

STATE OF NEW MEXICO
ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT
OIL CONSERVATION DIVISION



BRUCE KING
GOVERNOR

POST OFFICE BOX 2088
STATE LAND OFFICE BUILDING
SANTA FE, NEW MEXICO 87504
(505) 827-5800

May 24, 1991

Texaco USA, Inc.
P.O. Box 730
Hobbs, NM 88240

Attention: James A. Head

*RE: Injection Pressure Increase
Vacuum Grayburg-San Andres Unit
Lea County, New Mexico*

Dear Mr. Head:

Reference is made to your request dated March 21, 1991, to increase the surface injection pressure on six wells within the Vacuum Grayburg-San Andres Unit Pressure Maintenance Project. This request is based on step rate tests submitted with your application. The results of the tests have been reviewed by my staff and we feel an increase in injection pressure on these wells is justified at this time.

You are therefore authorized to increase the surface injection pressure on the following wells.

WELL AND LOCATION

MAXIMUM INJECTION
SURFACE PRESSURE

VGSAU Well No. 16
Unit I, Section 2, T-18 South,
R-34 East, NMPM;

1255 PSIG

VGSAU Well No. 20
Unit J, Section 1, T-18 South,
R-34 East, NMPM;

1260 PSIG

Injection Pressure Increase
Texaco USA, Inc.
May 23, 1991
Page 2

WELL AND LOCATION

MAXIMUM INJECTION
SURFACE PRESSURE

VGSAU Well No. 34
Unit J, Section 1, T-18 South,
R-34 East, NMPM;

1140 PSIG

VGSAU Well No. 46
Unit H, Section 2, T-18 South,
R-34 East, NMPM;

1765 PSIG

VGSAU Well No. 48
Unit F, Section 1, T-18 South,
R-34 East, NMPM;

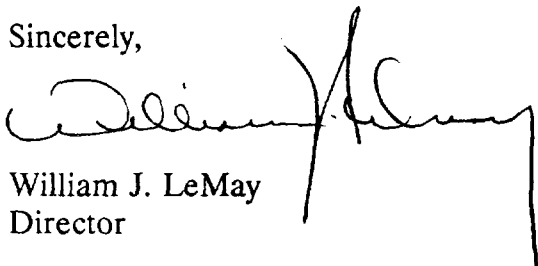
1260 PSIG

VGSAU Well No. 50
Unit G, Section 1, T-18 South,
R-34 East, NMPM.

1050 PSIG

The Division Director may rescind this injection pressure increase if it becomes apparent that the injected water is not being confined to the injection zone or is endangering any fresh water aquifers.

Sincerely,


William J. LeMay
Director

cc: Oil Conservation Division - Hobbs
File: Case No. 4852
R. Brown
D. Catanach

NO WAITING PERIOD

COMPANY: Texaco & USA
ADDRESS: P.O. Box 730
CITY, STATE, ZIP: Albuquerque, N.M. 88240
ATTENTION: J. A. Head

Re: Injection Pressure Increase

Ucruin Grayberg San Andres Unit

Lea County, New Mexico

Dear Sir:

Reference is made to your request dated March 21 1991 to increase the surface injection pressure on Six wells within the Ucruin Grayberg San Andres Unit Pressure Maintenance Project. This request is based on step rate tests conducted on these wells submitted with your application, 19. The results of the tests have been reviewed by my staff and we feel an increase in injection pressure on these wells is justified at this time.

You are therefore authorized to increase the surface injection pressure on the following wells:

<u>Well & Location</u>	<u>Maximum Injection Surface Pressure</u>
<u>UGSPA Well No. 16</u> <u>Unit I, Section 2, T-18Sout, R-34East</u>	<u>255 PSIG</u>
<u>UGSPA Well No. 20</u> <u>Unit I, Section 1, T-18Sout, R-34East</u>	<u>1260 PSIG</u>
<u>UGSPA Well No. 31</u> <u>Unit I, Section 1, T-18Sout, R-34East</u>	<u>1140 PSIG</u>
<u>UGSPA Well No. 46</u> <u>Unit II, Section 2, T-18Sout, R-34East</u>	<u>765 PSIG</u>
<u>UGSPA Well No. 48</u> <u>Unit I, Section 1, T-18Sout, R-34East</u>	<u>2400 PSIG</u>
<u>UGSPA Well No. 50</u> <u>Unit C, Section 1, T-18Sout, R-34East</u>	<u>1050 PSIG</u>

Atan Lea County, New Mexico

The Division Director may rescind this injection pressure increase if it becomes apparent that the injected water is not being confined to the injection zone or is endangering any fresh water aquifers.

xc: T. GALLEGOS

D. CATANACH

FILE-Case 4852

OCD-1660

R. Brown



Texaco USA

ALCOHOL DIVISION
011 02 87 10 03

March 21, 1991

Mr. David R. Catanach
New Mexico Energy, Minerals and Natural Resources Department
Oil Conservation Division
State Land Office Building
310 Old Santa Fe Trail
P.O. Box 2088
Santa Fe, New Mexico 87504

SUBJECT: REQUEST FOR INCREASED SURFACE INJECTION PRESSURE ON
SELECTED WELLS IN THE VACUUM GRAYBURG SAN ANDRES UNIT
LEA COUNTY, NEW MEXICO

Mr. David Catanach:

Texaco request that the surface injection pressure limit be increased for the six wells on the attached list. The requested increases are based on step rate tests which are attached for your review.

The increases in surface injection pressure are necessary to maintain adequate injection rates, thus ensuring the optimum performance of the waterflood.

Should you have any questions or require additional information, please contact Todd Lackey at (505) 393-7191.

