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NEW MEXICO OIL CONSERVATION COMMISSION
MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL95
File
C-122
Form C-122
Revised 9-1-65

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DEC 28 1977
U.S. GEOLOGICAL SURVEY
ARTESIA, NEW MEXICO

Type Test		☒ Initial		☐ Annual		DEC 29 1977		☐ Special		Test Date		11-24-77			
Company				Hanagan Petroleum Corp.				Formation				C. C.			
Pool				Wildcat				Location				Strawn			
Completion Date				12/10/77				Total Depth				11,500			
Casing Size				5 1/2				Weight				17 & 20			
Tubg. Size				2 7/8				Weight				6.5			
Perforations:				From 9714 To 9722				Perforations:				From To			
Type Well - Single - Bradenhead - G.C. or G.O. Multiple				Single				Packer Set At				Top 9599 Bot. Pkr. 9862			
Producing Thru				Tubing				Reservoir Temp. °F				160 @ 9575			
Mean Annual Temp. °F				70				Baro. Press. - P _a				13.2			
County				Eddy				State				New Mexico			
L				9718				H				9718			
G _g				0.667				% CO ₂							
% N ₂								% H ₂ S							
Prover				1000X100"				Meter Run				Flange			

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							3088		pk		
1.	4" X 0.500			488	81	94	2966	70			60 min.
2.	4" X 1.125			476	11.5	73	2841	70			60 min.
3.	4" X 1.125			476	30	70	2624	70			60 min.
4.	4" X 1.500			500	40	74	2232	70			60 min.
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, F _{pv}	Rate of Flow Q, Mcfd
1	1.182	199.467	501.2	0.9688	1.224	1.043	291.6
2	6.031	75.005	489.2	0.9877	1.224	1.049	573.7
3	6.031	121.145	489.2	0.9905	1.224	1.050	930.1
4	10.840	143.276	513.2	0.9868	1.224	1.051	1971.6
5							

NO.	P _t	Temp. °R	T _r	Z	Gas Liquid Hydrocarbon Ratio	A.P.I. Gravity of Liquid Hydrocarbons	Specific Gravity Separator Gas	Specific Gravity Flowing Fluid	Critical Pressure	Critical Temperature
1	0.75	554	1.47	0.920	52.5	57.6 @ 60	0.667	X X X X X	670	378
2	0.73	533	1.41	0.909						
3	0.73	530	1.40	0.907						
4	0.77	534	1.41	0.905						
5										

NO.	P _t	P _s	P _w	P _t ² - P _w ²
1	4100.2	16812	990	
2	3959.2	15675	2127	
3	3700.2	13691	4111	
4	3151.2	9930	7872	
5				

(1) $\frac{P_c^2}{P_c^2 - P_w^2} = 2.2614329$		(2) $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 2.123425$	
AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 4186.5$			

Absolute Open Flow		Angle of Slope		Slope, n	
4186.5 Mcfd @ 15.025		47° 18'		0.922834	

Remarks:	
BHP measured with Amerada RPG-3 gauge, serial no. 9383-N 0-6000 psi	

Approved By Commission:	Conducted By:	Calculated By:	Checked By:
	Teffteller, Inc.	Bill Taylor	