

Submit in duplicate to
appropriate district office.
See Rule 401 & Rule 1122

State of New Mexico
Energy Minerals and Natural Resources

Form C-122
Revised October, 1999

Oil Conservation Division
2040 South Pacheco
Santa Fe, NM 87505

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Operator <u>Morexco Inc</u>										Lease or Unit Name <u>Linck</u>																																																																															
Type Test ☒ Initial ☐ Annual ☐ Special										Test Date <u>10-26-99</u>										Well No. <u>1</u>																																																																					
Completion Date <u>7-24-99</u>										Total Depth <u>9050</u>										Plug Back TD <u>8990</u>										Elevation <u>3460</u>										Unit Ltr. - Sec. - TWP - Rge. <u>K 24 18S 25E</u>																																																	
Csg. Size <u>5.5</u>										Wt. <u>17#/ft</u>										d <u>4.892</u>										Set At <u>9050</u>										Perforations:										County <u>Eddy</u>																																							
Thg. Size <u>2.375</u>										Wt. <u>4.7</u>										d <u>1.995</u>										Set At <u>8680</u>										Perforations:										Pool <u>West Atoka Morrow Gas</u>																																							
																																								From: <u>8851</u>										To: <u>8871</u>																																							
Type Well - Single - Bradenhead - G.G. or G.O. Multiple <u>Single</u>										Packer Set At <u>8680</u>										Formation <u>Morrow</u>																																																																					
Producing Thru Tubing										Reservoir Temp. °F <u>164</u>										Mean Annual Temp. °F										Baro. Press - P _a <u>13.2</u>										Connection <u>Pipeline</u>																																																	
L <u>8861</u>										H <u>8861</u>										Gg <u>0.624</u>										%CO ₂ <u>0.826</u>										%N ₂ <u>0.788</u>										%H ₂ S <u>0.0</u>										Prover										Meter Run <u>2 in.</u>										Taps <u>Pipe</u>									

FLOW DATA						TUBING DATA				CASING DATA				Duration
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	Press. p.s.i.g.	Temp. °F	Duration Of Flow	
SI	2"		1"			69	1440		1839	164			72 Hours	
1.	2"		1"	240	6	69	1340		1701	164			1 Hour	
2.	2"		1"	240	44	105	1010		1302	164			1 Hour	
3.	2"		1"	250	58	105	700		940	164			1 Hour	
4.	2"		1"	250	60	105	470		688	164			1 Hour	
5.														

RATE OF FLOW CALCULATIONS							
No.	COEFFICIENT (24 HOUR)		Pressure P _m	Flow Temp. Factor Ft.	Gravity Factor Fg.	Super Compress. Factor, F pv.	Rate of Flow Q, Mcfd
1.	6.55		38.98	253.2	0.991	1.265	331
2.	6.55		105.55	253.2	0.959	1.035	868
3.	6.55		123.55	263.2	0.959	1.035	1016
4.	6.55		125.66	263.2	0.959	1.035	1033
5.							

No.	P _r	Temp. °R	T _r	Z	Gas Liquid Hydrocarbon Ratio Dry Gas	Mcf/bbl.
1.				0.929	A. P. I. Gravity of Liquid Hydrocarbons Dry Gas	Deg.
2.				0.932	Specific Gravity Separator	
3.				0.933	Gas <u>0.624</u>	XXXXXXXXXX
4.				0.933	Specific Gravity Flowing Fluid	XXXXXX
5.					Critical Pressure	P.S.I.A. _____ P.S.I.A. _____
					Critical Temperature	R. _____ R. _____

No.	P _i ²	P _w ²	P _c ²	P _c ² - P _w ²
1.		1701	2893.4	487.6
2.		1302	1695.2	1685.8
3.		940	883.6	2497.4
4.		688	473.0	2908.0
5.				

(1) P_{c2} = 6.933

$\frac{P_c^2 - P_w^2}{P_c^2 - P_w^2}$

AOF = Q

(2) $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = \underline{4.549}$

$\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = \underline{1505}$

Absolute Open Flow <u>1505</u>		Mcf/d @ <u>15.025</u>		Angle of Slope θ: <u>54</u>		Slope, n: <u>0.779</u>	
--------------------------------	--	-----------------------	--	-----------------------------	--	------------------------	--

Remarks: Q₁ Choke Size = 6/64 Q₂ Choke Size = 10/64 Q₃ Choke Size = 12/64 Q₄ Choke Size = 15/64

Approved By Division	Conducted By: <u>Keltic Services</u>	Calculated By: <u>JJ McGlasson</u>	Checked By:
----------------------	---	---------------------------------------	-------------

