NEW MEXICO OIL CONSERVATION COMMISSION

Form C-122

Revised 12-1-55

MULTI-POINT BACK PRESSURE TEST FOR GAS WELLS

Pool Jalmat Formation Yates County Lea

Initial ____ Annual ____ Special X Date of Test 3/3-3/11/60

Company Dalport Oil Corporation Lease Lunt B Well No. 1

Unit P Sec. 20 Twp. 22S Rge. 36E Purchaser El Paso Natural Gas Company

Casing 5½ Wt. 14# I.D. ____ Set at 3400 Perf. ____ To ____

Tubing 2 Wt. 4.7 I.D. ____ Set at 3160 Perf. ____ To ____

Gas Pay: From 3164 To 3363 L 3160 xG .674 =GL 2130 Bar.Press. 13.2

Producing Thru: Casing ____ Tubing X Type Well Single
Single-Bradenhead-G. G. or G.O. Dual

Date of Completion: 3-4-59 Packer None Reservoir Temp. ____

OBSERVED DATA

Tested Through (Prover) (Choke) (Meter) Type Taps Flange

No.	Flow Data (Prover) (Line) Size	Flow Data (Choke) (Orifice) Size	Flow Data Press. psig	Flow Data Diff. h_w	Flow Data Temp. °F.	Tubing Data Press. psig	Tubing Data Temp. °F.	Casing Data Press. psig	Casing Data Temp. °F.	Duration of Flow Hr.
SI						660				72
1.	4	1.000	218	9.00	70	327				24
2.	4	1.000	186	16.00	71	307				24
3.	4	1.000	218	14.44	74	325				24
4.	4	1.000	220	16.00	68	330				24
5.										

FLOW CALCULATIONS

No.	Coefficient (Flange) (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.	6.135	45.62	231.2	.9905	.9435	1.022	267.2
2.	6.135	56.45	199.2	.9896	.9435	1.019	329.4
3.	6.135	57.77	231.2	.9868	.9435	1.022	337.1
4.	6.135	61.08	233.2	.9924	.9435	1.023	358.9
5.							

PRESSURE CALCULATIONS

Gas Liquid Hydrocarbon Ratio * cf/bbl.
Gravity of Liquid Hydrocarbons ____ deg.
F_c 9.936 $(1-e^{-s})$ 0.136

Specific Gravity Separator Gas .674
Specific Gravity Flowing Fluid ____
P_c 673.2 P_c^2 453.2

No.	P_t (psia)	P_t^2	F_cQ	$(F_cQ)^2$	$\frac{(F_cQ)^2}{(1-e^{-s})}$	P_w^2	$P_c^2-P_w^2$	Cal. P_w	$\frac{P_w}{P_c}$
1.	340.2	115.7	2.655	7.05	0.96	116.7	336.5	341.6	.5074
2.	320.2	102.5	3.273	10.71	1.46	104.0	349.2	322.5	.4790
3.	338.2	114.4	3.349	11.21	1.52	115.9	337.3	340.4	.5056
4.	343.2	117.8	3.566	12.72	1.73	119.5	333.7	345.7	.5135
5.									

Absolute Potential: 465 MCFPD; n .777

COMPANY DALPORT OIL CORPORATION
ADDRESS 930 Fidelity Union Life Bldg. Dallas, Texas
AGENT and TITLE [signature] President
WITNESSED J. B. Murray
COMPANY El Paso Natural Gas Company, Jal, New Mexico

REMARKS

*This well produced an undetermined amount of water during this test. Poor point alignment on back pressure curve. Therefore the average Jalmat slope of .777 was drawn through the data point corresponding to the highest rate of flow.

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.