

District I
1625 N. French Dr., Hobbs, NM 88240
District II
1301 W. Grand Avenue, Artesia, NM 88210
District III
1000 Rio Brazos Road, Aztec, NM 87410
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico
Energy Minerals and Natural Resources

Form C-101
May 27, 2004

Oil Conservation Division
1220 South St. Francis Dr.
Santa Fe, NM 87505

Submit to appropriate District Office

☐ AMENDED REPORT

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

Operator Name and Address LCX ENERGY, LLC. 110 NORTH MATIENFELD SUITE 200 MIDLAND, TEXAS 79701		² OGRID Number 218885
		API Number 30 -
¹ Property Code 34222	³ Property Name 1625 STATE	RECEIVED 015-34541 JAN 10 2006
⁴ Proposed Pool 1 (75250) COTTONWOOD CREEK-WOLFCAMP (GAS)		⁵ Proposed Pool 2

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
0	19	16S	25E		660'	SOUTH	1880'	EAST	EDDY

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
B	19	16S	25E		660'	NORTH	1880'	EAST	EDDY

Additional Well Information

¹¹ Work Type Code N	¹² Well Type Code G	¹³ Cable/Rotary ROTARY	¹⁴ Lease Type Code S	¹⁵ Ground Level Elevation 3584
¹⁶ Multiple NO	¹⁷ Proposed Depth MD-8726 TVD-4960	¹⁸ Formation WOLFCAMP	¹⁹ Contractor BIG DOG DRILLING	²⁰ Spud Date WHEN APPROVED
Depth to Groundwater 100'+		Distance from nearest fresh water well 1 Mi. west		Distance from nearest surface water Unknown
Pit: Lining Synthetic ☒ 12 mils thick Clay ☐ Pit Volume: 18M bbls Drilling Method: ☐ Fresh Water ☒ Brine ☒ Diesel/Oil-based ☐ Gas/Air ☐				
Closed-Loop System ☐				

²¹ Proposed Casing and Cement Program

Hole Size	Casing Size	Casing weight/foot	Setting Depth	Sacks of Cement	Estimated TOC
26"	20"	Conductor	40'	Redi-mix	Surface
17 1/2"	13 3/8"	48#	350'	400 Sx.	Surface
12 1/2"	9 5/8"	36#	1200'	475 Sx.	Surface
8 3/4" & 7 7/8"	5 1/2"	15.5#	MD8760 TVD4960'	600 Sx.	1000' F 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.

SEE ATTACHED SHEET

NOTIFY OCD OF SPUD & TIME TO
WITNESS CEMENTING OF
SURFACE & INTERMEDIATE
CASING

Clean Fresh Water Mud to 1200'

²³ I hereby certify that the information given above is true and complete to the best of my knowledge and belief. I further certify that the drilling pit will be constructed according to NMOCD guidelines ☒ a general permit ☐ or an (attached) alternative OCD-approved plan ☐ .		OIL CONSERVATION DIVISION
Printed name: Joe T. Janica		Approved by: <i>Jim W. Green</i>
Title: Agent	Approval Date: JAN 10 2006	Expiration Date: JAN 10 2007
E-mail Address: joejanica@valornet.com		
Date: 01/09/06	Phone: 505-391-8503	Conditions of Approval Attached ☐

DISTRICT I
1625 N. French Dr., Hobbs, NM 88240

State of New Mexico
Energy, Minerals & Natural Resources Department

Form C-102
Revised August 15, 2000
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., Aztec, NM 87410

OIL CONSERVATION DIVISION
2040 South Pacheco
Santa Fe, NM 87505

DISTRICT IV
2040 South Pacheco, Santa Fe, NM 87505

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

API Number	Pool Code 75250	Pool Name COTTONWOOD CREEK-WOLFCAMP (GAS)
Property Code	Property Name 1625 STATE	Well Number 191
OGRID No. 218885	Operator Name LCX ENERGY, LLC	Elevation 3584'

Surface Location

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
0	19	16 S	25 E		660	SOUTH	1880	EAST	EDDY

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
B	19	16 S	25 E		660	NORTH	1880	EAST	EDDY
Dedicated Acres 320	Joint or Infill	Consolidation Code	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

NOTE: 1) Plane Coordinates shown hereon are Transverse Mercator Grid and Conform to the "New Mexico Coordinate System", New Mexico East Zone, North American Datum of 1983. Distances shown hereon are mean horizontal surface values.		Plane Coordinate X = 483,339.1 Y = 696,292.3 Plane Coordinate X = 483,326.7 Y = 692,322.0
		OPERATOR CERTIFICATION I hereby certify the the information contained herein is true and complete to the best of my knowledge and belief. <i>Joe T. Janica</i> Signature Joe T. Janica Printed Name Agent Title 01/09/06 Date
		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 upervision and that the same is true and orrect to the best of my belief. December 8, 2005 Date Surveyed Signature & Seal of Professional Surveyor W.O. Num. 2005-1166 Certificate No. MACON, McDONALD 12185

