

COPY

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

Form C-122
Revised 9-1-61

Type Test ☒ Initial ☐ Annual ☐ Special					Test Date 7/21/94					
Company DUSTY MAC RESOURCES, Inc.					Connection Transwestern Pipeline Company					
Pool SW Jabalina Atoka Gas Pool					Formation Atoka Ls.					Unit
Completion Date 7/21/94			Total Depth 15555'		Plug Back TD 15308'		3189' GL 3211' KR		Farm or Lease Name MADERA FEDERAL 30	
Csq. Size 5" L.	Wt. 23.20	d 4.044"	Set At 15550	Perforations: From 15097 To 15121			Well No. 20-1			
Thq. Size 2-7/8	Wt. 7.9 ppf	d 2.323"	Set At 12520'	Perforations: From To			Unit L 30 26S 35E			
Type Well - Single - Bradenhead - G.G. or G.O. Multiple Single					Packer Set At PBR 12490'-12520'			County LEA		
Producing Thru Thq L		Reservoir Temp. °F 195 @ 15123'		Mean Annual Temp. °F 60		Baro. Press. - P _g 13.2		State NEW MEXICO		
L 1.5109	H 15109	Gg .679	% CO ₂ 1.38	% N ₂ .43	% H ₂ S .00	Prover .0	Meter Run 4.0	Taps FLANGE		

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
SI							9511.	78.			72.0
1.	4.03 X 2.375			700.	3.0	88	9067	78	0.	0.	.3
2.	4.03 X 2.375			720.	8.0	81	8649	78	0.	0.	.3
3.	4.03 X 2.375			720.	21.0	71	7980	78	0.	0.	.3
4.	4.03 X 2.375			730	34.0	58	6766	78	0.	0.	.3
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	28.98	46.26	713.2	.9741	1.2139	1.0656	1689.
2	28.98	76.59	733.2	.9804	1.2139	1.0712	2829.
3	28.98	124.09	733.2	.9896	1.2139	1.0768	4652.
4	28.98	158.96	743.2	1.0019	1.2139	1.0865	6087.
5.							

NO.	P _t	Temp. °R	T _f	Z	Gas Liquid Hydrocarbon Ratio .000 Mcf/bbl.
1.	1.06	548	1.44	.881	A.P.I. Gravity of Liquid Hydrocarbons .0 Deg.
2.	1.09	541	1.43	.872	Specific Gravity Separator Gas .679 X X X X X X X X
3.	1.09	531	1.40	.862	Specific Gravity Flowing Fluid X X X X X .679
4.	1.10	518	1.36	.847	Critical Pressure 674. P.S.I.A. 674. P.S.I.A.
5.					Critical Temperature 380. R 380. R

NO.	P _t ²	P _w	P _w ²	P _t ² - P _w ²	$(1) \frac{P_t^2}{P_t^2 - P_w^2} = 2.0628$ $(2) \left[\frac{P_t^2}{P_t^2 - P_w^2} \right]^n = 1.7307$ $AOF = Q \left[\frac{P_t^2}{P_t^2 - P_w^2} \right]^n = 11221$
1		9070.	82268.	8170	
2		8659	74978	15460	
3		8013	64207	26232	
4		6826	46596	43842	
5					

Absolute Open Flow 11221 Mcfd @ 15.025		Angle of Slope θ 52.5	Slope, n .767
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APPROVED BY COMMISSION: DELTON

Approved By: Commission	Conducted By: Well Testing	Calculated By: Delton Shirley	Checked By: C.D. Gritz
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COMPANY DUSTY MAC RESOURCES

