

Form 3160-3
(August 2007)

HOBBS OCD

OCD-HOBBS

JUN 04 2012

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

APPLICATION FOR PERMIT TO DRILL OR REENTER

FORM APPROVED
OMB No 1004-0137
Expires July 31, 2010

5 Lease Serial No.
NM-105562 & NM-27507 **84**

6 If Indian, Allottee or Tribe Name

1a. Type of work: ☒ DRILL ☐ REENTER

1b. Type of Well: ☒ Oil Well ☐ Gas Well ☐ Other ☐ Single Zone ☐ Multiple Zone

2. Name of Operator Mewbourne Oil Company

3a Address PO Box 5270
Hobbs, NM 88240

3b Phone No. (include area code)
(57) 393-5905

8. Lease Name and Well No. **39261**
Red Hills West "22" AP Fed Com #1H

9 API Well No.
30-025-40608

10 Field and Pool, or Exploratory
Wildcat Bone Spring, ~~96403~~ **97835**

4. Location of Well (Report location clearly and in accordance with any State requirements.)*

At surface 150' FNL & 990' FEL (Unit A)

At proposed prod. zone 330' FSL & 990' FEL (Unit P)

**NORTHDOX
LOCATION**

11. Sec., T. R. M. or Blk. and Survey or Area
Sec 22, T26S, R32E

14. Distance in miles and direction from nearest town or post office*
27.75 miles West of Jal, NM

12 County or Parish
Lea

13. State
NM

15 Distance from proposed*
location to nearest
property or lease line, ft
(Also to nearest drig. unit line, if any)

150'

16. No. of acres in lease
320 & 640

17. Spacing Unit dedicated to this well
160

18 Distance from proposed location*
to nearest well, drilling, completed,
applied for, on this lease, ft

2035' East Red Hills
West 22CN FedCom#1H

19 Proposed Depth
14057' MD
9476' TVD

20. BLM/BIA Bond No. on file
NM1693, Nationwide

21. Elevations (Show whether DF, KDB, RT, GL, etc.)
3156' GL

22. Approximate date work will start*
09/01/2012

23 Estimated duration
40 days

24. Attachments

The following, completed in accordance with the requirements of Onshore Oil and Gas Order No.1, must be attached to this form:

1. Well plat certified by a registered surveyor.

2. A Drilling Plan.

3. A Surface Use Plan (if the location is on National Forest System Lands, the
SUPO must be filed with the appropriate Forest Service Office)

4. Bond to cover the operations unless covered by an existing bond on file (see
Item 20 above).

5. Operator certification

6. Such other site specific information and/or plans as may be required by the
BLM.

25 Signature

Brett Bednarz

Name (Printed/Typed)
Brett Bednarz

Date
02/22/2012

Title

Petroleum Engineer

Approved by (Signature)

/s/ Don Peterson

Name (Printed/Typed)

Date **MAY 31 2012**

Title

FIELD MANAGER

Office

CARLSBAD FIELD OFFICE

Application approval does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to
conduct operations thereon.

Conditions of approval, if any, are attached.

APPROVAL FOR TWO YEARS

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United
States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

(Continued on page 2)

*(Instructions on page 2)

Carlsbad Controlled Water Basin

Approval Subject to General Requirements
& Special Stipulations Attached

SEE ATTACHED FOR
CONDITIONS OF APPROVAL

JUN 07 2012

Drilling Program
Mewbourne Oil Company
 Red Hills West "22" AP Fed Com #1H
 150' FNL & 990' FEL (SHL)
 Sec 22-T26S-R32E
 Lea County, New Mexico

1. The estimated tops of geological markers are as follows:

Rustler	530'
Top Salt	900'
Base Salt	4180'
Lamar	4400'
*Delaware	4430'
*Bone Springs	8475'

2. Estimated depths of anticipated fresh water, oil, or gas:

Water	Fresh water is anticipated at 230' and will be protected by setting surface casing at 555' and cementing to surface.
Hydrocarbons	Oil and gas are anticipated in the above (*) formations. These zones will be protected by casing as necessary.

3. Pressure control equipment:

2000# WP Annular will be installed after running 13 3/8" casing. A 3000# WP Double Ram BOP and 3000# WP Annular will be installed after running 9 5/8" & 7" casing strings. Pressure tests will be conducted prior to drilling out under all casing strings. BOP controls will be installed prior to drilling under surface casing and will remain in use until completion of drilling operations. BOPE will be inspected and operated as recommended in Onshore Order #2. A kelly cock and a sub equipped with a full opening valve sized to fit the drill pipe and collars will be available on the rig floor in the open position when the kelly is not in use. Will test the 7" & 9 5/8" BOPE to 3000# and both Annular BOPs to 1500# with a third party testing company before drilling below each shoe, but will test again, if needed, in 30 days from the 1st test as per BLM Onshore Oil and Gas Order #2.

4. MOC proposes to drill a vertical wellbore to 8858' & kick off to horizontal @ 9431' TVD. The well will be drilled to 14057' MD (9476' TVD). See attached directional plan.

*Operator
5/23/12
CRW-*

5. Proposed casing and cementing program:

A. Casing Program:

See TOA

Hole Size	Casing	Wt/Ft.	Grade	Depth	Jt Type
17 1/2"	13 3/8" (new)	48#	H40	0'-555'	ST&C
		36#	J-55	0'-3240	STC
12 1/4"	9 5/8" (new)	40#	J-55	3240'-4240'	LTC
		40#	N-80	4240'-4400'	LTC
8 3/4"	7" (new)	26#	P110	0'-8858' MD	LT&C
8 3/4"	7" (new)	26#	P110	8858'-9752' MD	BT&C
6 1/8"	4 1/2" (new)	11.6#	P110	9552'-14057' MD	LT&C

Minimum casing design factors: Collapse 1.125, Burst 1.0, Tensile strength 1.8.

*Subject to availability of casing.

B. Cementing Program:

- See COA*
- i. Surface Casing: 235 sks Class "C" lite (35:65:4) cement w/ salt and LCM additives. Yield at 2.15 cuft/sk. 200 sks Class "C" cement w/ 2% CaCl₂. Yield at 1.34 cuft/sk. Cmt circulated to surface w/100% excess.
 - ii. Intermediate Casing: 580 sks Class "C" lite (35:65:4) cement w/ LCM & Cello Flake additives. Yield at 2.03 cuft/sk. 400 sacks Class "C" cement. Yield at 1.34 cuft/sk. Cmt circulated to surface w/25% excess.
 - iii. Production Casing: 325 sks Class "H" lite (35:65:4) cement w/ FL & MPA5 additives. Yield at 2.11 cuft/sk. 400 sks Class "H" cement w/ Salt & FL additives. Yield at 1.19 cuft/sk. Cmt calc to tieback 200' inside Intermediate csg w/25% excess.
 - iv. Production Liner: This will be a Packer/Port completion from TD up inside 7" casing with packer type liner hanger.

*Referring to above blends of lite cement: (wt% fly ash : wt% cement : wt% bentonite of the total of first two numbers). Generic names of additives are used since the availability of specific company and products are unknown at this time.

