

District I
PO Box 1980, Hobbs, NM 88241-1980
District II
811 S. 1st Street, Artesia, NM 88210-2834
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 Resources Department

OIL CONSERVATION DIVISION
2040 South Pacheco
Santa Fe, NM 87505

Form C-101
Revised October 18, 1994
Instructions on back
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 Altura Energy LTD P.O. Box 4294 Houston, TX 77210-4294		² OGRID Number 157984
⁴ Property Code 19520	⁵ Property Name North Hobbs G/SA Unit	³ API Number 30-025-34997
		⁶ Well No. 543

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
H	33	18-S	38-E		2630	North	313	East	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
I	33	18-S	38-E		2548	South	796	East	Lea

⁹ Proposed Pool 1 Hobbs; Grayburg - San Andres	¹⁰ Proposed Pool 2
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¹¹ Work Type Code N	¹² Well Type Code O	¹³ Cable/Rotary R	¹⁴ Lease Type Code P	¹⁵ Ground Level Elevation 3630
¹⁶ Multiple No	¹⁷ Proposed Depth 4500'	¹⁸ Formation San Andres	¹⁹ Contractor Key Energy	²⁰ Spud Date June, 2000

²¹ Proposed Casing and Cement Program

Hole Size	Casing Size	Casing weight/foot	Setting Depth	Sacks of Cement	Estimated TOC
18	14	Conductor	40	50	Surface
12-1/4	8-5/8	24	1650	775	Surface
7-7/8	5-1/2	15.5	4500	750	Surface

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

Permit Expires 1 Year From Approval
Date Unless Drilling Underway

See attached for proposed drilling program.

BOP Program 3000# Ram Preventer

Note: Well will be drilled closed-loop -- Altura intends to haul drilling fluids and cuttings to Parabo Inc., Eunice, New Mexico

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

Signature:

Mark Stephens

Printed name:

Mark Stephens (281) 552-1158

Title:

Business Analyst (SG)

OIL CONSERVATION DIVISION

Approved by: **ORIGINAL SIGNED & STAMPED**

Title: **SEALER**

Approval Date: **10/1/00**

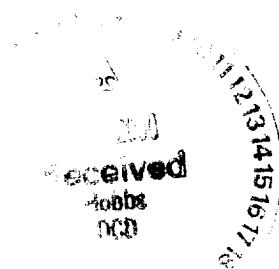
Expiration Date:



Proposed Drilling Program
North Hobbs G/SA Unit No. 33-543
Lea County, New Mexico

A 14" conductor will be set and cemented to surface with 50 sx. cement. A 12-1/4" hole will be drilled from surface to approximately 1700'. This will allow for protection of all water zones and casing off of the Red Beds. A full string of 8-5/8", 24#, J-55 surface casing will be run and set 25' into the top of the Rustler Anhydrite with cement circulated to surface. The cement will be allowed to set for a minimum of eight (8) hours (minimum 500# compressive strength) and will then be tested to 1500 psi for 30 minutes before drilling resumes. After the casing is run and cemented, weld on 8-5/8" X 11" 3M casinghead housing and nipple up BOP stack (3000# Ram Preventer).

A 7-7/8" hole will be drilled out from surface casing point (1650') to +/- 4500' TVD. A full string of 5-1/2", 15.5#, J-55 production casing will be run to TD and cemented to surface (casing test to 1500 psi will be done by the completion rig).



DISTRICT I
P.O. Box 1880, Hobbs, NM 88241-1880

State of New Mexico
Energy, Minerals and Natural Resources Department

Form C-102
Revised February 10, 1994
Submit to Appropriate District Office
State Lease - 4 Copies
Fee Lease - 3 Copies

DISTRICT II
P.O. Drawer DD, Artesia, NM 88211-0719

DISTRICT III
1000 Rio Brazos Rd., Artesia, NM 87410

DISTRICT IV
P.O. BOX 2088, SANTA FE, N.M. 87504-2088

OIL CONSERVATION DIVISION

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

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

API Number 30-025-34997	Pool Code 31920	Pool Name HOBBS: GRAYBURG - SAN ANDRES
Property Code 19520	Property Name NORTH HOBBS G/SA UNIT	Well Number 543
OGRID No. 157984	Operator Name ALTURA ENERGY LTD.	Elevation 3630

