

JUL 10 2013

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

OCD Artesia

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

13-464

APPLICATION FOR PERMIT TO DRILL OR REENTER

| | | |
|--|--|--|
| 1a. Type of work: <input checked="" type="checkbox"/> DRILL <input type="checkbox"/> REENTER | | 5. Lease Serial No. <u>B14</u> L-4333 (SL), NM 17446-A (BHL), NM 0556297. |
| 1b. Type of Well: <input checked="" type="checkbox"/> Oil Well <input type="checkbox"/> Gas Well <input type="checkbox"/> Other <input checked="" type="checkbox"/> Single Zone <input type="checkbox"/> Multiple Zone | | 6. If Indian, Allottee or Tribe Name |
| 2. Name of Operator Mewbourne Oil Company | | 7. If Unit or CA Agreement, Name and No. |
| 3a. Address PO Box 5270 Hobbs, NM 88241 | 3b. Phone No. (include area code) 575-393-5905 | 8. Lease Name and Well No. <u><40024></u> Wildcat 21 LI Fed Com #1H |
| 4. Location of Well (Report location clearly and in accordance with any State requirements.) At surface 2310' FSL & 150' FWL, Sec. 21 T23S R34E <u>Unit L</u> At proposed prod. zone 1650' FSL & 330' FEL, Sec. 21 T23S R34E <u>Unit I</u> | | 9. API Well No. <u>30-025-41261</u> |
| 14. Distance in miles and direction from nearest town or post office* 20 miles NW of Jal, NM | | 10. Field and Pool, or Exploratory <u>West</u> Antelope Ridge Bone Spring (39564) <u><2209></u> |
| 15. Distance from proposed* 150' location to nearest property or lease line, ft. (Also to nearest drig. unit line, if any) | 16. No. of acres in lease (SL)-160 (BHL)-40 <u>NM 0556297-120</u> | 11. Sec., T. R. M. or Blk. and Survey or Area Sec. 21 T23S R34E |
| 18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft. 1650' - Wildcat Energy Antebellum #1 | 19. Proposed Depth 16,114.5 (MD) 11,448 (TVD) | 12. County or Parish Lea |
| 21. Elevations (Show whether DF, KDB, RT, GL, etc.) 3498' | 22. Approximate date work will start* 04/01/2013 | 13. State NM |
| 17. Spacing Unit dedicated to this well 160 | | |
| 20. BLM/BIA Bond No. on file NM 1693 Nationwide, NMB-000919 | | |
| 23. Estimated duration 60 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. | 4. Bond to cover the operations unless covered by an existing bond on file (see Item 20 above). |
| 2. A Drilling Plan. | 5. Operator certification |
| 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). | 6. Such other site specific information and/or plans as may be required by the BLM. |

| | | |
|--|---|----------------------------|
| 25. Signature <u>Bradley Bishop</u> | Name (Printed/Typed) Bradley Bishop | Date <u>02-25-2013</u> |
| Title | | |
| Approved by (Signature) <u>/s/George MacDonell</u> | Name (Printed/Typed) <u>/s/George MacDonell</u> | Date <u>JUN 26 2013</u> |
| 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.

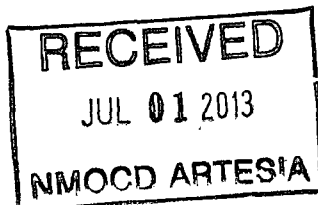
APPROVAL FOR TWO YEARS

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

KC
07/12/13SEE ATTACHED FOR
CONDITIONS OF APPROVALApproval Subject to General Requirements
& Special Stipulations Attached

JUL 16 2013

dm

Drilling Program
Mewbourne Oil Company
Wildcat 21 LI Fed Com #1H
2310' FSL & 150' FWL (SHL)
Sec 21-T23S-R34E
Lea County, New Mexico

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

| | |
|-----------------------------------|---------------------|
| Rustler | 970' |
| Top Salt | 1220' |
| Base Salt | 2850' |
| Top of Castile | 2850' |
| Yates | NP |
| Seven Rivers | NP |
| Queen | NP |
| Capitan | NP |
| Grayburg | NP |
| San Andres | NP |
| Glorieta | NP |
| Yeso | NP |
| Base of Castile | 5080' |
| *Lamar/Delaware | 5080' |
| Bone Springs | 8630' |
| 1 st Bone Spring Sand | 9760' |
| 2 nd Bone Spring Sand | 10280' |
| *3 rd Bone Spring Sand | 11240' |
| Wolfcamp | Will not penetrate. |

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

| | |
|--------------|---|
| Water | Fresh water is anticipated @ 300' & will be protected by setting surface casing at 995' 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:

A 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. 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. BOPs 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 13 3/8" annular to 1500# and the 9 5/8" & 7" BOPE to 3000# and annular 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 11,000' & kick off to horizontal @11,478' TVD. The well will be drilled to 16,115' MD (11,448' TVD). See attached directional plan.