6. Mud Program:

<u>Interval</u>	<u>Type System</u>	<u>Weight</u>	<u>Viscosity</u>	<u>Fluid Loss</u>
0' - 555' <i>660</i>	FW spud mud	8.6-9.0	32-34	NA
555' - 4400'	Brine Water	10.0-10.2	28-30	NA
4400' - 8858' (KOP)	Cut Brine	8.3-8.6	28-30	NA
8858' - TD	Cut Brine w/Polymer	8.5-8.7	32-35	15

7. Evaluation Program: *See COA*

Samples: 10' samples from surface casing to TD
Logging: GR/N & Gyro from KOP -100' (8758') to surface. GR from 8758' to TD.

8. Downhole Conditions

Zones of abnormal pressure: None anticipated
Zones of lost circulation: Anticipated in surface and intermediate holes
Maximum bottom hole temperature: 120 degree F
Maximum bottom hole pressure: 8.3 lbs/gal gradient or less

9. Anticipated Starting Date:

Mewbourne Oil Company intends to drill this well as soon as possible after receiving approval with approximately 40 days involved in drilling operations and an additional 10 days involved in completion operations on the project.

Mewbourne Oil Co

Eddy County, New Mexico

Sec 22-26S-32E

Red Hills West 22 AP Fed Com #1H

Wellbore #1

Plan: Design #1

DDC Well Planning Report

14 February, 2012



DDC
Well Planning Report



Database:	EDM 5000.1 Single User Db	Local Co-ordinate Reference:	Well Red Hills West 22 AP Fed Com #1H
Company:	Mewbourne Oil Co	TVD Reference:	WELL @ 3176.0usft (Patterson #75)
Project:	Eddy County, New Mexico	MD Reference:	WELL @ 3176.0usft (Patterson #75)
Site:	Sec 22-26S-32E	North Reference:	Grid
Well:	Red Hills West 22 AP Fed Com #1H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Design #1		

Project:	Eddy County, New Mexico		
Map System:	US State Plane 1927 (Exact solution)	System Datum:	Mean Sea Level
Geo Datum:	NAD 1927 (NADCON CONUS)		
Map Zone:	New Mexico East 3001		

Site:	Sec 22-26S-32E		
Site Position:		Northing:	377,122.80 usft
From:	Map	Easting:	707,577.80 usft
Position Uncertainty:	0.0 usft	Slot Radius:	13-3/16 "
		Latitude:	32° 2' 6.200 N
		Longitude:	103° 39' 48.484 W
		Grid Convergence:	0.36 °

Well:	Red Hills West 22 AP Fed Com #1H		
Well Position	+N/-S	16.3 usft	Northing:
	+E/-W	2,028.4 usft	Easting:
Position Uncertainty	0.0 usft	Wellhead Elevation:	Ground Level:
			3,156.0 usft

Wellbore:	Wellbore #1		
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Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2010	2/14/2012	7.53	59.98	48,428

Design:	Design #1		
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Audit Notes:				
Version:		Phase:	PLAN	Tie On Depth:
				0.0

Vertical Section	Depth From (TVD) (usft)	+N/-S (usft)	+E/-W (usft)	Direction (°)
	0.0	0.0	0.0	179.61

Plan Sections										
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	TFO (°)	Target
0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.00	0.00	
8,858.1	0.00	0.00	8,858.1	0.0	0.0	0.00	0.00	0.00	0.00	
9,752.1	89.40	179.61	9,431.0	-567.0	3.8	10.00	10.00	20.09	179.61	
14,057.4	89.40	179.61	9,476.0	-4,871.9	32.8	0.00	0.00	0.00	0.00	PBHL Red Hills We

DDC

Well Planning Report



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Site:	Sec 22-26S-32E	North Reference:	Grid
Well:	Red Hills West 22 AP Fed Com #1H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Design #1		

Planned Survey									
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
0.0	0.00	0.00	0.0	0.0	0.0	0.0	0.00	0.00	0.00
100.0	0.00	0.00	100.0	0.0	0.0	0.0	0.00	0.00	0.00
200.0	0.00	0.00	200.0	0.0	0.0	0.0	0.00	0.00	0.00
300.0	0.00	0.00	300.0	0.0	0.0	0.0	0.00	0.00	0.00
400.0	0.00	0.00	400.0	0.0	0.0	0.0	0.00	0.00	0.00
500.0	0.00	0.00	500.0	0.0	0.0	0.0	0.00	0.00	0.00
600.0	0.00	0.00	600.0	0.0	0.0	0.0	0.00	0.00	0.00
700.0	0.00	0.00	700.0	0.0	0.0	0.0	0.00	0.00	0.00
800.0	0.00	0.00	800.0	0.0	0.0	0.0	0.00	0.00	0.00
900.0	0.00	0.00	900.0	0.0	0.0	0.0	0.00	0.00	0.00
1,000.0	0.00	0.00	1,000.0	0.0	0.0	0.0	0.00	0.00	0.00
1,100.0	0.00	0.00	1,100.0	0.0	0.0	0.0	0.00	0.00	0.00
1,200.0	0.00	0.00	1,200.0	0.0	0.0	0.0	0.00	0.00	0.00
1,300.0	0.00	0.00	1,300.0	0.0	0.0	0.0	0.00	0.00	0.00
1,400.0	0.00	0.00	1,400.0	0.0	0.0	0.0	0.00	0.00	0.00
1,500.0	0.00	0.00	1,500.0	0.0	0.0	0.0	0.00	0.00	0.00
1,600.0	0.00	0.00	1,600.0	0.0	0.0	0.0	0.00	0.00	0.00
1,700.0	0.00	0.00	1,700.0	0.0	0.0	0.0	0.00	0.00	0.00
1,800.0	0.00	0.00	1,800.0	0.0	0.0	0.0	0.00	0.00	0.00
1,900.0	0.00	0.00	1,900.0	0.0	0.0	0.0	0.00	0.00	0.00
2,000.0	0.00	0.00	2,000.0	0.0	0.0	0.0	0.00	0.00	0.00
2,100.0	0.00	0.00	2,100.0	0.0	0.0	0.0	0.00	0.00	0.00
2,200.0	0.00	0.00	2,200.0	0.0	0.0	0.0	0.00	0.00	0.00
2,300.0	0.00	0.00	2,300.0	0.0	0.0	0.0	0.00	0.00	0.00
2,400.0	0.00	0.00	2,400.0	0.0	0.0	0.0	0.00	0.00	0.00
2,500.0	0.00	0.00	2,500.0	0.0	0.0	0.0	0.00	0.00	0.00
2,600.0	0.00	0.00	2,600.0	0.0	0.0	0.0	0.00	0.00	0.00
2,700.0	0.00	0.00	2,700.0	0.0	0.0	0.0	0.00	0.00	0.00
2,800.0	0.00	0.00	2,800.0	0.0	0.0	0.0	0.00	0.00	0.00
2,900.0	0.00	0.00	2,900.0	0.0	0.0	0.0	0.00	0.00	0.00
3,000.0	0.00	0.00	3,000.0	0.0	0.0	0.0	0.00	0.00	0.00
3,100.0	0.00	0.00	3,100.0	0.0	0.0	0.0	0.00	0.00	0.00
3,200.0	0.00	0.00	3,200.0	0.0	0.0	0.0	0.00	0.00	0.00
3,300.0	0.00	0.00	3,300.0	0.0	0.0	0.0	0.00	0.00	0.00
3,400.0	0.00	0.00	3,400.0	0.0	0.0	0.0	0.00	0.00	0.00
3,500.0	0.00	0.00	3,500.0	0.0	0.0	0.0	0.00	0.00	0.00
3,600.0	0.00	0.00	3,600.0	0.0	0.0	0.0	0.00	0.00	0.00
3,700.0	0.00	0.00	3,700.0	0.0	0.0	0.0	0.00	0.00	0.00
3,800.0	0.00	0.00	3,800.0	0.0	0.0	0.0	0.00	0.00	0.00
3,900.0	0.00	0.00	3,900.0	0.0	0.0	0.0	0.00	0.00	0.00
4,000.0	0.00	0.00	4,000.0	0.0	0.0	0.0	0.00	0.00	0.00
4,100.0	0.00	0.00	4,100.0	0.0	0.0	0.0	0.00	0.00	0.00
4,200.0	0.00	0.00	4,200.0	0.0	0.0	0.0	0.00	0.00	0.00
4,300.0	0.00	0.00	4,300.0	0.0	0.0	0.0	0.00	0.00	0.00
4,400.0	0.00	0.00	4,400.0	0.0	0.0	0.0	0.00	0.00	0.00
4,500.0	0.00	0.00	4,500.0	0.0	0.0	0.0	0.00	0.00	0.00
4,600.0	0.00	0.00	4,600.0	0.0	0.0	0.0	0.00	0.00	0.00
4,700.0	0.00	0.00	4,700.0	0.0	0.0	0.0	0.00	0.00	0.00
4,800.0	0.00	0.00	4,800.0	0.0	0.0	0.0	0.00	0.00	0.00
4,900.0	0.00	0.00	4,900.0	0.0	0.0	0.0	0.00	0.00	0.00
5,000.0	0.00	0.00	5,000.0	0.0	0.0	0.0	0.00	0.00	0.00
5,100.0	0.00	0.00	5,100.0	0.0	0.0	0.0	0.00	0.00	0.00
5,200.0	0.00	0.00	5,200.0	0.0	0.0	0.0	0.00	0.00	0.00
5,300.0	0.00	0.00	5,300.0	0.0	0.0	0.0	0.00	0.00	0.00