Yours very truly,

J. A. Head
Hobbs Area Manager

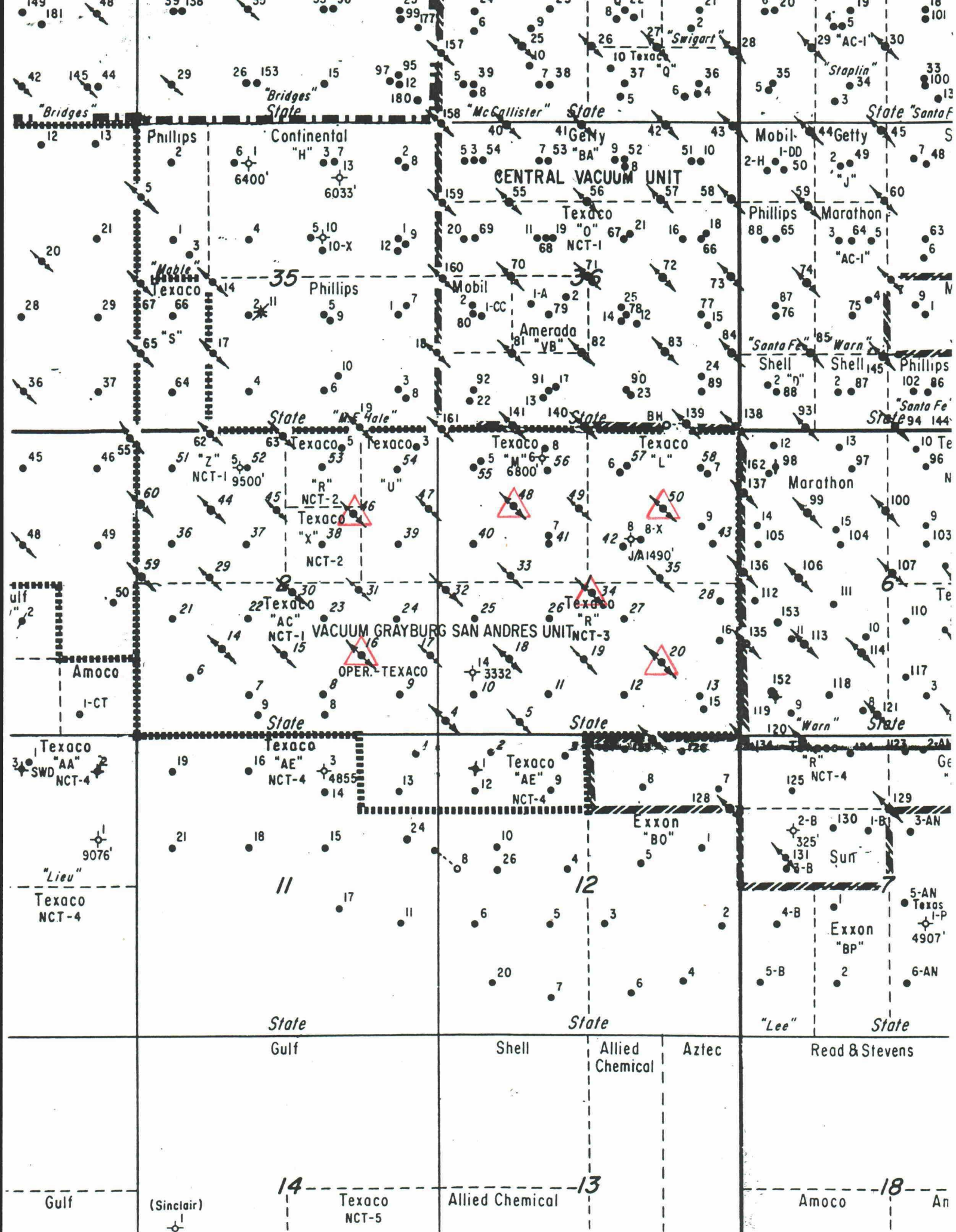
WTL

cc: Mr. Jerry Sexton
Oil Conservation Division
P.O. Box 1980
Hobbs, NM 88240

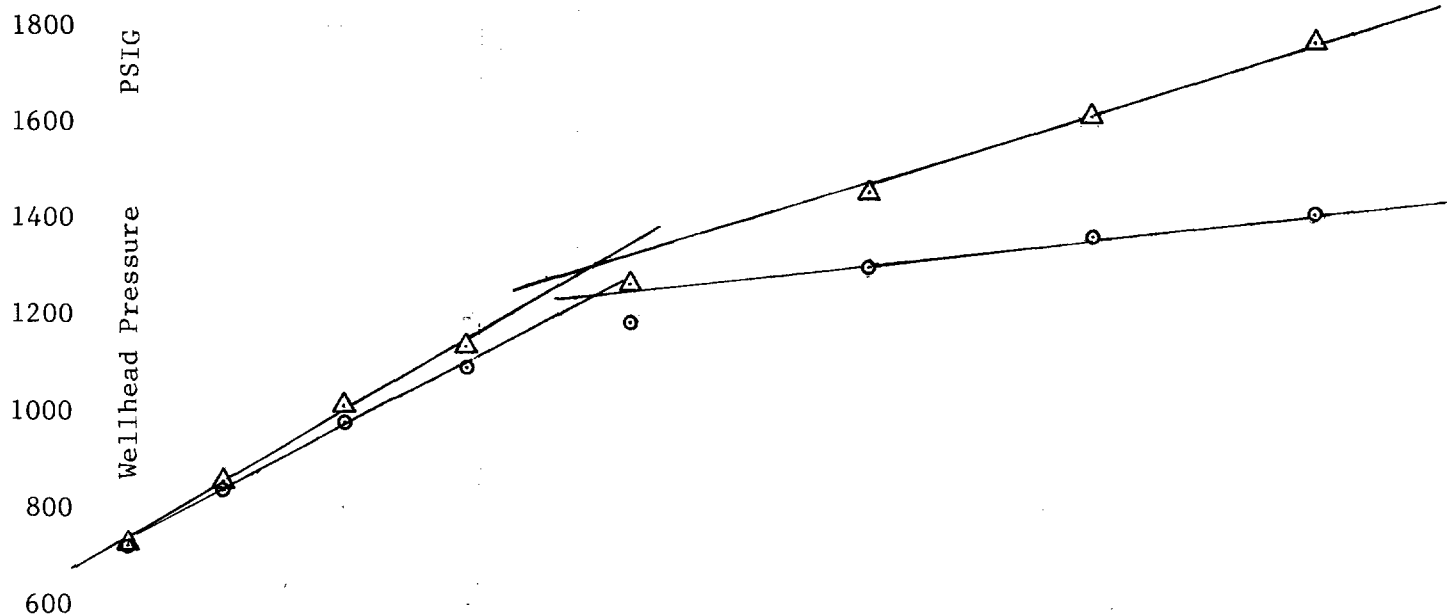
Vacuum Grayburg San Andres Unit
Texaco Producing Inc.
Lea County, New Mexico

<u>Well</u>	<u>Present Allow Inj Press (PSIG)</u>	<u>Observed Surface Parting Press (PISG)</u>	<u>Requested Allow Inj Press (PSIG)</u>
16	1200	1305	1305
20	881	1310	1310
34	920	1140 plus**	1140
46	1415	1815	1815
48	895	1310	1310
50	925	1100	1100

** Did not reach parting pressure. Highest pressure reached during the test without observing a break was 1140 psig. The lowest allowable injection pressure on all other injectors in this unit is 1110 psig. Therefore we are applying for an allowable increase on well No. 13 using 1140 psig as the surface parting pressure.



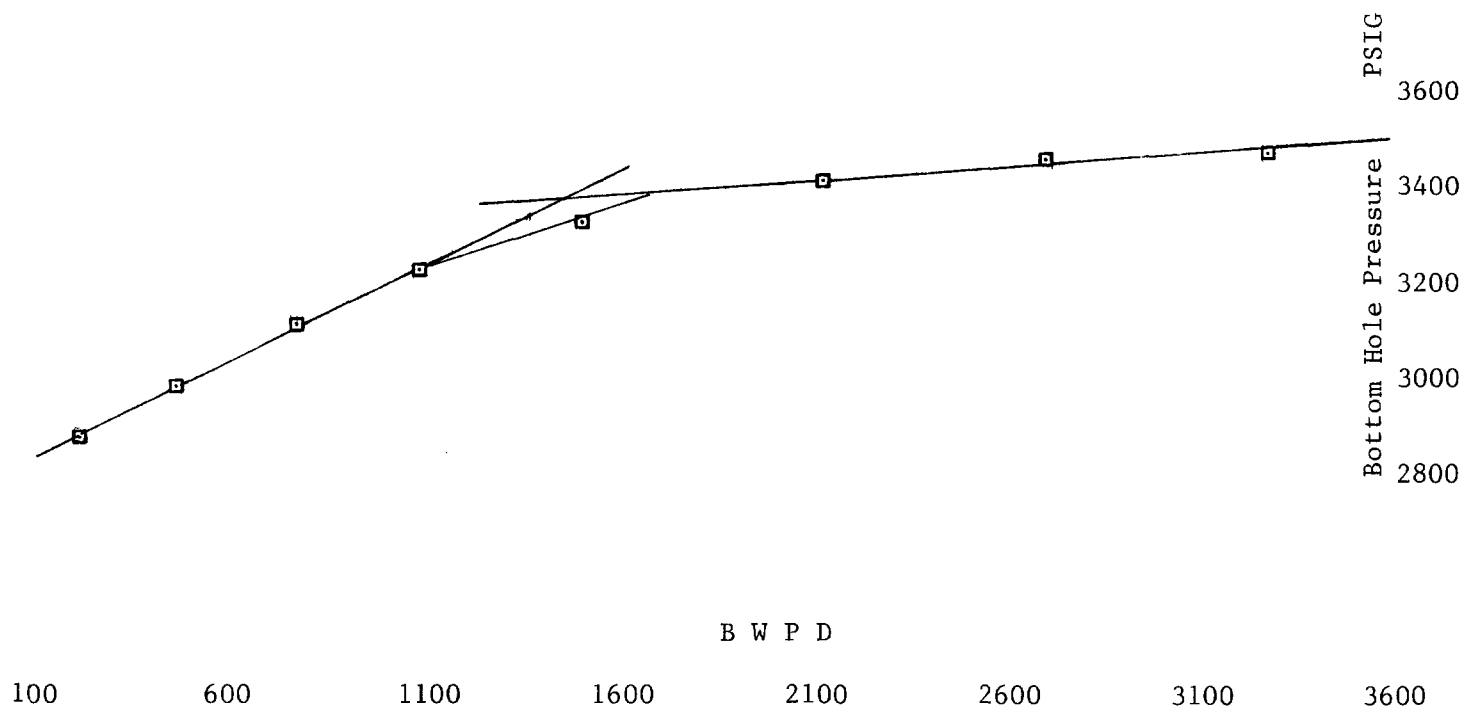
- △ Recorded Wellhead Pressure
- Corrected Wellhead Pressure Based on 2 3/8" Tubing
- Bottom Hole Pressure @ 4,585 Feet



TEXACO PRODUCING, INC.

Vacuum Grayburg San Andres Unit No. 16

Step-rate Injection Test



JOHN WEST ENGINEERING CO.

Step Rate Injection Test

Well Name Vacuum Garyburg San Andres Unit #16

Date 4/27/90

CO. Name Texaco Producing, Inc.

[illegible]

JOHN WEST ENGINEERING CO.

