N. M. OIL CONS. COMMISSION
P. O. BOX 1980
HOBBS, NEW MEXICO 88240

Form 9-331
Dec. 1973

Form Approved.
Budget Bureau No. 42-R1424

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

SUNDRY NOTICES AND REPORTS ON WELLS

(Do not use this form for proposals to drill or to deepen or plug back to a different reservoir. Use Form 9-331-C for such proposals.)

1. oil well ☐ gas well ☑ other

2. NAME OF OPERATOR
CONOCO INC.

3. ADDRESS OF OPERATOR
P. O. Box 460, Hobbs, N.M. 88240

4. LOCATION OF WELL (REPORT LOCATION CLEARLY. See space 17 below.)
AT SURFACE: 660' FSL & 660' FWL
AT TOP PROD. INTERVAL:
AT TOTAL DEPTH:

5. LEASE
LC-032096 (B)

6. IF INDIAN, ALLOTTEE OR TRIBE NAME

7. UNIT AGREEMENT NAME
NMFU

8. FARM OR LEASE NAME
LOCKHART B-13A

9. WELL NO.
1

10. FIELD OR WILDCAT NAME
TERRY BLINEBRY

11. SEC., T., R., M., OR BLK. AND SURVEY OR AREA
SEC. 13, T-21S, R-37E

12. COUNTY OR PARISH
LEA

13. STATE
NM

14. API NO.

15. ELEVATIONS (SHOW DF, KDB, AND WD)

16. CHECK APPROPRIATE BOX TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

REQUEST FOR APPROVAL TO:		SUBSEQUENT REPORT OF:
TEST WATER SHUT-OFF	☐	☐
FRACTURE TREAT	☑	☐
SHOOT OR ACIDIZE	☑	☐
REPAIR WELL	☐	☐
PULL OR ALTER CASING	☐	☐
MULTIPLE COMPLETE	☐	☐
CHANGE ZONES	☑	☐
ABANDON*	☐	☐
(other) RE-ENTER ABO	✓	

(NOTE: Report results of multiple completion or zone change on Form 9-330.)

17. DESCRIBE PROPOSED OR COMPLETED OPERATIONS (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work. If well is directionally drilled, give subsurface locations and measured and true vertical depths for all markers and zones pertinent to this work.)*

PLEASE SEE ATTACHED PROCEDURE.

RECEIVED
83 SEP 19 AM 11 01 DES

Subsurface Safety Valve: Manu. and Type _____ Set @ _____ Ft.

18. I hereby certify that the foregoing is true and correct

SIGNED Wm A. Dutterfield TITLE Administrative Supervisor DATE 9/16/83

APPROVED (This space for Federal or State office use)

APPROVED (Orig. Sgd.) PETER W. CHESTER TITLE _____ DATE _____

CONDITIONS OF APPROVAL, IF ANY:

SEP 28 1983

*See Instructions on Reverse Side

LOCKHART B-13A NO. 1

ABO RE-ENTRY

Well Data

TD: 7576' PBD: ±5988' ELEV: 3427' ZERO: 12' AGL

LOCATION: 660' FSL & 660' FWL of Section 13, T21S-R37E, Lea County, NM

CASING: 13-3/8", 25#, Surface String @ 238' w/250 sx (circ)
9-5/8", 36#, J-55 Intermediate String @ 3150' w/1596 sx
7", 23# & 26#, N-80 Production String @ 7576' w/730 sx

PERFORATIONS: 5654-5840' - Blinebry (452 Shots)
6050-6300' - Tubb (390 Shots)
7063-7125' - Abo (252 Shots) - Squeezed
7160-7450' - Abo (680 Shots)

MISC: CIBP @ ±6000 w/2 sx cmt cap
Junk CIBP @ ±6400'
Cmt Retainer @ ±6995'
CIBPs @ ±7140', ±7200', ±7310' and ±7416'

Recommended Procedure

1. Rig up and if necessary, kill well w/2% KCL TFW w/1 gallon Adomall per 1000 gallons.

2. POOH and lay down rods and pump.
   A. Transfer sucker rods to Lockhart B-13A No. 5.
   B. Install BOP.
   C. Tag for fill w/2-3/8" tubing.
   D. POOH and tally 2-3/8" tubing.

3. Pick up and GIH w/7" packer, SN and 2-7/8" workstring.
   A. Hydro-test 2-7/8" workstring w/6000 psi above slips and run pkr to ±5950'.
   B. Pressure test CIBP @ ±6000' w/3500 psi via packer.
   C. Set packer @ ±5500'.
   D. Load backside w/2% KCL TFW w/1 gallon Adomall per 1000 gallons.