Surface Location

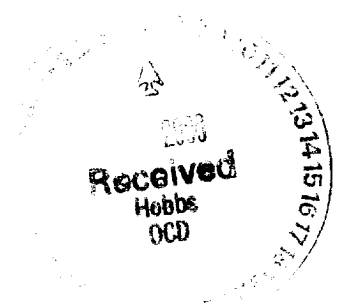
UL or lot No. H	Section 33	Township 18 S	Range 38 E	Lot Idn	Feet from the 2630	North/South line NORTH	Feet from the 318	East/West line EAST	County LEA
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Bottom Hole Location If Different From Surface

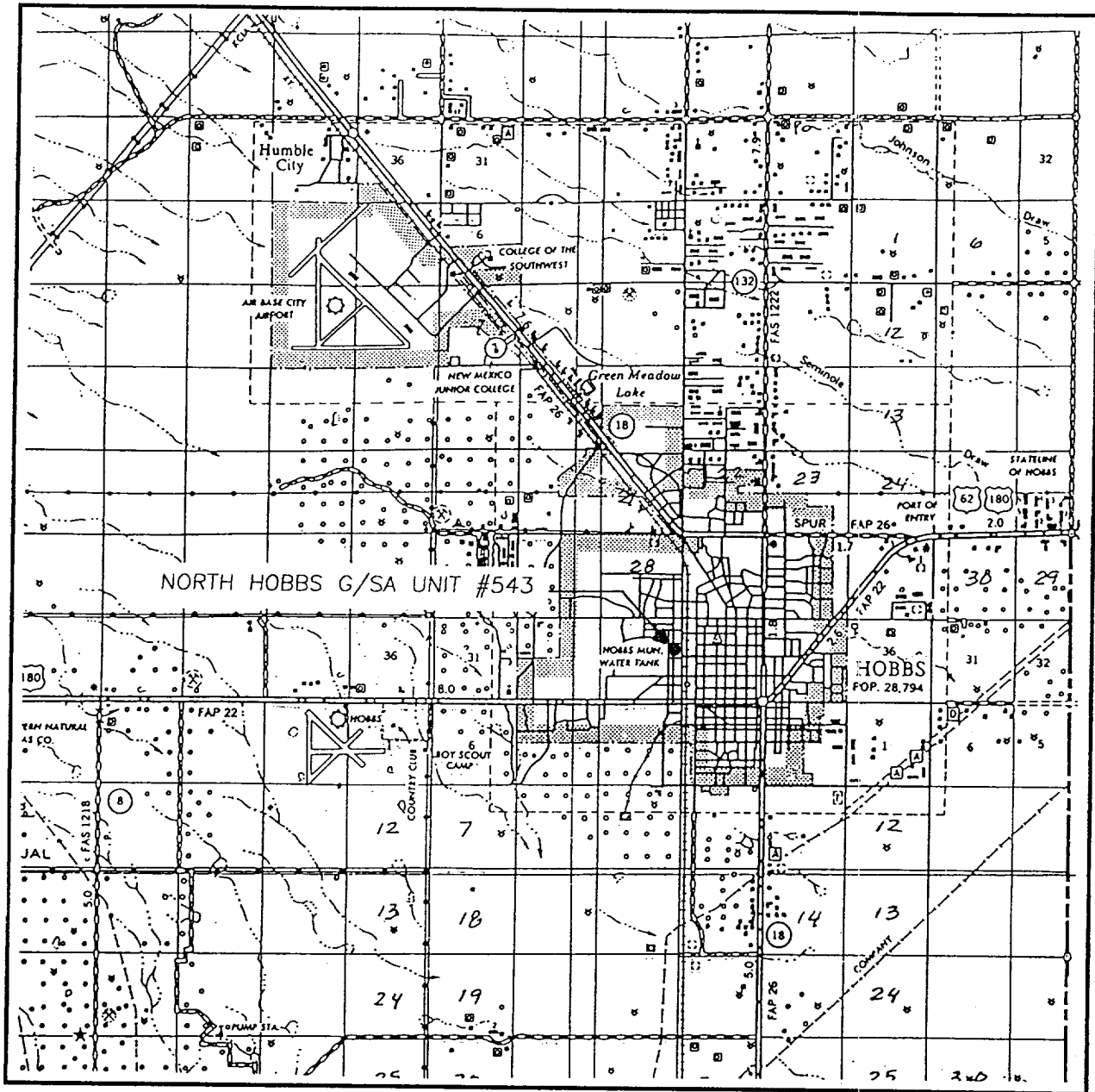
UL or lot No. I	Section 33	Township 18 S	Range 38 E	Lot Idn	Feet from the 2548 2744	North/South line SOUTH N	Feet from the 796 796	East/West line EAST	County LEA
Dedicated Acres 40	Joint or Infill I	Consolidation Code U	Order No.						