5. Proposed casing and cementing program:

A. Casing Program:

| Hole Size | Casing | Wt/Ft. | Grade | Depth | Jt Type |
|-----------|---------------|--------|-------|------------------|---------|
| 17 1/2" | 13 3/8" (new) | 48# | H40 | 0'-995' 1095' | ST&C |
| 12 1/4" | 9 5/8" (new) | 36# | J55 | 0' - 3300' MD | LT&C |
| 12 1/4" | 9 5/8" (new) | 40# | J55 | 3300' - 4300' MD | LT&C |
| 12 1/4" | 9 5/8" (new) | 40# | N80 | 4300' - 4800' MD | LT&C |
| 8 3/4" | 7" (new) | 26# | P110 | 0'-11000' MD | LT&C |
| 8 3/4" | 7" (new) | 26# | P110 | 11000'-11750' MD | BT&C |
| 6 1/8" | 4 1/2" (new) | 13.5# | P110 | 11550'-TD' 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:

- i. ^{13 3/8"} Surface Casing: 550 sks Class "C" lite cement w/ salt. Yield at 2.15 cuft/sk. 200 sks Class "C" cement w/ 1% CaCl₂. Yield at 1.34 cuft/sk. Cmt circulated to surface w/ 100% excess.
- ii. ^{9 5/8"} Intermediate Casing: 775 sacks Class "C" light cement w/ salt & LCM additives. Yield at 2.10 cuft/sk. 200 sacks Class "C" cement w/ 2% CaCl₂. Yield at 1.34 cuft/sk. Cmt circulated to surface w/ 25% excess.
- iii. ^{7"} Production Casing: 450 sacks *Lite "C" (60:40:0) cement w/salt and fluid loss additives. Yield at 2.12 cuft/sk. 400 sacks Class "H" cement w/ salt & FLA additives. Yield at 1.18 cuft/sk. Cmt calculated to tieback 200' into intermediate casing @ 4600' w/25% excess.
- iv. ^{4 1/2"} 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 light 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:

| Interval | Type System | Weight | Viscosity | Fluid Loss |
|----------------------|--------------|-----------|-----------|------------|
| 0' - 995' 1085' | FW spud mud | 8.6-9.0 | 32-34 | NA |
| 995' - 4800' 5050' | Brine water | 10.0-10.2 | 28-30 | NA |
| 4800' - 11000' (KOP) | FW | 8.5-8.7 | 28-30 | 15 |
| 11000' - TD | FW w/Polymer | 8.5-8.7 | 32-35 | 15 |

**Visual mud monitoring system shall be in place to detect volume changes indicating loss or gain of circulation fluid volume. Sufficient mud materials will be kept on location at all times to combat abnormal conditions.

7. Evaluation Program:

Samples: 10' samples from surface casing to TD
Logging: GR, CN & Gyro from KOP -100' (10,900') to surface. GR from 10,900' 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 ($.43368 \times 11,478' = 4978$ psi) |

Drilling Program
Mewbourne Oil Company
Wildcat 21 LI Fed Com #1H
Page 3

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

Lea County, New Mexico (Nad 83)

Sec 21, T23S, R34E

Wildcat 21 LI Fed Com #1H

Wellbore #1

Plan: Design #1

DDC Well Planning Report

21 February, 2013



DDC
Well Planning Report



| | | | |
|-----------|---------------------------------|------------------------------|---------------------------------|
| Database: | EDM 5000.1 Single User Db | Local Co-ordinate Reference: | Well: Wildcat 21 LI Fed Com #1H |
| Company: | Mewbourne Oil Co | TVD Reference: | WELL @ 3518.0usft (Patterson) |
| Project: | Lea County, New Mexico (Nad 83) | MD Reference: | WELL @ 3518.0usft (Patterson) |
| Site: | Sec 21, T23S, R34E | North Reference: | Grid |
| Well: | Wildcat 21 LI Fed Com #1H | Survey Calculation Method: | Minimum Curvature |
| Wellbore: | Wellbore #1 | | |
| Design: | Design #1 | | |

| | | | |
|-------------|---------------------------------|---------------|----------------|
| Project: | Lea County, New Mexico (Nad 83) | | |
| Map System: | US State Plane 1983 | System Datum: | Mean Sea Level |
| Geo Datum: | North American Datum 1983 | | |
| Map Zone: | New Mexico Eastern Zone | | |

| | | | |
|-----------------------|--------------------|-------------------|-------------------|
| Site: | Sec 21, T23S, R34E | | |
| Site Position: | | Northing: | 469,988.70 usft |
| From: | Map | Easting: | 804,086.10 usft |
| Position Uncertainty: | 0.0 usft | Slot Radius: | 13-3/16 " |
| | | Latitude: | 32° 17' 21.155 N |
| | | Longitude: | 103° 28' 59.010 W |
| | | Grid Convergence: | 0.45 ° |

| | | | | | | |
|----------------------|----------|---------------------------|-----------|-----------------|--------------|-------------------|
| Well | | Wildcat 21 LI Fed Com #1H | | | | |
| Well Position | +N/-S | 0.0 usft | Northing: | 469,988.70 usft | Latitude: | 32° 17' 21.155 N |
| | +E/-W | 0.0 usft | Easting: | 804,086.10 usft | Longitude: | 103° 28' 59.010 W |
| Position Uncertainty | 0.0 usft | Wellhead Elevation: | | Ground Level: | 3,498.0 usft | |

| | | | | | |
|-----------|------------|-------------|--------------------|------------------|------------------------|
| Wellbore | | Wellbore #1 | | | |
| Magnetics | Model Name | Sample Date | Declination (°) | Dip Angle (°) | Field Strength (nT) |
| | IGRF2010 | 2/21/2013 | 7.34 | 60.22 | 48,496 |

| | | | | |
|-------------------|----------------------------|-----------------|-------------------|------------------|
| Design: Design #1 | | | | |
| 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 | 97.39 |

| 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 | |
| 11,000.5 | 0.00 | 0.00 | 11,000.5 | 0.0 | 0.0 | 0.00 | 0.00 | 0.00 | 0.00 | |
| 11,753.8 | 90.39 | 97.39 | 11,478.0 | -61.9 | 476.7 | 12.00 | 12.00 | 12.93 | 97.39 | |
| 16,114.5 | 90.39 | 97.39 | 11,448.0 | -622.9 | 4,801.1 | 0.00 | 0.00 | 0.00 | 0.00 | PBHL Wildcat 21 LI |

