

WORK SHEET FOR STEPWISE CALCULATION

(SUBSURFACE) PRESSURE (P_c & P_w)

Form C-122-E
Adopted 9-1-65

1st

COMPANY Liberty Oil & Gas LEASE Lee Federal Com WELL NO. 2 DATE 3/29/83

LOCATION: Unit 10619 Section 25 Township 20s Range 20e

L 10619 H 10619 L/H 1,000 G 6444 % CO₂ 391 % N₂ 1.970 % H₂S 372

d 1.995 F_r .018231 Q_m 0 M^2 -cfd (L/H) ($F_r Q_m$)² 0 P_{cr} 670 T_{cr} 372

TABLE 13.3.3

LINE	ITEM	SOURCE	1	2	3	4	5	6	7	8	9	10
1	H		10619	5309.5		0						
2	GH		6842.9	3421.4		0						
3	37.5GH		256608	128304		0						
4	P_c or P_n		4433.3	3963.6	3954.7	3476.6	3450.0	3451.3				
5	P_r		6.62	5.92	5.90	519	5.15	5.15				
6	T		640	587	587	534	534	534				
7	T_r		1.72	1.58	1.58	1.44	1.44	1.44				
8	Z		.946	.888	.887	.797	.795	.795				
9	P/Z P/Z	4-8	4686.4	4463.5	4458.5	4362.1	4339.6	4341.2				
10	P/TZ	9-6	7.3224	7.6039	7.5954	8.1688	8.1266	8.1296				
11	$(P/TZ)^2/1000$	10-2/1000										
12	$L/H(F_r Q_m)^2$											
13	$I_1 + I_2$											
14	I_n	10-13	136.568	131.511	131.659	122.417	123.053	123.007				
15	$M = P_n - P_{n-1}$			470	479	478	505	503				
16	$N = I_n + I_{n-1}$			268.079	268.227	254.076	254.712	254.666				
17	$M \times N$	15-16			128375			128210				
18	$\Sigma(M \times N)$	$\Sigma 17$			128233							