1. Drill 26" hole to 40'. Set 40' of 20" conductor pipe and cement to surface with Redi-mix.
2. Drill 17-1/2" hole to 350'. Run and set 350' of 13-3/8" 48# H-40 ST&C casing. Cement with 200 sx 35/65 Poz/C + 6% gel and tail in with 200 sx of Class "C" cement + 2% CaCl, circulate cement to surface.
3. Drill 12-1/4 hole to 1200'. Run and set 1200' of 9-5/8" 36# J-55 ST&C casing. Cement with 375 sx of 35/65 Poz/C + 5% NaCl + 6% Bentonite, tail in with 100 sx. of Class "C" cement + 2% CaCl, circulate cement to surface.
4. Drill 8-3/4" hole to approx. 5100'. Set cement kick-off plug from TD to approx. 4800 ft with 150 sx H + 0.7% dispersant.
5. Dress cement top to desired kick-off point. Drill 8-3/4" curve and land lateral in pay zone (approx. 4900 ft TVD). Pickup lateral drilling assembly with an 8-3/4" or 7-7/8" bit and drill a +/-4000' lateral to 660' from lease line (approx. 4000 ft vertical section).
6. Run and set 5-1/2" 15.5# N80 or stronger production casing. Cement 5-1/2" with acid soluble cement through the lateral and 400 sx 50/50 Poz/C + 10% gel and tail in with 200 sx C + 200% CaCO₃ (acid soluble cement) + fluid loss additive + retarder (as required), attempting to bring top of cement to 1,000'.

Contingency String:

If hole conditions dictate running a 7" contingency string in the 8-3/4" hole :

- 4a. Run approx. 5100 ft 7" 26# J55 or stronger casing to TD. Cement with 700 sx class 'C' cement + add's attempting bringing TOC to approx. 1,000 ft. This may be done in the vertical pilot hole or at the end of the 8-3/4" curve section.
- 4b. Run whipstock and cut a window in the 7" casing (or drill out with 6-1/8" BHA if 7" set at end of curve). Drill to TD.
- 5a. Step 5 will be omitted.
- 6a. Run and set approximately 4400 ft 4-1/2" 11.6# N/L80 liner from TD to approximately 200' above the window/7" casing shoe. Cement with approx. 110 sx C + 200% CaCO₃ (acid soluble cement) + add's attempting to bring TOC above liner top.

Fresh water will be used to drill the 350' hole and the 1200' hole.

There is no known presence of any H₂S in this area. Other wells have been drilled with no indication of any H₂S.