DDC Well Planning Report



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Wellbore:	Wellbore #1		
Design:	Design #1		

Planned Survey										
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	
5,400.0	0.00	0.00	5,400.0	0.0	0.0	0.0	0.00	0.00	0.00	
5,500.0	0.00	0.00	5,500.0	0.0	0.0	0.0	0.00	0.00	0.00	
5,600.0	0.00	0.00	5,600.0	0.0	0.0	0.0	0.00	0.00	0.00	
5,700.0	0.00	0.00	5,700.0	0.0	0.0	0.0	0.00	0.00	0.00	
5,800.0	0.00	0.00	5,800.0	0.0	0.0	0.0	0.00	0.00	0.00	
5,900.0	0.00	0.00	5,900.0	0.0	0.0	0.0	0.00	0.00	0.00	
6,000.0	0.00	0.00	6,000.0	0.0	0.0	0.0	0.00	0.00	0.00	
6,100.0	0.00	0.00	6,100.0	0.0	0.0	0.0	0.00	0.00	0.00	
6,200.0	0.00	0.00	6,200.0	0.0	0.0	0.0	0.00	0.00	0.00	
6,300.0	0.00	0.00	6,300.0	0.0	0.0	0.0	0.00	0.00	0.00	
6,400.0	0.00	0.00	6,400.0	0.0	0.0	0.0	0.00	0.00	0.00	
6,500.0	0.00	0.00	6,500.0	0.0	0.0	0.0	0.00	0.00	0.00	
6,600.0	0.00	0.00	6,600.0	0.0	0.0	0.0	0.00	0.00	0.00	
6,700.0	0.00	0.00	6,700.0	0.0	0.0	0.0	0.00	0.00	0.00	
6,800.0	0.00	0.00	6,800.0	0.0	0.0	0.0	0.00	0.00	0.00	
6,900.0	0.00	0.00	6,900.0	0.0	0.0	0.0	0.00	0.00	0.00	
7,000.0	0.00	0.00	7,000.0	0.0	0.0	0.0	0.00	0.00	0.00	
7,100.0	0.00	0.00	7,100.0	0.0	0.0	0.0	0.00	0.00	0.00	
7,200.0	0.00	0.00	7,200.0	0.0	0.0	0.0	0.00	0.00	0.00	
7,300.0	0.00	0.00	7,300.0	0.0	0.0	0.0	0.00	0.00	0.00	
7,400.0	0.00	0.00	7,400.0	0.0	0.0	0.0	0.00	0.00	0.00	
7,500.0	0.00	0.00	7,500.0	0.0	0.0	0.0	0.00	0.00	0.00	
7,600.0	0.00	0.00	7,600.0	0.0	0.0	0.0	0.00	0.00	0.00	
7,700.0	0.00	0.00	7,700.0	0.0	0.0	0.0	0.00	0.00	0.00	
7,800.0	0.00	0.00	7,800.0	0.0	0.0	0.0	0.00	0.00	0.00	
7,900.0	0.00	0.00	7,900.0	0.0	0.0	0.0	0.00	0.00	0.00	
8,000.0	0.00	0.00	8,000.0	0.0	0.0	0.0	0.00	0.00	0.00	
8,100.0	0.00	0.00	8,100.0	0.0	0.0	0.0	0.00	0.00	0.00	
8,200.0	0.00	0.00	8,200.0	0.0	0.0	0.0	0.00	0.00	0.00	
8,300.0	0.00	0.00	8,300.0	0.0	0.0	0.0	0.00	0.00	0.00	
8,400.0	0.00	0.00	8,400.0	0.0	0.0	0.0	0.00	0.00	0.00	
8,500.0	0.00	0.00	8,500.0	0.0	0.0	0.0	0.00	0.00	0.00	
8,600.0	0.00	0.00	8,600.0	0.0	0.0	0.0	0.00	0.00	0.00	
8,700.0	0.00	0.00	8,700.0	0.0	0.0	0.0	0.00	0.00	0.00	
8,800.0	0.00	0.00	8,800.0	0.0	0.0	0.0	0.00	0.00	0.00	
Build 10°/100' @ 8858' MD										
8,858.1	0.00	0.00	8,858.1	0.0	0.0	0.0	0.00	0.00	0.00	
8,900.0	4.19	179.61	8,900.0	-1.5	0.0	1.5	10.00	10.00	0.00	
9,000.0	14.19	179.61	8,998.6	-17.5	0.1	17.5	10.00	10.00	0.00	
9,100.0	24.19	179.61	9,092.9	-50.3	0.3	50.3	10.00	10.00	0.00	
9,200.0	34.19	179.61	9,180.1	-99.0	0.7	99.0	10.00	10.00	0.00	
9,300.0	44.19	179.61	9,257.5	-162.1	1.1	162.1	10.00	10.00	0.00	
9,400.0	54.19	179.61	9,322.7	-237.7	1.6	237.7	10.00	10.00	0.00	
9,500.0	64.19	179.61	9,373.9	-323.5	2.2	323.5	10.00	10.00	0.00	
9,600.0	74.19	179.61	9,409.4	-416.8	2.8	416.9	10.00	10.00	0.00	
9,700.0	84.19	179.61	9,428.1	-514.9	3.5	515.0	10.00	10.00	0.00	
EOB @ 9752' MD / 89.40° Inc / 179.61° Azm / 9431' TVD										
9,752.1	89.40	179.61	9,431.0	-567.0	3.8	567.0	10.00	10.00	0.00	
9,800.0	89.40	179.61	9,431.5	-614.8	4.1	614.9	0.00	0.00	0.00	
9,900.0	89.40	179.61	9,432.6	-714.8	4.8	714.8	0.00	0.00	0.00	
10,000.0	89.40	179.61	9,433.6	-814.8	5.5	814.8	0.00	0.00	0.00	
10,100.0	89.40	179.61	9,434.7	-914.8	6.2	914.8	0.00	0.00	0.00	
10,200.0	89.40	179.61	9,435.7	-1,014.8	6.8	1,014.8	0.00	0.00	0.00	