4. Cement squeeze Blinebry perforations (5654'-5840') as follows:
   A. Establish pump in rates and pressures.
   B. Pump 100 sx Class "C" cement (1.32 ft^3/sx slurry volume and 14.8 lbs/gal slurry weight) w/2% $CaCl_2$.
      1. Hesitate-squeeze to achieve a final squeeze pressure of 3000 psi if necessary.

5. Release packer @ ±5500' and reverse circulate excess cement out.
   A. Set packer @ ±5400'.
   B. Pressure up on cement squeeze w/3000 psi.
   C. Shut in 18 hours.

6. Release packer @ +5400'.
   A. POOH w/2-7/8" workstring, SN and 7" packer.
   B. GIH w/6-1/8" bit, 4 - 4-3/4" drill collars, and 2-7/8" workstring.

7. Drill out cement to +5900'.
   A. Pressure test squeezed perforations (5654'-5840') w/1000 psi for 15 minutes.
   B. If cement squeeze does not hold.
      1. POOH w/2-7/8" workstring, 4 - 4-3/4" drill collars and 6-1/8" bit.
      2. Repeat Steps 4 & 5.

8. Drill out cement & CIBP @ +5988'.
   A. Drill out CIBP @ +6400'.
   B. Run bit to +6995'.
   C. POOH w/2-7/8" workstring, 4 - 4-3/4" drill collars and 6-1/8" bit.

9. GIH w/7" retrievable bridge plug, setting-releasing tool, 7" packer, SN and 2-7/8" workstring.
   A. Set retrievable bridge plug @ +6500'.
   B. Pressure test retrievable bridge plug w/3500 psi via packer.
   C. Spot 15' sand on top of retrievable bridge plug.
   D. Set packer @ +5900'.
   E. Load backside w/2% KCL TFW w/1 gallon Adomall per 1000 gallons.

10. Cement squeeze Tubb perforations (6050'-6300') as follows:
   A. Establish pump in rates and pressures.
   B. Pump 100 sx Class "C" cement (1.32 ft^3/sx slurry volume and 14.8 lbs/gal slurry weight) w/2% $CaCl_2$.
      1. Hesitate-squeeze to achieve a final squeeze pressure of 3000 psi if necessary.

11. Release packer @ +5900' and reverse circulate excess cement out.
   A. Set packer @ +5870'.
   B. Pressure up on cement squeeze w/3000 psi.
   C. Shut in 18 hours.

12. Release packer @ +5870'.
   A. POOH w/2-7/8" workstring, SN, 7" packer and setting-releasing tool.
   B. GIH w/6-1/8" bit, 4 - 4-3/4" drill collars and 2-7/8" workstring.

13. Drill out cement to +6485'.
   A. Pressure test cement squeeze (6050'-6300') w/1000 psi for 15 minutes.
   B. If cement squeeze does not hold:
      1. POOH w/2-7/8" workstring, 4 - 4-3/4" drill collars and 6-1/8" bit.
      2. Repeat Steps 10 and 11.

14. POOH w/2-7/8" workstring, 4 - 4-3/4" drill collars and 6-1/8" bit.
   A. GIH w/setting-releasing tool and 2-7/8" workstring.
   B. Release retrievable bridge plug @ +6500.
   C. POOH w/2-7/8" workstring, setting-releasing tool and 7" retrievable bridge plug.

15. GIH w/6-1/8" bit, 4 - 4-3/4" drill collars and 2-7/8" workstring.
   A. Run bit to +6990'.
   B. Displace wellbore w/9 PPG brine water w/1 gallon Adomall and 2 gallons

ABO RE-ENTRY

16. Drill out cement retainer @ +6995'.
    A. Drill out cement to +7140'.
    B. Drill out CIBP @ +7140'.
    C. Drill out CIBP @ +7200'.
    D. Clean out wellbore to +7310'.
    E. Circulate wellbore clean w/9 PPG brine water w/1 gallon Adomall and 2 gallons Cla-Sta per 1000 gallons.
    F. POOH w/2-7/8" workstring, 4 - 4-3/4" drill collars and 6-1/8" bit.

17. Rig up wireline services.
    A. GIH w/gauge ring, junk basket and wireline.
    B. Run gauge ring to +7310'.
    C. POOH w/wireline, junk basket and gauge ring.
    D. GIH w/GR-PDC logging tool and wireline.
    E. Log from +7310' to +6000'.
    F. POOH w/wireline and GR-PDC logging tool.

