District I
1625 N. French Dr., Hobbs, NM 88240
District II
811 S. 1st Street, Artesia, NM 88210
District III
1000 Rio Brazos Rd., Aztec, NM 87410
District IV
2040 South Pacheco, Santa Fe, NM 87505

State of New Mexico
Energy, Minerals & Natural Resource

Oil Conservation Divsiion
2040 South Pacheco
Santa Fe, NM 87505

Form C-101
Revised March 17, 1999

Submit to appropriate District Office
State Lease - 6 Copies
Fee Lease - 5 Copies

☐ AMENDED REPORT

APPLICATION FOR PERMIT TO DRILL, RE-ENTER, DEEPEN, PLUGBACK, OR ADD A ZONE

[1] Operator Name and Address	[2] OGRID Number
Texaco Exploration & Production 15 Smith Road - Midland, Texas 79705	022351
	[3] API Number 30- 025-02277

[4] Property Code	[5] Property Name	[6] Well No.
11124	Vacuum Grayburg JSan Andres Unit	7H

[7] Surface Location

UL or lot no.	Section	Township	Range	Lot. Idn	Feet from the	North/South Line	Feet from the	East/West line	County
N	2	18-S	34-E		666'	South	1987'	West	Lea

[8] Proposed Bottom Hole Location If Different From Surface

UL or lot no.	Section	Township	Range	Lot. Idn	Feet from the	North/South Line	Feet from the	East/West line	County
P	2	18-S	34-E		681'	South	943'	East	Lea

[9] Proposed Pool 1	[10] Proposed Pool 2
Vacuum Grayburg San Andres	

[11] Work Type Code	[12] Well Type Code	[13] Cable/Rotary	[14] Lease Type Code	[15] Ground Level Elevation
P (Horizontal)	O	R	S	4008'
[16] Multiple	[17] Proposed Depth	[18] Formation	[19] Contractor	[20] Spud Date
N	6847' MD	San Andres		5/20/02

[21] Proposed Casing and Cement Program

Hole Size	Casing Size	Casing weight/foot	Setting Depth	Sacks of Cement	Estimated TOC
NO CHANGE					

[22] Describe the proposed program. If this application is to DEEPEN or PLUG BACK, give the data on the present productive zone and proposed new productive zone. Describe the blowout prevention program, if any. Use additional sheets if necessary.

See Attached "Proposed Work"
Kick Off Point 4256'-4262'

Permit Expires 1 Year From Approval
Date Unless Drilling Underway

Horizontal

[23] I hereby certify that the information given above is true and complete to the best of my knowledge and belief.

Signature: Laura Skinner

Printed name: Laura Skinner

Title: Regulatory Specialist

Date: 5/2/02

Phone: (915) 687-7355

OIL CONSERVATION DIVISION

Approved by: ORIGINAL SIGNED BY PAUL F. KAUTZ

Title: PETROLEUM ENGINEER

Approval Date: JUN 19 2002

Expiration Date:

Conditions of Approval:

Attached ☐

PROPOSED WORK

PRODUCTION HOLE:

1) MIRU pulling unit. TOOH with rods, pump and tubing.

2) TIH with 4-3/4" bit to TD of 4810'. TIH with casing scraper to 4300' (bottom of casing at 4311'). TOOH.

3) On wireline, trip in hole and set a 5-1/2" CIBP at 4268' (Shoe joint at 4316', float collar at 4274' to 4276', collars at 4233' and 4194'+).

4) Test CIBP to 500 psi. TIH and reverse circulate wellbore clean (top of window 4256' and bottom of window 4262'). TOOH and lay down tubing. RDMO pulling unit.

5) MIRU horizontal rig. TIH with dummy mills and tag top of CIBP and make correction. Strap the pipe going in the hole. This measurement will be used when setting the whipstock. Accuracy is very important. Check the strap with the wire line measurement. TOOH.

6) TIH with bottom set retrievable Trackmaster whipstock, orientation sub and drill pipe. Stop at a point 5-10' above the CIBP and run a gyro. Take a gyro reading to determine the direction of the whipstock face. Rotate the pipe as needed to achieve the required direction (azimuth 89.62 degrees). Lower the pipe to within one foot of the CIBP and take another gyro reading. Rotate pipe again, if necessary, to obtain the required direction. This step may need to be made several times until confident the whipstock is oriented in the proper direction. Pull the gyro to surface, recording the orientation of the wellbore.