DDC Well Planning Report



Database:	EDM 5000.1 Single User Db	Local Co-ordinate Reference:	Well Red Hills West 22 AP Fed Com #1H
Company:	Mewbourne Oil Co	TVD Reference:	WELL @ 3176.0usft (Patterson #75)
Project:	Eddy County, New Mexico	MD Reference:	WELL @ 3176.0usft (Patterson #75)
Site:	Sec 22-26S-32E	North Reference:	Grid
Well:	Red Hills West 22 AP Fed Com #1H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Design #1		

Planned Survey										
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N-S (usft)	+E-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	
10,300.0	89.40	179.61	9,436.7	-1,114.8	7.5	1,114.8	0.00	0.00	0.00	
10,400.0	89.40	179.61	9,437.8	-1,214.8	8.2	1,214.8	0.00	0.00	0.00	
10,500.0	89.40	179.61	9,438.8	-1,314.8	8.9	1,314.8	0.00	0.00	0.00	
10,600.0	89.40	179.61	9,439.9	-1,414.8	9.5	1,414.8	0.00	0.00	0.00	
10,700.0	89.40	179.61	9,440.9	-1,514.8	10.2	1,514.8	0.00	0.00	0.00	
10,800.0	89.40	179.61	9,442.0	-1,614.8	10.9	1,614.8	0.00	0.00	0.00	
10,900.0	89.40	179.61	9,443.0	-1,714.8	11.5	1,714.8	0.00	0.00	0.00	
11,000.0	89.40	179.61	9,444.1	-1,814.7	12.2	1,814.8	0.00	0.00	0.00	
11,100.0	89.40	179.61	9,445.1	-1,914.7	12.9	1,914.8	0.00	0.00	0.00	
11,200.0	89.40	179.61	9,446.2	-2,014.7	13.6	2,014.8	0.00	0.00	0.00	
11,300.0	89.40	179.61	9,447.2	-2,114.7	14.2	2,114.8	0.00	0.00	0.00	
11,400.0	89.40	179.61	9,448.2	-2,214.7	14.9	2,214.8	0.00	0.00	0.00	
11,500.0	89.40	179.61	9,449.3	-2,314.7	15.6	2,314.8	0.00	0.00	0.00	
11,600.0	89.40	179.61	9,450.3	-2,414.7	16.3	2,414.8	0.00	0.00	0.00	
11,700.0	89.40	179.61	9,451.4	-2,514.7	16.9	2,514.8	0.00	0.00	0.00	
11,800.0	89.40	179.61	9,452.4	-2,614.7	17.6	2,614.7	0.00	0.00	0.00	
11,900.0	89.40	179.61	9,453.5	-2,714.7	18.3	2,714.7	0.00	0.00	0.00	
12,000.0	89.40	179.61	9,454.5	-2,814.7	18.9	2,814.7	0.00	0.00	0.00	
12,100.0	89.40	179.61	9,455.6	-2,914.7	19.6	2,914.7	0.00	0.00	0.00	
12,200.0	89.40	179.61	9,456.6	-3,014.7	20.3	3,014.7	0.00	0.00	0.00	
12,300.0	89.40	179.61	9,457.6	-3,114.6	21.0	3,114.7	0.00	0.00	0.00	
12,400.0	89.40	179.61	9,458.7	-3,214.6	21.6	3,214.7	0.00	0.00	0.00	
12,500.0	89.40	179.61	9,459.7	-3,314.6	22.3	3,314.7	0.00	0.00	0.00	
12,600.0	89.40	179.61	9,460.8	-3,414.6	23.0	3,414.7	0.00	0.00	0.00	
12,700.0	89.40	179.61	9,461.8	-3,514.6	23.7	3,514.7	0.00	0.00	0.00	
12,800.0	89.40	179.61	9,462.9	-3,614.6	24.3	3,614.7	0.00	0.00	0.00	
12,900.0	89.40	179.61	9,463.9	-3,714.6	25.0	3,714.7	0.00	0.00	0.00	
13,000.0	89.40	179.61	9,465.0	-3,814.6	25.7	3,814.7	0.00	0.00	0.00	
13,100.0	89.40	179.61	9,466.0	-3,914.6	26.4	3,914.7	0.00	0.00	0.00	
13,200.0	89.40	179.61	9,467.0	-4,014.6	27.0	4,014.7	0.00	0.00	0.00	
13,300.0	89.40	179.61	9,468.1	-4,114.6	27.7	4,114.7	0.00	0.00	0.00	
13,400.0	89.40	179.61	9,469.1	-4,214.6	28.4	4,214.7	0.00	0.00	0.00	
13,500.0	89.40	179.61	9,470.2	-4,314.6	29.0	4,314.7	0.00	0.00	0.00	
13,600.0	89.40	179.61	9,471.2	-4,414.5	29.7	4,414.6	0.00	0.00	0.00	
13,700.0	89.40	179.61	9,472.3	-4,514.5	30.4	4,514.6	0.00	0.00	0.00	
13,800.0	89.40	179.61	9,473.3	-4,614.5	31.1	4,614.6	0.00	0.00	0.00	
13,900.0	89.40	179.61	9,474.4	-4,714.5	31.7	4,714.6	0.00	0.00	0.00	
14,000.0	89.40	179.61	9,475.4	-4,814.5	32.4	4,814.6	0.00	0.00	0.00	
TD @ 14057' MD / 9476' TVD										
14,057.4	89.40	179.61	9,476.0	-4,871.9	32.8	4,872.0	0.00	0.00	0.00	

Design Targets										
Target Name	Dip Angle	Dip Dir	TVD	+N-S	+E-W	Northing	Easting	Latitude	Longitude	
hit/miss target	(°)	(°)	(usft)	(usft)	(usft)	(usft)	(usft)			
Shape										
PBHL Red Hills West	0.00	0.00	9,476.0	-4,871.9	32.8	372,267.20	709,639.00	32° 1' 18.022 N	103° 39' 24.893 W	
- plan hits target center										
- Point										