DDC
Well Planning Report



| | | | |
|-----------|---------------------------------|------------------------------|--------------------------------|
| Database: | EDM 5000.1 Single User Db | Local Co-ordinate Reference: | Well Wildcat 21 LI Fed Com #1H |
| Company: | Mewbourne Oil Co | TVD Reference: | WELL @ 3518.0usft (Patterson) |
| Project: | Lea County, New Mexico (Nad 83) | MD Reference: | WELL @ 3518.0usft (Patterson) |
| Site: | Sec 21 T23S R34E | North Reference: | Grid |
| Well: | Wildcat 21 LI 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) | |
| Build 12°/100' | | | | | | | | | | |
| 11,000.5 | 0.00 | 0.00 | 11,000.5 | 0.0 | 0.0 | 0.0 | 0.00 | 0.00 | 0.00 | |
| 11,100.0 | 11.94 | 97.39 | 11,099.3 | -1.3 | 10.2 | 10.3 | 12.00 | 12.00 | 0.00 | |
| 11,200.0 | 23.94 | 97.39 | 11,194.2 | -5.3 | 40.7 | 41.1 | 12.00 | 12.00 | 0.00 | |
| 11,300.0 | 35.94 | 97.39 | 11,280.7 | -11.7 | 90.1 | 90.9 | 12.00 | 12.00 | 0.00 | |
| 11,400.0 | 47.94 | 97.39 | 11,355.0 | -20.3 | 156.3 | 157.6 | 12.00 | 12.00 | 0.00 | |
| 11,500.0 | 59.94 | 97.39 | 11,413.7 | -30.7 | 236.3 | 238.3 | 12.00 | 12.00 | 0.00 | |
| 11,600.0 | 71.94 | 97.39 | 11,454.4 | -42.4 | 326.7 | 329.4 | 12.00 | 12.00 | 0.00 | |
| 11,700.0 | 83.94 | 97.39 | 11,475.3 | -54.9 | 423.5 | 427.1 | 12.00 | 12.00 | 0.00 | |
| EOB @ 90.39° Inc / 97.39° Azm / 11,478' TVD | | | | | | | | | | |
| 11,753.8 | 90.39 | 97.39 | 11,478.0 | -61.9 | 476.7 | 480.7 | 12.00 | 12.00 | 0.00 | |
| 11,800.0 | 90.39 | 97.39 | 11,477.6 | -67.8 | 522.6 | 527.0 | 0.00 | 0.00 | 0.00 | |
| 11,900.0 | 90.39 | 97.39 | 11,476.9 | -80.7 | 621.8 | 627.0 | 0.00 | 0.00 | 0.00 | |
| 12,000.0 | 90.39 | 97.39 | 11,476.3 | -93.5 | 720.9 | 727.0 | 0.00 | 0.00 | 0.00 | |
| 12,100.0 | 90.39 | 97.39 | 11,475.6 | -106.4 | 820.1 | 827.0 | 0.00 | 0.00 | 0.00 | |
| 12,200.0 | 90.39 | 97.39 | 11,474.9 | -119.3 | 919.2 | 927.0 | 0.00 | 0.00 | 0.00 | |
| 12,300.0 | 90.39 | 97.39 | 11,474.2 | -132.1 | 1,018.4 | 1,027.0 | 0.00 | 0.00 | 0.00 | |
| 12,400.0 | 90.39 | 97.39 | 11,473.5 | -145.0 | 1,117.6 | 1,126.9 | 0.00 | 0.00 | 0.00 | |
| 12,500.0 | 90.39 | 97.39 | 11,472.8 | -157.9 | 1,216.7 | 1,226.9 | 0.00 | 0.00 | 0.00 | |
| 12,600.0 | 90.39 | 97.39 | 11,472.1 | -170.7 | 1,315.9 | 1,326.9 | 0.00 | 0.00 | 0.00 | |
| 12,700.0 | 90.39 | 97.39 | 11,471.5 | -183.6 | 1,415.1 | 1,426.9 | 0.00 | 0.00 | 0.00 | |
| 12,800.0 | 90.39 | 97.39 | 11,470.8 | -196.5 | 1,514.2 | 1,526.9 | 0.00 | 0.00 | 0.00 | |
| 12,900.0 | 90.39 | 97.39 | 11,470.1 | -209.3 | 1,613.4 | 1,626.9 | 0.00 | 0.00 | 0.00 | |
| 13,000.0 | 90.39 | 97.39 | 11,469.4 | -222.2 | 1,712.6 | 1,726.9 | 0.00 | 0.00 | 0.00 | |
| 13,100.0 | 90.39 | 97.39 | 11,468.7 | -235.1 | 1,811.7 | 1,826.9 | 0.00 | 0.00 | 0.00 | |
