Form 3160-5 (June 2015)

#### **UNITED STATES** DEPARTMENT OF THE INTERIOR BUREAU OF LAND MANAGEMENT

Hobbs

FORM APPROVED OMB NO. 1004-0137 Expires: January 31, 2018

Lease Serial No.

NMI	VM1283	66	

13160-5 2015)	SOCD	UNITED STATES DEPARTMENT OF THE INTERIOR BUREAU OF LAND MANAGEMENT	N
DEC	Do not use abandoned	Y NOTICES AND REPORTS ON WELL: this form for proposals to drill or to re-ent yell. Use form 3160-3 (APD) for such propo	S er an osals.

abandoned well. Use form 3160-3 (API	6. If Indian, Allottee or Tribe Name		
REC SUBMIT IN TRIPLICATE - Other inst	7. If Unit or CA/Agreement, Name and/or No.		
Type of Well	8. Well Name and No.		
☑ Oil Well ☐ Gas Well ☐ Other	LEA UNIT 48H ✓		
<ol> <li>Name of Operator</li></ol>	9. API Well No. 30-025 43136 43146		
3a. Address	3b. Phone No. (include area code)	10. Field and Pool or Exploratory Area	
PO BOX 10848 MIDLAND, TX 79702	Ph: 432-689-5200	LEA; BONE SPRING	
4. Location of Well (Footage, Sec., T., R., M., or Survey Description,	)	11. County or Parish, State	
Sec 1 T20S R34E SESW 630FSL 2180FWL 🗸	ri e	LEA COUNTY, NM	

12. C	CHECK THE A	APPROPRIATE BOX	(ES) TO	O INDICATE N	NATURE OF	NOTICE,	REPORT,	OR	OTHER DA	ATA
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TYPE OF SUBMISSION	TYPE OF ACTION				
☑ Notice of Intent ☐ Subsequent Report	☐ Acidize ☐ Alter Casing ☐ Casing Repair	☐ Deepen ☐ Hydraulic Fracturing ☐ New Construction	☐ Production (Start/Resume) ☐ Reclamation ☐ Recomplete	☐ Water Shut-Off ☐ Well Integrity ☑ Other	
☐ Final Abandonment Notice	Change Plans Convert to Injection	Plug and Abandon Plug Back	☐ Temporarily Abandon ☐ Water Disposal	Z Other	

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 must 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 must be filed once testing has been completed. Final Abandonment Notices must be filed only after all requirements, including reclamation, have been completed and the operator has determined that the site is ready for final inspection.

Legacy Reserves Operating respectfully request approval to add an additional option for the intermediate casing cement procedures. This option would allow for a three-stage cement job utilizing two DV tools. Both DV tools shall be set a minimum of 50 feet below the previous casing shoe and a minimum of 200 feet above the current shoe and adjust cement proportionately based on placement. Please see the following update to the cementing details for a three-stage cement job.

14. I hereby certify that the foregoing is true and correct Electronic Submission #350540 verified by the BLM Well Information System
For LEGACY RESERVES OPERATING LP, sent to the Hobbs
Committed to AFMSS for processing by DEBORAH MCKINNEY on 09/15/2016 () Name (Printed/Typed) MATT DICKSON DRILLING ENGINEER

Signature (Electronic Submission) Date 09/09/2016

THIS SPACE FOR FEDERAL OR STATE OFFICE USE

Title

Office

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 lease which would entitle the applicant to conduct operations thereon.

BUREAU OF LAND WA

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-SUBMITTED \*\* OPERATOR-SUBMITTED \*\* OPERATOR-SUBMITTED \*\*

#### Lea Unit #48H

# Intermediate Casing

In the event that circulation is lost (> 50%) while drilling the 12-1/4" intermediate hole in the Capitan Reef at +/-4000', we will plan to install a DV tool and external casing packer within 200' of the top depth where lost circulation occurred and will pump a two-stage cement job with the potential to add an additional DV tool for a three-stage cement job. If there is no lost circulation a single stage cementing procedure will be followed. Legacy plans to cement to surface regardless of whether a single stage, 2-stage or 3-stage procedure is implemented.

