

MULTI-POINT BACK PRESSURE TEST FOR GAS WELLS

Pool Jalmar Formation Yates County Lea
 Initial _____ Annual _____ Special X Date of Test 8-22/8-26-60
 Company Jal Oil Company, Inc. Lease Jenkins Well No. 2
 Unit K Sec. 29 Twp. 25 Rge. 37 Purchaser El Paso Natural Gas
 Casing 7" Wt. 20 I.D. _____ Set at 3400 Perf. _____ To _____
 Tubing 2" Wt. 4.7 I.D. _____ Set at 3380 Perf. _____ To _____
 Gas Pay: From 3112 To 3132 L3112 xG0.661 -GL 2057 Bar.Press. 13.2
 Producing Thru: Casing X Tubing _____ Type Well single
 Single-Bradenhead-G. G. or G.O. Dual _____
 Date of Completion: 12-10-51 Packer _____ Reservoir Temp. _____

OBSERVED DATA

Tested Through (~~Flowmeter~~) (~~Orifice~~) (Meter) _____ Type Taps flange

No.	Flow Data					Tubing Data		Casing Data		Duration of Flow Hr.
	(Prover) (Line) Size	(Choke) (Orifice) Size	Press. psig	Diff. h _w	Temp. °F.	Press. psig	Temp. °F.	Press. psig	Temp. °F.	
SI								<u>450</u>		<u>72</u>
1.	<u>4</u>	<u>.750</u>	<u>119</u>	<u>1.00</u>	<u>106</u>			<u>432</u>		<u>24</u>
2.	<u>4</u>	<u>.750</u>	<u>90</u>	<u>3.61</u>	<u>95</u>			<u>395</u>		<u>24</u>
3.	<u>4</u>	<u>.750</u>	<u>136</u>	<u>5.29</u>	<u>92</u>			<u>375</u>		<u>24</u>
4.	<u>4</u>	<u>.750</u>	<u>133</u>	<u>9.61</u>	<u>88</u>			<u>315</u>		<u>24</u>
5.										

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.	<u>3.435</u>	<u>11.50</u>		<u>.9585</u>	<u>.9527</u>	<u>1.009</u>	<u>36.39</u>
2.	<u>3.435</u>	<u>19.30</u>		<u>.9680</u>	<u>.9527</u>	<u>nil</u>	<u>61.13</u>
3.	<u>3.435</u>	<u>28.09</u>		<u>.9706</u>	<u>.9527</u>	<u>1.012</u>	<u>90.29</u>
4.	<u>3.435</u>	<u>37.48</u>		<u>.9741</u>	<u>.9527</u>	<u>1.012</u>	<u>120.9</u>
5.							

PRESSURE CALCULATIONS

Gas Liquid Hydrocarbon Ratio dry cf/bbl.
 Gravity of Liquid Hydrocarbons _____ deg.
 F_c 0.707 (1-e^{-s}) 0.132
 Specific Gravity Separator Gas _____
 Specific Gravity Flowing Fluid _____
 P_c 463.2 P_c 214.5

No.	P _{xx} 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.	<u>445.2</u>	<u>198.2</u>				<u>198.2</u>	<u>16.3</u>		<u>.96</u>
2.	<u>408.2</u>	<u>166.2</u>				<u>166.6</u>	<u>47.9</u>		<u>.88</u>
3.	<u>388.2</u>	<u>150.7</u>	<u>- Neg.</u>	<u>*</u>		<u>150.7</u>	<u>63.8</u>		<u>.868</u>
4.	<u>328.2</u>	<u>107.7</u>				<u>107.7</u>	<u>106.8</u>		<u>.708</u>
5.									

Absolute Potential: 192 MCFPD; n .632 .570
 COMPANY Jal Oil Company, Inc.
 ADDRESS Drawer Z, Jal, New Mexico
 AGENT and TITLE Ladell Ellis, Prod. Supt.
 WITNESSED J.B. Murray
 COMPANY El Paso Natural Gas

REMARKS

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} = Supercompressibility 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 .