Joe T. Janice

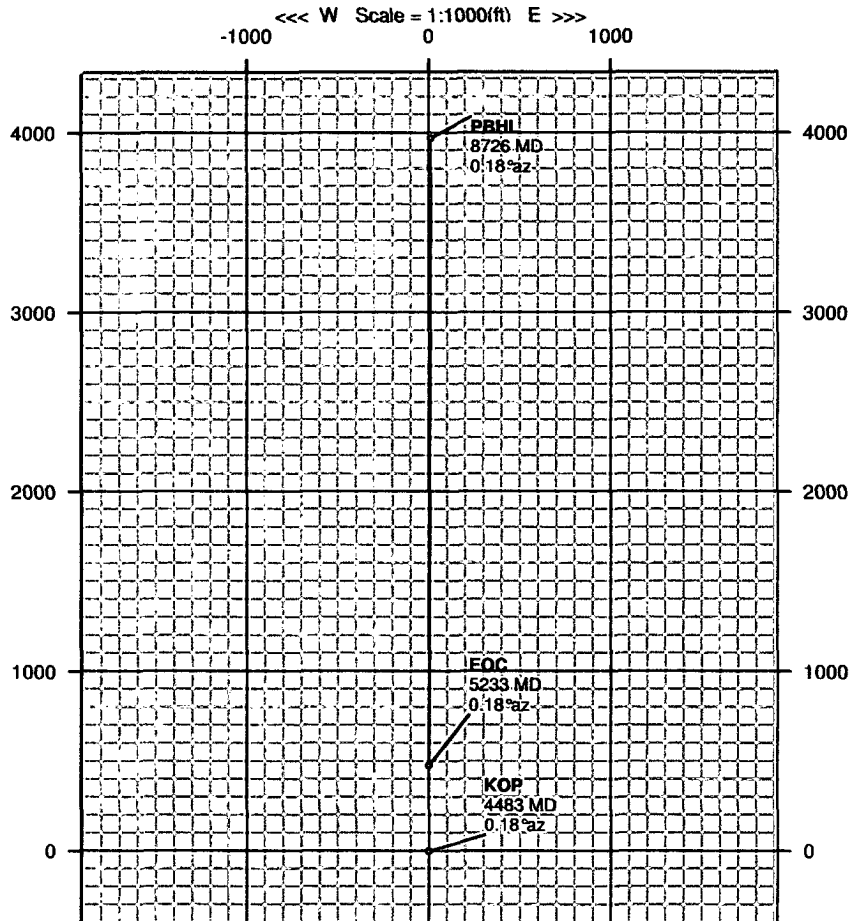
Proposal

Report Date: December 28, 2005 Client: LCX Energy LLC. Field: Eddy County, NM Nad 83 Structure / Slot: 1625 State #191 / 1625 State #191 Well: 1625 State #191 Borehole: 1625 State #191 UWI/API#: Survey Name / Date: 1625 State #191_r1 / December 28, 2005 Tort / AHD / DDI / ERD ratio: 90.000° / 3970.67 ft / 5.798 / 0.801 Grid Coordinate System: NAD83 New Mexico State Planes, Eastern Zone, US Feet Location Lat/Long: N 32 54 11.041, W 104 31 20.453 Location Grid N/E Y/X: N 692322.000 ftUS, E 483326.700 ftUS Grid Convergence Angle: -0.10267672° Grid Scale Factor: 0.99991294	Survey / DLS Computation Method: Minimum Curvature / Lubinski Vertical Section Azimuth: 0.180° Vertical Section Origin: N 0.000 ft, E 0.000 ft TVD Reference Datum: RKB TVD Reference Elevation: 0.0 ft relative to Sea Bed / Ground Level Elevation: 0.000 ft relative to Magnetic Declination: 8.711° Total Field Strength: 49502.795 nT Magnetic Dip: 60.781° Declination Date: December 28, 2005 Magnetic Declination Model: IGRF 2005 North Reference: Grid North Total Corr Mag North -> Grid North: +8.814° Local Coordinates Referenced To: Well Head
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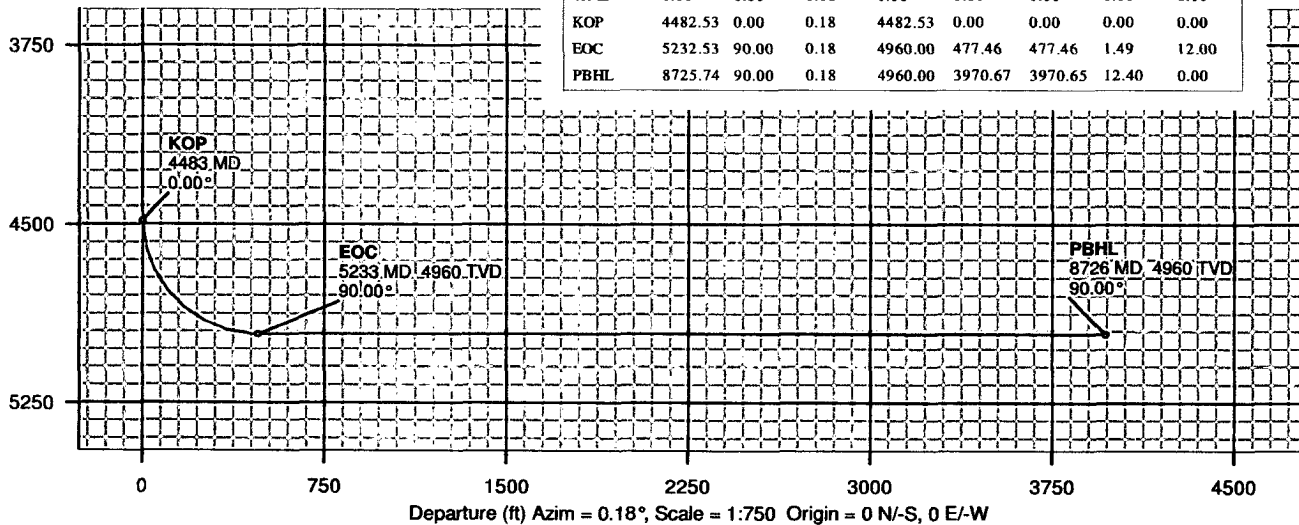
Comments	Measured Depth (ft)	Inclination (deg)	Azimuth (deg)	TVD (ft)	Vertical Section (ft)	NS (ft)	EW (ft)	Closure (ft)	Closure Azimuth (deg)	DLS (deg/100 ft)	Tool Face (deg)
Tie-In	0.00	0.00	0.18	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.18M
KOP	4482.53	0.00	0.18	4482.53	0.00	0.00	0.00	0.00	0.00	0.00	0.18M
	4500.00	2.10	0.18	4500.00	0.32	0.32	0.00	0.32	0.18	12.00	0.18M
	4600.00	14.10	0.18	4598.82	14.38	14.38	0.04	14.38	0.18	12.00	0.00G
	4700.00	26.10	0.18	4692.56	48.67	48.67	0.15	48.67	0.18	12.00	0.00G
	4800.00	38.10	0.18	4777.12	101.71	101.71	0.32	101.71	0.18	12.00	0.00G
	4900.00	50.10	0.18	4848.81	171.17	171.17	0.53	171.17	0.18	12.00	0.00G
	5000.00	62.10	0.18	4904.49	254.01	254.01	0.79	254.01	0.18	12.00	0.00G
	5100.00	74.10	0.18	4941.72	346.63	346.62	1.08	346.63	0.18	12.00	0.00G
	5200.00	86.10	0.18	4958.89	444.96	444.95	1.39	444.96	0.18	12.00	0.00G
EOC	5232.53	90.00	0.18	4960.00	477.46	477.46	1.49	477.46	0.18	12.00	180.00G
PBHL	8725.74	90.00	0.18	4960.00	3970.67	3970.65	12.40	3970.67	0.18	0.00	0.00G

