg. Size: 2.375 / Wt.: 4.7 / d: 1.995 / Set At: ~~11520~~ 11454	Perforations: From OPEN To ENDED		Unit: J / Sec.: 14 / Twp.: 24S / Rge.: 28E
Type Well – Single – Bradenhead – G.G. or G.O. Multiple: SINGLE	Packer Set At: 11454		County: EDDY
Producing Thru: TUBING	Reservoir Temp. °F: 188	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
11523	11523	.630	.409	.993	Ø	Ø	4.026	FLANGE

NO.	FLOW DATA: Prover Line Size X Orifice Size	Press. p.s.i.g.	Diff. hw	Temp. °F	TUBING DATA: Press. p.s.i.g.	Temp. °F	B.H.P. DATA: Press. p.s.i.g.	CHOKE	Duration of Flow
SI					5500		6899		48HR
1.	4.026 X 1.500	486	4.4	99	5181	88	6591	2.5/64	60MIN
2.	4.026 X 1.500	492	8.4	103	4795	88	6336	4/64	60MIN
3.	4.026 X 1.500	495	14.0	105	4295	89	6011	5/64	60MIN
4.	4.026 X 1.500	500	18.0	102	3573	84	5597	6.75/64	60MIN
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	10.84	46.87	499.2	.9645	1.260	1.037	640
2	10.84	65.14	505.2	.9610	1.260	1.036	886
3	10.84	84.35	508.2	.9594	1.260	1.036	1145
4	10.84	96.11	513.2	.9619	1.260	1.037	1309
5							

NO.	P_t	Temp. °R	T_f	Z
1	.75	559	1.53	.930
2	.75	563	1.54	.932
3	.76	565	1.55	.932
4	.77	562	1.54	.930
5				

Gas Liquid Hydrocarbon Ratio: 0 Mcf/bbl.
A.P.I. Gravity of Liquid Hydrocarbons: 0 Deg.
Specific Gravity Separator Gas: .630 XXXXXXXXX
Specific Gravity Flowing Fluid: XXXXX .630
Critical Pressure: 669 P.S.I.A. 669 P.S.I.A.
Critical Temperature: 365 R 365 R

P_c 5620.2 P_c^2 31587

NO	P_t^2	P_w	P_w^2	$P_c^2 - P_w^2$
1		5318	28279	3308
2		5087	25877	5710
3		4798	23022	8565
4		4433	19653	11934
5				

(1) $\frac{P_c^2}{P_c^2 - P_w^2} = 2.6468$

(2) $\left[\frac{P_c^2}{P_c^2 - P_w^2}\right]^n = 1.8160$

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2}\right]^n = 2377$

Post ID-2
10-21-83
Comp + RK

Absolute Open Flow: 2377 Mcfd @ 15.025
Angle of Slope θ: 58.8
Slope, n: .613

Remarks: BOTTOM HOLE PRESSURES MEASURED WITH AMERADA PRESSURE ELEMENTS

Approved By Commission	Conducted By:	Calculated By:	Checked By:
	RICHARD TOWNLEY	BENNETT & CATHEY	