

NEW MEXICO OIL CONSERVATION COMMISSION

HOBBBS OFFICE 00 Form C-122

MULTI-POINT BACK PRESSURE TEST FOR GAS WELLS

Revised 12-1-55

10:14

Pool Jalmat Formation Yates County Lea
Initial _____ Annual _____ Special XX Date of Test 11-12/11-16-56
Company Skelly Oil Company Lease King "C" Well No. 1
Unit G Sec. 1 Twp. 23 S Rge. 36 E Purchaser El Paso Natural Gas Company
Casing 7" Wt. 20# I.D. 6.456" Set at 2885' Perf. _____ To _____
Tubing None Wt. _____ I.D. _____ Set at _____ Perf. _____ To _____
Gas Pay: From 2980 To 3485 L 2885 xG 0.665 -GL 1919 Bar.Press. 13.2
Producing Thru: Casing XX Tubing _____ Type Well Single
Single-Bradenhead-G. G. or G.O. Dual
Date of Completion: 12-12-49 Packer None Reservoir Temp. _____

OBSERVED DATA

Tested Through (Proven)(Choker) (Meter) Type Taps _____

No.	Flow Data			Tubing Data		Casing Data		Duration of Flow Hr.
	(Proven)(Choker) (Line) Size	(Orifice) Size	Press. psig	Diff. h _w	Temp. °F.	Press. psig	Temp. °F.	
SI								
1.	4	1.500	818	19.36	70		876	
2.	4	1.500	809	36.00	71		876	
3.	4	1.500	791	50.41	69		810	
4.	4	1.500	749	84.64	70		794	
5.							755 *	

*Not enough draw down because of high line pressure.

FLOW CALCULATIONS

No.	Coefficient (24-Hour)	$\sqrt{h_w p_f}$	Pressure psia	Flow Temp. Factor F _t	Gravity Factor F _g	Compress. Factor F _{pv}	Rate of Flow Q-MCFPD @ 15.025 psia
1.	13.99	126.44		0.9905	0.9498	1.083	1,808
2.	13.99	172.03		0.9396	0.9498	1.083	2,450
3.	13.99	201.32		0.9915	0.9498	1.085	2,877
4.	13.99	253.96		0.9905	0.9498	1.075	3,593
5.							

PRESSURE CALCULATIONS

Gas Liquid Hydrocarbon Ratio _____ cf/bbl.
Gravity of Liquid Hydrocarbons _____ deg.
F_c 0.4682 (1-e^{-s}) 0.124

Specific Gravity Separator Gas _____
Specific Gravity Flowing Fluid _____
P_c 889.2 P_c² 790.7

No.	P _w P _t (psia)	P _t ²	F _c Q	(F _c Q) ²	(F _c Q) ² (1-e ^{-s})	P _w ²	P _c ² -P _w ²	Cal. P _w	P _w P _c
1.	832.2	692.6	0.85	0.7	0.09	692.7	93.0		
2.	823.2	677.7	1.15	1.3	0.16	677.9	112.9		
3.	807.2	651.6	1.35	1.8	0.23	651.8	133.9		
4.	768.2	590.1	1.66	2.8	0.35	590.5	200.2		
5.									

Absolute Potential: 3,900 MCFPD; n 0.659COMPANY Skelly Oil CompanyADDRESS Box 38, Hobbs, New Mexico

AGENT and TITLE _____

WITNESSED _____

COMPANY _____

REMARKS

FAR
65011

INSTRUCTIONS

This form is to be used for reporting multi-point back pressure tests on gas wells in the State, except those on which special orders are applicable. Three copies of this form and the back pressure curve shall be filed with the Commission at Box 871, Santa Fe.

The log log paper used for plotting the back pressure curve shall be of at least three inch cycles.

NOMENCLATURE

Q = Actual rate of flow at end of flow period at W. H. working pressure (P_w).
MCF/da. @ 15.025 psia and 60° F.