Step Rate Injection Test

Well Name Vacuum Grayburg San Andres Unit #16

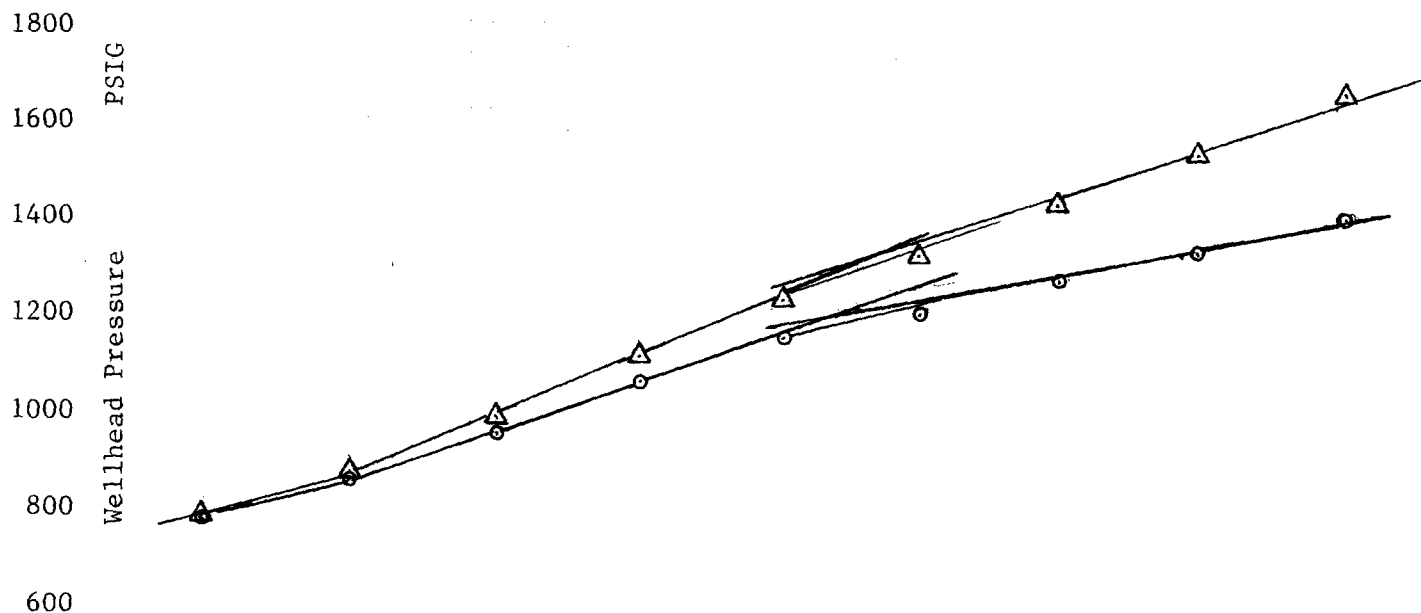
Date 4/27/90

CO. Name Texaco Producing, Inc.

Page 2

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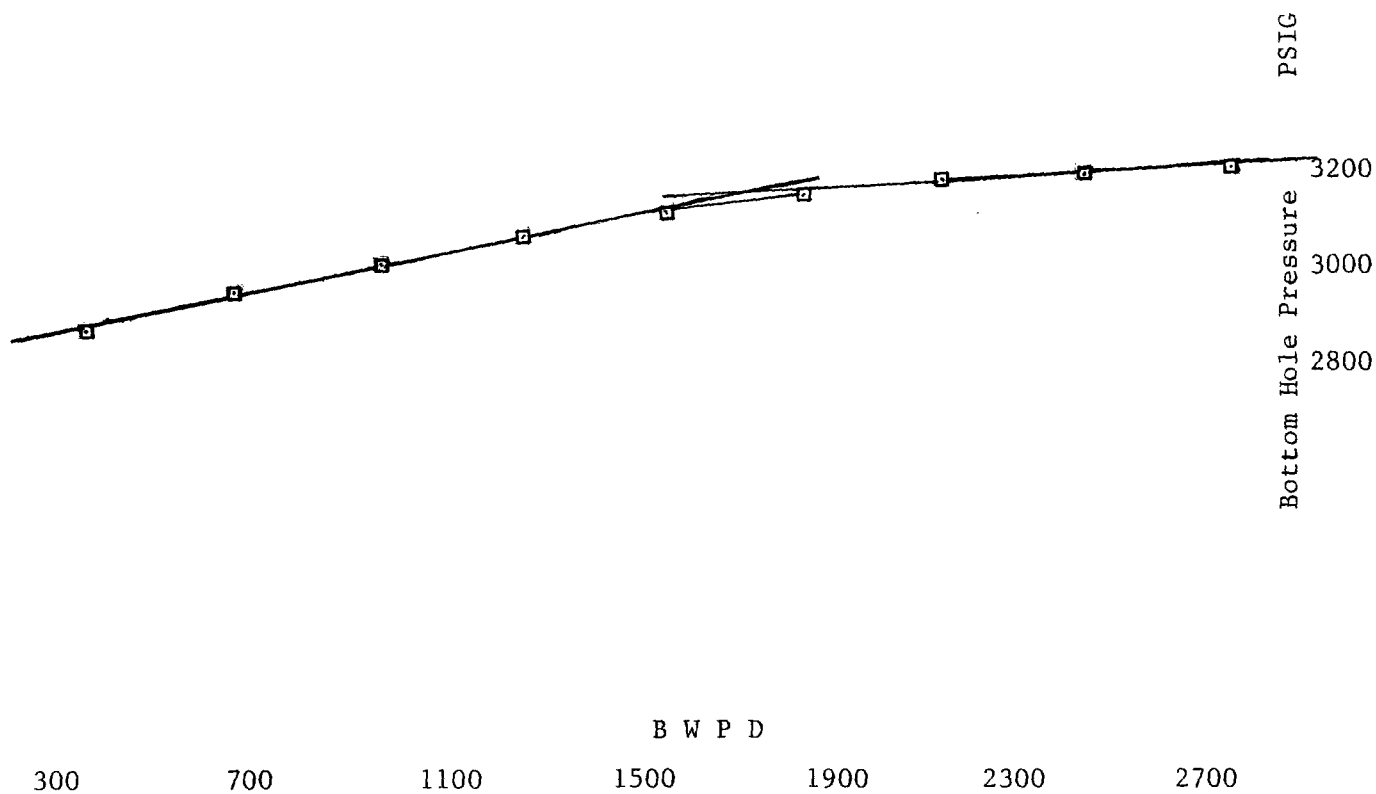
- △ Recorded Wellhead Pressure
- Corrected Wellhead Pressure Based on 2 3/8" Tubing
- Bottom Hole Pressure @ 4,550 Feet



TEXACO PRODUCING, INC.

Vacuum Grayburg San Andres Unit 20

Step-rate Injection Test



Test Date 9/26/90

[illegible]

Step Rate Injection Test

Well Name Vacuum Grayburg San Andres Unit No. 20Test Date 9/26/90Company Name Texaco Producing, Inc.