JAL OIL COMPANY, INC.
 JENKINS No 2
 K-29-25-37 LEA Co., N.M.
 8-26-60

$R_2 - R_{w2} = (4 \text{ hrs})$

$Q_2 = 240 \text{ LOG } 2.380211$
 $Q_1 = 586 \text{ LOG } 1.778008$
 SLOPE $n = .632023$

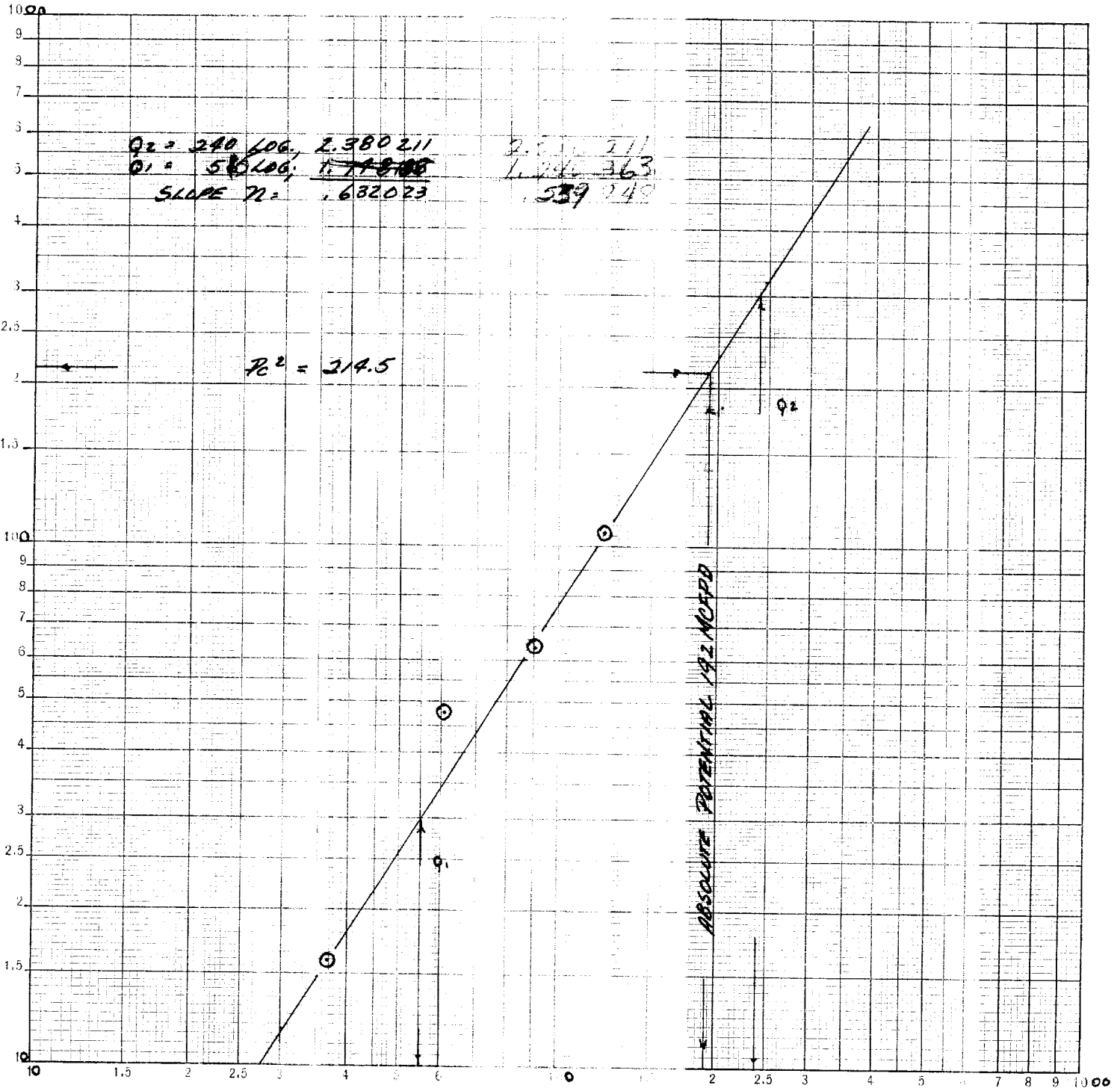
2.380211
 1.778008
 $.539248$

$R_2 = 314.5$

ABSOLUTE POTENTIAL 192 MCFPD

$Q = \text{MCFPD}$

LOGARITHMIC 359-110
 KEUFFEL & ESSER CO. MADE IN U.S.A.
 2 X 2 CYCLES



1. *Pharmaceutical industry*—United States—History. I. Title. II. Series.

Journal of Management Education 30(6)br/>© The Author(s)
10.1177/0095647206288111
<http://jme.sagepub.com>