P_c = 72 hour wellhead shut-in casing (or tubing) pressure whichever is greater.
psia

P_w = Static wellhead working pressure as determined at the end of flow period.
(Casing if flowing thru tubing, tubing if flowing thru casing.) psia

P_t = Flowing wellhead pressure (tubing if flowing through tubing, casing if flowing through casing.) psia

P_f = Meter pressure, psia.

h_w = Differential meter pressure, inches water.

F_g = Gravity correction factor.

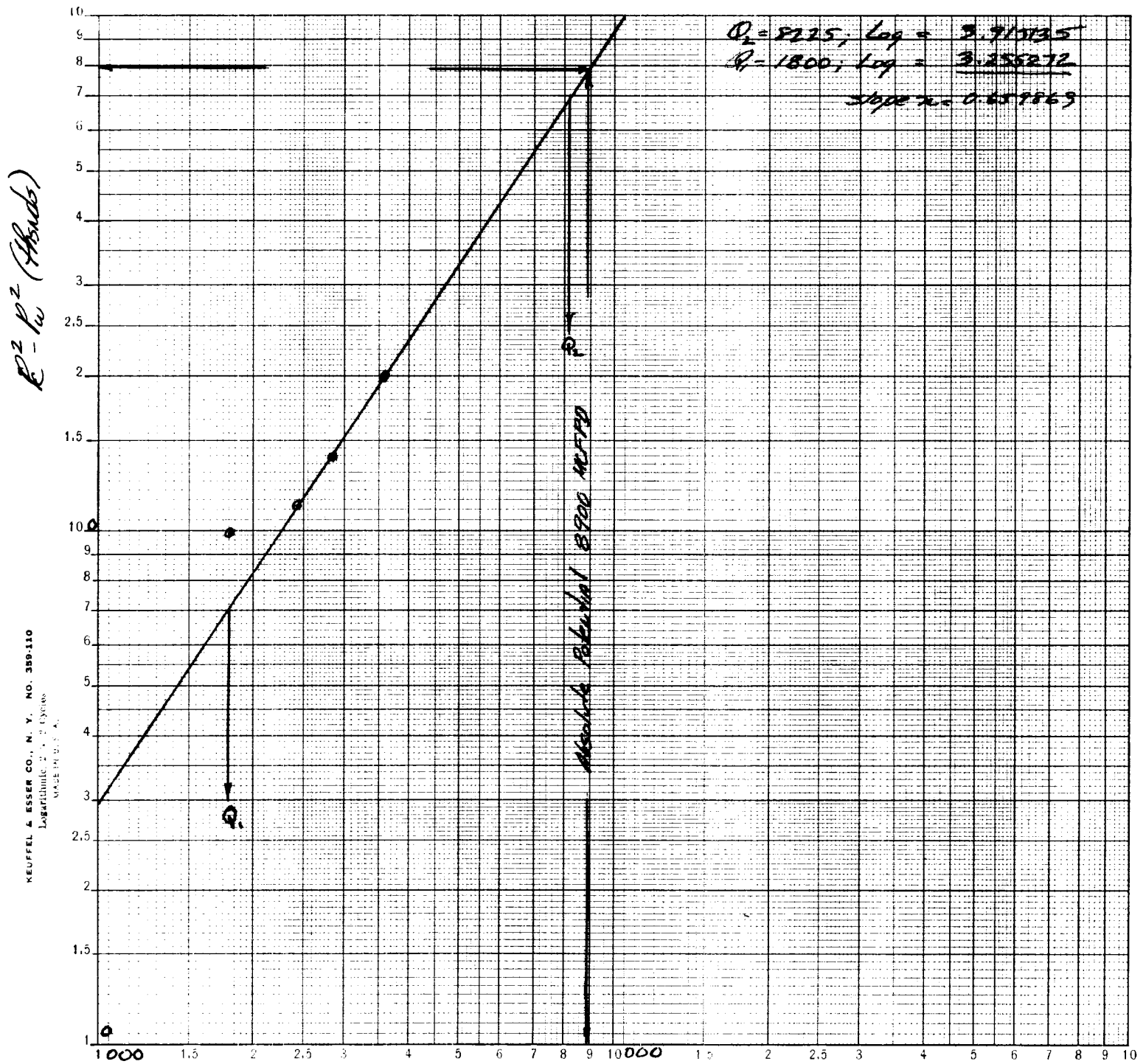
F_t = Flowing temperature correction factor.

