



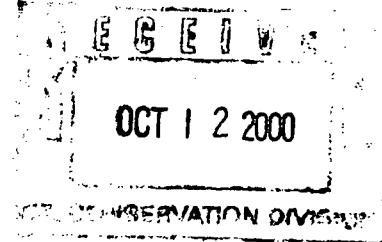
Texaco Exploration and Production Inc
Permian Basin Business Unit
Hobbs Operating Unit

P. O. Box 3109
Midland TX 79702-3019
505 688 4100

1 P1-146 N/R
29334934

October 9, 2000

New Mexico Oil Conservation Division
P.O. Box 2088
Santa Fe NM 87501



Attention: Mr. Mark Ashley

RE: **Request for Increase in Surface Injection Pressure Limit**
Texaco Exploration & Production Inc

Central Vacuum Unit Well No. 242
Section 36, T 17 S, R 34 E, Lea County, New Mexico, and
Vacuum Grayburg San Andres Unit No. 30 (30-025-24307)
Section 2, T 18 S, R 34 E, Lea County, New Mexico

R-4442

Dear Mr. Ashley,

Texaco requests permission to inject into the subject wells at a higher pressure than what is currently permitted. Step rate tests were performed on CVU No. 242 on October 3 and on VGSAU No. 30 on October 4.

The test of CVU No. 242 failed to reveal a break in the rate vs. pressure curve up to a surface water injection pressure (corrected for friction losses) of 1461 PSIG. Based on this result we are asking for pressure limits of 1461 psig while injecting water and 1811 psig for CO₂ injection. The higher injection pressure is needed for optimum CO₂ flood efficiency in this pattern. We plan on injecting CO₂ in this well within the next two years.

The test of VGSAU resulted in a break in the rate vs. pressure curve at a surface water injection pressure (corrected for friction) of 2054 PSIG. We ask for an increase in our maximum allowed water injection pressure to 2054 PSIG.

Copies of the test results are attached for your review. Please call me at 915-688-4577 if you would like to discuss this request.

Yours truly,

Stephen Guillot
Production Engineer

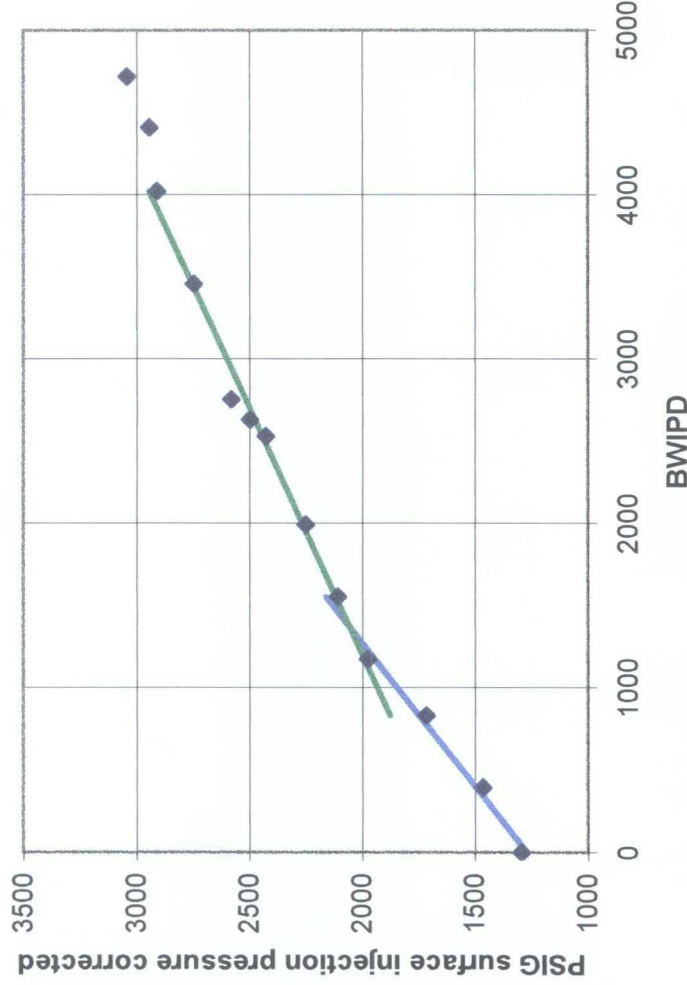
Attachments

cc: Mr. Chris Williams, Hobbs NMOCD

Vacuum Grayburg San Andres Unit No. 30

BWIPD	PSIG*	Line 1	Line 2
0	1294	1267.2	
391.1	1465.3	1491.9	
832.6	1714.4	1745.5	1874.3
1175.9	1973.5	1942.7	1989.1
1554.6	2108.2	2160.2	2115.6
1993.6	2248.6		2262.3
2527.7	2426.8		2440.7
2628.2	2496.4		2474.3
2750.2	2580.8		2515.1
3457.1	2745.6		2751.3
4023.4	2909.1		2940.5
4408.3	2942.3		
4720.0	3042.9		
Line 1	m=	0.574	
	b=	1267.203	
	r^2	0.987	
Line 2	m=	0.334	
	b=	1596.142	
	r^2	0.991	
Intersection =		2054	PSIG
* Surface pressures have been corrected for friction pressure			

