Form 3160-5 (August 1999)

UNITED STATES DEPARTMENT OF THE INTERIOR

BUREAU OF LAND MANAGEMENT

FORM APPROVED OMB NO. 1004-0135 Expires: November 30, 2000

5. Lease Serial No.

| Tr | act | 251 | | Lee | #_ | 0015 | 4 |
|----|--------|-------|------|-------|----|-------|------|
| 6. | If Inc | lian, | Allo | ottee | or | Tribe | Name |

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.

| | | | Jicarilla Apache |
|--|--|--|---|
| SUBMIT IN TRIPLICA | 7. If Unit or CA/Agreement, Name and/or No | | |
| Oil Well Gas Well Other Name of Operator | | 8. Well Name and No. Jicarilla Apache # 20 | |
| Marathon Oil Company | | | 9. API Well No. |
| a. Address | | 3b. Phone No. (include area code) | 30-039-21819 |
| P.O. Box 552 Midland, TX 7970 | 2 | 915-687-8357 | 10. Field and Pool, or Exploratory Area |
| . Location of Well (Footage, Sec., T., R., M., or Su | rvey Description) | | Pictured Cliffs |
| Sec. 27, T-26-N,R-5-W, 850' FSL Rio Arriba, N.M. | 11. County or Parish, State | | |
| NO ALLM, N.M. | | | Rio Arriba N.M. |
| 12. CHECK APPROPRI | ATE BOX(ES) TO IN | DICATE NATURE OF NOTICE, P | EPORT, OR OTHER DATA |
| TYPE OF SUBMISSION | | TYPE OF ACTI | ON |
| X Notice of Intent | Acidize | | action (Start/Resume) Water Shut-Off |
| Subsequent Report | Alter Casing | Fracture Treat Recla | mation Well Integrity |
| Subsequent Report | Casing Repair | New Construction Reco | mplete Other |
| Final Abandonment Notice | Change Plans | Plug and Abandon Temp | porarily Abandon |
| | Convert to Inject | ion Plug Back Wate | r Disposal |
| Perforate the Pictured Cliffs the Pictured Cliffs perfs. F | prefs @ 3067' to : Pick up 2-3/8" produ | 3132'. Break down w/ acid a uction tubing and land @ 310 | and foam fracture 00'. Put well |
| back on production. | | | 5.5 |
| Please see attached workover | procedure for detai | ils. | · • • • • • • • • • • • • • • • • • • • |
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| No. 1 | | 20 m 11 5 2 7 | y. |
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| I hereby certify that the foregoing is true and on Name (Printed/Typed) | orrect | Title | |
| Jerry Fletcher | | Engineer Tech. | |
| Jung Hitcher | | Date 7/11/01 | |
| | | DERAL OR STATE OFFICE USE | |
| Approved by /s/ Patricia | M. Hoster | Title Lands and Mineral | Date JUL 2 6 2001 |
| Conditions of approval, if any, are attached. Approval, if any, are attached. Approval, that the applicant holds legal or equitable which would entitle the applicant to conduct operations. | title to those rights in the su | warrant or Office | HOSOUFOES - |

Title 18 U.S.C. Section 1001, and Title 43 U.S.C. Section 1212, makes 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.

WORKOVER PROCEDURE

Jicarilla Apache #20

850' FSL & 850' FWL, Sec 27, T-26-N, R-5-W Rio Arriba County, New Mexico

Date: July 10, 2001

Purpose: Recomplete in Pictured Cliffs

<u>AFE #</u>: 5???00 <u>AFE Amount</u>: \$1??,??0 <u>AFE Days</u>: 10

<u>GWI:</u> 100% <u>NRI</u>: 87.5%

<u>KB</u>: 6686' <u>GL</u>: 6674' <u>TD:</u> 4100' <u>PBTD</u>: 2940' CIBP

Surface Csg: 8-5/8" 24# K-55 @ 239' Cmt'd w/ 200 sks (Circulated)

Production Csg: 4-1/2" 10.5# K-55 8rd @ 4100' Cmt'd w/ 750 sks (Circulated)

[Drift = 3.927" 80% Burst = 3832 psi]

Tubing: None

Perforations: Fruitland Coal: 3010-14', 3025-38', & 3042-52' (108 holes)

Pictured Cliffs: 3074-81' & 3104-24' (29 holes) [Squeezed w/ 150 sks - 7/94]

Chacra: 3957-65' (9 holes) [Squeezed w/ 100 sks - 7/94]

Anticipated BHP: ±500 psi in the Pictured Cliffs

Comments: 1) Use 2% KCl (no substitutes) in all workover fluids.

2) Use 2-7/8" N-80 tubing as a work string.

PROCEDURE

- 1. Inspect location and improve if necessary. Install and test safety anchors to 22,500# as necessary.
- 2. MIRU PU. Kill well as necessary. ND wellhead. NU 7-1/16" BOP with 2-7/8" rams as per Mid-Continent Region's "Workover and Completion Guidelines". Pressure test blind rams & casing to 1000 psi. RIH with 3-7/8" bit and scraper on 2-7/8" workstring to ±2900'. Test pipe rams to 1000 psi.
- 3. Drill out CIBP @ 2940'. FIH to cement retainer @ 3062'. POOH with bit.
- 4. RIH with 4-1/2" cement retainer on 2-7/8" tbg and set @ ±2950'. Establish injection rate into Fruitland Coal perfs 3010-52' and squeeze as per recommendation. POOH.
- 5. RIH with 3-7/8" bit and collars and drill out retainer and cement to ±3060'. Pressure test squeezed perfs to 1000 psi. Drill up cement retainer @ 3062' and cement to ±3360'. POOH with bit and collars.
- 6. RU electric line company. NU and test lubricator to 500 psi. RIH with 3-1/8" casing guns loaded 2 SPF @ 120 degree phasing with premium charges and perforate the Pictured Cliffs intervals 3067-79', & 3104-24' (32' 64 shots). Use Dresser Atlas GR-CBL dated 8/17/78 for correlation. POOH & RD EL.
- 7. RIH with 4-1/2" treating packer on 2-7/8" tubing. Hydro-test tubing below slips to 7000 psi. Set packer @ ±3060'. Test casing x tubing annulus to 500 psi.
- 8. RU flowback line to frac tank. RU stimulation company. Hold safety meeting. Test lines to 7000 psi. Place 500 psi on annulus and monitor while treating well. Break down perfs with 1500 gals 15% HCl acid using 96 ball sealers spaced evenly for diversion. Unset packer and RIH through perfs to knock off any remaining ball sealers. PUH and reset packer @ ±3000'. Foam fracture stimulate the Pictured Cliffs as per recommendation using 85,000# of 20/40 sand @ 30 BPM with a maximum treating pressure of 6000 psi. Flow back well immediately between 1 and 2 BPM. RD stimulation company.
- 9. Kill well as necessary. POOH with packer LD 2-7/8" workstring.
- 10. PU 2-3/8" production tubing and RIH with notched collar, mud joint and seating nipple. Tag TD and clean out as necessary. Land EOT @ ±3100'. ND BOP. Jet or swab well in as necessary. RDMO PU. Turn well over to production.

XC: M. D. Bidwell K. C. Holt R. Skinner R. G. Fletcher W. S. Landon B. Teller

P. M. Hedderman R. J. Longmire Well File