7) Lower the drill pipe to set the whipstock. The weight indicator will jump indicating the plunger shear pin is sheared and the whipstock is set. Continue setting down to shear the mill bolt. The weight indicator will jump, indicating the bolt is sheared.

8) Pick up the power swivel and begin circulating. Pick up the drill pipe until the mill has cleared the whipstock and start rotation. Lower the drill pipe slowly until the torque gauge suggest the mill is contacting the casing. Adjust weight and speed until satisfied with the penetration rate. Resume milling operations and mill until the complete assembly has cleared the casing. Pick up and lower the string several times without rotation to assure a good clean window has been obtained. Circulate the hole clean. TOOH.

9) Inspect the mill on the surface. If mills are 1/8" or less out of gauge, run drilling assembly instead of making an extra mill run.

HORIZONTAL PRODUCTION HOLE:

1. Rig up Scientific Drilling Company and Advance mud loggers. Adjust plan to target as necessary. Trip in the hole with Scientific Drilling's curve building assembly. This will be a 4-3/4" insert bit, 3-3/4" PDM, float sub/orienter combo, 2-flexible monel collars and 2-7/8" AOH drill pipe or other assembly as recommended by SDI.

2. Drill a tangent section at 5 degrees inclination to 4561' TVD. Build curve to estimated target depths and angles as follows:

True Vertical Depth	4671'
Measured Depth	4741'
Final Angle	90 degrees
Target Azimuth	89.62 degrees
Build Rate	47.55 degrees/100'

Drill the curve sliding as necessary to stay on target. It is recommended that after each slide, the bit be pulled back and washed through the slide. Once the curve is built, rotate through the curve section noting tight spots and fill. Make at least one short trip prior to tripping out of the hole.

3. Trip in the hole with Scientific Drilling's lateral assembly. This will be a 4-3/4" bit, 3-3/4" motor, float sub/orienter combo, 2 - flexible monel collars and 2-7/8" AOH drill pipe or other assembly as recommended by SDI.

4. Drill ±2106' lateral. The end point will be ±6847' MD, ±4603' TVD and ±2250' vertical section per the attached Scientific well plan. Continue drilling the lateral per the Asset Team (Russell Pool 915-687-7417 or Greg Hinterlong 915-687-7236) recommendations.

5. Trip out of the hole with the drilling assembly, laying down all but approximately 4400' of 2-7/8" drill pipe.

6. TIH with whipstock hook and retrieve the whipstock.

7. TIH and set a retrievable bridge plug ±4200'. TOOH and lay down the remaining drill pipe.

8. Nipple down the BOP stack. Release the rig. Rig down and move out rotary tools.

POTENTIAL PROBLEMS

Horizontal Production hole:

a) The horizontal lateral will be drilled with fresh water.

b) H2S detection equipment is to be installed.

c) Loss circulation material and/or other plugging agents are not to be used in this portion of the hole.

MUD PROGRAM

Interval	Type	Weight	Viscosity	Remarks
Curve	Fresh Water	8.4 ppg	35	Raise visc. with starch and gel
Horizontal	Fresh Water	8.4-9.0 ppg	28-29	Circulate reserve

EVALUATION PROGRAM

Coring:

No cores are anticipated.

Mud Loggers:

Advance mud loggers, 505-270-4926, will be rigged from the start of the curve to total depth.

Open Hole Logs:

The following open hole logs will be run in the vertical section of the well:

Run 1: Gyro from +/-4250' to surface for determination of bottom hole location.
The guidance system in the curve and horizontal sections of the hole will consist of a MWD system.

No electric logs will be run in the lateral.

CASING PROPERTIES

KB – 4013.2', GL – 4008', TD 4810' (Open hole)

		BURST		COLLAPSE		TEST
DEPTH	PIPE	Rated	(75%)	Rated	(75%)	PRESSURE
0-1650'	8-5/8", 28#, H-40	2470	1850	1640	1230	1000
0-4311'	5-1/2", 15.5#, J-55	4810	3600	4040	3030	800

Squeeze perforations at 1675'.