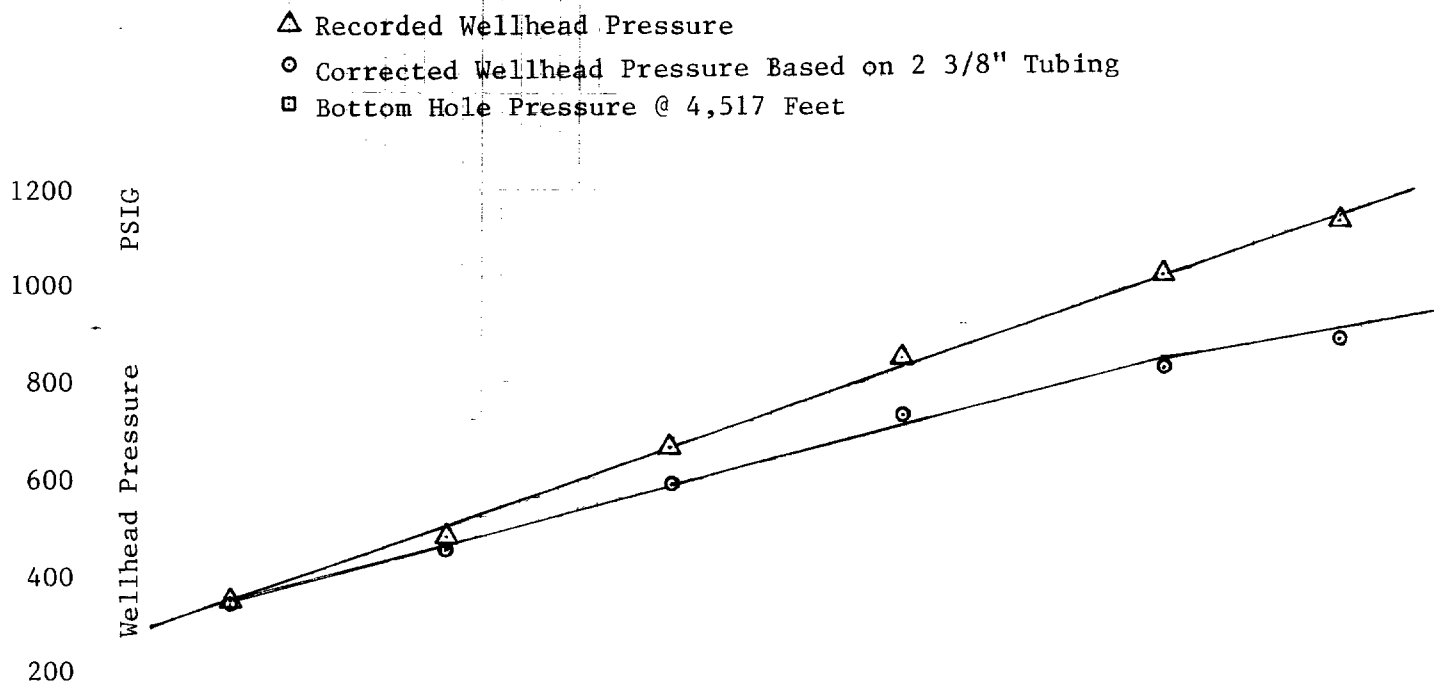
Page 2

Remarks	Time	Tbg. Press.	Rate B P D	Total	B H P	Tbg. Press.	Rate G P M	Total
	11:15	1198.60	1526.40	72.0	3073.00			
	11:20	1199.80	1555.20	77.4	3080.00			
	11:25	1201.80	1555.20	82.8	3087.00			
	11:30	1205.30	1526.40	88.1	3093.00			
	11:35	1207.80	1555.20	93.5	3098.30			
Rate V	11:40	1216.30	1555.20	98.9	3103.40	1128.5	45.08	87.839
			1545.60					
	11:45	1293.10	1814.40	105.20	3114.10			
	11:50	1303.70	1843.20	111.60	3121.60			
	11:55	1306.90	1814.40	117.90	3126.20			
	12:00	1311.30	1843.20	124.3	3131.50			
	12:05	1310.60	1843.20	130.7	3135.30			
Rate VI	12:10	1315.50	1814.40	137.0	3140.20	1195.6	53.34	119.912
			1828.80					
	12:15	1404.70	2131.20	144.40	3151.10			
	12:20	1402.30	2131.20	151.80	3156.20			
	12:25	1405.00	2102.40	159.10	3159.60			
	12:30	1406.10	2131.20	166.50	3163.90			
	12:35	1410.70	2102.40	173.80	3167.60			
Rate VII	12:40	1411.70	2131.20	181.20	3171.50	1253.9	61.88	157.828
			2121.60					
	12:45	1521.90	2419.20	189.60	3181.90			
	12:50	1522.00	2419.20	198.00	3184.80			
	12:55	1527.30	2419.20	206.40	3186.20			
	1:00	1528.40	2390.40	214.70	3186.50			
	1:05	1527.80	2448.00	223.2	3188.00			
Rate VIII	1:10	1519.60	2419.20	231.6	3188.50	1318.4	70.56	201.210
			2419.20					
	1:15	1640.90	2707.20	241.00	3195.00			
	1:20	1643.50	2707.20	250.40	3197.40			
	1:25	1647.30	2736.00	259.90	3197.70			
	1:30	1642.30	2707.20	269.30	3198.90			
	1:35	1645.00	2764.80	278.90	3200.10			
Rate IX	1:40	1645.00	2707.20	288.30	3202.60	1394.8	79.38	250.197
			2721.60					

Test Date 9/26/90

Page 3

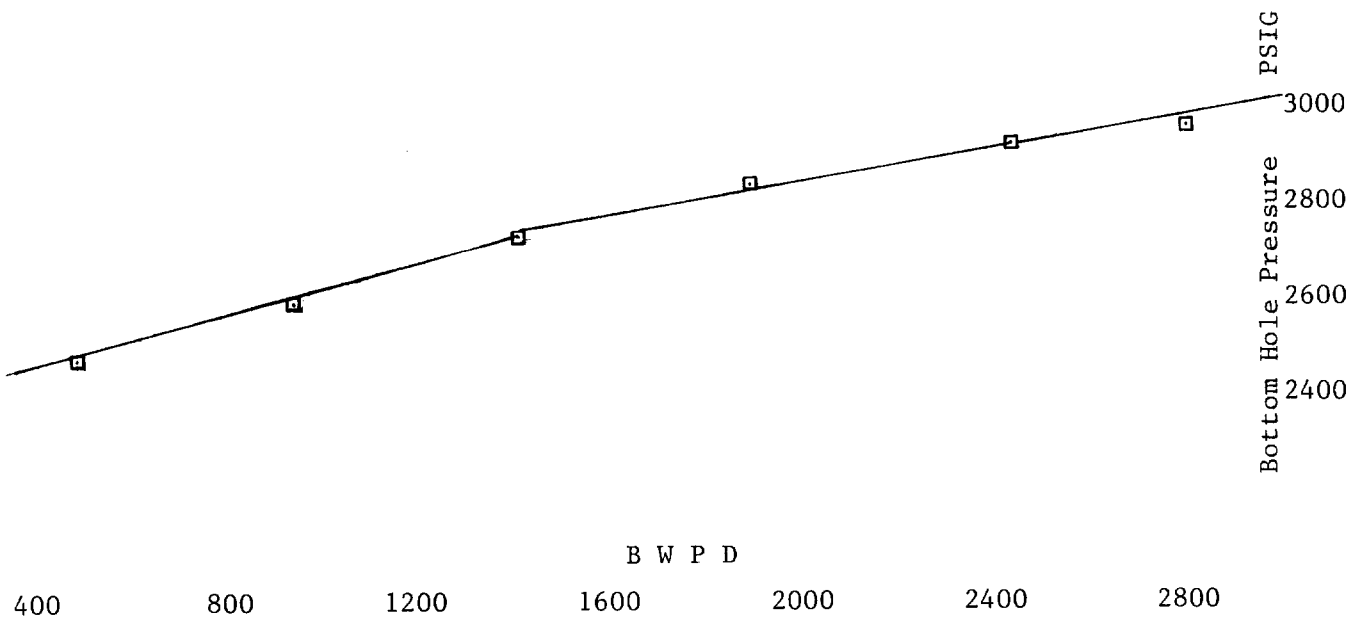
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TEXACO PRODUCING, INC.

Vacuum Grayburg San Andres Unit No. 34

Step-rate Injection Test



Step Rate Injection Test

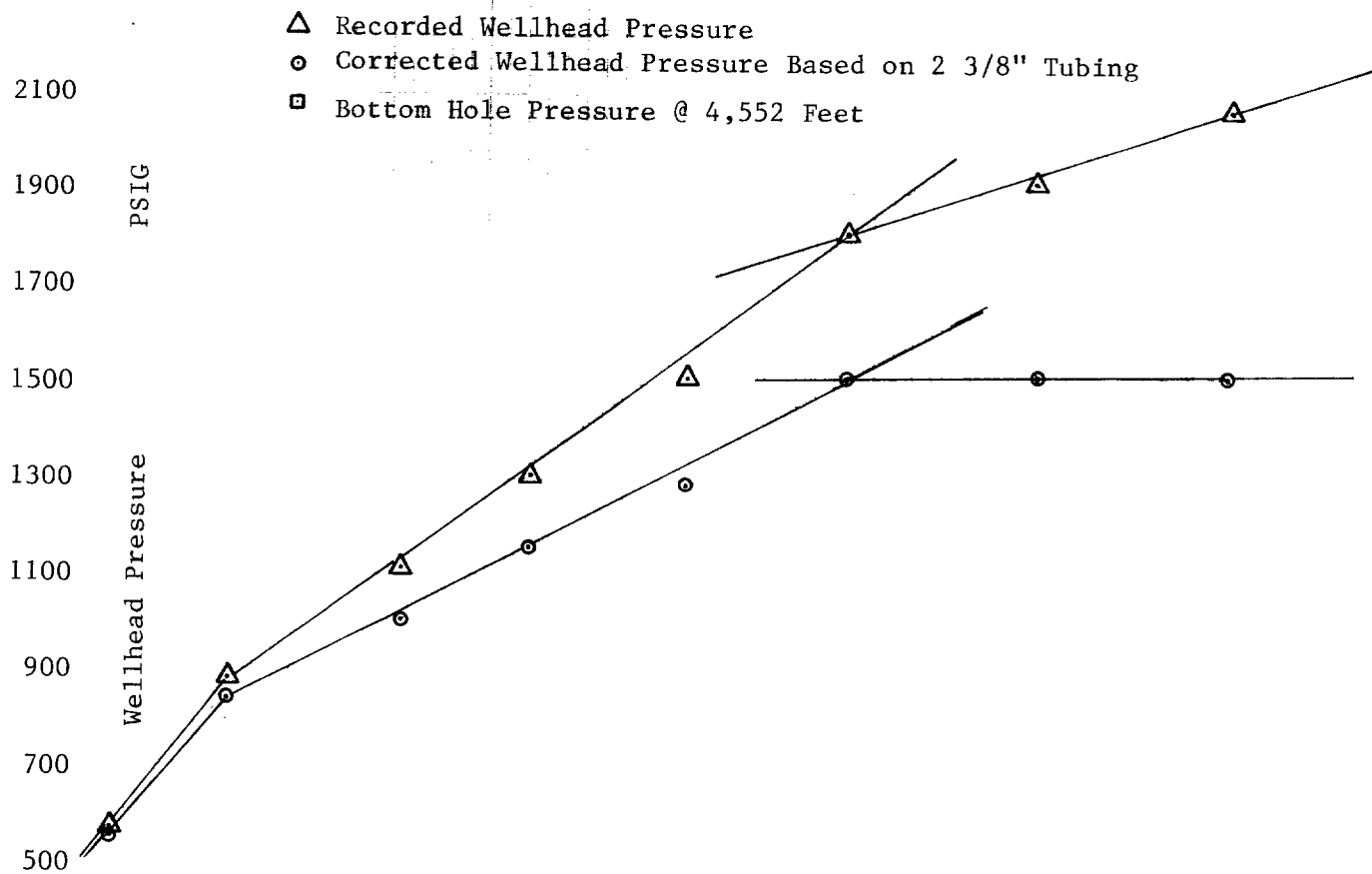
Well Name Vacuum Grayburg San Andres Unit #34