LCX Energy LLC.

WELL		FIELD		STRUCTURE	
1625 State #191		Eddy County, NM		1625 State #191	
Magnetic Parameters		Surface Location		Miscellaneous	
Model: IGRF 2005	Dip: 60.781° Mag Dec: +8.711°	Date: December 26, 2005 IS: 45502.8 mT	Lat: N32 54 11.041 Lon: W104 31 20.453	NAD83 New Mexico State Plane, Eastern Zone, US Feet Northing: 682322.00 IUS Easting: 682326.70 IUS Grid Coord: -0.10267072° Scale Factor: 0.9999129445	Plot: 1625 State #191 TVD Ref: R98 (0.00 ft above) Srvy Desc: Well 11-49 AM December 26, 2005



Critical Point	Critical Points							
	MD	INCL	AZIM	TYD	YSEC	N(+) / S(-)	E(+) / W(-)	DLS
Tie-In	0.00	0.00	0.18	0.00	0.00	0.00	0.00	0.00
KOP	4482.53	0.00	0.18	4482.53	0.00	0.00	0.00	0.00
EOC	5232.53	90.00	0.18	4960.00	477.46	477.46	1.49	12.00
PBHL	8725.74	90.00	0.18	4960.00	3970.67	3970.65	12.40	0.00