Casing collars: 4194'+, 4233'
Float Collar 4274' – 4276'
Shoe 4316'

Note: Collars and shoe taken off of 8/21/2000 log, casing shoe is 5' deeper on this log then the original reported shoe depth of 4311'.

Scientific Drilling

Scientific Drilling Intl.
Planning Report

ChevronTexaco

Company:	ChevronTexaco	Date: 5/1/2002	Time: 10:11:40	Page:	1
Field:	Vacuum Grayburg San Andres Unit(NAD 83)	Co-ordinate(NE) Reference:	Well: VGSAU #7H, Grid North		
Site:	Lea County, New Mexico	Vertical (TVD) Reference:	SITE 0.0		
Well:	VGSAU #7H	Section (VS) Reference:	Site (0.00N,0.00E,89.62Azi)		
Wellpath:	1	Plan:	Plan #2		

Field:	Vacuum Grayburg San Andres Unit(NAD 83)		
Map System:	US State Plane Coordinate System 1983	Map Zone:	New Mexico, Eastern Zone
Geo Datum:	GRS 1980	Coordinate System:	Well Centre
Sys Datum:	Mean Sea Level	Geomagnetic Model:	igrf2000

Site:	Lea County, New Mexico				
Site Position:		Northing:	668354.38 ft	Latitude:	32 50 0.000 N
From:	Geographic	Easting:	848497.42 ft	Longitude:	103 19 59.999 W
Position Uncertainty:	0.0 ft			North Reference:	Grid
Ground Level:	0.0 ft			Grid Convergence:	0.54 deg

Well:	VGSAU #7H				Slot Name:	
Well Position:	+N/-S	0.0 ft	Northing:	668354.38 ft	Latitude:	32 49 59.999 N
	+E/-W	0.0 ft	Easting:	848497.42 ft	Longitude:	103 19 59.999 W
Position Uncertainty:		0.0 ft				

Wellpath:	1			Drilled From:	Surface
				Tie-on Depth:	0.0 ft
Current Datum:	SITE	Height	0.0 ft	Above System Datum:	Mean Sea Level
Magnetic Data:	4/11/2002			Declination:	8.68 deg
Field Strength:	50063 nT			Mag Dip Angle:	61.07 deg

Vertical Section:	Depth From (TVD) ft	+N/-S ft	+E/-W ft	Direction deg
	4603.0	0.0	0.0	89.62

Plan:	Plan #2	Date Composed:	4/11/2002
		Version:	1
Principal:	Yes	Tied-to:	User Defined

Plan Section Information

MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg	Target
4000.0	0.00	0.00	4000.0	0.0	0.0	0.00	0.00	0.00	0.00	
4256.0	0.00	0.00	4256.0	0.0	0.0	0.00	0.00	0.00	0.00	
4287.2	5.00	89.62	4287.2	0.0	1.4	16.00	16.00	0.00	89.62	
4562.1	5.00	89.62	4561.0	0.2	25.3	0.00	0.00	0.00	0.00	
4740.9	90.00	89.62	4671.0	1.0	145.4	47.55	47.55	0.00	0.00	
4743.2	90.38	89.62	4671.0	1.0	147.7	16.00	16.00	0.00	-0.01	
5195.5	90.38	89.62	4668.0	4.0	600.0	0.00	0.00	0.00	0.00	600-7h
5214.1	93.36	89.62	4667.4	4.1	618.6	16.00	16.00	0.00	0.01	
5596.2	93.36	89.62	4645.0	6.6	1000.0	0.00	0.00	0.00	0.00	1000-7h
5608.8	91.35	89.62	4644.5	6.7	1012.6	16.00	-16.00	-0.01	-179.97	
6096.4	91.35	89.62	4633.0	9.9	1500.0	0.00	0.00	0.00	0.00	1500-7h
6106.0	92.89	89.62	4632.6	10.0	1509.6	16.00	16.00	0.00	0.01	
6396.7	92.89	89.62	4618.0	11.9	1800.0	0.00	0.00	0.00	0.00	1800-7h
6402.9	91.90	89.62	4617.7	12.0	1806.2	16.00	-16.00	0.00	-180.00	
6696.9	91.90	89.62	4608.0	13.9	2100.0	0.00	0.00	0.00	0.00	2100-7h
6697.0	91.90	89.62	4608.0	13.9	2100.1	0.00	0.00	0.00	0.00	
6847.0	91.90	89.62	4603.0	14.9	2250.0	0.00	0.00	0.00	0.00	2250-7h