Date 4/25/90

CO. Name Texaco Producing, Inc.

Re-Run

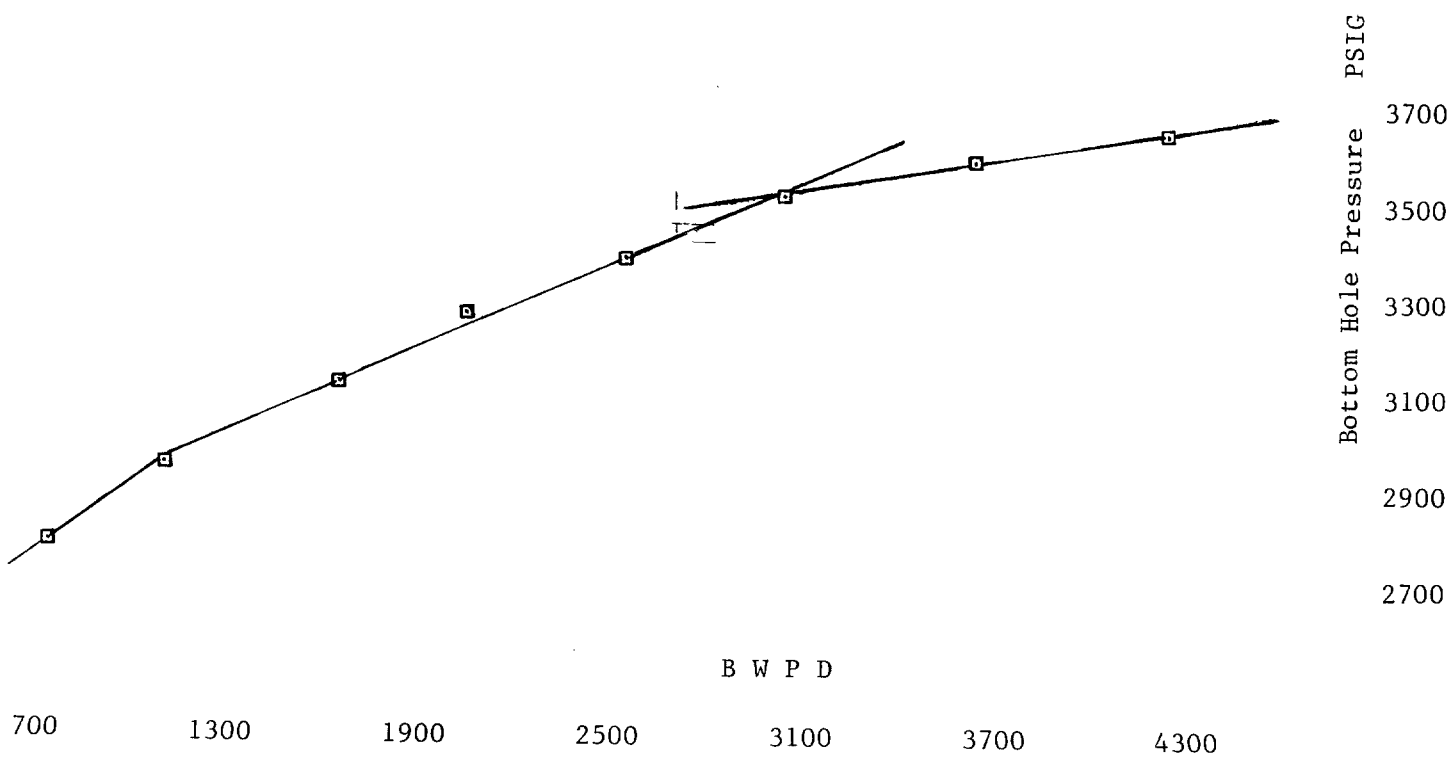
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TEXACO PRODUCING, INC.

Vacuum Grayburg San Andres Unit No. 46

Step-rate Injection Test



Step Rate Injection Test

Well Name Vacuum Grayburg San Andres Unit No. 46

Test Date 9/12/90

Company Name Texaco Producing, Inc.

Remarks	Time	Tbg. Press.	Rate B P D	Total	B H P	Tbg. Press.	Rate G P M	Total
				BOMB SET @ 4552'				
	8:50	458.90		0	2560.70			
	8:55	574.90	748.80	2.6	2680.20			
	9:00	635.90	777.60	5.3	2740.90			
Rate I	9:05	675.20	720.00	7.8	2784.10	652.2	21.84	22.995
			748.80					
	9:10	814.20	1123.20	11.7	2861.20			
	9:15	863.80	1123.20	15.6	2906.60			
Rate II	9:20	889.10	1094.40	19.4	2947.10	841.2	32.48	47.918
			1113.60					
	9:25	1037.10	1670.40	25.2	3032.70			
	9:30	1075.20	1641.60	30.9	3083.90			
Rate III	9:35	1107.00	1612.80	36.5	3124.20	1008.8	47.88	98.241
			1641.60					
	9:40	1257.90	2044.80	43.6	3191.60			
	9:45	1285.90	2016.00	50.6	3231.20			
Rate IV	9:50	1305.00	2016.00	57.6	3261.00	1160.1	59.08	144.934
			2025.60					
	9:55	1466.10	2534.40	66.4	3320.70			
	10:00	1485.10	2534.40	75.2	3355.60			
Rate V	10:05	1513.10	2505.60	83.9	3383.70	1295.2	73.64	217.855
			2524.80					
	10:10	1783.40	2880.00	93.9	3439.60			
	10:15	1811.50	3081.60	104.6	3487.30			
Rate VI	10:20	1818.90	3110.40	115.4	3515.90	1514.7	88.20	304.175
			3024.00					
	10:25	2019.80	3628.80	128.00	3555.90			
	10:30	2029.80	3542.40	140.30	3579.60			
Rate VII	10:35	1915.70	3657.60	153.0	3589.50	1516.2	105.28	399.506
			3609.60					
	10:40	2042.30	4233.60	167.70	3620.80			
	10:45	2038.30	4233.60	182.40	3642.10			
Rate VIII	10:50	2080.80	4176.00	196.90	3655.40	1518.7	122.92	562.093
			4214.40					

