Form 3160-5 (March 2012)

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

**SUNDRY NOTICES AND REPORTS ON WELLS** 

Do not use this form for proposals to drill or to re-enter an

**OCD** Hobbs

HORS ACPPROVED OMB No. 1004-0137

Expires: October 31, 2014

5. Lease Serial No. P 1 5 2013 NMNM016795

6. If Indian, Allottee or Tribe Name

RECEIVED

| abandoned well.  | USE FORM 316U-3 (A  | PD) for such propos   | ais.   |  |  |              |
|--|---|---|--|--|--|--------------|
| SUBMIT IN TRIPLICATE - Other instructions on page 2.   |   |   |  | 7. If Unit of CA/Agreement, Name and/or No.  |  |              |
| 1. Type of Well  ☑ Oil Well ☐ Gas W  |   | 8   | . Well Name and No. (  | Pearsall Que   | NSWN   |              |
| 2. Name of Operator LEGACY RESERVES OPERATING LP   |   |   |  | P. API Well No.<br>30-025-00851  | # Florence   | <del>U</del> |
| 3a. Address 3b. Phone N  |   | 3b. Phone No. (include area 432-689-5200  | code) 1  | 10. Field and Pool or Exploratory Area PEARSALL; SEVEN RIVERS                                  |  |              |
| 4. Location of Well (Footage, Sec., T., 1670' FNL & 2310' FWL, UNIT LETTER F, S  |   | 1   | 11. County or Parish, State LEA CO., NM  |  |  |              |
| 12. CHEC   | K THE APPROPRIATE BO  | X(ES) TO INDICATE NATU  | JRE OF NOTICE  | E, REPORT OR OTHE  | ER DATA  |              |
|  |   |   | TYPE OF ACTIO  | <u> </u>   |  |              |
| Notice of Intent   | Acidize Alter Casing Casing Repair  | Deepen Fracture Treat New Construction  | ☐ Produc☐ Reclam☐ Recom  |  | Water Shut-Off  Well Integrity  ✓ Other RECOMPLETE IN  |              |
| Subsequent Report  Final Abandonment Notice  | Change Plans Convert to Injection   | Plug and Abandon Plug Back  | Tempo  | rarily Abandon<br>Disposal   | SEVEN RIVERS   |              |
| THIS WELL IS CURRENTLY NA QUEEN SAND UNIT OWNERS WELL IN THE SEVEN RIVERS TO #4. IF THE RECOMPLETIO AMENDMENT IN THE PLAN OF ATTACHED IS THE PROPOSE SUBJECT TO LIKE APPROVAL BY ST. | AMED THE PEARSALL QUETO PLUG AND ABANDOIS FROM 3012' - 3620'. THE NIS SUCCESSFUL A NEED WORKOVER PROCED A WHO A WHOLE | UEEN SAND UNIT #11. AI N THE UNECONOMIC QUELEASE NAME WILL CHA EW PRODUCTION FACILIT E PEARSALL QUEEN SAN URE.  TO Charge | PPROVAL HAS<br>EEN PRODUCI<br><del>NGE TO LEGA</del><br>Y WILL BE INS<br>ID UNIT REFLE | BEEN OBTAINED ING INTERVAL AND CY. THE WELL NU STALLED AT THE WELTING THIS CHANT WAS SEE ATTAI | FROM ALL PEARSALL<br>D RECOMPLETE THE<br>JMBER WILL CHANGE<br>VELL LOCATION. AN<br>NGE WILL BE SUBMITT | ED.          |
| BLAIN LEWIS  |   |   | Title SENIOR ENGINEER  |  |  |              |
| Signature Rain Reuis   |   |   | /2013  |  | PROVED   |              |
|  | ✓ THIS SPACE  | FOR FEDERAL OR S  | STATE OFFI   | 1 1 //   | 0097   |              |
| Approved by  |   | Title   |  | SEP  | mater 1 Du   |              |
| Conditions of approval, if any, are attached that the applicant holds legal or equitable t   |   | not warrant or certify  |  | BUREAU OF  | LAM MANAGEMENT   | 1            |

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212 make it a sime for any porson 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 quickliction.

entitle the applicant to conduct operations thereon

#### PROCEDURE TO RECOMPLETE IN SEVEN RIVERS

# Pearsall Queen Sand Unit #11 (name will change to Legacy #1) Pearsall, Seven Rivers Field Lea County, New Mexico

Well Data:

KB 9' AGL

5-1/2", 14#, J-55 casing at 3720' with 100 sx, TOC at 2700' (calc.)

Grayburg (Queen) perfs: 3690'-3710' (total of 80 holes)

Un-perf'd Seven Rivers pay: 3012'-3620'

2-3/8" J-55, un-anchored tubing at 3725' with 3/4" rod string and 1.5" pump

Volumes:

