

WORK SHEET FOR CALCULATION OF WELLHEAD PRESSURES (P_{wf} or P_w)
FROM KNOWN BOTTOM HOLE PRESSURE (P_{res} or P_s)

COMPANY OXY GEN, INC. LEASE SWEARINGEN WELL NO. A No. 1 DATE 11-13-84

LOCATION: Unit J Section 5 Township 23S Range 28E

* 11341 H 11341 LN 1.000 G .577 % CO₂ .34 % N₂ .25 % H₂S —

* BHP INSTEAD SET IN THIS COLUMN

GH 6542.26 P_{cr} 672 T_{cr} 346

TABLE D. 1

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LINE	1	2	3	4	5	6	7	8
1	$T_w(W.H. \cdot R)$	534	534	534	534	534	534	534
2	$T_g(B.H. \cdot R)$	647	647	647	647	647	647	647
3	$T = \frac{T_w + T_g}{2}$	590.5	590.5	590.5	590.5	590.5	590.5	590.5
4	Z (Est.)	1.017	.977	1.018	.978	.950	.920	1.880
5	TZ	600.5	576.9	601.1	577.5	560.9	543.2	519.6
6	GH/TZ	10.896	11.392	10.885	11.331	11.664	12.045	12.592
7	e^B (Table XIV)	1.504	1.530	1.504	1.529	1.548	1.570	1.603
8	P_{wf} or P_s	5368.2	5368.2	5368.2	5368.2	4515.2	4515.2	3772.2
9	P_{wf}^2 or P_s^2	28817.5	28817.5	28925.0	28925.0	20387.0	20387.0	14229.4
10	$P_{wf}^2 = P_{wf}^2 / e^B$ or $P_s^2 = P_s^2 / e^B$	19151.2	18833.5	19230.3	18911.9	13163.6	12997.2	8873.6
11	P_{wf} or P_w	4376.2	4339.7	4381.2	4348.7	3628.1	3602.3	2978.5
12	$P_{wf} = \frac{P_{wf} + P_s}{2}$ or $(\frac{P_{wf} + P_s}{2})$	4872.2	4853.9	4881.7	4863.5	4071.6	4058.7	3383.5
13	$P_{wf} = (P/P_{cr})$	7.25	7.23	7.26	7.24	6.05	6.04	5.03
14	$T_r = (T/T_{cr})$	1.70	1.70	1.70	1.70	1.70	1.70	1.70
15	Z (Table XI)	1.977	.976	.978	.977	.920	.920	.880