Step Rate Injection Test

Well Name Vacuum Grayburg San Andres Unit No. 46

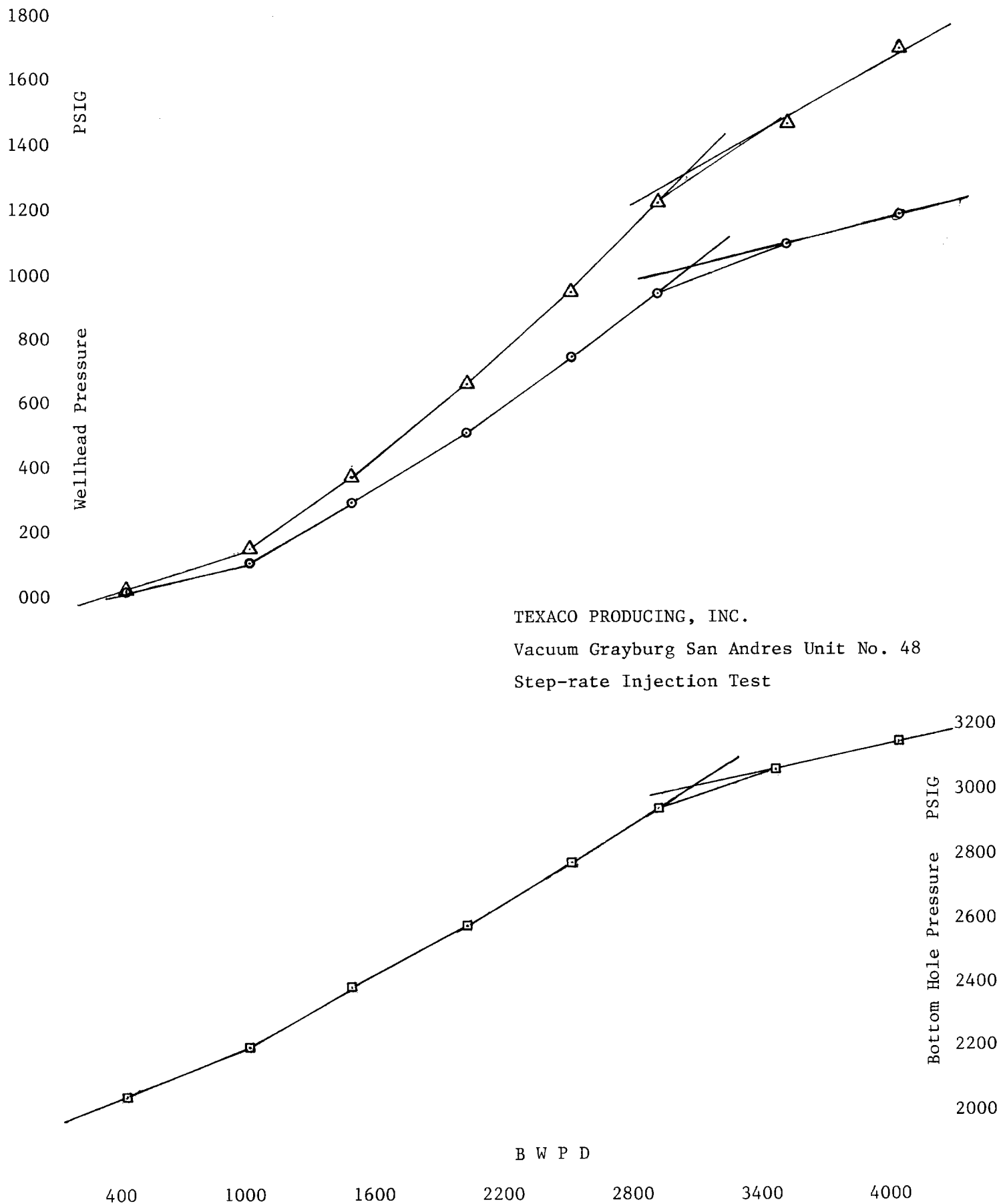
Test Date 9/12/90

Company Name Texaco Producing, Inc.

Page 2

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- △ Recorded Wellhead Pressure
- Corrected Wellhead Pressure Based on 2 3/8" Tubing
- Bottom Hole Pressure @ 4,505 Feet



Step Rate Injection Test

Well Name Vacuum Grayburg San Andres Unit #48Date 4-24-90CO. Name Texaco Producing, Inc.

Remarks	Time	Tbg. Press.	Rate BPD	Total	B H P	Tbg. Press.	Rate GPM	HEAD LOSS
				BOMB SET @ 4504				
	3:55	3.8		0	1949.90			
	9:00	8.8	432.00	1.5	1992.30			
	9:05	11.3	432.00	3.0	2015.90			
Rate I	9:10	11.1	403.20	4.4	2034.70	3.2	12.32	7.891
			422.4					
	9:15	55.60	950.40	7.7	2102.90			
	9:20	102.70	1036.80	11.3	2153.30			
Rate II	9:25	137.00	1008.00	14.8	2191.50	98.3	29.12	38.748
			998.4					
	9:30	264.50	1468.80	19.9	2271.80			
	9:35	316.70	1468.80	25.0	2326.50			
Rate III	9:40	361.40	1468.80	30.1	2370.50	282.3	42.84	79.145
			1468.80					
	9:45	545.50	2016.00	37.10	2461.20			
	9:50	591.60	1987.20	44.0	2520.20			
Rate IV	9:55	647.80	2016.00	51.0	2569.60	506.9	58.52	140.933
			2006.39					
	10:00	856.00	2505.60	59.7	2658.10			
	10:05	906.90	2505.60	68.4	2716.30			
Rate V	10:10	952.80	2476.80	77.0	2765.30	741.7	72.80	211.078
			2495.99					
	10:15	1147.60	2880.00	87.0	2841.60			
	10:20	1183.80	2880.00	97.0	2893.30			
Rate VI	10:25	1217.10	2908.80	107.1	2933.10	940.3	84.28	276.751
			2889.54					
	10:30	1447.20	3427.20	119.0	2998.70			
	10:35	1449.40	3456.00	131.0	3032.40			
Rate VII	10:40	1472.20	3427.20	142.9	3058.50	1090.8	100.24	381.439
			3436.79					
	10:45	1671.80	3974.40	156.7	3110.60			
	10:50	1680.60	4060.80	170.8	3137.40			
Rate VIII	10:55	1698.40	4003.20	184.70	3155.90	1190.3	117.04	508.063
			4012.80					
				out of water				

Step Rate Injection Test

Well Name Vacuum Grayburg San Andres Unit #48

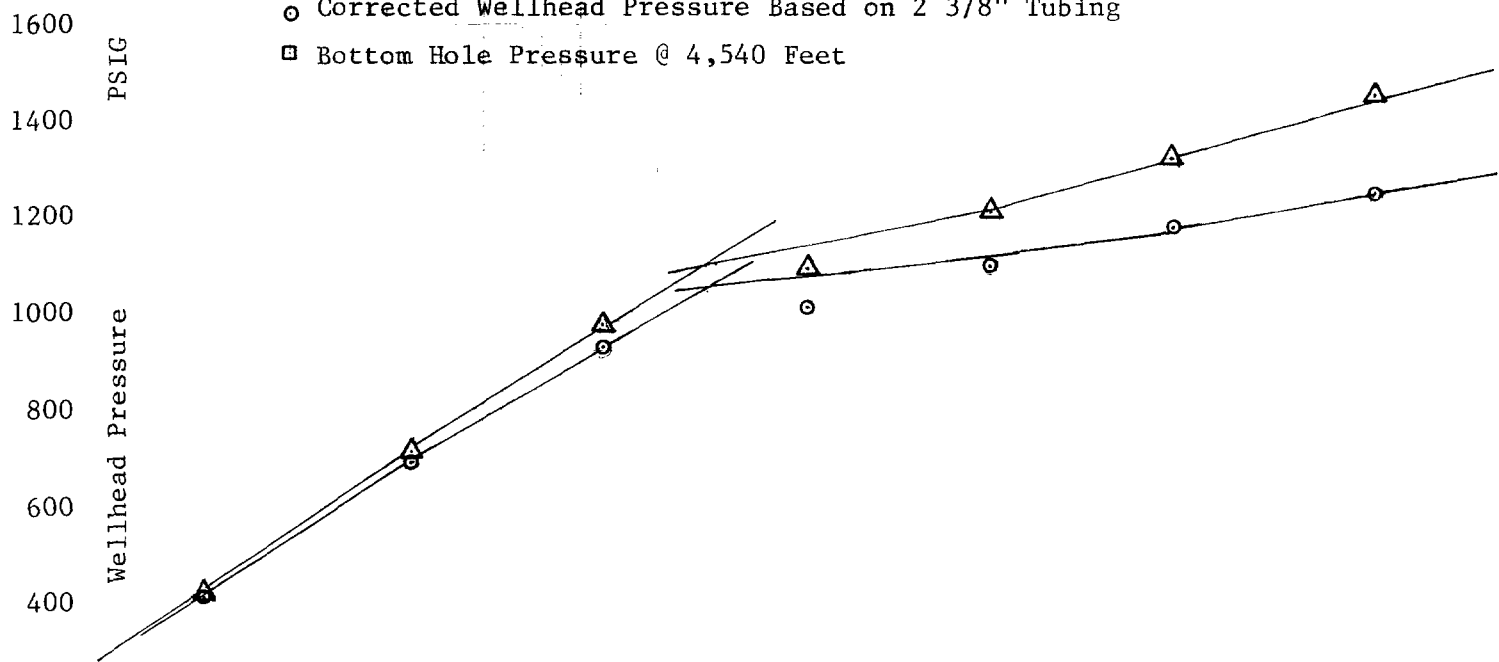
Date 4/24/90

CO. Name Texaco Producing, Inc.