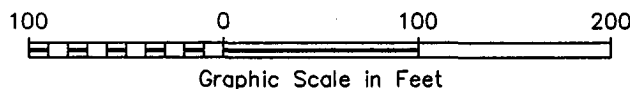
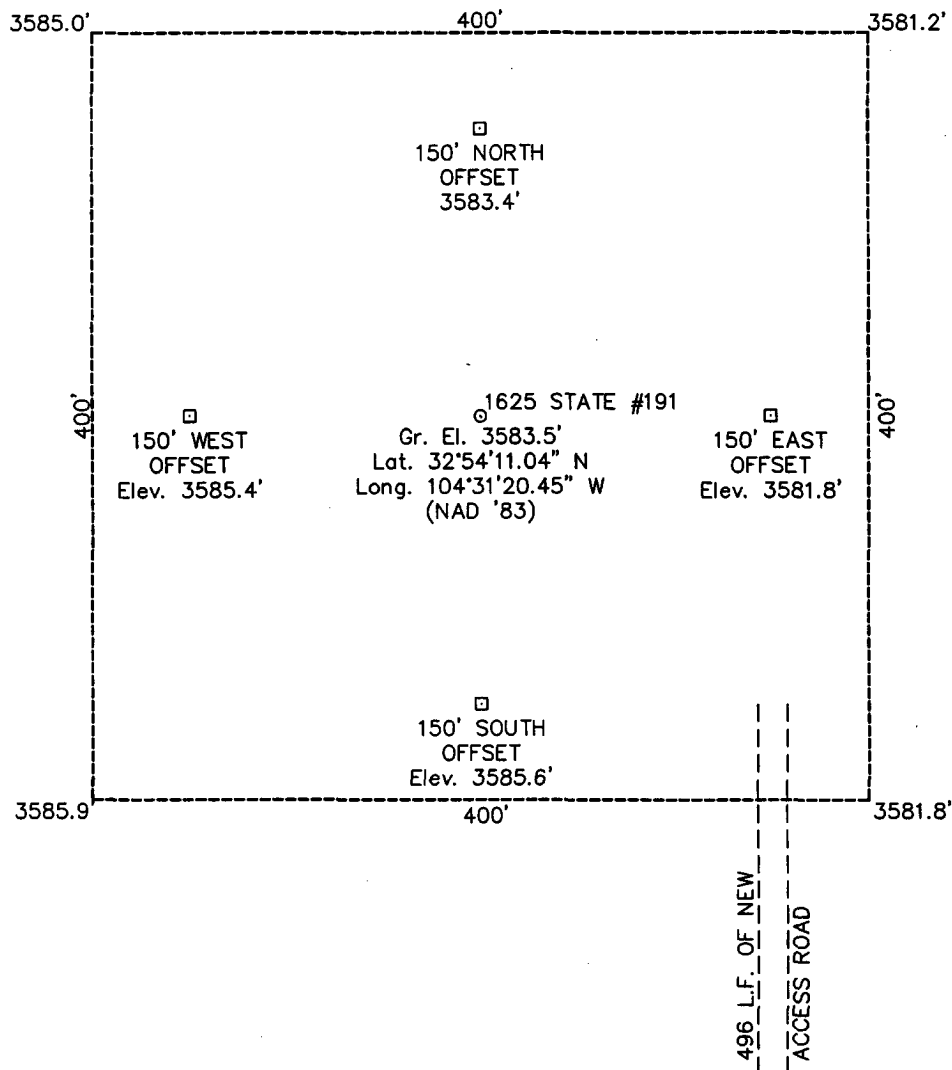


SECTION 19, TOWNSHIP 16 SOUTH, RANGE 25 EAST, N.M.P.M.

EDDY COUNTY

NEW MEXICO

L-2005-1166



DRIVING DIRECTIONS

FROM INTERSECTION OF HWY 285 & HWY 82 IN ARTESIA, GO WEST ALONG HWY 82 5.9 MILES; THEN GO NORTH