| 13,200.0 | 90.39 | 97.39 | 11,468.0 | -247.9 | 1,910.9 | 1,926.9 | 0.00 | 0.00 | 0.00 | |
| 13,300.0 | 90.39 | 97.39 | 11,467.3 | -260.8 | 2,010.1 | 2,026.9 | 0.00 | 0.00 | 0.00 | |
| 13,400.0 | 90.39 | 97.39 | 11,466.6 | -273.7 | 2,109.2 | 2,126.9 | 0.00 | 0.00 | 0.00 | |
| 13,500.0 | 90.39 | 97.39 | 11,466.0 | -286.5 | 2,208.4 | 2,226.9 | 0.00 | 0.00 | 0.00 | |
| 13,600.0 | 90.39 | 97.39 | 11,465.3 | -299.4 | 2,307.6 | 2,326.9 | 0.00 | 0.00 | 0.00 | |
| 13,700.0 | 90.39 | 97.39 | 11,464.6 | -312.3 | 2,406.7 | 2,426.9 | 0.00 | 0.00 | 0.00 | |
| 13,800.0 | 90.39 | 97.39 | 11,463.9 | -325.1 | 2,505.9 | 2,526.9 | 0.00 | 0.00 | 0.00 | |
| 13,900.0 | 90.39 | 97.39 | 11,463.2 | -338.0 | 2,605.1 | 2,626.9 | 0.00 | 0.00 | 0.00 | |
| 14,000.0 | 90.39 | 97.39 | 11,462.5 | -350.9 | 2,704.2 | 2,726.9 | 0.00 | 0.00 | 0.00 | |
| 14,100.0 | 90.39 | 97.39 | 11,461.8 | -363.7 | 2,803.4 | 2,826.9 | 0.00 | 0.00 | 0.00 | |
| 14,200.0 | 90.39 | 97.39 | 11,461.2 | -376.6 | 2,902.6 | 2,926.9 | 0.00 | 0.00 | 0.00 | |
| 14,300.0 | 90.39 | 97.39 | 11,460.5 | -389.4 | 3,001.7 | 3,026.9 | 0.00 | 0.00 | 0.00 | |
| 14,400.0 | 90.39 | 97.39 | 11,459.8 | -402.3 | 3,100.9 | 3,126.9 | 0.00 | 0.00 | 0.00 | |
| 14,500.0 | 90.39 | 97.39 | 11,459.1 | -415.2 | 3,200.1 | 3,226.9 | 0.00 | 0.00 | 0.00 | |
| 14,600.0 | 90.39 | 97.39 | 11,458.4 | -428.0 | 3,299.2 | 3,326.9 | 0.00 | 0.00 | 0.00 | |
| 14,700.0 | 90.39 | 97.39 | 11,457.7 | -440.9 | 3,398.4 | 3,426.9 | 0.00 | 0.00 | 0.00 | |
| 14,800.0 | 90.39 | 97.39 | 11,457.0 | -453.8 | 3,497.6 | 3,526.9 | 0.00 | 0.00 | 0.00 | |
| 14,900.0 | 90.39 | 97.39 | 11,456.3 | -466.6 | 3,596.7 | 3,626.9 | 0.00 | 0.00 | 0.00 | |
| 15,000.0 | 90.39 | 97.39 | 11,455.7 | -479.5 | 3,695.9 | 3,726.9 | 0.00 | 0.00 | 0.00 | |
| 15,100.0 | 90.39 | 97.39 | 11,455.0 | -492.4 | 3,795.1 | 3,826.9 | 0.00 | 0.00 | 0.00 | |
| 15,200.0 | 90.39 | 97.39 | 11,454.3 | -505.2 | 3,894.2 | 3,926.9 | 0.00 | 0.00 | 0.00 | |
| 15,300.0 | 90.39 | 97.39 | 11,453.6 | -518.1 | 3,993.4 | 4,026.9 | 0.00 | 0.00 | 0.00 | |
| 15,400.0 | 90.39 | 97.39 | 11,452.9 | -531.0 | 4,092.6 | 4,126.9 | 0.00 | 0.00 | 0.00 | |
| 15,500.0 | 90.39 | 97.39 | 11,452.2 | -543.8 | 4,191.7 | 4,226.9 | 0.00 | 0.00 | 0.00 | |
| 15,600.0 | 90.39 | 97.39 | 11,451.5 | -556.7 | 4,290.9 | 4,326.9 | 0.00 | 0.00 | 0.00 | |
| 15,700.0 | 90.39 | 97.39 | 11,450.8 | -569.6 | 4,390.1 | 4,426.9 | 0.00 | 0.00 | 0.00 | |
| 15,800.0 | 90.39 | 97.39 | 11,450.2 | -582.4 | 4,489.2 | 4,526.9 | 0.00 | 0.00 | 0.00 | |
| 15,900.0 | 90.39 | 97.39 | 11,449.5 | -595.3 | 4,588.4 | 4,626.9 | 0.00 | 0.00 | 0.00 | |
| 16,000.0 | 90.39 | 97.39 | 11,448.8 | -608.2 | 4,687.6 | 4,726.9 | 0.00 | 0.00 | 0.00 | |