Page 2

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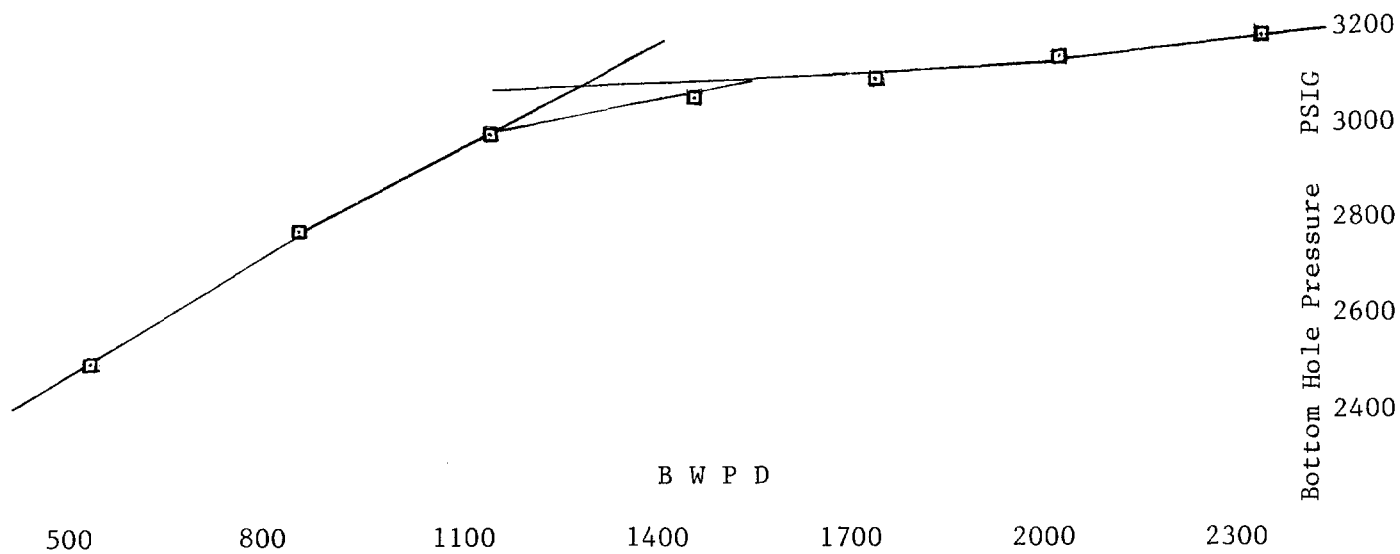
△ Recorded Wellhead Pressure
 ○ Corrected Wellhead Pressure Based on 2 3/8" Tubing
 □ Bottom Hole Pressure @ 4,540 Feet



TEXACO PRODUCING, INC.

Vacuum Grayburg San Andres Unit 50

Step-rate Injection Test



Step Rate Injection Test

Well Name Vacuum Grayburg San Andres Unit #50Test Date 10/1/90Company Name Texaco Producing, Inc.

Remarks	Time	Tbg. Press.	Rate B P D	Total	B H P	Tbg. Press.	Rate G P M	Total
		NOTE: Flow was cut back from approximately 386 B.P.D. to approximately 100 B.P.D. 48 hrs. before test. Shut down approximately one hr. to set up & go to bottom. Bomb set @ 4540'						
	9:35	75.60		0	2154.90			
	9:40	255.30	547.20	1.9	2316.40			
	9:45	302.50	518.40	3.7	2370.20			
	9:50	340.80	489.60	5.4	2411.00			
	9:55	370.10	518.40	7.2	2444.90			
	10:00	396.80	518.40	9.0	2469.10			
Rate I	10:05	417.20	489.60	10.7	2488.50	405.8	14.98	11.417
			513.60					
	10:10	551.30	864.00	13.7	2593.60			
	10:15	598.60	835.20	16.6	2642.70			
	10:20	635.60	835.20	19.5	2681.50			
	10:25	664.90	835.20	22.4	2714.00			
	10:30	693.00	864.00	25.4	2742.40			
Rate II	10:35	715.90	806.40	28.2	2767.20	687.5	24.50	28.367
			840.00					
	10:40	839.50	1152.00	32.2	2849.90			
	10:45	876.20	1123.20	36.1	2887.70			
	10:50	905.20	1123.20	40.0	2918.10			
	10:55	924.00	1152.00	44.0	2941.70			
	11:00	959.40	1094.40	47.8	2964.10			
Rate III	11:05	974.50	1152.00	51.8	2979.50	925.2	33.04	49.327
			1132.80					
	11:10	1079.30	1468.80	56.9	3025.40			
	11:15	1075.50	1468.80	62.0	3033.60			
	11:20	1084.40	1440.00	67.0	3038.40			
	11:25	1088.20	1440.00	72.0	3041.90			
	11:30	1090.80	1468.80	77.1	3044.80			
Rate IV	11:35	1087.00	1440.00	82.1	3046.50	1008.7	42.42	78.319
			1454.40					

10/11/11 10:00 AM 10/11/11 10:00 AM 10/11/11 10:00 AM 10/11/11 10:00 AM 10/11/11 10:00 AM

Well Name Vacuum Grayburg San Andres Unit #50

Test Date 10/1/90

Company Name Texaco Producing, Inc.

Page 2

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OIL CONSERVATION DIVISION

REC'D

MAR 8 54

STATE OF NEW MEXICO
ENERGY AND MINERALS DEPARTMENT
OIL CONSERVATION DIVISION
HOBBS DISTRICT OFFICE

March 25, 1991

POST OFFICE BOX 1980
HOBBS, NEW MEXICO 88240
(505) 393-6161

BRUCE KING
GOVERNOR

OIL CONSERVATION DIVISION
P.O. BOX 2088
SANTA FE, NEW MEXICO 87504-2088

RE: APPLICATION FOR PRESSURE LIMIT INCREASE FOR DISPOSAL & INJECTION WELLS

Gentlemen:

I have examined the step rate test for the:

Texaco Producing Inc.	VGB/SA Unit	50-G	1-18-34
Operator	Lease & Well No.	Unit	S-T-R

and my recommendations are as follows:

is a little high

Very truly yours

Jerry Sexton
Supervisor, District I

/bp



RECEIVED
OIL CONSERVATION DIVISION
MAR 25 1991

ENERGY AND MINERALS DEPARTMENT

STATE OF NEW MEXICO
OIL CONSERVATION DIVISION
HOBBS DISTRICT OFFICE

March 25, 1991

BRUCE KING
GOVERNOR

POST OFFICE BOX 1980
HOBBS, NEW MEXICO 88240
(505) 393-6161

OIL CONSERVATION DIVISION
P.O. BOX 2088
SANTA FE, NEW MEXICO 87504-2088

RE: APPLICATION FOR PRESSURE LIMIT INCREASE FOR DISPOSAL & INJECTION WELLS

Gentlemen:

I have examined the step rate test for the:

Texaco Producing Inc.	VGB/SA Unit	16-I	2-18-34
Operator	Lease & Well No.	Unit	S-T-R

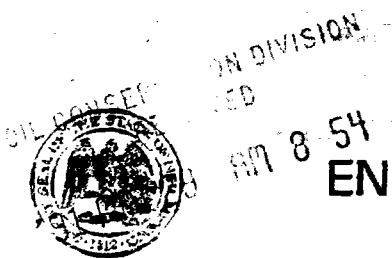
and my recommendations are as follows:

Pressure BE High

Very truly yours

Jerry Sexton
Supervisor, District I

/bp



STATE OF NEW MEXICO
ENERGY AND MINERALS DEPARTMENT
OIL CONSERVATION DIVISION
HOBBS DISTRICT OFFICE

March 25, 1991

BRUCE KING
GOVERNOR

POST OFFICE BOX 1980
HOBBS, NEW MEXICO 88240
(505) 393-6161

OIL CONSERVATION DIVISION
P.O. BOX 2088
SANTA FE, NEW MEXICO 87504-2088

RE: APPLICATION FOR PRESSURE LIMIT INCREASE FOR DISPOSAL & INJECTION WELLS

Gentlemen:

I have examined the step rate test for the:

Texaco Producing Inc.	VGB/SA Unit	20-J	1-18-34
Operator	Lease & Well No.	Unit	S-T-R

and my recommendations are as follows:

OK

Very truly yours

Jerry Sexton
Supervisor, District I

/bp



STATE OF NEW MEXICO
ENERGY AND MINERALS DEPARTMENT
OIL CONSERVATION DIVISION
HOBBS DISTRICT OFFICE

March 25, 1991

POST OFFICE BOX 1980
HOBBS, NEW MEXICO 88240
(505) 393-6161

OIL CONSERVATION DIVISION
P.O. BOX 2088
SANTA FE, NEW MEXICO 87504-2088

RE: APPLICATION FOR PRESSURE LIMIT INCREASE FOR DISPOSAL & INJECTION WELLS

Gentlemen:

