

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

WELL COMPLETION OR RECOMPLETION REPORT AND LOG

FORM APPROVED
OMBNO. 1004-0137
Expires: March 31, 20071a. Type of Well ☐ Oil Well ☒ Gas Well ☐ Dry ☐ Otherb. Type of Completion: ☐ New Well ☐ Work Over ☐ Deepen ☒ Plug Back ☐ Diff. Rev.
Other _____2. Name of Operator **Richardson Operating Company**3. Address **3100 La Plata Highway, Farmington, NM 87401**3a. Phone No. (include area code)
505-564-3100

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

At surface **2110 FNL, 1850 FEL, Sec. 25, T29N, R14W**

At top prod. interval reported below

At total depth **Same as above**14. Date Spudded
07/27/196115. Date T.D. Reached
08/24/196116. Date Completed **09/21/2004**
☐ D & A ☒ Ready to Prod.17. Elevations (DF, RKB, RT, GL)*
5637' KB18. Total Depth: MD **5416'**
TVD19. Plug Back T.D.: MD **1361'**
TVD20. Depth Bridge Plug Set: MD **4050' (Cmt Ret)**
TVD

21. Type Electric & Other Mechanical Logs Run (Submit copy of each)

Cased Hole CNL22. Was well cored? ☒ No ☐ Yes (Submit analysis)Was DST run? ☒ No ☐ Yes (Submit report)Directional Survey? ☒ No ☐ Yes (Submit copy)

23. Casing and Liner Record (Report all strings set in well)

| Hole Size | Size/Grade | Wt. (#/ft.) | Top (MD) | Bottom (MD) | Stage Cementer Depth | No. of Sks. & Type of Cement | Slurry Vol. (BBL) | Cement Top* | Amount Pulled |
|-----------|------------|-------------|----------|-------------|----------------------|------------------------------|-------------------|-------------|---------------|
| 12-1/4" | 8 5/8" K | 24# | Surface | 229" | | 220sx Class B | 46 bbls | Surface | Circ. 4 bbls |
| 6-3/4" | 4.5" J-55 | 9.5# | Surface | 5416' | | 125sx 50/50 p | 26bbls | 3979' | N/A |
| | | | | | | | | | |
| | | | | | | | | | |
| | | | | | | | | | |
| | | | | | | | | | |

24. Tubing Record

| Size | Depth Set (MD) | Packer Depth (MD) | Size | Depth Set (MD) | Packer Depth (MD) | Size | Depth Set (MD) | Packer Depth (MD) |
|--------|----------------|-------------------|------|----------------|-------------------|------|----------------|-------------------|
| 2 3/8" | 1235' | | | | | | | |

25. Producing Intervals

| Formation | Top | Bottom | Perforation Interval | Size | No. Holes | Perf. Status |
|-----------------------------------|--------------|--------------|----------------------|--------------|-----------------|--------------|
| A) W. Kutz Pictured Cliffs | 1242' | 1446' | 1242-1250' | 0.34" | 42 holes | Open |
| B) | | | | | | |
| C) | | | | | | |
| D) | | | | | | |

27. Acid, Fracture, Treatment, Cement Squeeze, etc.

| Depth Interval | Amount and Type of Material |
|-------------------|---|
| 1242-1250' | Pump 500 gals 15% HCL, pumped 5502 gals aquasafe X20 as pad, pump 4661 gals 1#/gal, pumped 3820 gals, 2#/gal, pump 2984' gal, 3#/gal, pump 1346 gals, 4#/gal, pump 2952 gals, 4#/gal with activator. |
| | Pump 403 gals as flush. |

28. Production - Interval A

| Date First Produced | Test Date | Hours Tested | Test Production | Oil BBL | Gas MCF | Water BBL | Oil Gravity Corr. API | Gas Gravity | Production Method |
|---------------------|----------------------|--------------|-----------------|---------|---------|-----------|-----------------------|-------------|---------------------------|
| | | | → | | | | | | Sundry of tests to follow |
| Choke Size | Tbg. Press. Flwg. SI | Csg. Press. | 24 Hr. Rate | Oil BBL | Gas MCF | Water BBL | Gas/Oil Ratio | Well Status | |
| | | | → | | | | | SI:WOPL | |

28a. Production - Interval B

| Date First Produced | Test Date | Hours Tested | Test Production | Oil BBL | Gas MCF | Water BBL | Oil Gravity Corr. API | Gas Gravity | Production Method |
|---------------------|----------------------|--------------|-----------------|---------|---------|-----------|-----------------------|-------------|-------------------|
| | | | → | | | | | | |
| Choke Size | Tbg. Press. Flwg. SI | Csg. Press. | 24 Hr. Rate | Oil BBL | Gas MCF | Water BBL | Gas/Oil Ratio | Well Status | |
| | | | → | | | | | | |

*(See instructions and spaces for additional data on page 2)

ACCEPTED FOR RECORD

SEP 24 2004

FARMINGTON FIELD OFFICE
BY Jim NMOC

28b. Production - Interval C

| Date First Produced | Test Date | Hours Tested | Test Production → | Oil BBL | Gas MCF | Water BBL | Oil Gravity Corr. API | Gas Gravity | Production Method |
|---------------------|----------------------------|--------------|----------------------|---------|---------|-----------|--------------------------|-------------|-------------------|
| Choke Size | Tbg. Press. Flwg. SI | Csg. Press. | 24 Hr. Rate → | Oil BBL | Gas MCF | Water BBL | Gas/Oil Ratio | Well Status | |

28c. Production - Interval D

| Date First Produced | Test Date | Hours Tested | Test Production → | Oil BBL | Gas MCF | Water BBL | Oil Gravity Corr. API | Gas Gravity | Production Method |
|---------------------|----------------------------|--------------|----------------------|---------|---------|-----------|--------------------------|-------------|-------------------|
| Choke Size | Tbg. Press. Flwg. SI | Csg. Press. | 24 Hr. Rate → | Oil BBL | Gas MCF | Water BBL | Gas/Oil Ratio | Well Status | |

29. Disposition of Gas (Sold, used for fuel, vented, etc.)

30. Summary of Porous Zones (Include Aquifers):

Show all important zones of porosity and contents thereof: Cored intervals and all drill-stem tests, including depth interval tested, cushion used, time tool open, flowing and shut-in pressures and recoveries.