No DV tool (80% excess on lead & 80% excess on tail to design for cement top at surface)

<u>Lead:</u> 1400 sx (35:65) poz (fly ash) class C cement+ 4% bwoc bentonite II + 5% bwoc MPA-5 + 0.25% bwoc FL- 52 + 5 lbs/sack LCM-1 + 0.125 lbs/sk cello flake+ 0.005 lbs/sk defoamer + 0.005 gps FP-6L + 1.2% bwoc Sodium Metasilicate + 5% bwow Sodium Chloride (12.5 ppg, 2.13 cfps, 8.81 gps wtr)

Tail: 200 sx class C cement (14.80 ppg, 1.33 cfps, 6.35 gps wtr)

With (1) DV Tool (100% excess on lead & 100% excess on tail to design for cement top at surface)

Assuming DV tool set at 3950' but if the setting depth changes, cement volumes will be adjusted proportionately.

## Stage 1

<u>Lead:</u> 400 sx (35:65) paz (fly ash) class C cement+ 4% bwoc Bentonite II+ 5% bwoc MPA-5 + 0,25% bwoc FL-52 + 5 lbs/sack LCM-1 + 0.125 lbs/sk cello flake+ 0.005 lbs/sk defoamer + 0.005 gps FP-6L + 1.2% bwoc Sodium Metasilicate + 5% bwow Sodium Chloride (12.5 ppg, 2.13 cfps, 8.81 gps wtr)

<u>Tail:</u> 200 sx class C cement (14.80 ppg, 1.33 cfps, 6.35 gps wtr)

### Stage 2

<u>Lead</u>: 1100 sx (35:65) paz (fly ash) class C cement+ 4% bwoc bentonite II + 5% bwoc MPA-5 + 0,25% bwoc FL-52 + 5 lbs/sack LCM-1 + 0.125 lbs/sk Cello Flake+ 0.005 lbs/sk Static Free+ 0.005 gps FP-6L + 1.2% bwoc Sodium Metasilicate + 5% bwow Sodium Chloride (12.5 ppg, 2.13 cfps, 8.81 gps wtr)

Tail: 200 sx class C cement (14.80 ppg, 1.33 cfps, 6.35 gps wtr)

With (2) DV Tools (100% excess on lead & 100% excess on tail to design for cement top at surface)

Assuming one DV tool set at 3950' and one DV tool set at 1800' but if the setting depths change, cement volumes will be adjusted proportionately.

#### Stage 1

<u>Lead:</u> 400 sx (35:65) paz (fly ash) class C cement+ 4% bwoc Bentonite II+ 5% bwoc MPA-5 + 0,25% bwoc FL-52 + 5 lbs/sack LCM-1 + 0.125 lbs/sk cello flake+ 0.005 lbs/sk defoamer + 0.005 gps FP-6L + 1.2% bwoc Sodium Metasilicate + 5% bwow Sodium Chloride (12.5 ppg, 2.13 cfps, 8.81 gps wtr)

Tail: 200 sx class C cement (14.80 ppg, 1.33 cfps, 6.35 gps wtr)

# Stage 2

<u>Lead</u>: 600 sx (35:65) paz (fly ash) class C cement+ 4% bwoc bentonite II + 5% bwoc MPA-5 + 0,25% bwoc FL-52 + 5 lbs/sack LCM-1 + 0.125 lbs/sk Cello Flake+ 0.005 lbs/sk Static Free+ 0.005 gps FP-6L + 1.2% bwoc Sodium Metasilicate + 5% bwow Sodium Chloride (12.5 ppg, 2.13 cfps, 8.81 gps wtr)

Tail: 200 sx class C cement (14.80 ppg, 1.33 cfps, 6.35 gps wtr)

### Stage 3

<u>Lead</u>: 600 sx (35:65) paz (fly ash) class C cement+ 4% bwoc bentonite II + 5% bwoc MPA-5 + 0,25% bwoc FL-52 + 5 lbs/sack LCM-1 + 0.125 lbs/sk Cello Flake+ 0.005 lbs/sk Static Free+ 0.005 gps FP-6L + 1.2% bwoc Sodium Metasilicate + 5% bwow Sodium Chloride (12.5 ppg, 2.13 cfps, 8.81 gps wtr)

Tail: 200 sx class C cement (14.80 ppg, 1.33 cfps, 6.35 gps wtr)

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