1997, 1998, 1999, 2000, 2001, 2002, 2003, 2004, 2005, 2006, 2007, 2008, 2009, 2010, 2011, 2012, 2013, 2014, 2015, 2016, 2017, 2018, 2019, 2020, 2021, 2022, 2023, 2024, 2025, 2026, 2027, 2028, 2029, 2030, 2031, 2032, 2033, 2034, 2035, 2036, 2037, 2038, 2039, 2040, 2041, 2042, 2043, 2044, 2045, 2046, 2047, 2048, 2049, 2050, 2051, 2052, 2053, 2054, 2055, 2056, 2057, 2058, 2059, 2060, 2061, 2062, 2063, 2064, 2065, 2066, 2067, 2068, 2069, 2070, 2071, 2072, 2073, 2074, 2075, 2076, 2077, 2078, 2079, 2080, 2081, 2082, 2083, 2084, 2085, 2086, 2087, 2088, 2089, 2090, 2091, 2092, 2093, 2094, 2095, 2096, 2097, 2098, 2099, 2100, 2101, 2102, 2103, 2104, 2105, 2106, 2107, 2108, 2109, 2110, 2111, 2112, 2113, 2114, 2115, 2116, 2117, 2118, 2119, 2120, 2121, 2122, 2123, 2124, 2125, 2126, 2127, 2128, 2129, 2130, 2131, 2132, 2133, 2134, 2135, 2136, 2137, 2138, 2139, 2140, 2141, 2142, 2143, 2144, 2145, 2146, 2147, 2148, 2149, 2150, 2151, 2152, 2153, 2154, 2155, 2156, 2157, 2158, 2159, 2160, 2161, 2162, 2163, 2164, 2165, 2166, 2167, 2168, 2169, 2170, 2171, 2172, 2173, 2174, 2175, 2176, 2177, 2178, 2179, 2180, 2181, 2182, 2183, 2184, 2185, 2186, 2187, 2188, 2189, 2190, 2191, 2192, 2193, 2194, 2195, 2196, 2197, 2198, 2199, 2200, 2201, 2202, 2203, 2204, 2205, 2206, 2207, 2208, 2209, 2210, 2211, 2212, 2213, 2214, 2215, 2216, 2217, 2218, 2219, 2220, 2221, 2222, 2223, 2224, 2225, 2226, 2227, 2228, 2229, 2230, 2231, 2232, 2233, 2234, 2235, 2236, 2237, 2238, 2239, 2240, 2241, 2242, 2243, 2244, 2245, 2246, 2247, 2248, 2249, 2250, 2251, 2252, 2253, 2254, 2255, 2256, 2257, 2258, 2259, 2260, 2261, 2262, 2263, 2264, 2265, 2266, 2267, 2268, 2269, 2270, 2271, 2272, 2273, 2274, 2275, 2276, 2277, 2278, 2279, 2280, 2281, 2282, 2283, 2284, 2285, 2286, 2287, 2288, 2289, 2290, 2291, 2292, 2293, 2294, 2295, 2296, 2297, 2298, 2299, 2300, 2301, 2302, 2303, 2304, 2305, 2306, 2307, 2308, 2309, 2310, 2311, 2312, 2313, 2314, 2315, 2316, 2317, 2318, 2319, 2320, 2321, 2322, 2323, 2324, 2325, 2326, 2327, 2328, 2329, 2330, 2331, 2332, 2333, 2334, 2335, 2336, 2337, 