DDC
Well Planning Report



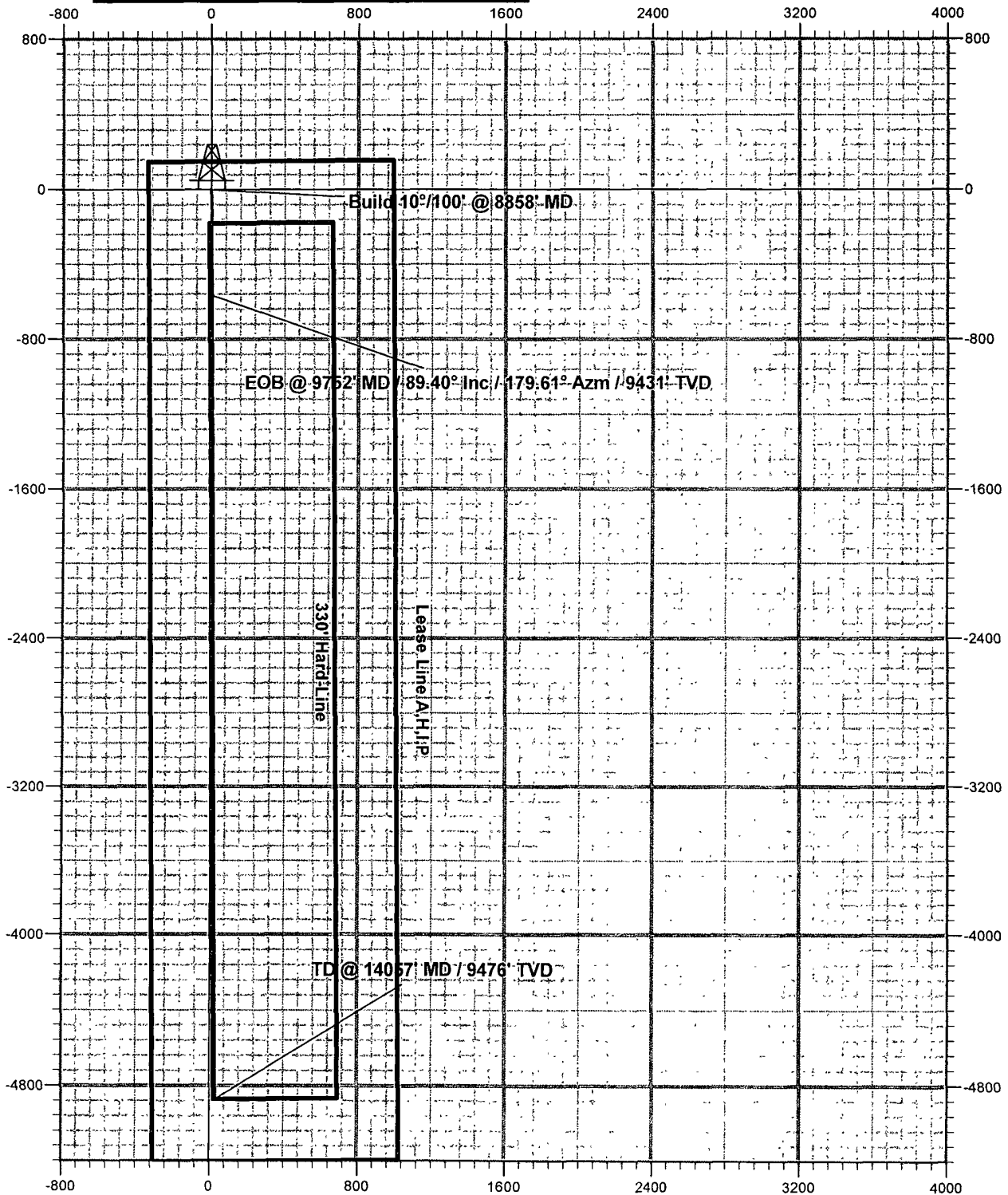
Database:	EDM 5000.1 Single User Db	Local Co-ordinate Reference:	Well Red Hills West 22 AP Fed Com #1H
Company:	Mewbourne Oil Co	TVD Reference:	WELL @ 3176.0usft (Patterson #75)
Project:	Eddy County, New Mexico	MD Reference:	WELL @ 3176.0usft (Patterson #75)
Site:	Sec 22-26S-32E	North Reference:	Grid
Well:	Red Hills West 22 AP Fed Com #1H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Design #1		

Plan Annotations				
Measured Depth (usft)	Vertical Depth (usft)	Local Coordinates		Comment
		+N/-S (usft)	+E/-W (usft)	
8,858.1	8,858.1	0.0	0.0	Build 10°/100' @ 8858' MD
9,752.1	9,431.0	-567.0	3.8	EOB @ 9752' MD / 89.40° Inc / 179.61° Azm / 9431' TVD
14,057.4	9,476.0	-4,871.9	32.8	TD @ 14057' MD / 9476' TVD

Mewbourne Oil Company

LBA

Eddy County, New Mexico
Red Hills West 22 AP Fed Com #1H
Quote 120116



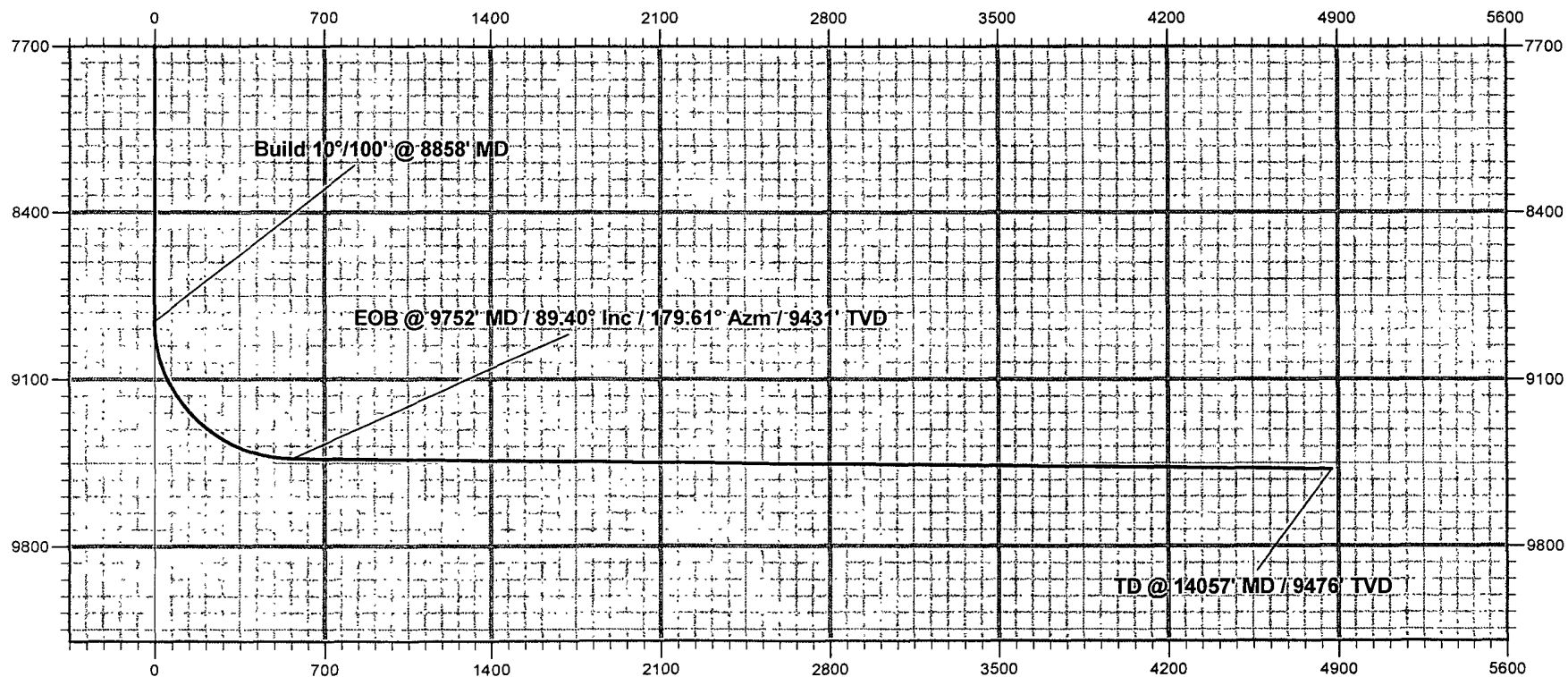
Mewbourne Oil Company



LEA

~~Eddy County, New Mexico~~
~~Red Hills West 22 AP Fed Com #1H~~

Quote 120116



Vertical Section at 179.61° (700 usft/in)