DDC
Well Planning Report



| | | | |
|-----------|---------------------------------|------------------------------|---------------------------------|
| Database: | EDM 5000.1 Single User Db | Local Co-ordinate Reference: | Well: Wildcat 21 LI Fed Com #1H |
| Company: | Mewbourne Oil Co | TVD Reference: | WELL @ 3518.0usft (Patterson) |
| Project: | Lea County, New Mexico (Nad 83) | MD Reference: | WELL @ 3518.0usft (Patterson) |
| Site: | Sec 21, T23S, R34E | North Reference: | Grid |
| Well: | Wildcat 21 LI 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) |
| 16,100.0 | 90.39 | 97.39 | 11,448.1 | -621.0 | 4,786.7 | 4,826.9 | 0.00 | 0.00 | 0.00 |
| 16,114.5 | 90.39 | 97.39 | 11,448.0 | -622.9 | 4,801.1 | 4,841.3 | 0.00 | 0.00 | 0.00 |

| Design Targets | | | | | | | | | |
|---------------------------|---------------|--------------|------------|--------------|--------------|-----------------|----------------|------------------|------------------|
| Target Name | Dip Angle (°) | Dip Dir. (°) | TVD (usft) | +N/-S (usft) | +E/-W (usft) | Northing (usft) | Easting (usft) | Latitude | Longitude |
| - hit/miss target | | | | | | | | | |
| - Shape | | | | | | | | | |
| PBHL Wildcat 21 LI F | 0.00 | 0.00 | 11,448.0 | -622.9 | 4,801.1 | 469,365.80 | 808,887.20 | 32° 17' 14.611 N | 103° 28' 3.142 W |
| - plan hits target center | | | | | | | | | |
| - Point | | | | | | | | | |

| Plan Annotations | | | | |
|-----------------------|-----------------------|-------------------|--------------|--|
| Measured Depth (usft) | Vertical Depth (usft) | Local Coordinates | | Comment |
| | | +N/-S (usft) | +E/-W (usft) | |
| 11,000.5 | 11,000.5 | 0.0 | 0.0 | Build 12° / 100' |
| 11,753.8 | 11,478.0 | -61.9 | 476.7 | EOB @ 90.39° Inc / 97.39° Azm / 11478' TVD |
| 16,114.5 | 11,448.0 | -622.9 | 4,801.1 | TD @ 16115' MD / 11448' TVD |

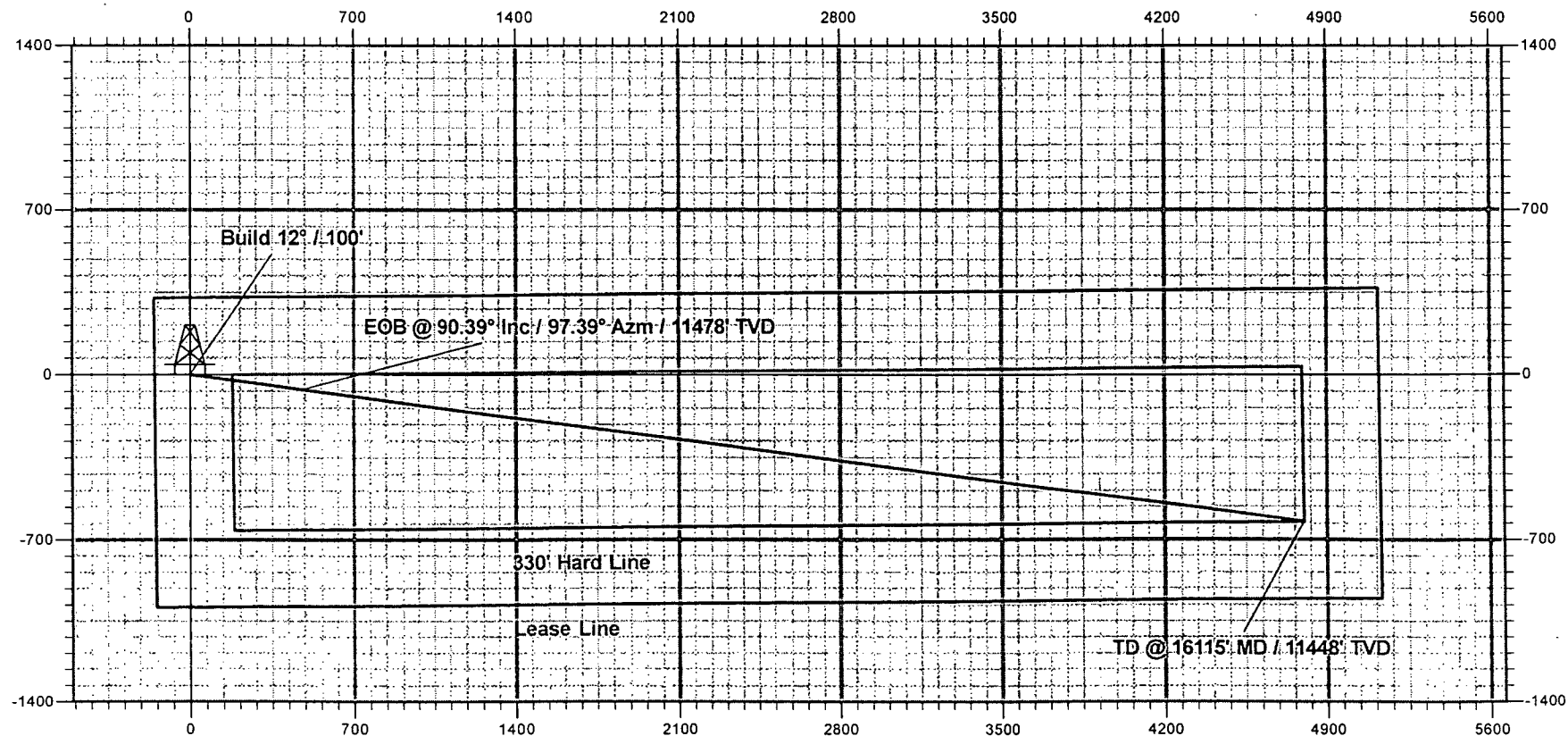
Mewbourne Oil Company

Lea County, New Mexico (Nad 83)