I have examined the step rate test for the:

Texaco Producing Inc.	VGB/SA Unit	34-J	1-18-34
Operator	Lease & Well No.	Unit	S-T-R

and my recommendations are as follows:

OK

Very truly yours

Jerry Sexton
Supervisor, District I

/bp



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MAR 29

STATE OF NEW MEXICO
ENERGY AND MINERALS DEPARTMENT
OIL CONSERVATION DIVISION
HOBBS DISTRICT OFFICE

March 25, 1991

BRUCE KING
GOVERNOR

POST OFFICE BOX 1980
HOBBS, NEW MEXICO 88240
(505) 393-6161

OIL CONSERVATION DIVISION
P.O. BOX 2088
SANTA FE, NEW MEXICO 87504-2088

RE: APPLICATION FOR PRESSURE LIMIT INCREASE FOR DISPOSAL & INJECTION WELLS

Gentlemen:

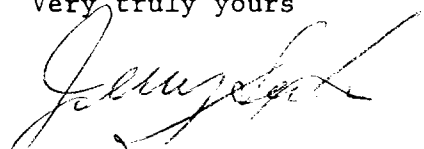
I have examined the step rate test for the:

Texaco Producing Inc.	VGB/SA Unit	46-H	2-18-34
Operator	Lease & Well No.	Unit	S-T-R

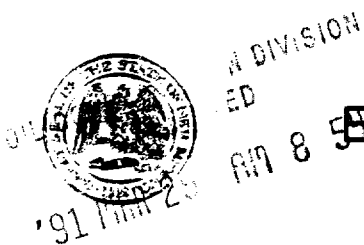
and my recommendations are as follows:

OK

Very truly yours


Jerry Sexton
Supervisor, District I

/bp



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STATE OF NEW MEXICO
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OIL CONSERVATION DIVISION
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RE: APPLICATION FOR PRESSURE LIMIT INCREASE FOR DISPOSAL & INJECTION WELLS

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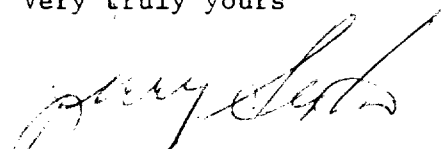
I have examined the step rate test for the:

Texaco Producing Inc.	VGB/SA Unit	48-F	1-18-34
Operator	Lease & Well No.	Unit	S-T-R

and my recommendations are as follows:

Rec 1150

Very truly yours


Jerry Sexton
Supervisor, District I

/bp



STATE OF NEW MEXICO

ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

GARREY CARRUTHERS
GOVERNOR

POST OFFICE BOX 2088
STATE LAND OFFICE BUILDING
SANTA FE, NEW MEXICO 87504
(505) 827-5800

October 11, 1988

Texaco, Inc.
West Star Route Box 423
Lovington, NM 88260

Attention: A. Gernandt

RE: Amended Injection Pressure
Increase Central Vacuum Unit,
Vacuum Grayburg San Andres
Unit, Lea County, New Mexico

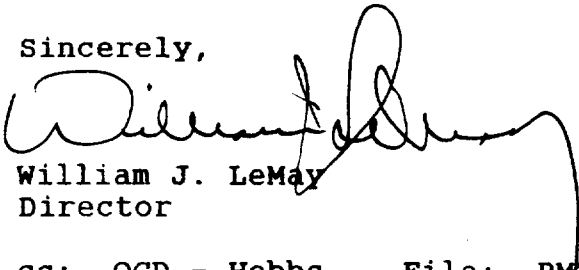
Dear Mr. Gernandt:

Reference is made to your request dated June 23, 1988, to increase the surface injection pressure on seventeen wells within the Central Vacuum Unit and Vacuum Grayburg San Andres Unit. This request is based on step rate tests conducted on these wells during May & June, 1988. The results of the tests have been reviewed by my staff and we feel an increase in injection pressure on these wells is justified at this time.

You are therefore authorized to increase the surface injection pressure on the wells show on Exhibit "A" attached to this order.

The Division Director may rescind this injection pressure increase if it becomes apparent that the injected water is not being confined to the injection zone or is endangering any fresh water aquifers.

Sincerely,


William J. LeMay
Director

cc: OCD - Hobbs File: PMX-120
D. McDonald PMX-121
D. Catanach PMX-43
Case File: 6008, PMX-74
 & 4852 PMX-111

Injection Pressure Increase
October 12, 1988
Page No. 2

EXHIBIT "A"

<u>WELL & LOCATION</u>	<u>MAXIMUM SURFACE INJECTION PRESSURE</u>
Central Vacuum Unit No. 73 2630 FNL & 142 FEL (Unit H) Section 36, T-17S, R-34E	1000 PSIG
Central Vacuum Unit No. 84 1333 FSL & 151 FEL (Unit I) Section 36, T-17S, R-34E	1144 PSIG
Central Vacuum Unit No. 93 10 FSL & 1136 FWL (Unit M) Section 31, T-17S, R-35E	1200 PSIG
Central Vacuum Unit No. 99 1408 FNL & 11211 FWL (Unit E) Section 6, T-18S, R-35E	1095 PSIG
Central Vacuum Unit No. 159 1310 FNL & 100 FWL (Unit D) Section 36, T-17S, R-34E	1215 PSIG
VGSAU Well No. 18 1330 FSL & 1330 FWL (Unit K) Section 1, T-18S, R-34E	1260 PSIG
VGSAU Well No. 30 2630 FSL & 2630 FWL (Unit K) Section 2, T-18S, R-34E	1260 PSIG
VGSAU Well No. 32 2630 FSL & 30 FWL (Unit L) Section 1, T-18S, R-34E	1220 PSIG
VGSAU Well No. 34 2630 FSL & 2630 FEL (Unit J) Section 1, T-18S, R-34E	920 PSIG
VGSAU Well No. 44 1330 FNL & 1330 FWL (Unit F) Section 2, T-18S, R-34E	1435 PSIG
VGSAU Well No. 46 1405 FNL & 1230 FEL (Unit H) Section 2, T-18S, R-34E	1415 PSIG

Injection Pressure Increase
October 12, 1988
Page No. 3

VGSAU Well No. 48 1330 FNL & 1330 FWL (Unit F) Section 1, T-18S, R-34E	895 PSIG
VGSAU Well No. 50 1330 FNL & 1330 FEL (Unit G) Section 1, T-18S, R-34E	925 PSIG
VGSAU Well No. 59 2500 FNL & 40 FWL (Unit E) Section 2, T-18S, R-34E	1110 PSIG
VGSAU Well No. 62 65 FNL & 1330 FWL (Unit C) Section 2, T-18S, R-34E	1240 PSIG
VGSAU Well No. 63 50 FNL & 2630 FEL (Unit B) Section 2, T-18S, R-34E	1330 PSIG
VGSAU Well No. 67 2630 FEL & 120 FWL (Unit L) Section 35, T-17S, R-34E	1380 PSIG



STATE OF NEW MEXICO

ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT

OIL CONSERVATION DIVISION

GARREY CARRUTHERS
GOVERNOR

POST OFFICE BOX 2088
STATE LAND OFFICE BUILDING
SANTA FE, NEW MEXICO 87504
(505) 827-5800

October 11, 1988

Texaco, Inc.
West Star Route Box 423
Lovington, NM 88260

Attention: A. Gernandt

RE: Injection Pressure Increase
Central Vacuum Unit, Vacuum
Grayburg San Andres Unit,
Lea County, New Mexico

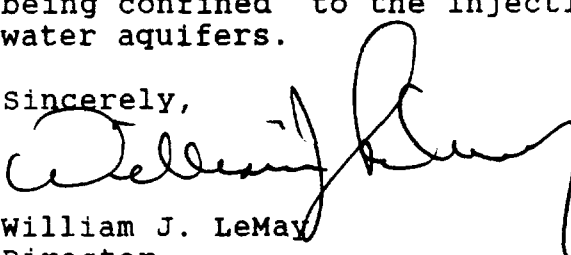
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You are therefore authorized to increase the surface injection pressure on the wells show on Exhibit "A" attached to this order.

The Division Director may rescind this injection pressure increase if it becomes apparent that the injected water is not being confined to the injection zone or is endangering any fresh water aquifers.

Sincerely,


William J. LeMay
Director

cc: OCD - Hobbs File: PMX-120
D. McDonald PMX-121
D. Catanach PMX-43
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Injection Pressure Increase
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Injection Pressure Increase
October 12, 1988
Page No. 3

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