

MULTIPOINT AND ONE POINT BACK PRESSURE TEST FOR GAS WELLS

Type Test ☒ Initial ☐ Annual ☐ Special				Test Date 6-15-84		RECEIVED JUN 21 1984 OIL CON. DIV. DIST. 3			
Company Beta Development Company			Connection Flare						
Pool Basin Dakota			Formation Dakota						
Completion Date 5-5-84		Total Depth 6575		Plug Back TD 6506		Elevation 6062		Farm or Lease Name Holloway Federal	
Csq. Size 4 1/2	Wt. 10.5	d 	Set At 6575	Perforations: From 6336 To 6486		Well No. 3-E			
Thq. Size 2 1/16	Wt. 3.4	d 1.750	Set At 6413	Perforations: From open To ended		Unit I	Sec. 6	Twp. 27N	Rge. 11W
Type Well - Single - Bradenhead - G.G. or G.O. Multiple Single				Packer Set At None		County San Juan			
Producing Thru Tubing		Reservoir Temp. °F 		Mean Annual Temp. °F 		Baro. Press. - P _a 		State 	
L	H	G _g 680	% CO ₂	% N ₂	% H ₂ S	Prover	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.	
SI	2"						885#		905	
1.	2"		.750	126		60	215		620	1 hr
2.	2"		.750	99		58	161		527	1 hr
3.	2"		.750	84		58	132		493	1 hr
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, Mcfd
1	12.365		96	.9831	9393	1.010	1,107
2.							
3.							
4.							
5.							

NO.	P _r	Temp. °R	T _r	Z	Gas Liquid Hydrocarbon Ratio 6 bbls 236,000 to 1 Mcf/bbl.
1.					A.P.I. Gravity of Liquid Hydrocarbons 1 bbl. water Deg.
2.					Specific Gravity Separator Gas X X X X X X X X
3.					Specific Gravity Flowing Fluid X X X X X
4.					Critical Pressure P.S.I.A. P.S.I.A.
5.					Critical Temperature R R

$P_c = 897$ $P_c^2 = 804609$					(1) $\frac{P_c^2}{P_c^2 - P_w^2} = 1.390652$	(2) $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 1.2806$
NO.	P _t	P _w	P _w ²	P _c ² - P _w ²		
1		505	225,025	579584		
2						
3						
4						
5						

AOF = Q $\left[\frac{P_c^2}{P_c^2 - P_w^2} \right]^n = 1,418$

Absolute Open Flow 1,418 Mcfd @ 15.025 Angle of Slope θ Slope, n .75

Remarks: _____

Approved By Division	Conducted By: John B. Keeling	Calculated By: John B. Keeling	Checked By:
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