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

GEOGRAPHIC LOCATION NAD 83 LAT. 32°42'14.14" N LONG. 103°08'45.07" W	PROPOSED SURFACE LOC. NAD 27 NM EAST ZONE Y = 621807 X = 865433	PROPOSED BOTTOM HOLE LOCATION	PROPOSED PENETRATION POINT @ 3865' TVD	330' UNIT BOUNDARY OFFSET LINE	NORTH HOBBS (GRAYBURG-SAN ANDRES) UNIT BOUNDARY	OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief. <u>Mark Stephens</u> Signature Mark Stephens Printed Name Business Analyst (SG) Title March 28, 2000 Date
(TRUE BRG.) S76°46'W - 378' SURF. TO PROP. PENETRATION PT. (TRUE BRG.) S76°46'W - 490' SURF. TO PROP. BOTTOM HOLE LOC.						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 belief. JANUARY 18, 2000 Date Surveyed <u>GARY EIDSON</u> Signature & Seal of Professional Surveyor NEW MEXICO 99-11-1107 Certificate No. RONALD J. EIDSON 3239 GARY EIDSON 12641 MACON-McDONALD 12185



VICINITY MAP



SCALE: 1" = 2 MILES

SEC. 33 TWP. 18-S RGE. 38-E

SURVEY N.M.P.M.

