

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELL

Type Test ☒ Initial ☐ Annual ☐ Special					Test Date 4-21-81			
Company ARCO Oil & Gas Co., Div. of Atlantic Richfield Company					Connection None			
Pool Basin Dakota					Formation Dakota		Unit	
Completion Date 4-4-81		Total Depth 6310		Plug Back TD 6293		Elevation 5715		Form of Lease Name Schlosser WN Fed
Coq. Size 4 1/2"	Wt. 10.5#	d 4.052	Set At 6310	Perforation At From 6097 To 6257		Well No. 5E		
Trq. Size 2 3/8"	Wt. 4.7#	d 1.995	Set At 6071	Perforation At From To		Unit Sec. Twp. Range F 34 28N 11W		
Type Well - Single - Broadhead - G.G. or G.O. Multiple Single Gas					Factor Set At None		County San Juan	
Producing Thru Tubing		Reservoir Temp. °F 8		Mean Annual Temp. °F		Baro. Press. - P _a 12.0		State New Mexico
L 4857	H 4857	Cq .800 Est.	% CO ₂	% N ₂	% H ₂ S	Prover 2"	Meter Run	Taps

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
51							949		950		SI 17 Days Flow 3 Hrs
1.	2"		.750"	80		80	138		488		
2.											
3.											
4.											
5.											

RATE OF FLOW CALCULATIONS							
NO.	Coefficient (24 Hour)	$\sqrt{h_w P_m}$	Pressure P _m	Flow Temp. Factor F _t	Gravity Factor F _g	Super Compress. Factor, F _{pv}	Rate of Flow Q, Mscf/d
1	9.453		92	.9813	1.118	1.012	966
2.							
3.							
4.							
5.							

NO.	P _i	Temp. °R	T _i	Z	Gas Liquid Hydrocarbon Ratio 23.935	Mcf/Lbl.
1	.14	540	1.27	.976	A.P.L. Gravity of Liquid Hydrocarbons 44.6 @ 60°	Deq.
2.					Specific Gravity Separator Gas .800 Est.	XXXXXX
3.					Specific Gravity Flowing Fluid XXXXX	
4.					Critical Pressure 635	P.S.I.A.
5.					Critical Temperature 424	R

NO.	P _i	P _w	P _i ²	P _w ²	P _i ² - P _w ²	(1) $\frac{P_i^2}{P_i^2 - P_w^2} = 1.0536$	(2) $\left[\frac{P_i^2}{P_i^2 - P_w^2} \right]^n = 1.0399$
1	22500	217	47082	878362			
2.							
3.							
4.							
5.							

Absolute Open Flow 1005				Mscf @ 15.025	Angle of Slope @	Slope n .75
Remarks: Well Tested Thru 48/64" Choke						

Approved by Division	Conducted By Rex Hitchcock, Jr.	Computed By Rex Hitchcock, Jr.	Checked By
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