Mewbourne Oil Company
 BOP Schematic for
 12 1/4" Hole

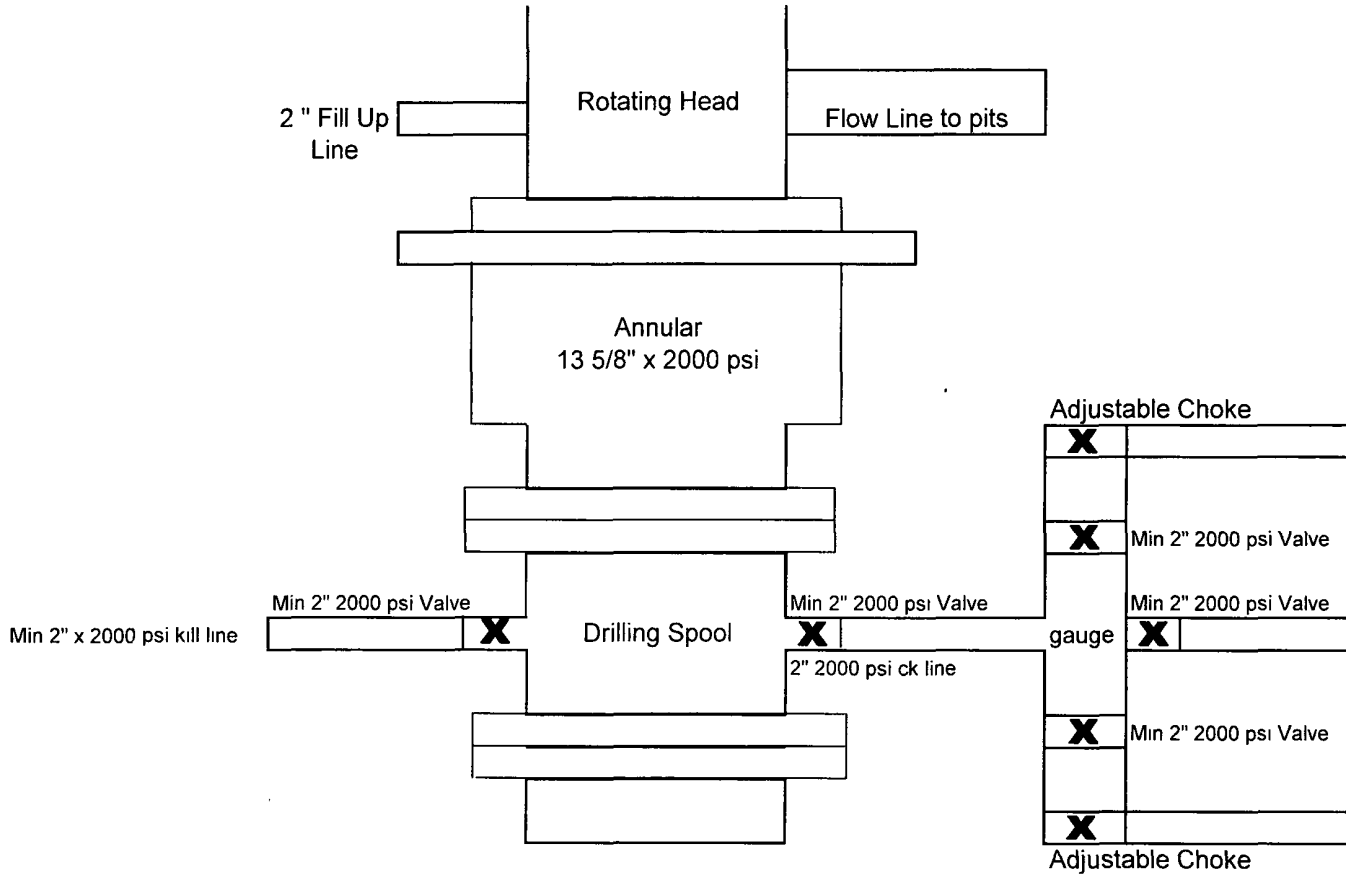


Exhibit #2

Red Hills West "22" AP Fed Com #1H
 150' FNL & 990' FEL
 Sec 22-T26S-R32E
 Lea, County
 New Mexico