COUNTY LEA

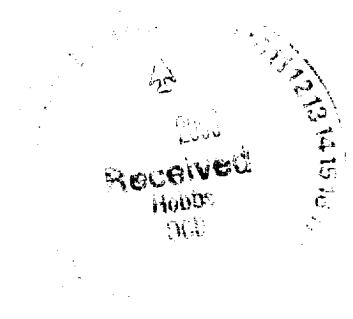
DESCRIPTION 2630' FNL & 318' FEL

ELEVATION 3630

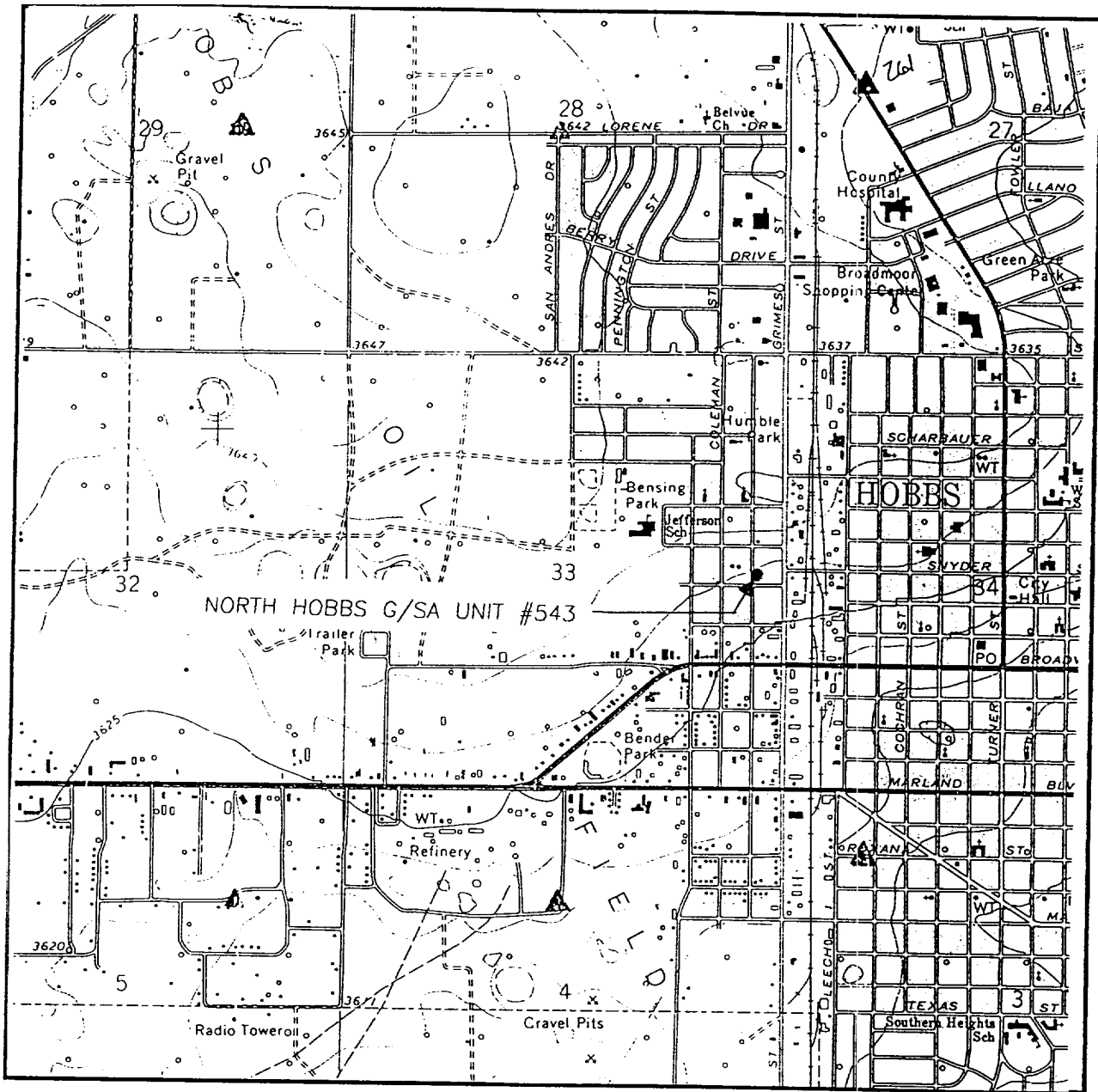
OPERATOR ALTURA ENERGY LTD.

LEASE NORTH HOBBS G/SA UNIT

JOHN WEST SURVEYING
HOBBS, NEW MEXICO
(505 393-3117)



LOCATION VERIFICATION MAP



SCALE: 1" = 2000'

CONTOUR INTERVAL:
HOBBS WEST - 5'

SEC. 33 TWP. 18-S RGE. 38-E

SURVEY N.M.P.M.

COUNTY LEA

DESCRIPTION 2630' FNL & 318' FEL

ELEVATION 3630

OPERATOR ALTURA ENERGY LTD.

LEASE NORTH HOBBS G/SA UNIT

U.S.G.S. TOPOGRAPHIC MAP

HOBBS WEST, N.M.

JOHN WEST SURVEYING
HOBBS, NEW MEXICO
(505 393-3117)

Scientific Drilling Inc.