Wildcat 21 LI Fed Com #1H

Quote 130192

Design #1



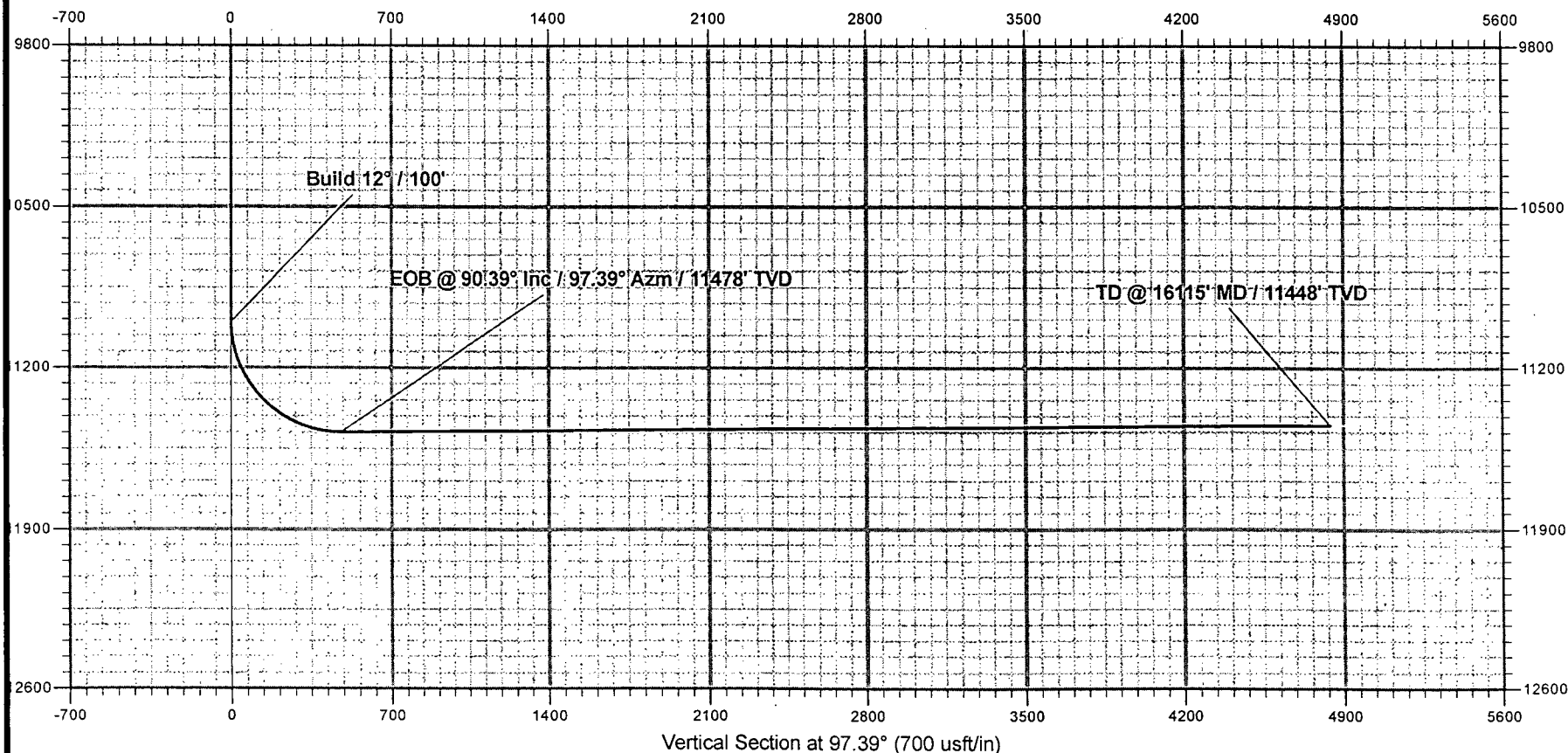
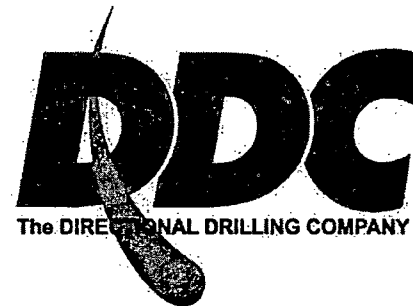
Mewbourne Oil Company

Lea County, New Mexico (Nad 83)

Wildcat 21 LI Fed Com #1H

Quote 130192

Design #1



Notes Regarding Blowout Preventer

Mewbourne Oil Company

Wildcat 21 LI Fed Com #1H
2310' FSL & 150' FWL (SHL)
Sec 21-T23S-R34E
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.