Section 1 : Start Hold

MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	VS ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg
4000.0	0.00	0.00	4000.0	0.0	0.0	0.0	0.00	0.00	0.00	0.00
4100.0	0.00	0.00	4100.0	0.0	0.0	0.0	0.00	0.00	0.00	0.00
4200.0	0.00	0.00	4200.0	0.0	0.0	0.0	0.00	0.00	0.00	0.00
4256.0	0.00	0.00	4256.0	0.0	0.0	0.0	0.00	0.00	0.00	0.00

Company: ChevronTexaco
Field: Vacuum Grayburg San Andres Unit(NAD 83)
Site: Lea County, New Mexico
Well: VGSAU #7H
Wellpath: 1

Date: 5/1/2002 Time: 10:11:40 Page: 3
Co-ordinate(NE) Reference: Well: VGSAU #7H, Grid North
Vertical (TVD) Reference: SITE 0.0
Section (VS) Reference: Site (0.00N,0.00E,89.62Azi)
Plan: Plan #2

Section 8 : Start Hold

MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	VS ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg
5500.0	93.36	89.62	4650.6	6.0	904.0	904.0	0.00	0.00	0.00	180.00
5596.2	93.36	89.62	4645.0	6.6	1000.0	1000.0	0.00	0.00	0.00	180.00

Section 9 : Start DLS 16.00 TFO -179.97

MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	VS ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg
5600.0	92.75	89.62	4644.8	6.7	1003.8	1003.8	16.00	-16.00	-0.01	-179.97
5608.8	91.35	89.62	4644.5	6.7	1012.6	1012.6	16.00	-16.00	-0.01	-179.97

Section 10 : Start Hold

MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	VS ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg
5700.0	91.35	89.62	4642.3	7.3	1103.8	1103.8	0.00	0.00	0.00	0.00
5800.0	91.35	89.62	4640.0	8.0	1203.7	1203.8	0.00	0.00	0.00	0.00
5900.0	91.35	89.62	4637.6	8.6	1303.7	1303.7	0.00	0.00	0.00	0.00
6000.0	91.35	89.62	4635.3	9.3	1403.7	1403.7	0.00	0.00	0.00	0.00
6096.4	91.35	89.62	4633.0	9.9	1500.0	1500.0	0.00	0.00	0.00	0.00

Section 11 : Start Build 16.00

MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	VS ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg
6100.0	91.93	89.62	4632.9	10.0	1503.6	1503.7	16.00	16.00	0.00	0.01
6106.0	92.89	89.62	4632.6	10.0	1509.6	1509.6	16.00	16.00	0.00	0.01

Section 12 : Start Hold

MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	VS ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg
6200.0	92.89	89.62	4627.9	10.6	1603.5	1603.6	0.00	0.00	0.00	0.00
6300.0	92.89	89.62	4622.9	11.3	1703.4	1703.4	0.00	0.00	0.00	0.00

Section 13 : Start Drop -16.00

MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	VS ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg
6396.7	92.89	89.62	4618.0	11.9	1800.0	1800.0	0.00	0.00	0.00	0.00
6400.0	92.36	89.62	4617.9	12.0	1803.3	1803.3	16.00	-16.00	0.00	-180.00

Section 14 : Start Hold

MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	VS ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg
6402.9	91.90	89.62	4617.7	12.0	1806.2	1806.2	16.00	-16.00	0.00	-180.00
6500.0	91.90	89.62	4614.5	12.6	1903.2	1903.2	0.00	0.00	0.00	0.00
6600.0	91.90	89.62	4611.2	13.3	2003.1	2003.2	0.00	0.00	0.00	0.00

Section 15 : Start Hold

MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	VS ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg
6696.9	91.90	89.62	4608.0	13.9	2100.0	2100.0	0.00	0.00	0.00	0.00
6697.0	91.90	89.62	4608.0	13.9	2100.1	2100.1	0.00	0.00	0.00	0.00

Section 16 : Start Hold

MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	VS ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg
6700.0	91.90	89.62	4607.9	14.0	2103.1	2103.1	0.00	0.00	0.00	0.00
6800.0	91.90	89.62	4604.6	14.6	2203.0	2203.1	0.00	0.00	0.00	0.00
6847.0	91.90	89.62	4603.0	14.9	2250.0	2250.0	0.00	0.00	0.00	0.00

