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State of New Mexico
Energy, Minerals and Natural Resources Department

Form C-122
Revised 4-1-91

OIL CONSERVATION DIVISION

P.O. Box 2088
Santa Fe, New Mexico 87504-2088

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELLS

Operator <i>Mewborne oil CO.</i>					Lease or Unit Name <i>Scoggin Draw "4" St. Com</i>				
Type Test ☒ Initial ☐ Annual ☐ Special					Test Date <i>2-19-98</i>		Well No. <i>1</i>		
Completion Date		Total Depth <i>10,470</i>		Plug Back TD <i>10,419</i>		Elevation		Unit Ltr. - Sec. - TWP - Rge. <i>4 18-S 28-E</i>	
Csg. Size	Wt.	d	Set At	Perforations: From: <i>10,286</i> To: <i>10,296</i>			County <i>Eddy</i>		
Tbg. Size <i>2 7/8</i>	Wt. <i>6.5</i>	d <i>2.441</i>	Set At <i>10229</i>	Perforations: From: To:			Pool <i>N ILLINOIS Camp Morrow</i>		
Type Well - Single - Bradenhead - G.G. or G.Q. Multiple <i>Single</i>				Packer Set At <i>10229</i>		Formation <i>Morrow</i>			
Producing Thru <i>Tbg</i>		Reservoir Temp. °F <i>154.6</i>		Mean Annual Temp. °F <i>60°</i>		Baro. Press - P _a <i>13.2</i>		Connection <i>Sales</i>	
L <i>10229</i>	II <i>10229</i>	Gg <i>.654</i>	% CO ₂ <i>.369</i>	% N ₂ <i>.401</i>	% H ₂ S <i>0</i>	Prover <i>0</i>	Meter Run <i>3,072</i>	Taps <i>F/G</i>	

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.	
SI							<i>2157</i>		<i>PKR</i>	
1.	<i>3.072 X 2.250</i>			<i>395</i>	<i>3"</i>	<i>82°</i>	<i>2052</i>	<i>52°</i>		<i>60 min</i>
2.	<i>3.072 X 2.250</i>			<i>430</i>	<i>7"</i>	<i>80°</i>	<i>1920</i>	<i>54°</i>		<i>60 min</i>
3.	<i>3.072 X 2.250</i>			<i>500</i>	<i>12"</i>	<i>76°</i>	<i>1910</i>	<i>56°</i>		<i>60 min</i>
4.	<i>3.072 X 2.250</i>			<i>590</i>	<i>21"</i>	<i>78°</i>	<i>1540</i>	<i>56°</i>		<i>60 min</i>
5.										

RATE OF FLOW CALCULATIONS							
NO.	COEFFICIENT (24 HOUR)	$\sqrt{h_w P_m}$	Pressure P _m	Flow Temp. Factor F _L	Gravity Factor F _g	Super Compress. Factor, F _{pv}	Rate of Flow Q, Mcfd
1.	<i>28.78</i>	<i>34.99</i>	<i>408.2</i>	<i>.9795</i>	<i>1.237</i>	<i>1.047</i>	<i>1277</i>
2.	<i>28.78</i>	<i>55.69</i>	<i>443.2</i>	<i>.9813</i>	<i>1.237</i>	<i>1.048</i>	<i>2039</i>
3.	<i>28.78</i>	<i>78.47</i>	<i>513.2</i>	<i>.9850</i>	<i>1.237</i>	<i>1.049</i>	<i>2887</i>
4.	<i>28.78</i>	<i>112.54</i>	<i>603.2</i>	<i>.9831</i>	<i>1.237</i>	<i>1.049</i>	<i>4130</i>
5.							

NO.	P _r	Temp. °R	T _r	Z	Gas Liquid Hydrocarbon Ratio	Mcf/bbl
					<i>43.05</i>	
1.	<i>.80</i>	<i>542</i>	<i>1.46</i>	<i>.912</i>	A.P. I. Gravity of Liquid Hydrocarbons <i>59.7</i>	Deg.
2.	<i>.80</i>	<i>540</i>	<i>1.45</i>	<i>.910</i>	Specific Gravity Separator Gas <i>.654</i>	<i>XXXXXXXXXX</i>
3.	<i>.79</i>	<i>534</i>	<i>1.43</i>	<i>.908</i>	Specific Gravity Flowing Fluid <i>N/A</i>	<i>XXXXXX</i>
4.	<i>.79</i>	<i>536</i>	<i>1.44</i>	<i>.908</i>	Critical Pressure <i>673</i>	P.S.I.A. <i>P.S.I.A.</i>
5.					Critical Temperature <i>371</i>	R <i>R</i>

NO.	P _i ²	P _w	P _w ²	P _c ² - P _w ²
1.		<i>2079.4</i>	<i>4323.9</i>	<i>401.0</i>
2.		<i>2026.3</i>	<i>4105.8</i>	<i>619.1</i>
3.		<i>1851.5</i>	<i>3428.0</i>	<i>1296.9</i>
4.		<i>1662.6</i>	<i>2764.2</i>	<i>1960.7</i>
5.				

1) $\frac{P_c^2}{P_c^2 - P_w^2} = 2.40$ 2) $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 1.86$

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 7681.8$

Absolute Open Flow <i>7681.8</i> Mcfd @ 15.025		Angle of Slope θ <i>54.64</i>	Slope, n <i>.709</i>
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Remarks: ** Well made 10 BBLS of 59.7 API Gravity Condensate*

Approved By Division	Conducted By: <i>Pro Well Testing</i>	Calculated By: <i>M.B.</i>	Checked By: <i>B.M.</i>
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