Form 3160-5 (February 2005)

UNITED STATES DEPARTMENT OF THE INTERIOR BUREAU OF LAND MANAGEMENT

OCD-ARTESIA

FORM APPROVED OM B No. 1004-0137 Expires: March 31, 2007

BUREAU OF LAND MANAGEMENT			5. Lease Serial No.				
SUNDRY NOTICES AND REPORTS ON WELLS Do not use this form for proposals to drill or to re-enter an			NMNM 17224 6. If Indian, Allottee or Tribe Name				
Do not use abandoned	o. I mulan, Anoute of 1 not Name						
SUBMIT IN TRIPLICATE- Other instructions on reverse side.			7. If Unit or CA/Agreement, Name and/or No.				
Type of Well Gas Well Other			8. Well Name and No. OUEEN LAKE 19 FEDERAL 1				
2. Name of Operator CHESAPEAKE OPERATING, INC ATTN: LINDA GOOD			9. API Well No.				
3a Address P.O. BOX 18496, OKLAHOMA CITY, OK 73154-0496 3b. Phone No. (include area code) 405-767-4275			30-015-24292 10. Field and Pool, or Exploratory Area				
4. Location of Well (Footage, Se	PIERCE CROSSING						
1950 FNL 1980 FEL, SEC 19-24S-29E MAY 2 5 2			11. County or Parish, State				
		JUNE 1801A	EDDY COUNTY, NM				
12. CHECK APPROPRIATE BOX(ES) TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA							
TYPE OF SUBMISSION		TYPE OF ACTION					
✓ Notice of Intent	Acidize Deepen Alter Casing Fracture To	reat Production (Sta	nt/Resume) Water Shut-Off Well Integrity				
Subsequent Report	Casing Repair New Cons		Other				
Final Abandonment Notice	Change Plans ☐ Plug and A Convert to Injection ☐ Plug Back	_	andon				
Attach the Bond under whi following completion of the testing has been completed determined that the site is range. Chesapeake, respectfu BLM Nationwide Bon (CHK PN 891238)	lly, request permission to perforate, acidize and	o. on file with BLM/BIA. Require tiple completion or recompletion in all requirements, including reclam	ed subsequent reports must be filed within 30 days in a new interval, a Form 3160-4 must be filed once ation, have been completed, and the operator has				
14. I hereby certify that the Name (Printed/Typed LINDA GOO)	Title PERMITTING AGEN	NT				
Signature 2	0 4.0		5/17/2006				
Signature Since	THIS SPACE FOR FEDERAL	Date					
THIS SPACE FOR FEDERAL OR STATE OFFICE USE							
Approved by 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 leant to conduct operations thereon.						

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.

Queen Lake 19 Federal 1 Plug Back to Cherry Canyon Eddy County, New Mexico

May 17, 2006

GENERAL INFORMATION

Location: 1950' FNL & 1980' FEL, Sec 19 - T24S - R29E

API No.: 30-015-24292

WELL INFORMATION

String OD	Weight & Grade	Depth	ID	Drift_	Burst	<u>TOC</u>
13-3/8"	48# H40 STC	0' - 530'	12.715"	12.559"	1730	
9-5/8"	47/40# P110 LTC	0' - 2630'	8.681"	8.525"	3950	1000'
7"	23# S95 LTC	0' - 11190'	6.366"	6.241"	7530	6480'

Perforations: 7520 – 7636' (OA), 6503 – 13'

TD/PBTD: 13500'/7965'

Recommended Perforations

Cherry Canyon 4921 – 35'

Re-Completion Procedure

- 1. MIRU Service Rig and requisite equipment. NU BOP. POOH with pump, rods, and tubing.
- 2. MIRU Wireline Service Co. Run a gauge ring in and out to 6460'. Run strip log and correlate to attached OH log. Set a CIBP at 6460'. Bail 1 sx of cement on plug. Load hole with brine and test to 1000#. Shoot two squeeze holes at 6400'. Set a cement retainer at 6375'. RDMO Wireline Service Co.
- 3. RIH pressure testing 2-7/8" 6.5# N80 tubing. Sting into retainer. Pressure annulus to 1000#. Break/establish circulation up 7" X 9-5/8" annulus with brine water. Pump 15 bbl of mud sweep and cement with 200 sacks of Class C cement plus additives per squeeze recommendation. Sting out of retainer, reverse clean, and POOH with tubing.
- 4. Run temperature log to establish TOC. WOC overnight.
- 5. RU lubricator and RIH w/ 3-3/8" HSD casing gun. Perforate the Cherry Canyon w/ 2 SPF, 120 degree phasing, 23 gram charge, .37" holes from 4921 35' (29 holes).
- 6. RIH w/ 7" treating packer and SN on 2-7/8" tubing. Space out with the EOT at 4935'.
- 7. RU Acid Service Company. Spot 200 gal of 7-1/2% HCL Acid containing 4 gpt of iron control, 1 gpt each of corrosion inhibitor, surface tension reducer, and non-emulsifier. Pull packer to ~ 4870'. Reverse circulate excess acid into tubing, set packer. Pressure test annulus to 1000#.
- 8. ND BOP. NU tree. Pressure annulus to 1000 psi. Displace spot acid, establish rate of 3 to 4 BPM w/ 2% KCL. (Keep KCL water usage to a minimum). Acidize w/ 1,300 gal of same acid. Displace w/ 2%

- KCL. Do not over-displace. Pump at 3 to 4 BPM max. Launch 40 ball sealers during job. Note rates and pressures. Note ISIP. Max pressure 4000#.
- 9. Flow/swab back job. Swab test zone.
- 10. Prep to frac. Kill well with 2% KCL if required. NU frac valve. MIRU Frac Service Company. Pressure annulus to 1000#. Tie on to tubing and establish rate w/ 10,000 pad of 30# XL gel pad containing additives per frac schedule. Frac per frac schedule ramping 16/30 Ottawa from a ¼ lb/gal scour to 6 #/gal of resin coat at tail of job in a 30# XL gel. Total sand 40000 lb of 16/30, 10000 lb of 16/30 resin coat. Obtain rates approaching 12 15 BPM, max pr 4000#. Cut resin activator in last tub of sand. Displace to top perf with slickwater. Anticipated treating pressure ~2500#.
- 11. Obtain 5, 10, and 15 min SI data. RDMO Frac Service Company. Wait on frac overnight.
- 12. Flow back job. Swab to clean up and test.
- 13. ND tree, NU BOP. POOH with tubing and packer.
- 14. RIH w/ MA, PS, SN, TAC (at ~ 4600') and 2-7/8" tubing. Space out and land SN ~4950'. Swab to clean up.
- 15. RIH w/ 1-1/2" pump and a high strength tapered rod string. Run pump, 350' of 1-1/2" sinker bars, 95 3/4", and 88 17/8". Space out/seat pump. Load and test. PWOP.