13 5/8" 2M BOPE & Closed Loop Equipment Schematic

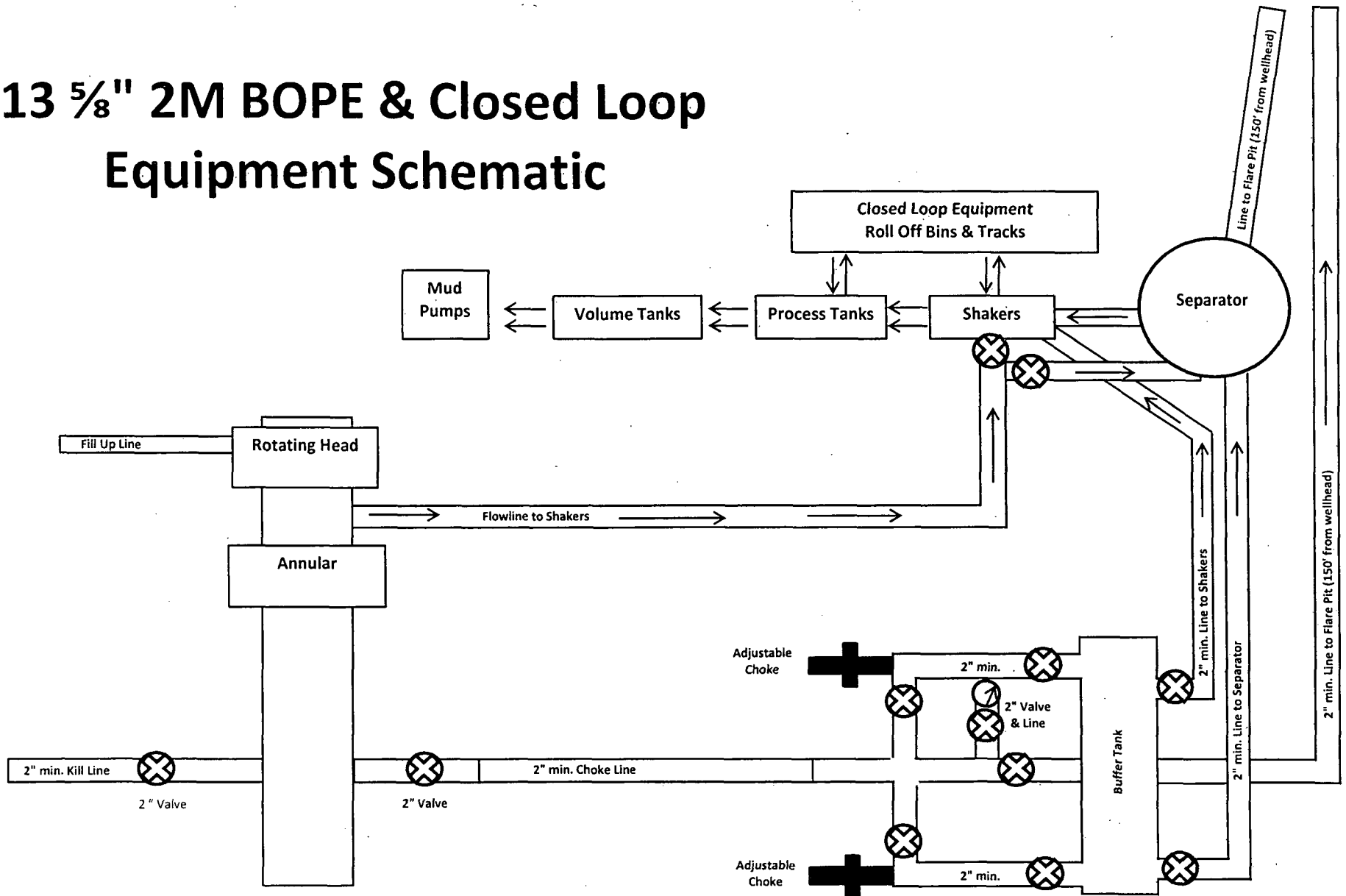


Exhibit 2A

Well Name: Wildcat 21 LI Fed Com #1H

11" 3M BOPE & Closed Loop Equipment Schematic

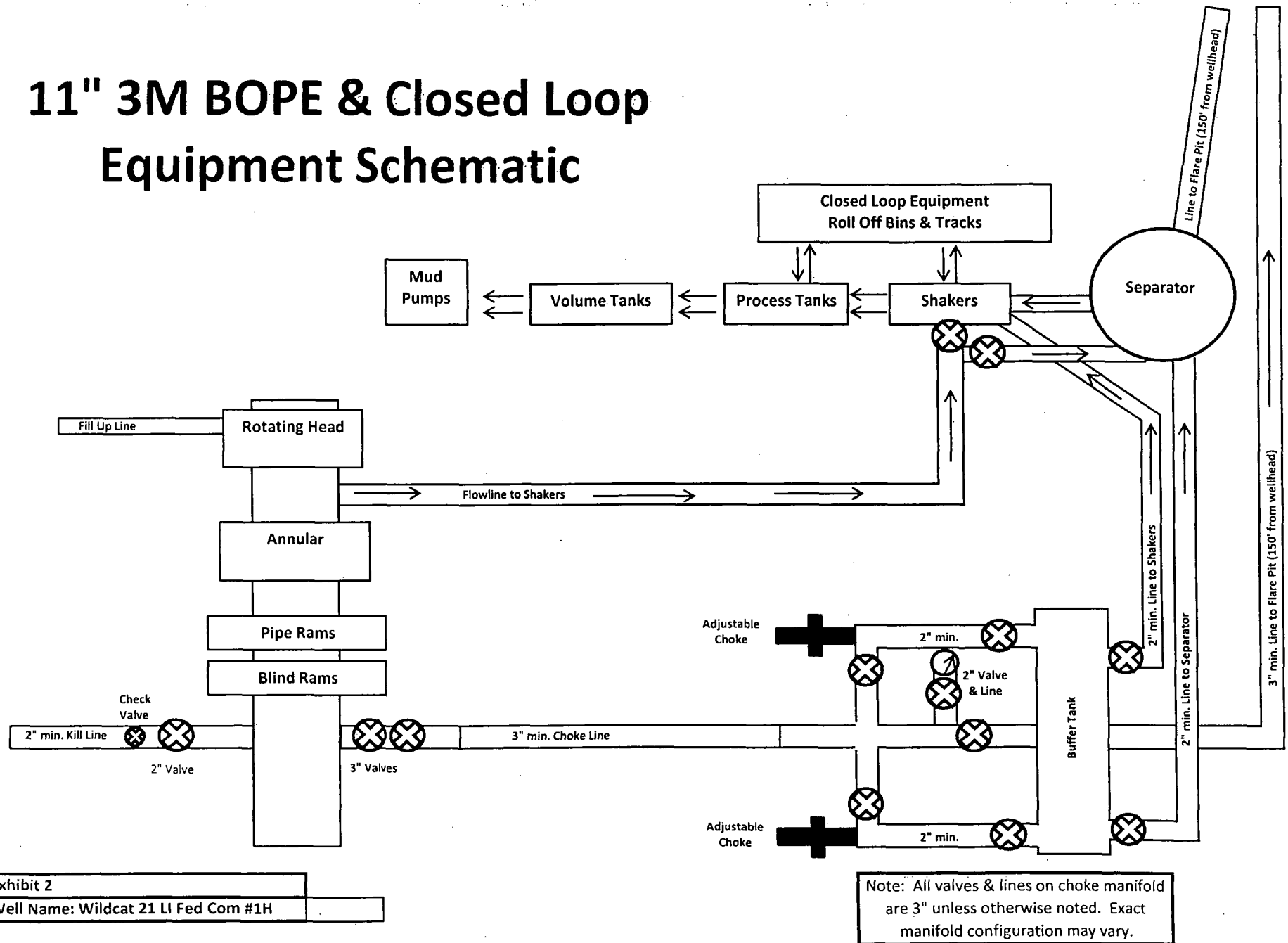


Exhibit 2
Well Name: Wildcat 21 LI Fed Com #1H