Mewbourne Oil Company

BOP Schematic for
8 3/4" & 6 1/8" Hole

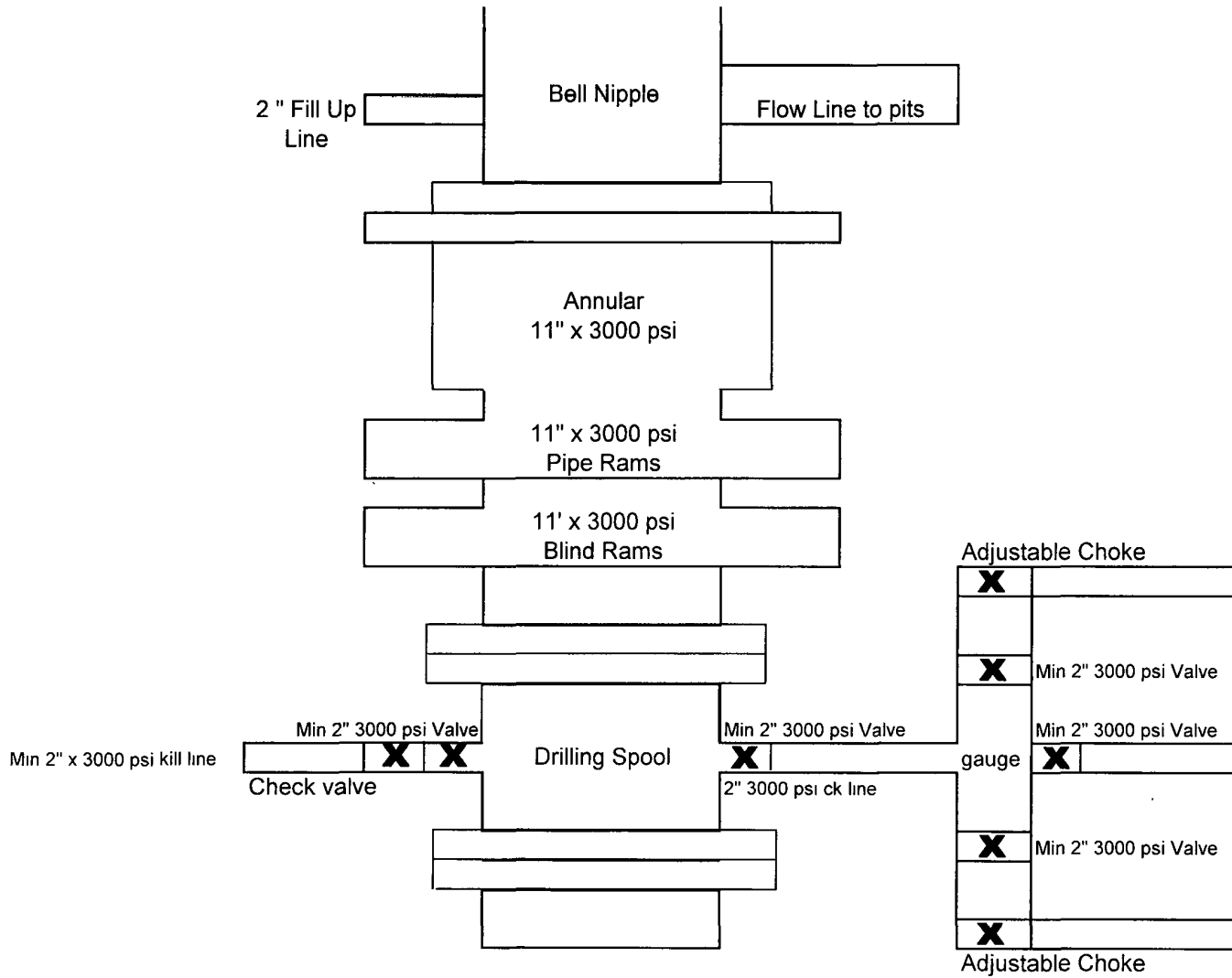


Exhibit #2

Red Hills West "22" AP Fed Com #1H
150' FNL & 990' FEL
Sec 22-T26S-R32E
Lea, County
New Mexico

Notes Regarding Blowout Preventer

Mewbourne Oil Company

Red Hills West "22" AP Fed Com #1H

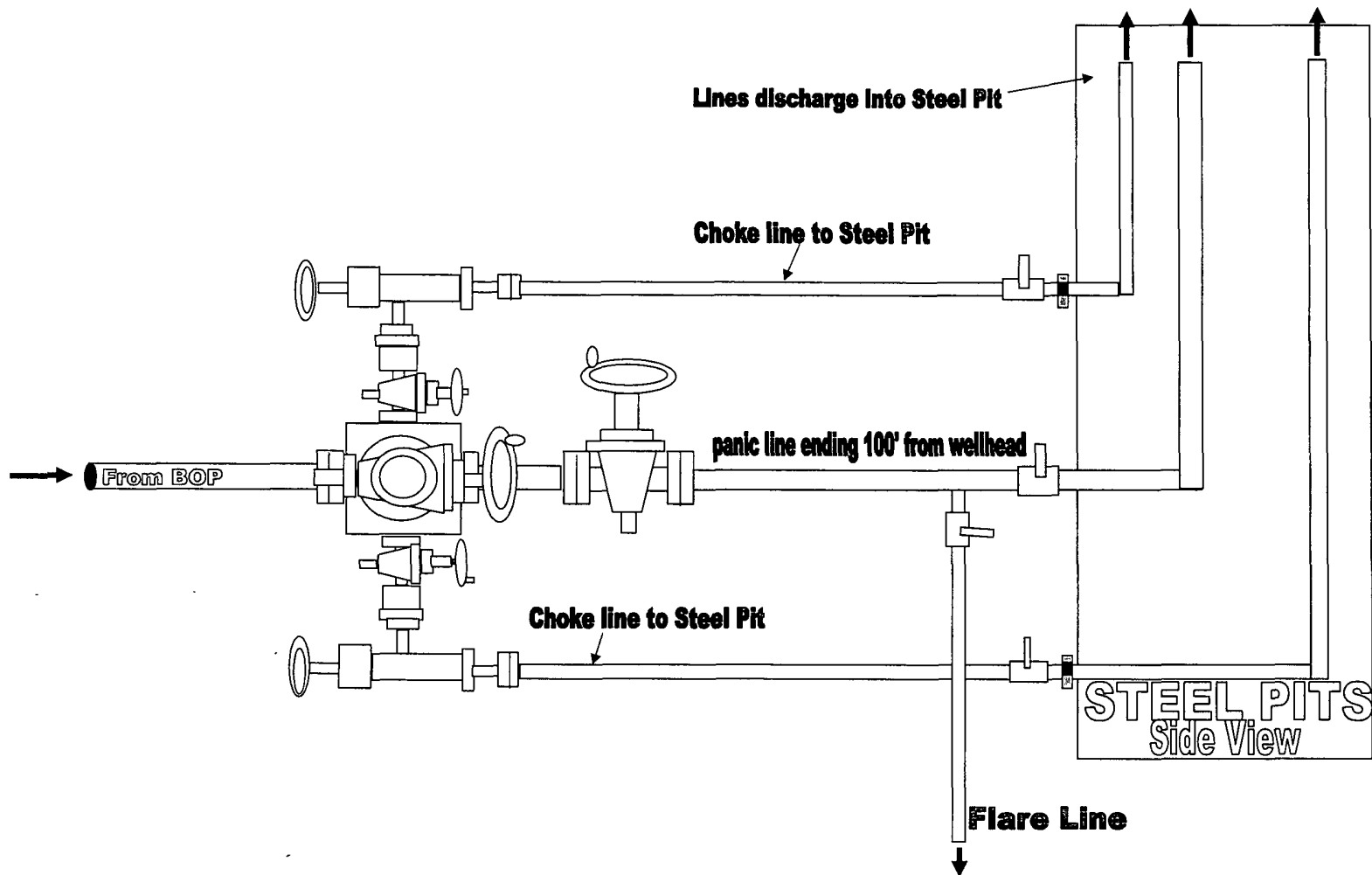
150' FNL & 990' FEL (SHL)