Planning Report

Company: Altura Energy Ltd. Field: North Hobbs GSA Unit Site: Lea County New Mexico Well: NHGSAU "33" #543 Wellpath: OH Original hole		Date: 03/08/2000 Co-ordinate(NE) Reference: Site: Lea County New Mexico, True North Vertical (TVD) Reference: SITE 0.0 above Mean Sea Level Section (VS) Reference: Site (0.0E,0.0N,256.7Azi) Plan: Plan #1		Time: 15:40:25 Page: 1
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Field: North Hobbs GSA Unit	
Map System: US State Plane Coordinate System 1927 Ellipsoid: Clarke - 1866 Sys Datum: Mean Sea Level	Map Zone: New Mexico, Eastern Zone North Reference: True Geomagnetic Model: IGRF2000

Site: Lea County New Mexico	
Site Position: From: Local Only Position Uncertainty: 0.0 ft Water Depth: 0.0 ft	Northing: ft Easting: ft Latitude: Longitude: Magnetic Declination: 0.00 deg Grid Convergence: deg

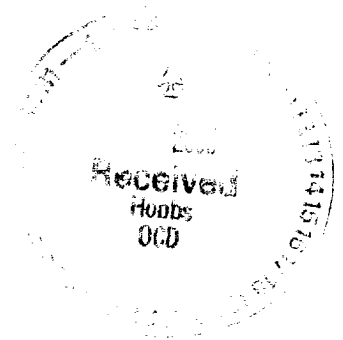
Well: NHGSAU "33" #543	
Well Position: +N/-S 0.0 ft From Slot: +E/-W 0.0 ft Position Uncertainty: 0.0 ft	Northing: ft Easting : ft Latitude: Longitude:

Wellpath: OH Original hole		Drilled From: Surface
Vertical Section: +N/-S 0.0 ft From: Site +E/-W 0.0 ft Measured Depth Reference: SITE	0.0 ft	Tie-on Depth: ft V.Section Direction: 256.70 deg Above System Datum: Mean Sea Level

Plan: Plan #1	Date Composed: 02/11/2000
	Version: 1
Principal: Yes	Locked: No

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
0.0	0.00	256.67	0.0	0.0	0.0	0.00	0.00	0.00	0.00	
2000.0	0.00	256.67	2000.0	0.0	0.0	0.00	0.00	0.00	0.00	
2535.9	13.40	256.67	2531.0	-14.4	-60.7	2.50	2.50	0.00	256.67	
4138.5	13.40	256.67	4090.0	-100.0	-422.0	0.00	0.00	0.00	0.00	Midpoint Pay-543
4385.2	13.40	256.67	4330.0	-113.2	-477.6	0.00	0.00	0.00	0.00	

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
0.0	0.00	256.67	0.0	0.0	0.0	0.0	0.00	0.00	0.00	0.00
100.0	0.00	256.67	100.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
200.0	0.00	256.67	200.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
300.0	0.00	256.67	300.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
400.0	0.00	256.67	400.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
500.0	0.00	256.67	500.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
600.0	0.00	256.67	600.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
700.0	0.00	256.67	700.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
800.0	0.00	256.67	800.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
900.0	0.00	256.67	900.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
1000.0	0.00	256.67	1000.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
1100.0	0.00	256.67	1100.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
1200.0	0.00	256.67	1200.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
1300.0	0.00	256.67	1300.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
1400.0	0.00	256.67	1400.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
1500.0	0.00	256.67	1500.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
1600.0	0.00	256.67	1600.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
1700.0	0.00	256.67	1700.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
1800.0	0.00	256.67	1800.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
1900.0	0.00	256.67	1900.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67
2000.0	0.00	256.67	2000.0	0.0	0.0	0.0	0.00	0.00	0.00	256.67



Scientific Drilling Inc.

Planning Report

Company: Altura Energy Ltd.
Field: North Hobbs GSA Unit
Site: Lea County New Mexico
Well: NHGSAU "33" #543
Wellpath: OH Original hole

Date: 03/08/2000 **Time:** 15:40:25 **Page:** 2
Co-ordinate(N/E) Reference: Site: Lea County New Mexico, True North
Vertical (TVD) Reference: SITE 0.0 above Mean Sea Level
Section (VS) Reference: Site (0.0E,0.0N,256.7Azi)
Plan: Plan #1