18. GIH w/retrievable bridge plug, setting-releasing tool, packer, SN, and 2-7/8" workstring.
    A. Hydro-test 2-7/8" workstring w/6000 psi above slips.
    B. Set retrievable bridge plug @ +7300'.
    C. Pressure test retrievable bridge plug w/3500 psi via packer.
    D. Set packer @ +7140'.
    E. Load backside w/9 PPG brine water w/1 gallon Adomall and 2 gallons Cla-Sta per 1000 gallons.
    F. Do Not pressure up on backside.

19. Acidize Abo (7160'-7276') through 2-7/8" workstring @ 4-6 BPM in three stages as follows:

    NOTE: Monitor Backside During Treatment.

    Maximum Surface Treating Pressures: See Pressure/Rate Chart.

    A. Pump 2520 gallons (60 bbls) 28% HCL-NE-FE (inhibit acid for 24 hrs @ 120°F) w/2 gallons Cla-Sta II per 1000 gallons.
    B. Pump 300 lbs diverting agent (50% benzoic acid flakes and 50% graded rock salt) mixed in 5 bbls 10 PPG brine water w/10 lbs. guar gum (include 2 hour breaker in guar gum).
    C. Pump 2520 gallons (60 Bbls) 28% HCL-NE-FE (inhibit acid for 24 hours @ 120°F) w/2 gallons Cla-Sta II per 1000 gallons.
    D. Pump 300 lbs. diverting agent (50% Benzoic acid flakes and 50% graded rock salt) mixed in 5 bbls 10 PPG brine water w/10 lbs. guar gum (include 2 hour breaker in guar gum).
    E. Pump 2520 gallons (60 bbls) 28% HCL-NE-FE (inhibit acid for 24 hours @ 120°F) w/2 gallons Cla-Sta II per 1000 gallons.
    F. Pump 60 bbls 9 PPG brine water w/1 gallon Adomall and 2 gallons Cla-Sta per 1000 gallons.
    G. Shut in for 1 hour.

20. Swab back load (+250 bbls).

21. Release packer @ +7140'.
    A. Release retrievable bridge plug @ +7300'.

C. Pressure test retrievable bridge plug w/3500 psi via packer.
D. Spot 5' sand on retrievable bridge plug.
E. Spot 126 gallons (3 bbls) 15% HCL-NE-FE (inhibit acid for 48 hours @ 120°F) from +7115 to +7038'.
F. POOH w/2-7/8" workstring, SN, packer and setting-releasing tool.

22. GIH w/4" centralized select-fire perforating gun (180° phase, 2 JSPF, and 0.40" EHD), collar locator and wireline.

23. Perforate Abo @ 7063', 7072', 7081', 7092', 7104', 7110', and 7115'. (Total: 14 perfs)

NOTE: Interval is to be perforated from top to bottom.

NOTE: Above perforating depths are based on neutron log and are to be correlated with log run in Step 17 for exact perforating depths.

24. POOH w/wireline, collar locator and 4" perforating gun.

25. GIH w/setting-releasing tool, 7" packer, SN, and 2-7/8" tubing.
A. Set packer @ +6900'.
B. Load backside w/9 PPG brine water w/1 gallon Adomall and 2 gallons Cla-Sta per 1000 gallons.
C. Do not pressure up on backside.

26. Acidize Abo (7063'-7115') through 2-7/8" workstring @ 4-6 BPM as follows:

NOTE: Monitor Backside During Treatment.

Maximum Surface Treating Pressures: See Pressure/Rate Chart.

A. Pump 1176 gallons (28 bbls) 28% HCL-NE-FE (inhibit acid for 24 hours @ 120°F) w/2 gallons Cla-Sta II per 1000 gallons.
1) Release 4 ball sealers after every 4 bbls acid pumped. (Total: 28 ball sealers)
2) Attempt to achieve ballout.
B. Pump 60 bbls 9 PPG brine water w/1 gallon Adomall and 2 gallons Cla-Sta per 1000 gallons.
C. Shut in for 1 hour.

27. Swab back load (+88 bbls).

28. Release packer @ +6900'.
A. Release retrievable bridge plug @ +7150'.
B. Set retrievable bridge plug @ +7050'.
C. Pressure test retrievable bridge plug w/3500 psi via packer.
D. Spot 5' sand on top of retrievable bridge plug.
E. Spot 168 gallons (4 bbls) 15% HCL-NE-FE (inhibit acid for 48 hours @ 120°F) from +7029' to +6926'.
F. POOH w/2-7/8" workstring, SN, packer and setting-releasing tool.