VGSAU #30



SWG 10/9/2000



Step Rate Injection Test Report
for
Texaco Exploration & Production, Inc
Grayburg #30

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SECTION III	DATA REPORT
SECTION IV	CHART

Production Testing Services

COMPANY : Texaco Exploration & Production, Inc
 WELL: Grayburg #30
 COMPANY REP: Siamak Saffargar
 PERFORATIONS: 4443 - 4740

PACKER DEPTH: 4400

SERVICE DATES : 10/04/00
 TEST TYPE : Step Rate Injection
 PTS TECHNICIANS : D. Ginanni
 BHP GAUGE DEPTH: N/A

DATE	TIME	REMARKS
10/04/00	9:40	Start Injecting @ 400 BPD
	9:45	
	9:50	
	9:55	Increase to 800 BPD
	10:00	
	10:05	
	10:10	Increase to 1200 BPD
	10:15	
	10:20	
	10:25	Increase to 1600 BPD
	10:30	
	10:35	
	10:40	Increase to 2000 BPD
	10:45	
	10:50	
	10:55	Increase to 2400 BPD
	11:00	
	11:05	
	11:10	Increase to 2800 BPD
	11:15	
	11:20	
	11:25	Increase to 3200 BPD
	11:30	
	11:35	
	11:40	Increase to 3600 BPD
	11:45	

Production Testing Services

COMPANY : Texaco Exploration & Production
WELL: Vacuum G-SA No. 30
COMPANY REP: Siamak Safargar
PERFORATIONS: 4443-4740 PACKER DEPTH: 4400

SERVICE DATES : 10/04/2000
TEST TYPE : Step Rate Injection
PTS TECHNICIANS : D. Ginanni
BHP GAUGE DEPTH: N/A

STEP NO.	TIME	(1) SURFACE TUBING PRESS. (psig)	(2) CUMULATIVE VOL. INJECTED (bbls)	(3) INJECTION RATE (bbls/day)	(4) FRICTION HEAD LOSS (psi)	(5) CORRECTED TUBING PRESS. (psi) (1) - (4)	(6) INJECTION RATE (gpm) (3)/34.2857	(7) MEASURED BHP (psi)
	9:40	1294.5						
	9:45	1422.3	1.3	382.3	3.492	1418.8	11.15	
	9:50	1460.3	2.7	400.4	3.804	1456.5	11.68	
1	9:55	1468.9	4.1	391.1	3.642	1465.3	11.41	
	10:00	1624.6	6.7	749.3	12.127	1612.5	21.85	
	10:05	1727.0	9.6	833.5	14.768	1712.2	24.31	
2	10:10	1729.1	12.5	832.6	14.738	1714.4	24.28	
	10:15	1932.8	16.3	1100.9	24.710	1908.1	32.11	
	10:20	1938.2	20.4	1181.8	28.174	1910.0	34.47	
3	10:25	2001.5	24.5	1175.9	27.914	1973.6	34.30	
	10:30	2157.0	29.6	1465.8	41.964	2115.0	42.75	
	10:35	2160.1	34.9	1544.8	46.244	2113.9	45.06	
4	10:40	2155.0	40.3	1554.6	46.788	2108.2	45.34	
	10:45	2333.8	46.9	1897.0	67.618	2266.2	55.33	
	10:50	2318.0	53.8	1987.0	73.673	2244.3	57.95	
5	10:55	2322.7	60.7	1993.6	74.126	2248.6	58.15	
	11:00	2410.7	68.8	2324.5	98.480	2312.2	67.80	
	11:05	2474.7	77.0	2363.7	101.575	2373.1	68.94	
6	11:10	2527.7	85.2	2355.6	100.932	2426.8	68.71	
	11:15	2619.7	94.4	2657.3	126.141	2493.6	77.50	
	11:20	2630.4	103.9	2721.6	131.845	2498.6	79.38	
7	11:25	2628.2	113.3	2721.0	131.792	2496.4	79.36	
	11:30	2796.5	123.0	2778.9	137.026	2659.5	81.05	
	11:35	2757.3	133.9	3151.3	172.920	2584.4	91.91	
8	11:40	2750.2	144.7	3116.2	169.374	2580.8	90.89	
	11:45	2945.6	156.3	3333.9	191.912	2753.7	97.24	
	11:50	2934.0	168.4	3473.2	207.009	2727.0	101.30	
9	11:55	2950.8	180.4	3457.1	205.238	2745.6	100.83	
	12:00	3226.7	193.9	3892.4	255.589	2971.1	113.53	
	12:05	3245.7	207.8	4013.1	270.444	2975.3	117.05	
10	12:10	3180.8	221.8	4023.4	271.730	2909.1	117.35	
	12:15	3289.1	236.6	4274.6	303.946	2985.2	124.68	
	12:20	3350.8	251.9	4395.0	319.973	3030.8	128.19	

