

Submit 1 Copy To Appropriate District Office
District I - (575) 393-6161
1625 N. French Dr., Hobbs, NM 88240
District II - (575) 748-1283
811 S. First St., Artesia, NM 88210
District III - (505) 334-6178
1000 Rio Brazos Rd., Aztec, NM 87410
District IV - (505) 476-3460
1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico
Energy, Minerals and Natural Resources

Form C-103
Revised July 18, 2013

OIL CONSERVATION DIVISION
1220 South St. Francis Dr.
Santa Fe, NM 87505

WELL API NO. API #30-015-26348
5. Indicate Type of Lease STATE <input type="checkbox"/> FEE <input checked="" type="checkbox"/>
6. State Oil & Gas Lease No.
7. Lease Name or Unit Agreement Name SOUTH CULEBRA BLUFF 23
8. Well Number 7
9. OGRID Number 258350
10. Pool name or Wildcat EAST LOVING DELAWARE <i>LOVING BRUSHY CANYON; Del 18</i>
11. Elevation (Show whether DR, RKB, RT, GR, etc.) 3002 GL

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 "APPLICATION FOR PERMIT" (FORM C-101) FOR SUCH PROPOSALS.)

1. Type of Well: Oil Well ☒ Gas Well ☐ Other

2. Name of Operator

VANGUARD PERMIAN LLC

3. Address of Operator

1209 SOUTH MAIN ST, LOVINGTON, NM 88260

4. Well Location

Unit Letter J feet from the 1950 line and SOUTH feet from the 1750 line EAST

Section 23 Township 23S Range 28E NMPM EDDY County

11. Elevation (Show whether DR, RKB, RT, GR, etc.)
3002 GL

12. Check Appropriate Box to Indicate Nature of Notice, Report or Other Data

NOTICE OF INTENTION TO:

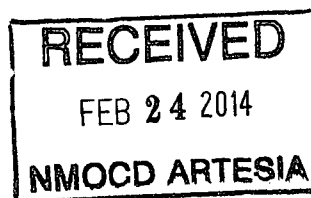
PERFORM REMEDIAL WORK ☒ PLUG AND ABANDON ☐
TEMPORARILY ABANDON ☐ CHANGE PLANS ☐
PULL OR ALTER CASING ☐ MULTIPLE COMPL ☐
DOWNHOLE COMMINGLE ☐
CLOSED-LOOP SYSTEM ☐
OTHER: ☐

SUBSEQUENT REPORT OF:

REMEDIAL WORK ☐ ALTERING CASING ☐
COMMENCE DRILLING OPNS. ☐ P AND A ☐
CASING/CEMENT JOB ☐
OTHER: ☐

13. Describe proposed or completed operations. (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work). SEE RULE 19.15.7.14 NMAC. For Multiple Completions: Attach wellbore diagram of proposed completion or recompletion.

SEE ATTACHMENT



Spud Date:

Rig Release Date:

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

SIGNATURE Gaye Heard TITLE AGENT DATE 2-21-14

Type or print name GAYE HEARD E-mail address: gheard@oilreportsinc.com PHONE: 575-393-2727

For State Use Only

APPROVED BY: T. C. Shapard TITLE "Geologist" DATE 2-14-2014

Conditions of Approval (if any):

VANGUARD PERMIAN LLC

SOUTH CULEBRA BLUFF 23 #7

API #30-015-26348 SEC 23 t23s R28E

Procedure:

