

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

Form O-100
Revised 1-65
File 0-722

RECEIVED

☒ Initial ☐ Annual ☐ Special		Test Date 12-14-78		FEB 21 1979 B.C.C. ARTESIA, OFFICE	
Company Amoco Production Company		Connection El Paso Natural Gas Comp.		Unit	
Well South Empire <i>Morrow</i>		Formation Morrow		Form or Lease Name Empire South Deep	
Completion Date 8-21-77		Total Depth 11,180		Elevation 3577	
Seq. No.	WT	WT	WT	From	To
5.5	17.0	4.892	11,180	10,735	10,801
IN. Size	WT	d	Set At	Perforations:	
2.375	4.7	1.995	10,485	From 0	To 0
Type Well - Single - Widespread - C.G. or G.C. Multiple				Packer Set At	
Single				10,485	
Reducing Valve		Reservoir Temp. °F		Baro. Press. - P _b	
Tubing		145 @ 10,769		60	
L		H		G ₂	
10,769		10,769		0.663	
% CO ₂		% H ₂		% H ₂ S	
0.44		0.55		0	
Proven		Meter Run		Taps	
2.0		0			

FLOW DATA						TUBING DATA		CASING DATA		Duration of Flow	
C.	Flow 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
51							780	31			48.0
1.	2.00 x 0.625		15	0	31	210	50	0	0	0	1.0
2.	2.00 x 0.375		39	0	34	169	52	0	0	0	0.7
3.	2.00 x 0.375		46	0	34	153	53	0	0	0	0.7
4.	2.00 x 0.375		55	0	37	129	53	0	0	0	0.7
5.											

RATE OF FLOW CALCULATIONS							
C.	Coefficient (24 Hour)	$\sqrt{h_w P_m}$	Pressure P _m	Flow Temp. Factor Ft.	Gravity Factor F _g	Super Comp. Factor, F _{sp}	Rate of Flow Q, Mgd
1	6.62	0	28.2	1.0291	1.2281	1.0034	237
2	2.43	0	52.2	1.0260	1.2281	1.0063	161
3	2.43	0	59.2	1.0260	1.2281	1.0071	183
4	2.43	0	68.2	1.0229	1.2281	1.0081	210
5.							

C.	P _c	Temp. °R	T _g	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	0.04	491	1.31	0.993	0	0	0.663	XXXXXX	670	376
2	0.08	494	1.31	0.988				XXXXXX		
3	0.09	494	1.31	0.986						
4	0.10	497	1.32	0.984						
5										

803.4	640	(1) $\frac{P_c^2}{P_c^2 - P_w^2} = 1.0873$	(2) $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 1.0430$
50	228	52	594
33	185	34	611
29	175	30	615
20	147	22	624

Absolute Open Flow 247 Mgd @ 15.025 Angle of Slope 63.5 Slope, n 0.503

Approved By Consultant		Conducted By John West Engineering		Calculated By CCW		Checked By RAB	
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