ALONG LOANESOME TRAIL ROAD 4.0 MILES, THEN GO WEST ALONG LEASE ROAD 1.4 MILES; LOCATION IS NORTH 660 FEET.

LCX ENERGY, LLC

1625 STATE #191

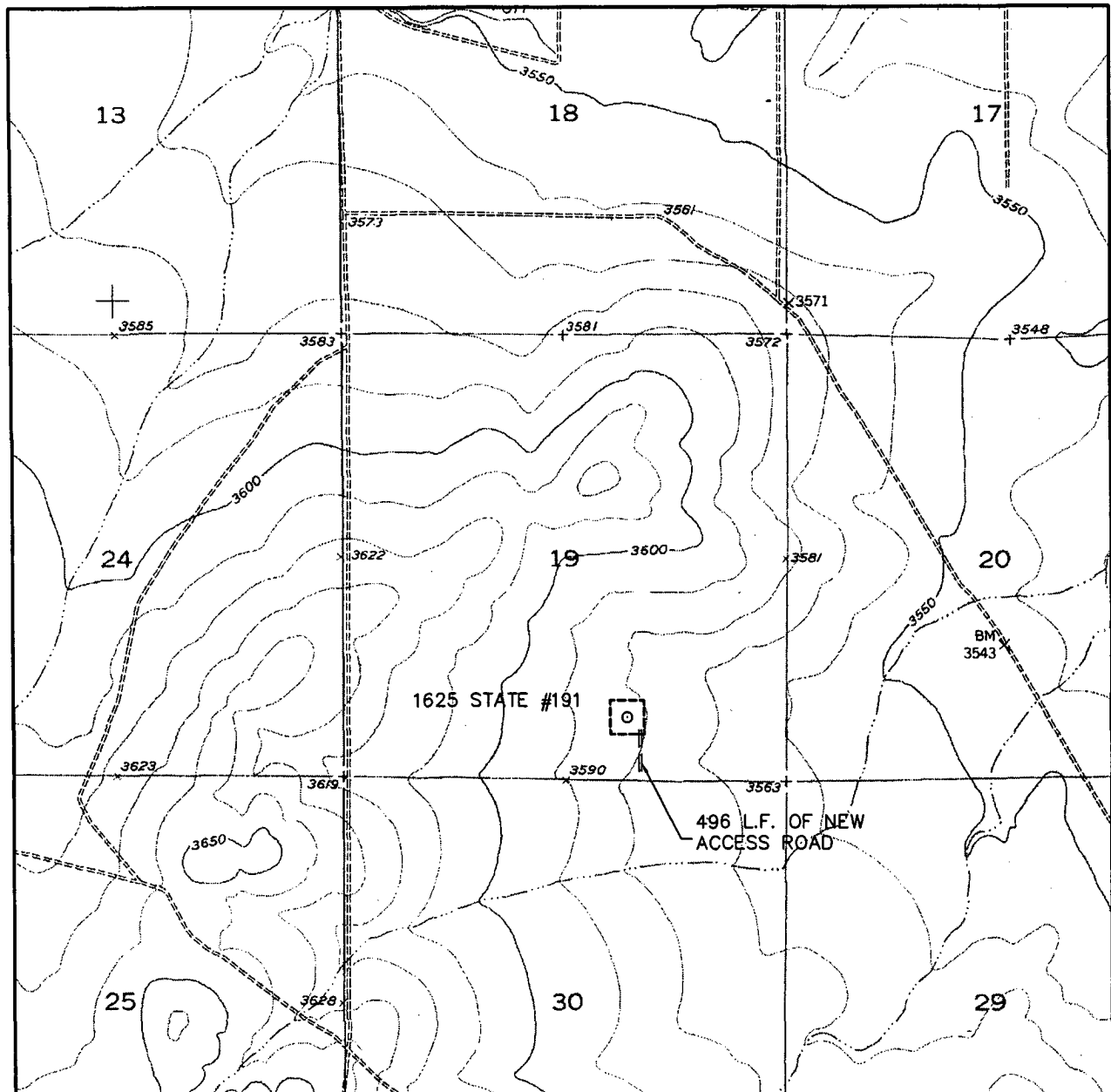
Located 660' FSL & 1880' FEL, Section 19
Township 16 South, Range 25 East, N.M.P.M.
Eddy County, New Mexico