Production Testing Services

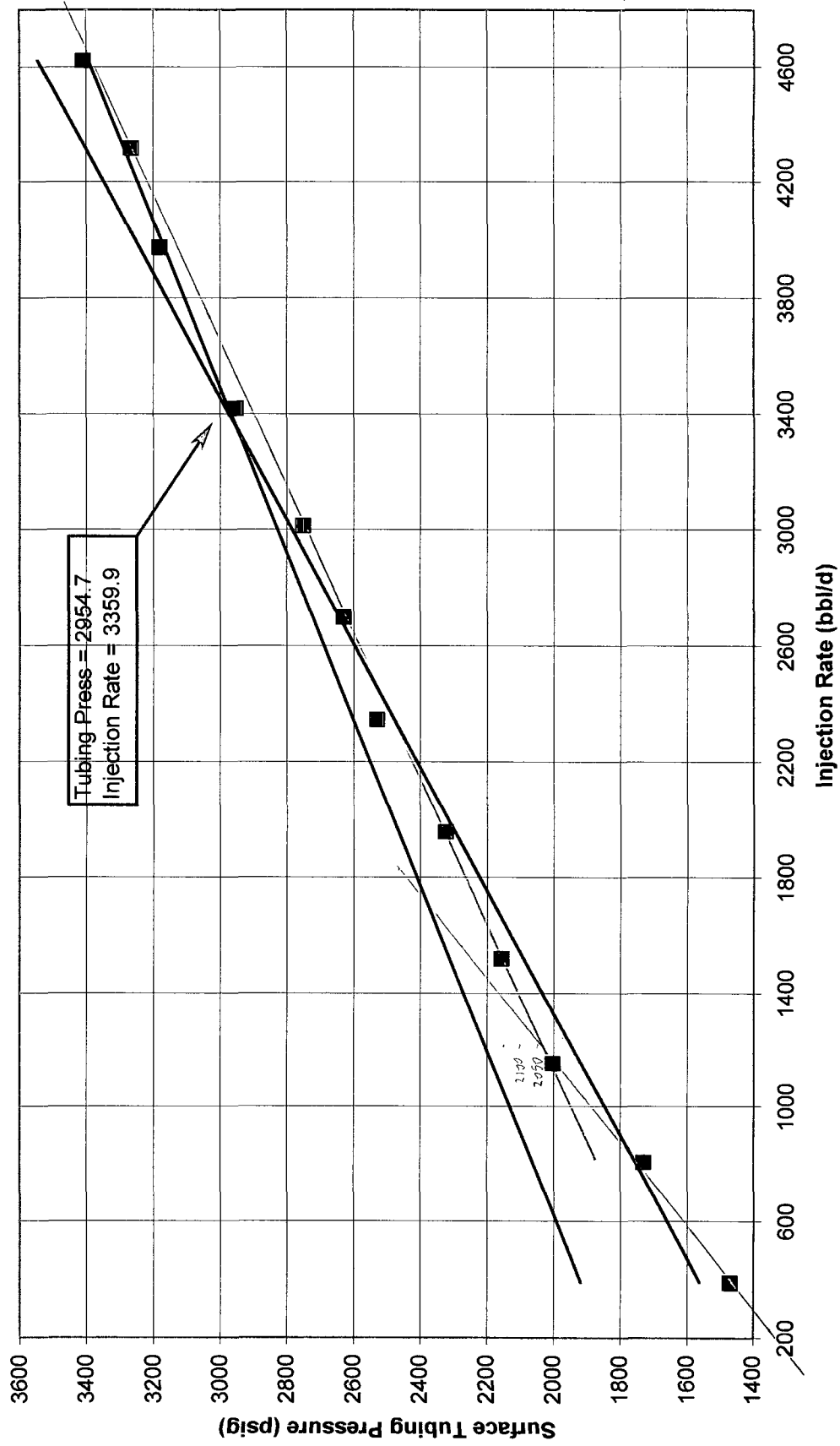
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 TEST TYPE : Step Rate Injection
 PTS TECHNICIANS : D. Ginanni
 BHP GAUGE DEPTH: N/A

STEP NO.	TIME	(1) SURFACE TUBING PRESS. (psig)	(2) CUMULATIVE VOL INJECTED (bbis)	(3) INJECTION RATE (bbis/day)	(4) FRICTION HEAD LOSS (psi)	(5) CORRECTED TUBING PRESS. (psi) (1) - (4)	(6) INJECTION RATE (gpm) (3)/34.2857	(7) MEASURED BHP (psi)
11	12:25	3264.1	267.2	4408.3	321.767	2942.3	128.58	
	12:30	3416.0	283.4	4672.0	358.278	3057.7	136.27	
	12:35	3402.7	300.0	4790.2	375.227	3027.5	139.71	
12	12:40	3408.0	316.4	4720.0	365.117	3042.9	137.67	

Production Testing Services

Step Rate Injection Test



1247 Broadway Pl.
P.O. Box 7125
Hobbs, NM 88240

Phone: (505) 391-8703
Fax: (505) 393-4753