Section 2 : Start Build 2.50

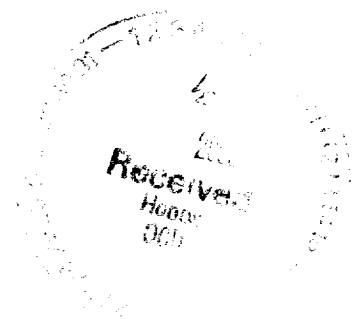
MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	VS ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg
2100.0	2.50	256.67	2100.0	-0.5	-2.1	2.2	2.50	2.50	0.00	0.00
2200.0	5.00	256.67	2199.7	-2.0	-8.5	8.7	2.50	2.50	0.00	0.00
2300.0	7.50	256.67	2299.1	-4.5	-19.1	19.6	2.50	2.50	0.00	0.00
2400.0	10.00	256.67	2398.0	-8.0	-33.9	34.8	2.50	2.50	0.00	0.00
2500.0	12.50	256.67	2496.0	-12.5	-52.9	54.3	2.50	2.50	0.00	0.00
2535.9	13.40	256.67	2531.0	-14.4	-60.7	62.4	2.50	2.50	0.00	0.00

Section 3 : 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
2600.0	13.40	256.67	2593.4	-17.8	-75.1	77.2	0.00	0.00	0.00	180.00
2700.0	13.40	256.67	2690.7	-23.1	-97.7	100.4	0.00	0.00	0.00	180.00
2800.0	13.40	256.67	2787.9	-28.5	-120.2	123.6	0.00	0.00	0.00	180.00
2900.0	13.40	256.67	2885.2	-33.8	-142.8	146.7	0.00	0.00	0.00	180.00
3000.0	13.40	256.67	2982.5	-39.2	-165.3	169.9	0.00	0.00	0.00	180.00
3100.0	13.40	256.67	3079.8	-44.5	-187.9	193.1	0.00	0.00	0.00	180.00
3200.0	13.40	256.67	3177.1	-49.9	-210.4	216.2	0.00	0.00	0.00	180.00
3300.0	13.40	256.67	3274.3	-55.2	-233.0	239.4	0.00	0.00	0.00	180.00
3400.0	13.40	256.67	3371.6	-60.5	-255.5	262.6	0.00	0.00	0.00	180.00
3500.0	13.40	256.67	3468.9	-65.9	-278.1	285.8	0.00	0.00	0.00	180.00
3600.0	13.40	256.67	3566.2	-71.2	-300.6	308.9	0.00	0.00	0.00	180.00
3700.0	13.40	256.67	3663.5	-76.6	-323.1	332.1	0.00	0.00	0.00	180.00
3800.0	13.40	256.67	3760.7	-81.9	-345.7	355.3	0.00	0.00	0.00	180.00
3900.0	13.40	256.67	3858.0	-87.3	-368.2	378.4	0.00	0.00	0.00	180.00
4000.0	13.40	256.67	3955.3	-92.6	-390.8	401.6	0.00	0.00	0.00	180.00
4100.0	13.40	256.67	4052.6	-97.9	-413.3	424.8	0.00	0.00	0.00	180.00
4138.5	13.40	256.67	4090.0	-100.0	-422.0	433.7	0.00	0.00	0.00	180.00

Section 4 : 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
4200.0	13.40	256.67	4149.8	-103.3	-435.9	447.9	0.00	0.00	0.00	180.00
4300.0	13.40	256.67	4247.1	-108.6	-458.4	471.1	0.00	0.00	0.00	180.00
4385.2	13.40	256.67	4330.0	-113.2	-477.6	490.8	0.00	0.00	0.00	180.00