**WEST
COMPANY**
of Midland, Inc.

110 W. LOUISIANA, STE. 110
MIDLAND TEXAS, 79701
(432) 687-0865 - (432) 687-0868 FAX

Drawn By: JMJ	Date: December 15, 2005
Scale: 1"=100'	Field Book: 326 / 1-3
Revision Date:	Quadrangle:
W.O. No: 2005-1166	Dwg. No.: L-2005-1166

LOCATION VERIFICATION MAP



SCALE: 1" = 2000'

CONTOUR INTERVAL:
HOPE NE - 10'

SEC. 19 TWP. 16-S RGE. 25-E

SURVEY N.M.P.M.

COUNTY EDDY

DESCRIPTION 660' FSL & 1880' FEL

ELEVATION 3584'

OPERATOR LCX ENERGY, LLC

LEASE 1625 STATE

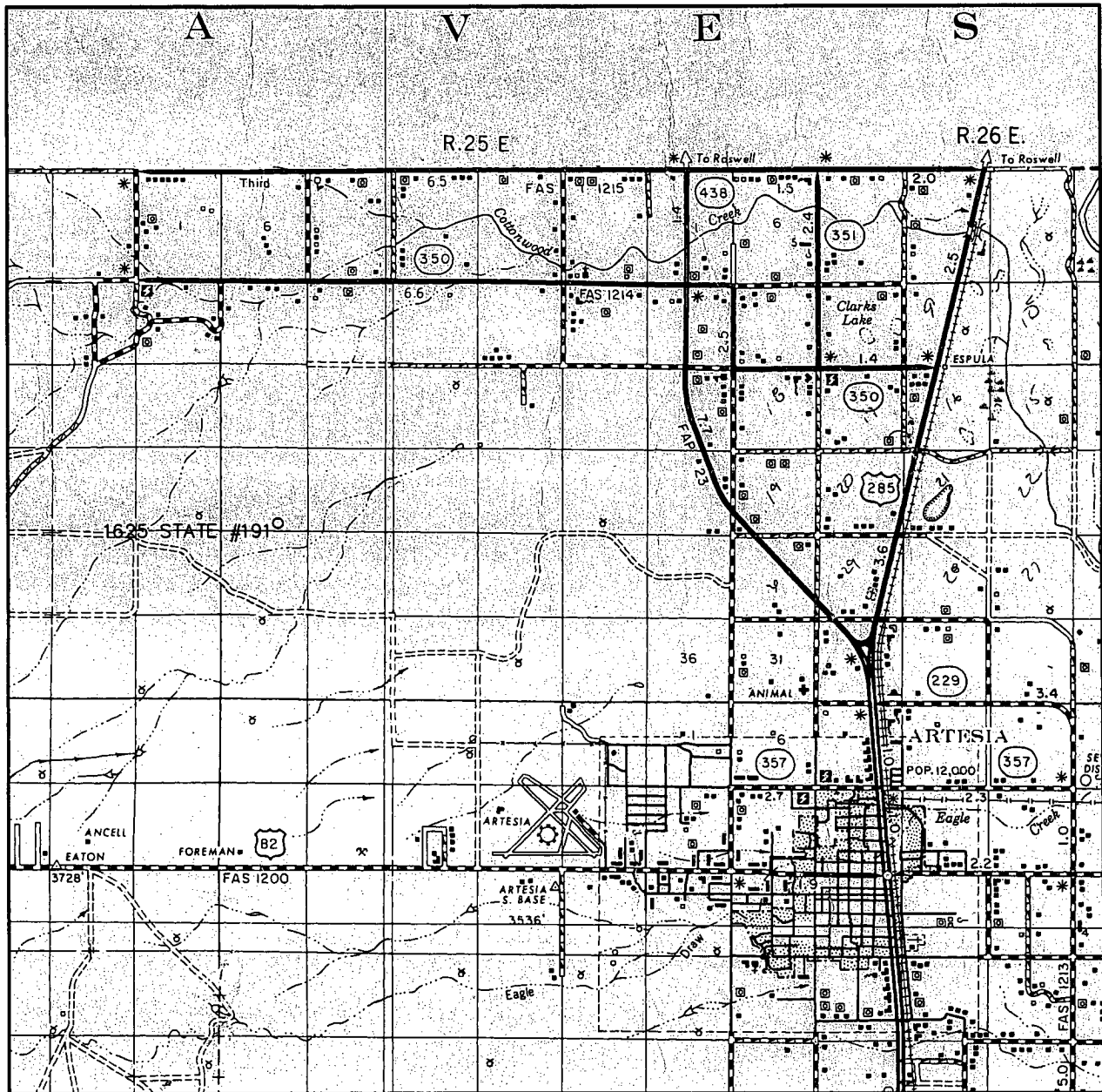
U.S.G.S. TOPOGRAPHIC MAP
HOPE NE, N.M.



**WEST
COMPANY**
of Midland, Inc.

110 W. LOUISIANA, STE. 110
MIDLAND TEXAS, 79701
(432) 687-0865 - (432) 687-0868 FAX

VICINITY MAP



SCALE: 1" = 2 MILES

SEC. 19 TWP. 16-S RGE. 25-E

SURVEY N.M.P.M.

COUNTY EDDY

DESCRIPTION 660' FSL & 1880' FEL

ELEVATION 3584'

OPERATOR LCX ENERGY, LLC

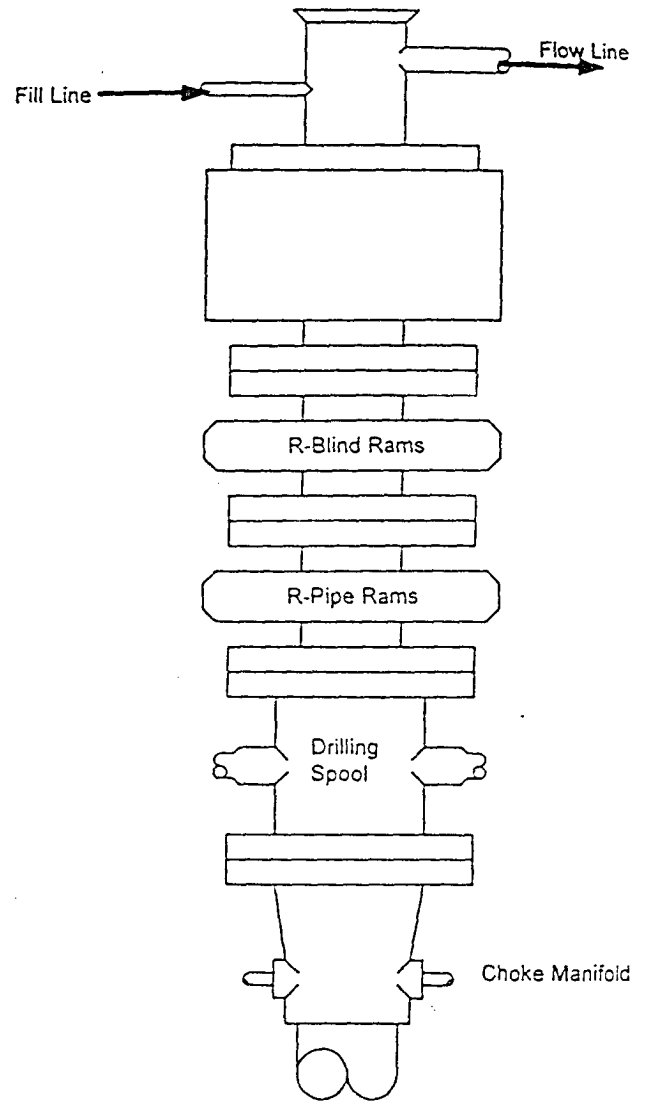
LEASE 1625 STATE



WEST
COMPANY
of Midland, Inc.