F_{pv} = Supercompressability factor.

n = Slope of back pressure curve.

Note: If P_w cannot be taken because of manner of completion or condition of well, then P_w must be calculated by adding the pressure drop due to friction within the flow string to P_t .

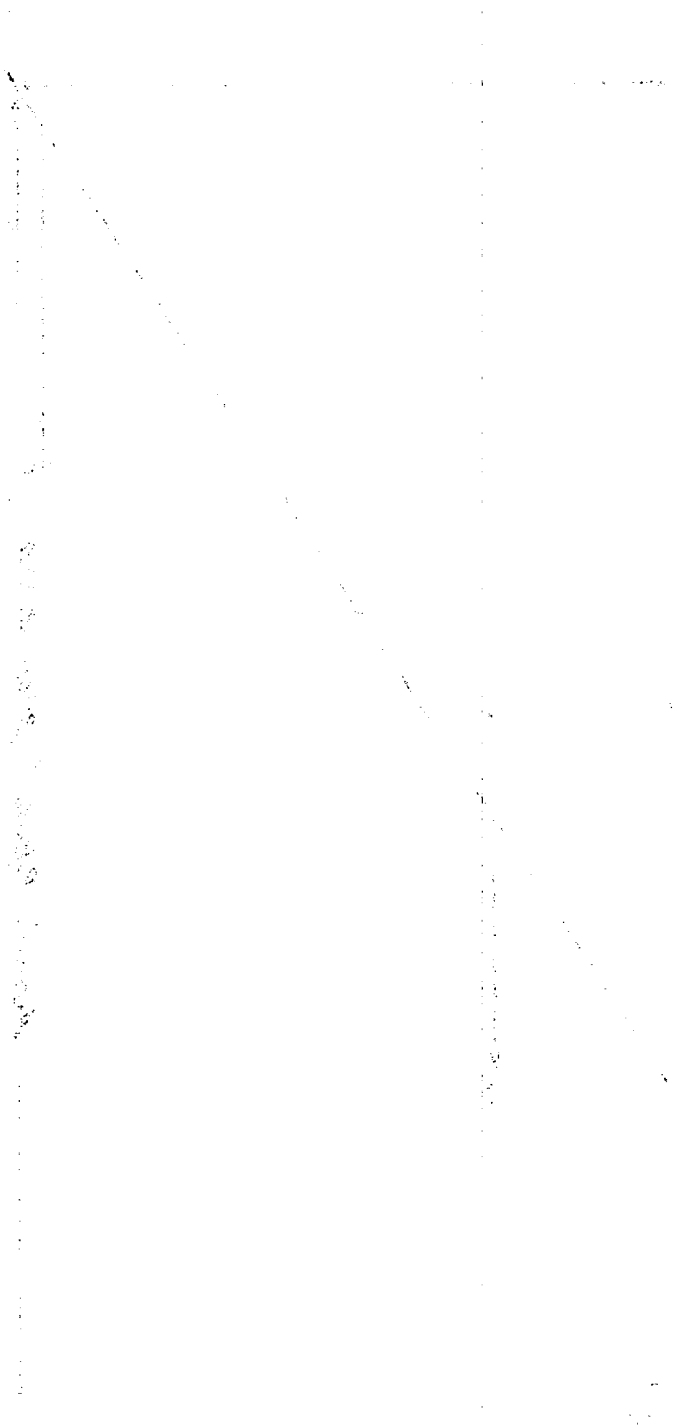
SKELLY OIL CO
KING "C" #1
1-23-36 Lea, N.M.



Q - MCFPD - 15.025 psia 60°F

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