Sec 22-T26S-R32E

Lea County, New Mexico

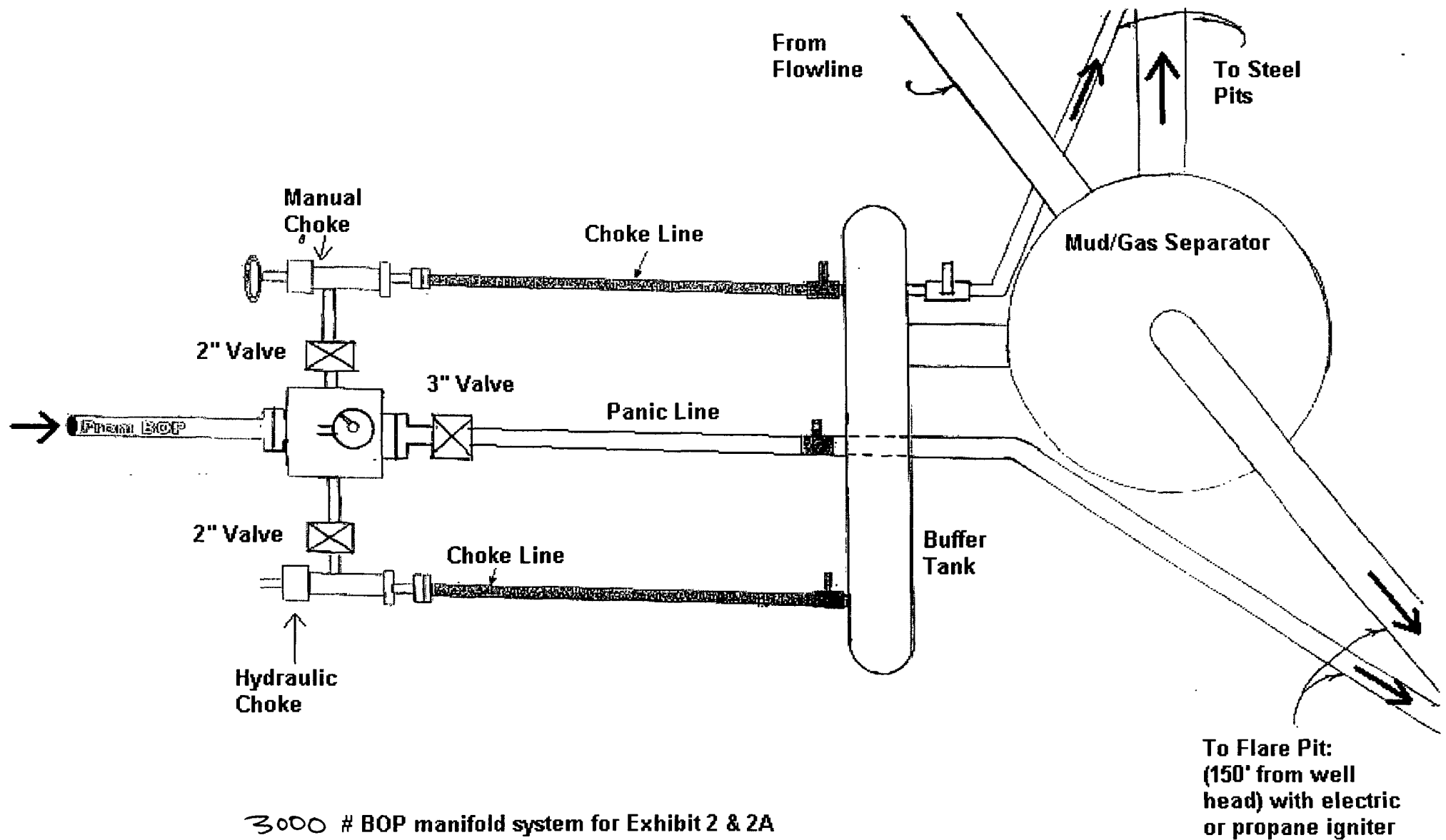
- I. Drilling nipple (bell nipple) to be constructed so that it can be removed without the use of a welder through the opening of the rotary table, with minimum internal diameter equal to blowout preventer bore.
- II. Blowout preventer and all fittings must be in good condition with a minimum 2000 psi working pressure on 13 3/8" casing and 3000 psi working pressure on 9 5/8" & 7" casing.
- III. Safety valve must be available on the rig floor at all times with proper connections to install in the drill string. Valve must be full bore with minimum 3000 psi working pressure.
- IV. Equipment through which bit must pass shall be at least as large as internal diameter of the casing.
- V. A kelly cock shall be installed on the kelly at all times.

Blowout preventer closing equipment to include and accumulator of at least 40 gallon capacity, two independent sources of pressure on closing unit, and meet all other API specifications.



3000# BOP manifold system for Exhibit 2 & 2A

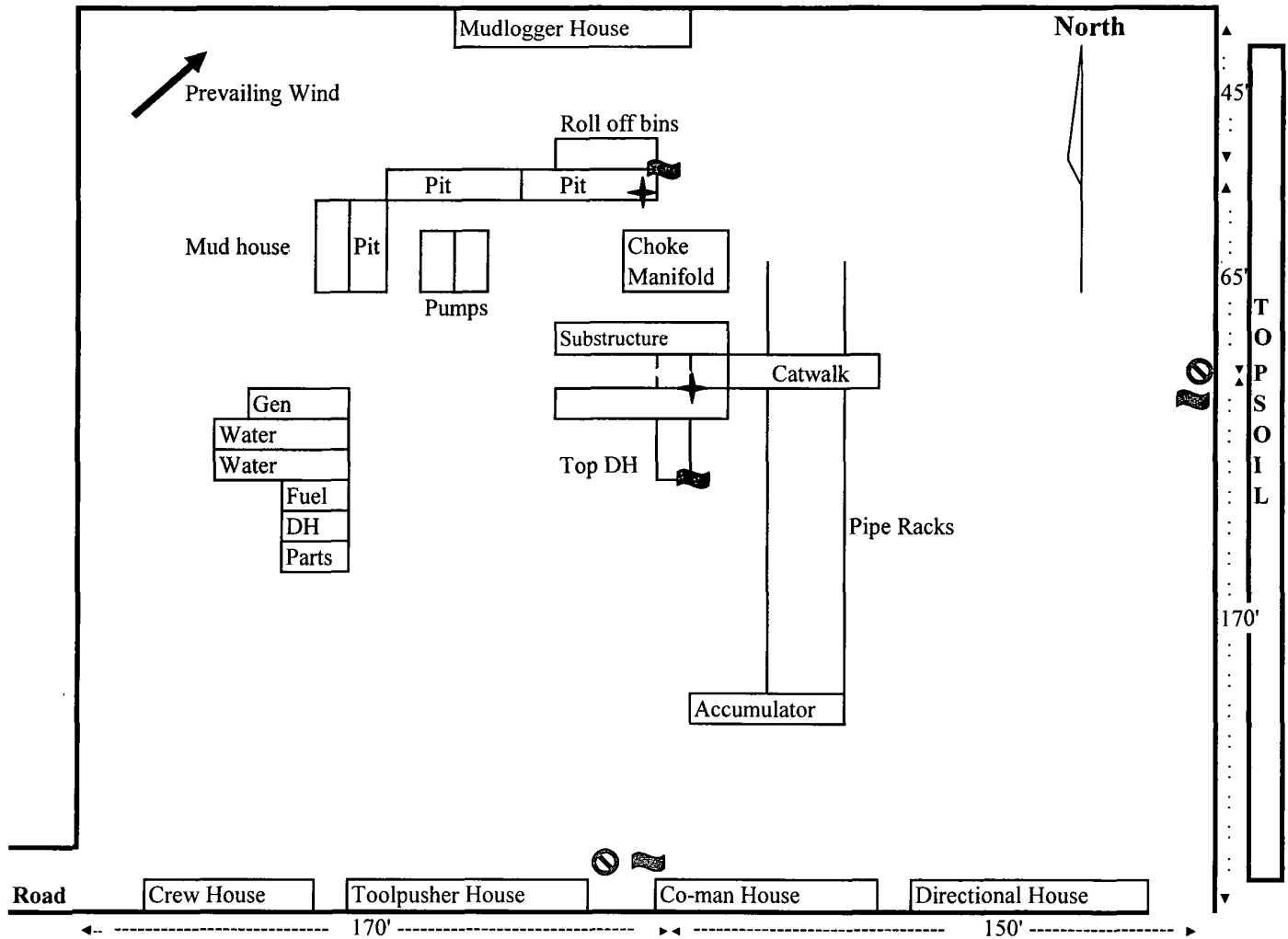
Red Hills Wes + "22" AP Fed Com #1H



Red Hills West "22" AP Fed Com #1H

Exhibit 5

Closed Loop Pad Dimensions 280' x 320'
and H2S Plan



Legend

- Wellbore Location
- Briefing Area w/ SCBA
- H2S Sensors
- Windsocks

Mewbourne Oil Company

Red Hills West "22" AP Fed Com #1H
150' FNL & 990' FEL
Sec 22-T26S-R32E
Lea County, NM