31. Formation (Log) Markers

| Formation | Top | Bottom | Descriptions, Contents, etc. | Name | Top Meas. Depth |
|--|-----------------------|----------------|------------------------------|------|--------------------|
| Ojo Alamo Fruitland Coal Pictured Cliffs | surf 1180' 1242 | 1220' 1446' | | | |

32. Additional remarks (include plugging procedure):

SENT TO FARMINGTON OFFICE FOR SUBMITTAL ON THIS DATE

33. Indicate which items have been attached by placing a check in the appropriate boxes:

- ☐ Electrical/Mechanical Logs (1 full set req'd.) ☐ Geologic Report ☐ DST Report ☐ Directional Survey
☒ Sundry Notice for plugging and cement verification ☐ Core Analysis ☐ Other:

34. I hereby certify that the foregoing and attached information is complete and correct as determined from all available records (see attached instructions)*

Name (please print) Tom BerginTitle Operations ManagerSignature Date 09/21/2004

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.

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENTFORM APPROVED
OMB No. 1004-0137
Expires: March 31, 2007

SUNDRY NOTICES AND REPORTS ON WELLS

Do not use this form for proposals to drill or to re-enter an abandoned well. Use Form 3160-3 (APD) for such proposals.

SUBMIT IN TRIPLICATE- Other instructions on reverse side.

| | | |
|--|---|--|
| 1. Type of Well <input checked="" type="checkbox"/> Oil Well <input type="checkbox"/> Gas Well <input type="checkbox"/> Other | | 5. Lease Serial No. NMSF-14-20-603-2172 |
| 2. Name of Operator Richardson Operating Company | | 6. If Indian, Allottee or Tribe Name Navajo |
| 3a. Address 3100 La Plata Highway, Farmington, NM, 87401 | 3b. Phone No. (include area code) 505-564-3100 | 7. If Unit or CA/Agreement, Name and/or No. NW Cha Cha Unit |
| 4. Location of Well (Footage, Sec., T., R., M., or Survey Description) Sec 25, T29N-R14W, 2110' FNL 1850' FEL | | 8. Well Name and No. NW Cha Cha # 43 |
| | | 9. API Well No. 30-045-07864 |
| | | 10. Field and Pool, or Exploratory Area Cha Cha Gallup |
| | | 11. County or Parish, State San Juan County, New Mexico |

12. CHECK APPROPRIATE BOX(ES) TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

| TYPE OF SUBMISSION | TYPE OF ACTION | | | |
|--|---|---|--|---|
| <input checked="" type="checkbox"/> Notice of Intent | <input type="checkbox"/> Acidize | <input type="checkbox"/> Deepen | <input type="checkbox"/> Production (Start/Resume) | <input type="checkbox"/> Water Shut-Off |
| <input type="checkbox"/> Subsequent Report | <input type="checkbox"/> Alter Casing | <input type="checkbox"/> Fracture Treat | <input type="checkbox"/> Reclamation | <input type="checkbox"/> Well Integrity |
| <input type="checkbox"/> Final Abandonment Notice | <input type="checkbox"/> Casing Repair | <input type="checkbox"/> New Construction | <input checked="" type="checkbox"/> Recomplete | <input type="checkbox"/> Other _____ |
| | <input type="checkbox"/> Change Plans | <input type="checkbox"/> Plug and Abandon | <input type="checkbox"/> Temporarily Abandon | |
| | <input type="checkbox"/> Convert to Injection | <input type="checkbox"/> Plug Back | <input type="checkbox"/> Water Disposal | |

13. Describe Proposed or Completed Operation (clearly state all pertinent details, including estimated starting date of any proposed work and approximate duration thereof. If the proposal is to deepen directionally or recomplete horizontally, give subsurface locations and measured and true vertical depths of all pertinent markers and zones. Attach the Bond under which the work will be performed or provide the Bond No. on file with BLM/BIA. Required subsequent reports shall be filed within 30 days following completion of the involved operations. If the operation results in a multiple completion or recompletion in a new interval, a Form 3160-4 shall be filed once testing has been completed. Final Abandonment Notices shall be filed only after all requirements, including reclamation, have been completed, and the operator has determined that the site is ready for final inspection.)

This well was plugged back to the Pictured Cliffs in December 2000. All pertinent information, including Cement Bond logs and pressure data were submitted at that time.

Richardson Operating Company plans to recomplete this well in the Pictured Cliffs and Fruitland Coal formations.

Approval has been received from the Navajo Nation for ROWs and pipeline installations. However, this is an area of Raptor concerns and work cannot progress until after July 31, 2004.

Recompletion and pipeline work is expected to commence in August, 2004.

Work to be completed by 10/01/2004.

14. I hereby certify that the foregoing is true and correct
Name (Printed/Typed)

Charles H. Williams

Title Engineering Operations Manager

Signature

Charles H. Williams

Date

04/30/2004

THIS SPACE FOR FEDERAL OR STATE OFFICE USE

Approved by

[Signature]

Title

PE

Date

MAY 07 2004

Conditions of approval, if any, are attached. Approval of this notice 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.

Office

F/F

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.

(Instructions on page 2)

OPERATOR