1. MIRU completion rig and test anchors.
2. Kill well with 2% KCL water, if necessary. Unseat pump and POOH w/ rods and pump.
3. ND WH and NU BOP. Release TAC and POOH w/ tubing. Lay out 2-7/8" tubing.
4. PU, strap and TIH with 4-3/4" bit, 5-1/2" casing scraper and 3-1/2" frac string tubing. Clean out hole to PBTD (6283') until clean returns, POOH.
5. MI wireline w/ packoff. RIH CBP, GR/CCL & correlate.
6. Set the CBP @ ~6080'.
7. MU 3-1/8" casing guns set at 2 spf, 120° phasing (0.38" hole, 39.5" penetration).
8. Perforate as follows:
 - a. 5946' - 5950' (4', 8 shots)
 - b. 5960' - 5964' (4', 8 shots)
 - c. 5984' - 5988' (4', 8 shots)
 - d. 5998' - 6002' (4', 8 shots)
 - e. 6036' - 6040' (4', 8 shots)
 - f. 6050' - 6054' (4', 8 shots), total 48 shots
9. RD wireline.
10. PU a 5-1/2" Arrowset I packer and RIH to ~5920'. Load tubing/hole with 2 % KCL and set packer.
11. MIRU pump truck and test lines to 3500 psi.
12. Pump 2000 gals 15% NEFE acid with rock salt.
 - a. Pump 500 gal then pump 30 ball sealers over next 1000 gals.
 - b. Pump last 500 gals and flush to 6040'.
 - c. Record ISIP, 5 min, 10 min and 30 min.
13. RU swabber and swab well in to test acid job. Recover load and report fluid/gas entry.
14. RDMO completion rig.
15. Call out 3-500 bbl tanks & fill with 2% KCL water. Install frac valve in preparation for frac job down 3-1/2" tubing.
16. RU frac Co. and test lines & pump as per frac schedule.
17. Monitor ISIP, 5 min, 10 min, 15 min. Flowback until well dies.
18. Rig down frac valve and release frac tanks.
19. MIRU completion rig.
20. Release packer and POOH.
21. MI wireline w/ packoff. RIH CBP, GR/CCL & correlate.
22. Set the CBP @ ~5900'.
23. MU 3-1/8" casing guns set at 2 spf, 120° phasing (0.38" hole, 39.5" penetration).
24. Perforate as follows:
 - a. 5766' - 5772' (6', 12 shots)
 - b. 5786' - 5790' (4', 8 shots)
 - c. 5818' - 5824' (6', 12 shots)

VANGUARD PERMIAN LLC

SOUTH CULEBRA BLUFF 23 #7

API #30-015-26348 SEC 23 t23s R28E

- d. 5852' - 5856' (4', 8 shots)
- e. 5864' - 5870' (6', 12 shots)
- 25. RD wireline.
- 26. PU a 5-1/2" Arrowset packer and 3-1/2" tubing and RIH with tubing to ~5760' and set packer.
- 27. MIRU pump truck (with 2000 gals acid) and test lines to 4500 psi.
- a. Pump 1000 gals 15% NEFE acid with 30 ball sealers.
- b. Pump last 1000 gals and flush to 5870'.
- c. Record ISIP, 5 min, 10 min and 30 min.
- 28. Wait at least 1 hr then RU swabber and swab well in to test acid job. Recover load and report fluid/gas entry, if possible.
- 29. RDMO completion rig.
- 30. Call out 3-500 bbl tanks & fill with 2% KCl water. Install frac valve in preparation for frac job down 3-1/2" tubing.
- 31. RU frac Co. and test lines & pump as per frac schedule.
- 32. Monitor ISIP, 5 min, 10 min, 15 min. Flowback until well dies.
- 33. Rig down frac valve and release frac tanks.
- 34. MIRU completion rig.
- 35. Load hole and release packer, POOH and lay out 3-1/2" frac string tubing.
- 36. PU a 4-3/4" bit, sand bailer and 2-7/8" tubing and RIH. Clean out the well as needed and knockout both CBP's, POOH.
- 37. RIH w/ 5-1/2" TAC, SN and 2-7/8" tubing. Set SN at ~6244'.
- 38. RIH w/ rods and pump.
- 39. RD & MO.
- 40. Turn well on to production.