WELL DATA SHEET

LEASE: Vacuum Grayburg San Andres Unit WELL: 7

LOC: 666 'F S L & 1987 'F W L SEC: 2
TOWNSHIP: 18S CNTY: Lea
RANGE: 34E UNIT: E ST: NM

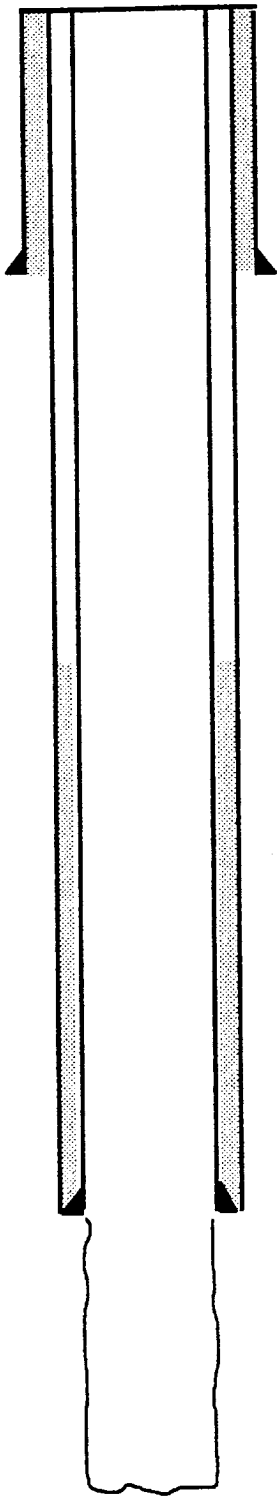
Formation: Grayburg San Andres DATE: 4/11/2002

GL: 4008 STATUS: Oil Producer
KB: 4013 API NO: 30-025-02277
DF: 4013

Date Completed: 10/30/1951
Initial Production: 30 BOPD, 0 BWPD, 0 MCF
Initial Formation: Grayburg San Andres
FROM: 4311' to 4710'

8-5/8" OD (11" hole)
28 # CSG
Set @ 1650' W/ 900 sx.
Cmt circ.? yes
TOC @ surf by

5-1/2" OD (7-7/8" hole)
15 1/2 # CSG
Set @ 4311 W/ 500 SX
Cmt circ.? no
TOC @ 2921 by Est.



4-3/4 " Open Hole
4311-4810

Completion Data

4311to 4710 open hole frac w/ gelled brine (No sand)

Subsequent Workover or Reconditioning:

9/04/00 (Last Workover)

Deepened from 4710 to 4810 (4-3/4 " hole). Acidized.

Current Production

Prod. 10 bopd 100 bwpd Date: ######
28 gas

Rod Pump

SHOE 4316'
COLLAR 4274

SET CIBP @ 4265
WHIP/WIRE 4256
4262

printed: 4/11/2002

DISTRICT I
P.O. Box 1980, Hobbs, NM 88241-1980
DISTRICT II
P.O. Box Drawer DD, Artesia, NM 88211-0719
DISTRICT III
1000 Rio Brazos Rd., Aztec, NM 87410
DISTRICT IV
P.O. Box 2088, Santa Fe, NM 87504-2088

State of New Mexico
Energy, Minerals and Natural Resources D. .tment

OIL CONSERVATION DIVISION

P.O. Box 2088
Santa Fe, New Mexico 87504-2088

Form C-10
Revised February 10,199
Instructions on back
Submit to Appropriate District Offic
State Lease - 4 Copie
Fee Lease - 3 Copie
☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

1 API Number	2 Pool Code	3 Pool Name	
30-025-02277	62180	Vacuum Grayburg San Andres	
4 Property Code	5 Property Name		6 Well No.
11124	Vacuum Grayburg San Andres Unit		7H
7 OGRID Number	8 Operator Name		9 Elevation
022351	TEXACO EXPLORATION & PRODUCTION INC.		4008'