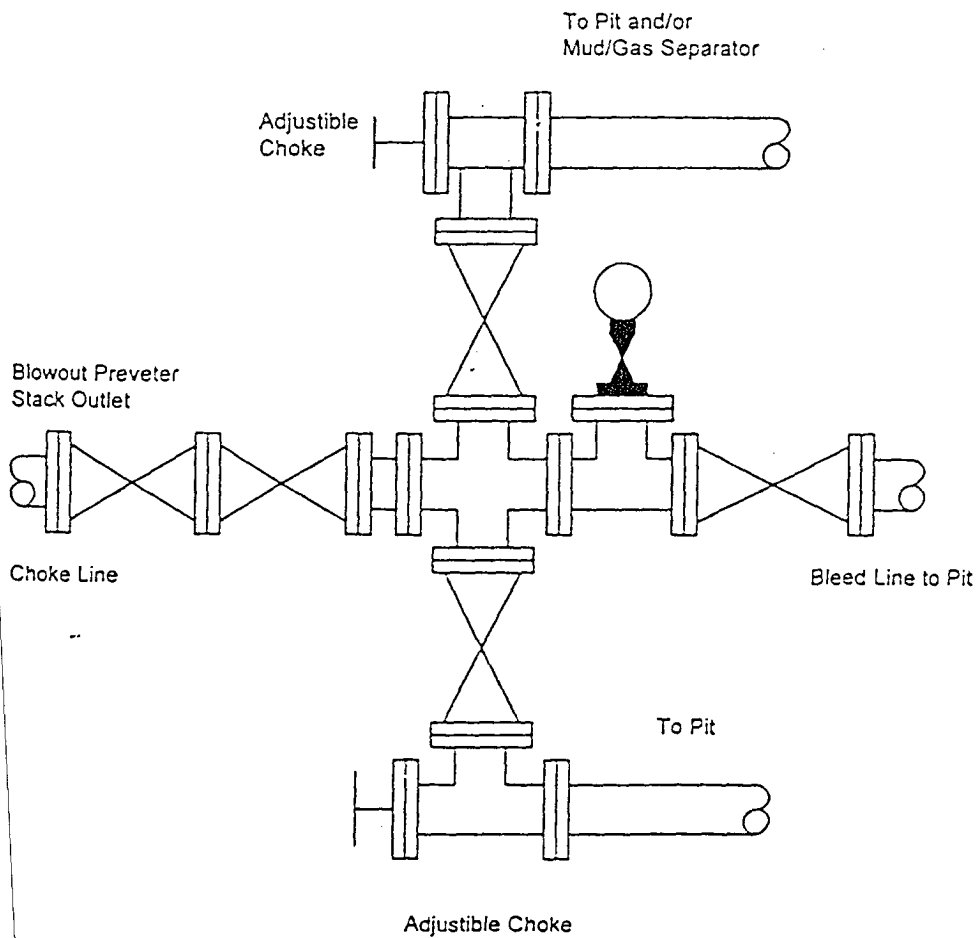
110 W. LOUISIANA, STE. 110
MIDLAND TEXAS, 79701
(432) 687-0865 - (432) 687-0868 FAX

BLOWOUT PREVENTER SYSTEM



Type 900 Series
3000 psi WP

Choke Manifold Assembly for 3M WP System



CapStar Drilling, Inc.



RESERVE SHOULD BE PUSHED OUT

5' DEEP

5' DEEP

MUD
PUMP

MUD PUMP	
-------------	--

RIG

BCOM

HM

WATER T.

AE

NOGHOUS

PIPE RACKS

► CELLAR
4X6X4 BOX
(Cellar should not be dug with dozer)

Cellar can be 4X4X4 if using a screw-on wellhead
Working Pits dug 5' below ground level

- Wind Direction Indicators (wind sock or streamers)
- H2S Monitors (alarms at bell nipple and shale shaker)
- Briefing Areas
- Remote BOP Closing Unit
- Sign and Condition Flags

Location Specs