2338, 2339, 2340, 2341, 2342, 2343, 2344, 2345, 2346, 2347, 2348, 2349, 2350, 2351, 2352, 2353, 2354, 2355, 2356, 2357, 2358, 2359, 2360, 2361, 2362, 2363, 2364, 2365, 2366, 2367, 2368, 2369, 2370, 2371, 2372, 2373, 2374, 2375, 2376, 2377, 2378, 2379, 2380, 2381, 2382, 2383, 2384, 2385, 2386, 2387, 2388, 2389, 2390, 2391, 2392, 2393, 2394, 2395, 2396, 2397, 2398, 2399, 2400, 2401, 2402, 2403, 2404, 2405, 2406, 2407, 2408, 2409, 2410, 2411, 2412, 2413, 2414, 2415, 2416, 2417, 2418, 2419, 2420, 2421, 2422, 2423, 2424, 2425, 2426, 2427, 2428, 2429, 2430, 2431, 2432, 2433, 2434, 2435, 2436, 2437, 2438, 2439, 2440, 2441, 2442, 2443, 2444, 2445, 2446, 2447, 2448, 2449, 2450, 2451, 2452, 2453, 2454, 2455, 2456, 2457, 2458, 2459, 2460, 2461, 2462, 2463, 2464, 2465, 2466, 2467, 2468, 2469, 2470, 2471, 2472, 2473, 2474, 2475, 2476, 2477, 2478, 2479, 2480, 2481, 2482, 2483, 2484, 2485, 2486, 2487, 2488, 2489, 2490, 2491, 2492, 2493, 2494, 2495, 2496, 2497, 2498, 2499, 2500, 2501, 2502, 2503, 2504, 2505, 2506, 2507, 2508, 2509, 2510, 2511, 2512, 2513, 2514, 2515, 2516, 2517, 2518, 2519, 2520, 2521, 2522, 2523, 2524, 2525, 2526, 2527, 2528, 2529, 2530, 2531, 2532, 2533, 2534, 2535, 2536, 2537, 2538, 2539, 2540, 2541, 2542, 2543, 2544, 2545, 2546, 2547, 2548, 2549, 2550, 2551, 2552, 2553, 2554, 2555, 2556, 2557, 2558, 2559, 2560, 2561, 2562, 2563, 2564, 2565, 2566, 2567, 2568, 2569, 2570, 2571, 2572, 2573, 2574, 2575, 2576, 2577, 2578, 2579, 2580, 2581, 2582, 2583, 2584, 2585, 2586, 2587, 2588, 2589, 2590, 2591, 2592, 2593, 2594, 2595, 2596, 2597, 2598, 2599, 2600, 2601, 2602, 2603, 2604, 2605, 2606, 2607, 2608, 2609, 2610, 2611, 2612, 2613, 2614, 2615, 2616, 2617, 2618, 2619, 2620, 2621, 2622, 2623, 2624, 2625, 2626, 2627, 2628, 2629, 2630, 2631, 2632, 2633, 2634, 2635, 2636, 2637, 2638, 2639, 2640, 2641, 2642, 2643, 2644, 2645, 2646, 2647, 2648, 2649, 2650, 2651, 2652, 2653, 2654, 2655, 2656, 2657, 2658, 2659, 2660, 2661, 2662, 2663, 2664, 2665, 2666, 2667, 2668, 2669, 2670, 2671, 2672, 2673, 2674, 2675, 2676, 2677, 2678, 26