WELL MADERA FEDERAL 30-1

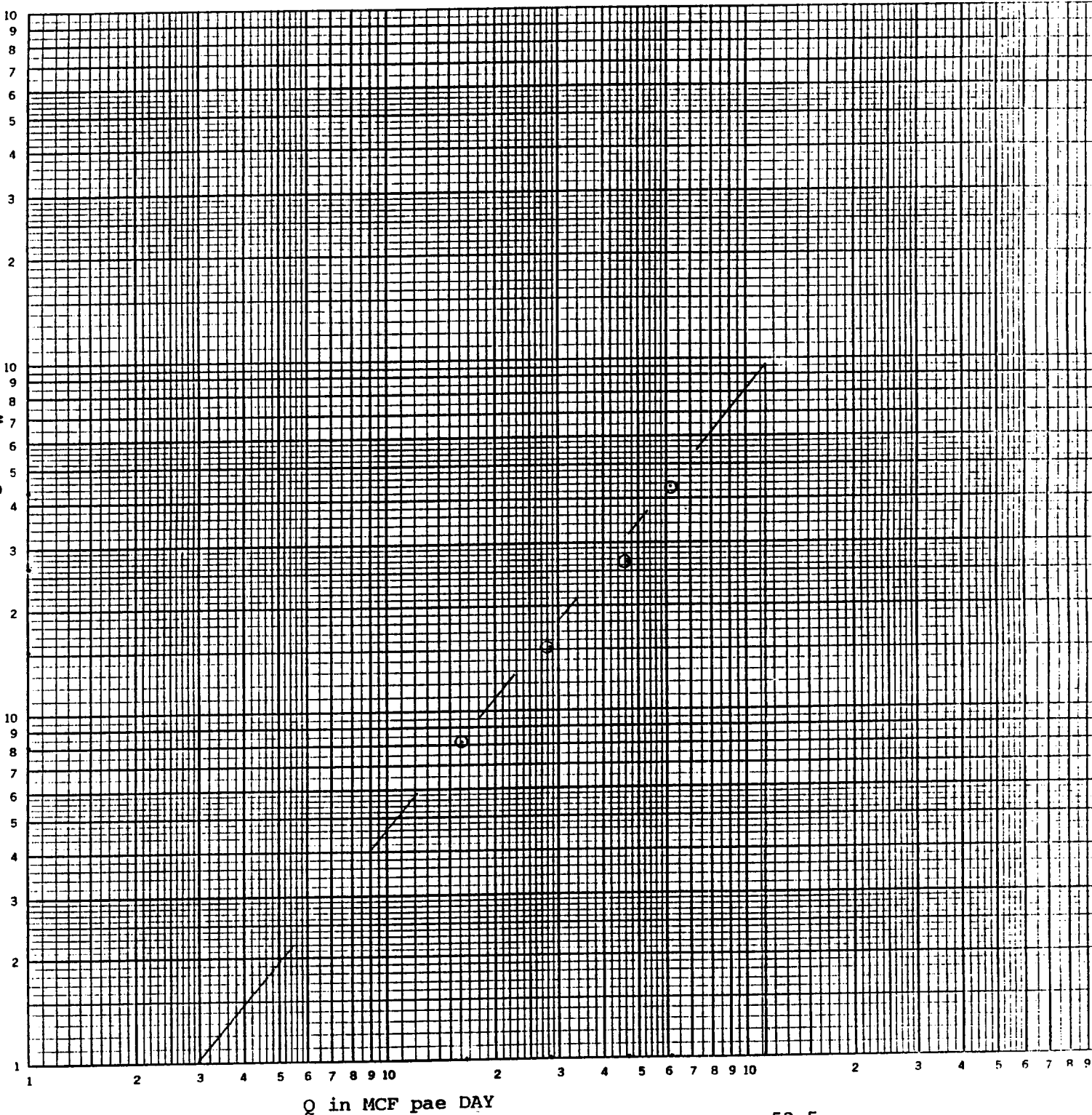
LOCATION

COUNTY LEA

DATE JULY 21, 1994

$p_c^2 - p_w^2$ Thousands

K*Σ LOGARITHMIC 3 X 3 CYCLES
KEUFFEL & ESSER CO. MADE IN U.S.A.



$e = 52.5$
 $N = .767$
 $Q = 11221$