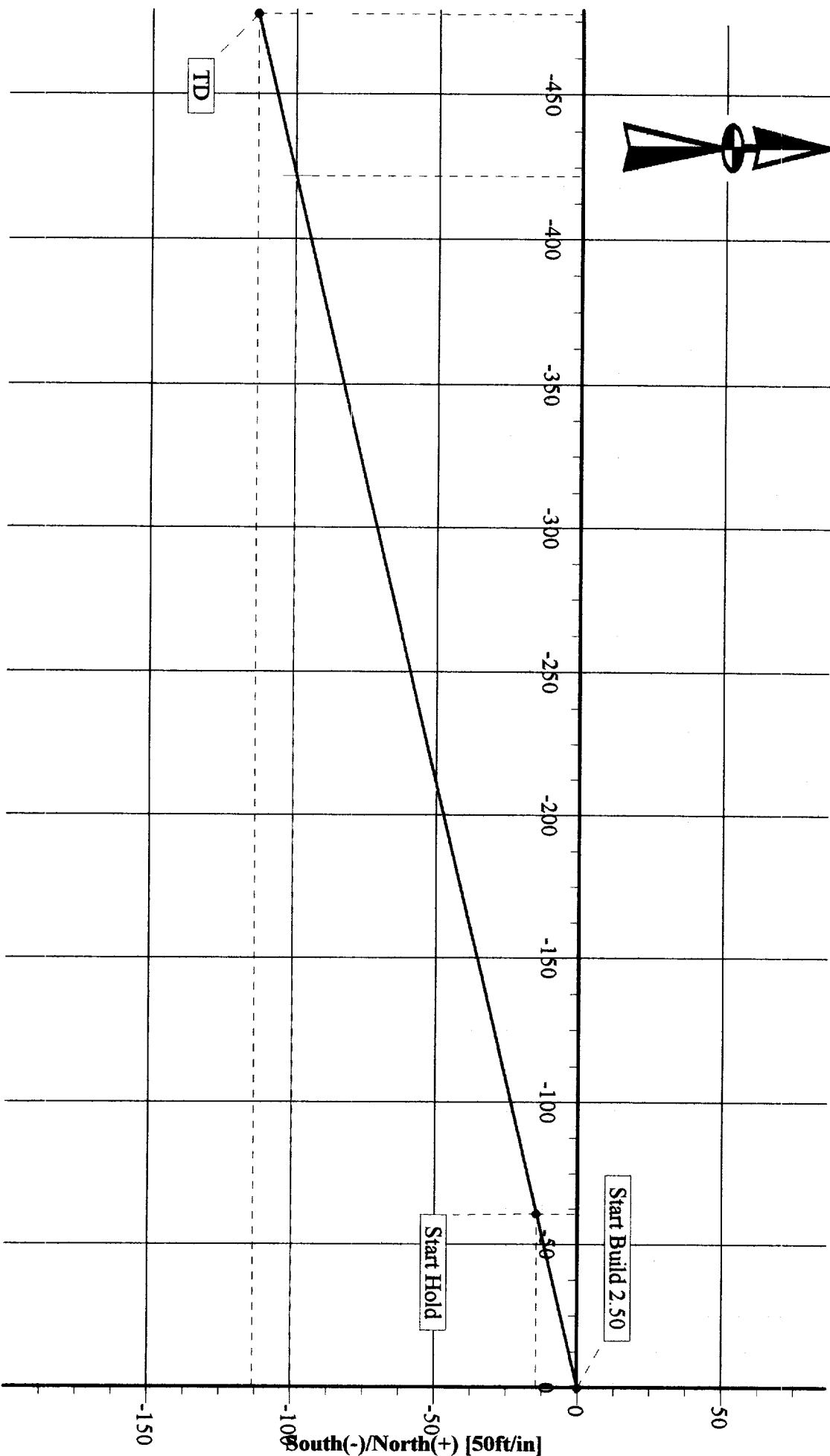
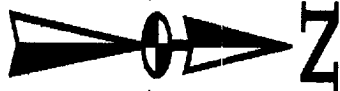




**Scientific
Drilling**

Field: North Hobbs GSA Unit
Site: Lea County New Mexico
Well: NHGSAU "33" #543
Wellpath: OH Original hole
Plan: Plan #1

Altura
ENERGY LTD.



West(-)/East(+) [50ft/in]

ELF
9/18/60
ABOVE DATE DOES NOT
INDICATE WHEN
CONFIDENTIAL
WILL BE RELEA