29. GIH w/4" centralized select-fire perforating gun (180° phase, 2 JSPF, and 0.40" EHD), collar locator and wireline.

30. Perforate Abo @ 6951', 6953', 6974', 6976', 6980', 6984', 7002', 7006', 7014', 7018', 7027', and 7029'. (Total: 24 perforations)

NOTE: Interval is to be perforated from top to bottom.

NOTE: Above perforating depths are based on neutron log and are to be correlated w/log run in Step 17 for exact perforating depths.

31. POOH w/wireline, collar locator and 4" perforating gun.

32. GIH w/setting-releasing tool, 7" packer, SN and 2-7/8" workstring.
A. Set packer @ ±6800'.
B. Load backside w/9 PPG brine water w/1 gallon Adomall and 2 gallons Cla-Sta per 1000 gallons.
C. DO NOT pressure up on backside.

33. Acidize Abo (6951'-7029') through 2-7/8" workstring @ 4-6 BPM as follows:

NOTE: Monitor Backside During Treatment.

Maximum Surface Treating Pressures: See Pressure/Rate Chart.

A. Pump 2016 gallons (48 bbls) 28% HCL-NE-FE (inhibit acid for 24 hours @ 120°F) w/2 gallons Cla-Sta II per 1000 gallons.
1) Release 4 ball sealers after every 4 bbls acid pumped. (Total: 48 ball sealers)
2) Attempt to achieve ballout.
B. Pump 60 bbls 9 PPG brine water w/1 gallon Adomall and 2 gallons Cla-Sta per 1000 gallons.
C. Shut in for 1 hour.

34. Swab back load (±108 bbls).

35. Release packer @ ±6800'.
A. Release retrievable bridge plug @ ±7050'.
B. Set retrievable bridge plug @ ±6940'.
C. Pressure test retrievable bridge plug w/3500 psi via packer.
D. Spot 5' sand on top of retrievable bridge plug.
E. Spot 168 gallons (4 bbls) 15% HCL-NE-FE (inhibit acid for 24 hours @ 120°F) from ±6920' to ±6817'.
F. POOH w/2-7/8" workstring, SN, packer and setting-releasing tool.

36. GIH w/4" centralized select-fire perforating gun (180° phase, 2 JSPF, and 0.40" EHD), collar locator and wireline.

37. Perforate Abo @ 6856', 6863', 6873', 6879', 6884', 6893', 6917', and 6920'. (Total: 16 perforations)

NOTE: Interval is to be perforated from top to bottom.

NOTE: Above perforating depths are based on neutron log and are to be correlated w/log run in Step 17 for exact perforating depths.

ABO RE-ENTRY

40. POOH w/wireline, collar locator and 4" perforating gun.

41. GIH w/setting-releasing tool, packer, SN and 2-7/8" workstring.
   A. Set packer @ +6700'.
   B. Load backside w/9 PPG brine water w/1 gallon Adomall and 2 gallons Cla-Sta per 1000 gallons.
   C. DO NOT pressure up on backside.

42. Acidize Abo (6656'-6920') through 2-7/8" workstring @ 4-6 BPM as follows:

   NOTE: Monitor Backside During Treatment.

   Maximum Surface Treating Pressures: See Pressure/Rate Chart.

   A. Pump 1344 gallons (32 bbls) 28% HCL-NE-FE (inhibit acid for 24 hours @ 120°F) w/2 gallons Cla-Sta II per 1000 gallons.
      1. Release 4 ball sealers after every 4 bbls acid pumped. (Total: 32 ball sealers)
      2. Attempt to achieve ballout.
   B. Pump 60 bbls 9 PPG brine water w/1 gallon Adomall and 2 gallons Cla-Sta per 1000 gallons.
   C. Shut in for 1 hour.

43. Swab back load (+92 bbls).

44. Release packer @ +6700'.
   A. Release retrievable bridge plug @ +6940'.
   B. POOH and lay down 2-7/8" workstring, SN, packer, setting-releasing tool and retrievable bridge plug.

45. GIH w/orange-peeled-slotted mud anchor, SN, 19 joints 2-3/8" tubing, 7" x 2-3/8" tubing anchor and 2-3/8" tubing.
   A. Hydro-test 2-3/8" tubing w/6000 psi above slips.
   B. Land SN @ +7270'.
   C. Set tubing anchor in 12 points tension @ +6700'.
   D. GIH w/8' gas dip tube, pump, and 3/4" Class "D" rods.
   E. Hang well on and place well on production.