10 Surface Location

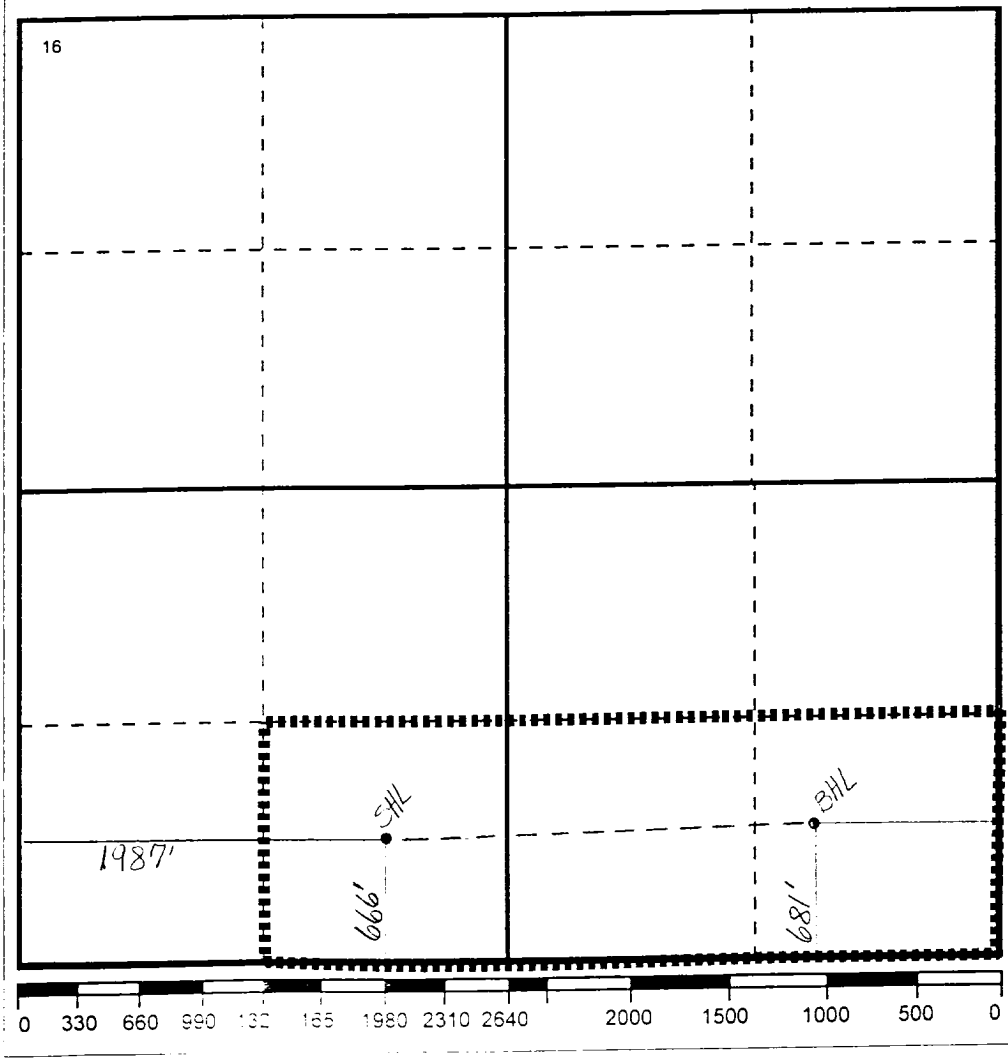
Ul or lot no	Section	Township	Range	Lot.Idn	Feet From The	North/South Line	Feet From The	East/West Line	County
N	2	18-S	34-E		666'	South	1987'	West	Lea

11 Bottom Hole Location If Different From Surface

Ul or lot no	Section	Township	Range	Lot.Idn	Feet From The	North/South Line	Feet From The	East/West Line	County
P	2	18-S	34-E		681'	South	943'	East	Lea

12 Dedicated Acre	13 Joint or Infill	14 Consolidation Code	15 Order No.
120	No		

NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION



17 OPERATOR CERTIFICATION

I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief

Laura Skinner
Signature

Printed Name
Laura A. Skinner

Positio
Regulatory Specialist

Date May 2, 2002

18 SURVEYOR CERTIFICATION

I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my knowledge and belief.

Date Surveyed

Signature & Seal of Professional Surveyor

Certificate No.

DeSoto/Nichols 3/94 ver 1.10