SCB 23 #7
Loving East - 30-015-26348
Eddy County, New Mexico
PROPOSED COMPLETION - 2/2014

KB: 3016.9'
 GL: 3002'

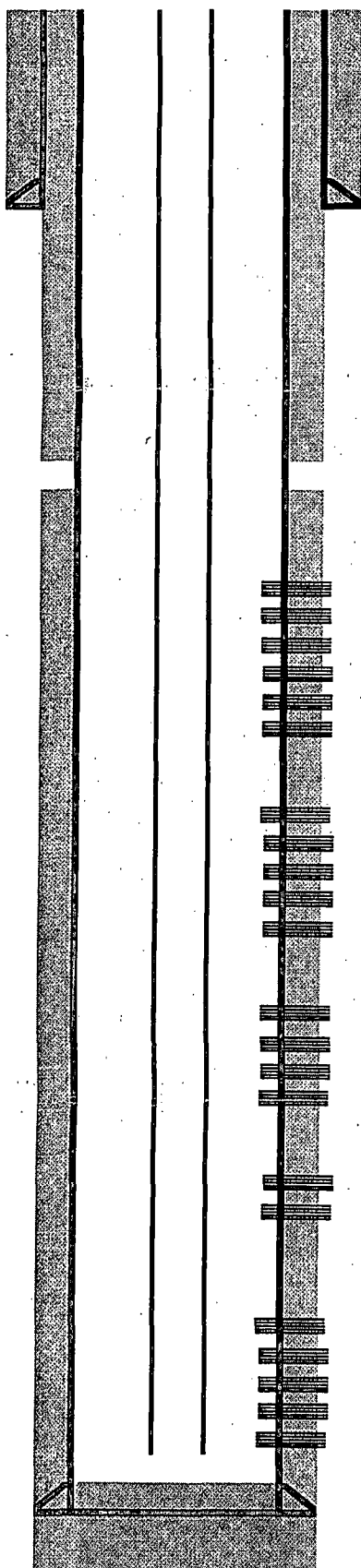
TOC @ surf
 350 sxs

8 5/8" csg @ 542'

TOC @ surf
 800 sxs in stage 2
 DV Tool @ 3473'

1600 sxs in stage 1

5 1/2" csg @ 6300'



CASING PROGRAM

<u>Depth</u>	<u>Size</u>	<u>Weight</u>	<u>Grade</u>	<u>I.D.</u>	<u>Collapse</u>	<u>Burst</u>
542'	8 5/8"	24#	J-55	8.097	1,370	2,950
6300'	5 1/2"	15.5#	J-55	4.950	4,040	4,810

PRODUCTION TUBING

<u>Depth</u>	<u>Size</u>	<u>Weight</u>	<u>Grade</u>	<u>Threads</u>
6244'	2 7/8"	6.5#	J-55	EUE

Pardue Perforations:

Frac'd in 2005

- 4,685' - 4,700' (2 spf, 10 holes)
- 4,740' - 4,746' (2 spf, 12 shots)
- 4,758' - 4,768' (2 spf, 20 shots)
- 4,772' - 4,778' (2 spf, 12 shots)
- 4,782' - 4,788' (2 spf, 12 shots)
- 4,791' - 4,794' (2 spf, 6 shots) 104 total shots

Brushy Canyon AA Perforations:

PROPOSED
 PROPOSED
 PROPOSED
 PROPOSED
 PROPOSED

- 5,766' - 5,772' (2 spf, 12 holes)
- 5,786' - 5,790' (2 spf, 8 holes)
- 5,818' - 5,824' (2 spf, 12 holes)
- 5,852' - 5,856' (2 spf, 8 holes)
- 5,864' - 5,870' (2 spf, 12 holes)

Brushy Canyon A Perforations:

PROPOSED
 PROPOSED
 PROPOSED
 PROPOSED

- 5,946' - 5,950' (2 spf, 8 holes)
- 5,960' - 5,964' (2 spf, 8 holes)
- 5,984' - 5,988' (2 spf, 8 holes)
- 5,998' - 6,002' (2 spf, 8 holes)

Brushy Canyon B Perforations:

PROPOSED
 PROPOSED

- 6,036' - 6,040' (2 spf, 8 holes)
- 6,050' - 6,054' (2 spf, 8 holes)

Brushy Canyon C & D Perforations:

Frac'd in 1990

- 6,138' - 6,148' (2 spf, 20 holes)
- 6,158' - 6,168' (2 spf, 20 holes)
- 6,178' - 6,181' (2 spf, 6 holes)
- 6,202' - 6,208' (2 spf, 12 holes)
- 6,230' - 6,240' (2 spf, 20 holes) 78 total shots

PBTD = 6,283' FC

Note: This schematic is not to scale. For display purposes only.