H2S Diagram
Closed Loop Pad Dimensions 280' x 320'

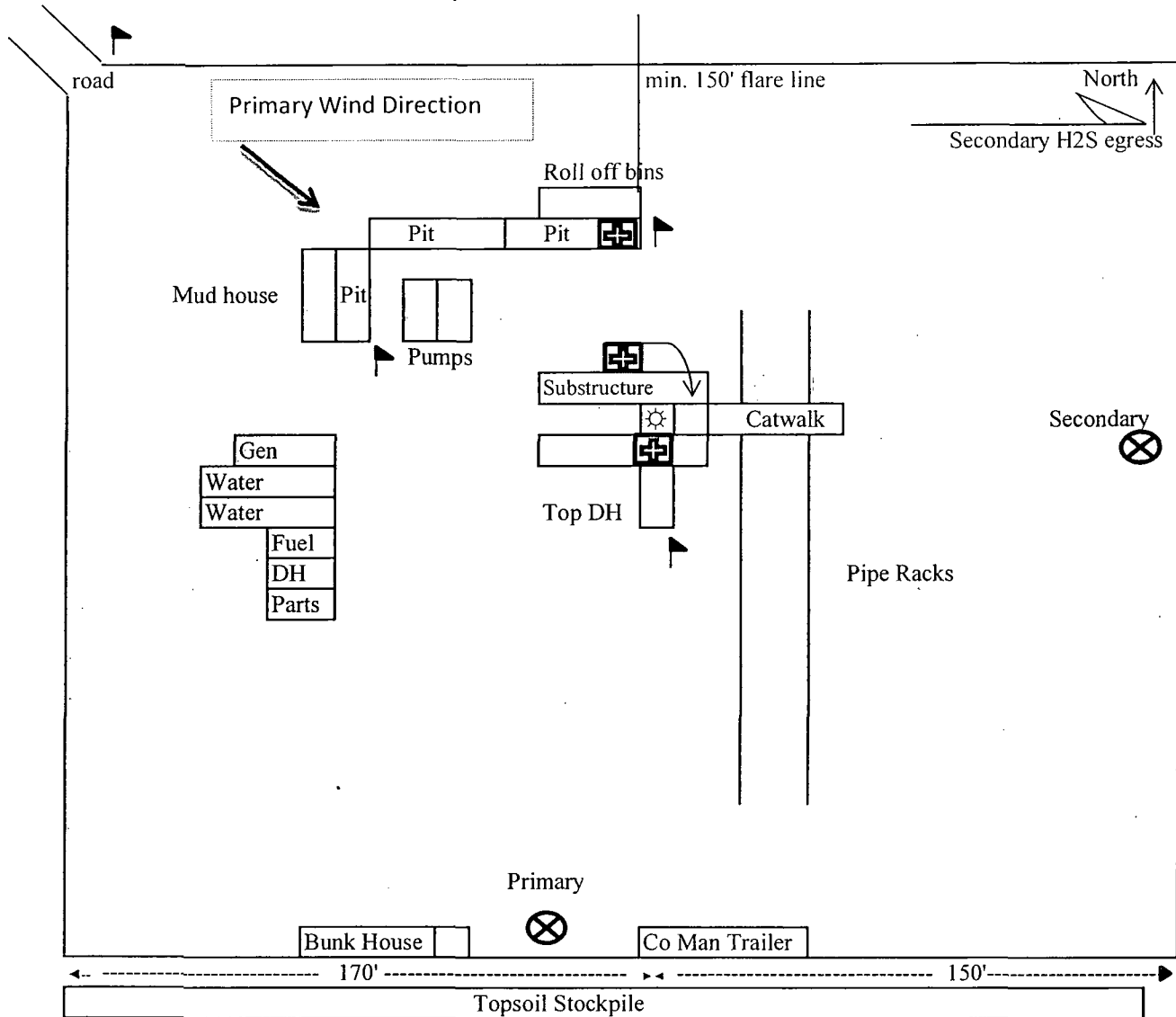


Exhibit 5



= H2S Monitors



= Wind Markers



= Safety Stations

Mewbourne Oil Company
Wildcat 21 LI Fed Com #1H
2310' FSL & 150' FWL
Sec. 21 T23S R34E
Lea County, NM