5-1/2" csg x 3-1/2" tbg annulus = 0.0125 bbls/ft

5-1/2" csg = 0.0244 bbls/ft 3-1/2" tbg = 0.0087 bbls/ft

- 1) **Day one:** MIRU pulling unit. POH and visually inspect rods and pump (\$12,000 is in AFE to replace rods if necessary). NU BOP. POH with tubing. Unload 3700' of 3-1/2", 9.3#, N-80, EUE, 8R work string.
- 2) **Day two:** RIH with 4-3/4" bit, casing scraper and production tubing. RIH to bottom at +/- 3715'. POH and lay down casing scraper and bit.
- MIRU wireline unit. RIH with GR/CCL/CBL log tools, get on depth with Lane Wells GR/N log dated 3/19/56 and log from bottom to 2500'. Report cement top to Blain Lewis (perfs may be adjusted). POH with logging tools. RIH with CIBP and set on wireline at +/- 3685' (middle of first joint above shoe joint of 5-1/2" casing). RIH with 3-1/8" select-fire slick gun and perf Seven Rivers with 1 shot at each of the following depths: 3620', 3453', 3418', 3372', 3316', 3249', 3198', 3162', 3052' and 3012' (10 holes). POH with wireline. NOTE: If cement top is found to be above +/- 3200', perfs will be adjusted to shoot total of 10 holes below 3200'. RIH with bailer on wireline and dump 2 sx (20') cement on CIBP for PBTD 3665'. POH and RDMO wireline unit.
- 4) **Day three:** RIH with packer and 3-1/2" tubing to +/- 2900'. MIRU frac equipment as per attached recommendation with +/- 1,500 bbls 2% KCl water. Circulate hole with +/- 62 bbls 2% KCl water and set packer at +/- 2900'. Test casing annulus to 500 psig for 15 min. and monitor throughout stimulation. NU frac valve to 3-1/2" tubing and treat Seven Rivers perfs 3012'-3620' at 6-10 BPM and 5,000 psig maximum with spearhead of 2,000 gals (47.6 bbls) 15% NEFE HCl. Frac down 3-1/2" tubing at 15-20 BPM, 5000 psig maximum. Flush to top perf with 28 bbls linear gelled 2% KCl water. Report ISIP and 5-10-15 min. SIP's. RDMO frac equipment and leave well SI overnight.
- 5) Day four: Open and flow down to tank. Release packer and POH laying down work string and packer.
- 6) RIH with BPMA, perf sub, SN, TAC and remainder of production tubing (hydrotest tubing in hole) to set bottom of BPMA above perfs at +/- 3000', SN at +/- 2965' and TAC at +/- 2960'. ND BOP. NU wellhead.

#### Page 2 Procedure to Recomplete in Seven Rivers Pearsall Queen Sand Unit #11

- 7) **Day five:** RIH with 1.25" bore insert pump and rods, seat pump, space out and hang on pumping unit. Load and pressure test tubing. Put well on pump. RDMO pulling unit.
- 8) Optimize production rate by adjusting SPM or pump size as necessary.

#### **ESTIMATED COSTS:**

| Pulling unit – 5 days | \$ 25,000 |
|-----------------------|-----------|
| Stimulation services  | \$ 60,000 |
| Wireline services     | \$ 15,000 |
| Rental tools          | \$ 15,000 |
| Contract labor        | \$ 15,000 |
| Rod string            | \$ 12,000 |
| 3000' 2-3/8" tbg      | \$ 10,000 |
| Misc. equip           | \$ 7,000  |
| 5% contingencies      | \$ 6,500  |
| TOTAL                 | \$165,500 |

PREPARED BY: Blain Lewis Date: 06/05/13



#### Pearsall Queen Sand Unit #11

LOCATION: 1670' FNL & 2310' FWL, Sec 5, T18S, R32E **Current Wellbore Diagram** 

FIELD: Pearsall

COUNTY: Lea

STATE: New Mexico

GL: 3862'

SPUD DATE: 5/27/1957

5-1/2", 14#, J-55 csg set @ 3720' w/ 100 sx Class C

KB:

LATEST UPDATE: 06/07/2013

BY: BKL

API No: 30-025-00851

11" Hole 8-5/8", 32# csg set @ 663' w/ 75 sx Class C to surf. 7-7/8" Hole TOC behind 5-1/2" csg @ 2700' (calc.) Queen Perfs: 3690'-3710' (80 holes) - 5/57

PBTD: 3715'

TD: 3729'



#### Pearsall Queen Sand Unit #11 (aka Legacy #1)

LOCATION: 1670' FNL & 2310' FWL, Sec 5, T18S, R32E
Proposed Wellbore Diagram

FIELD: Pearsall

GL: 3862'

LATEST UPDATE: 06/07/2013

COUNTY: Lea

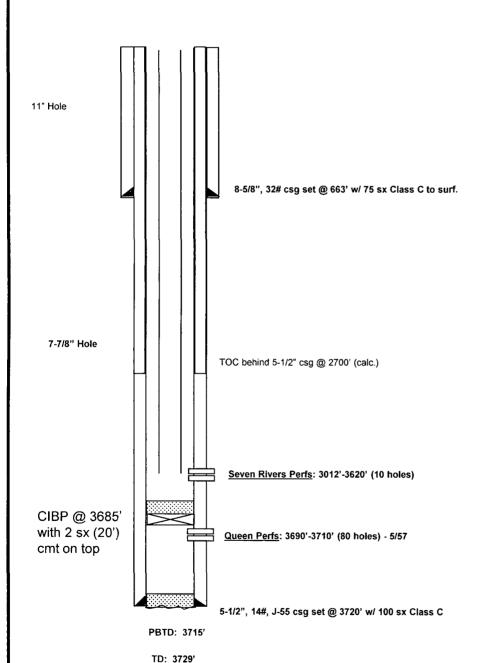
KB:

BY: BKL

STATE: New Mexico

SPUD DATE: 5/27/1957

API No: 30-025-00851



### **Conditions of Approval**

Legacy Reserves Operating LP Pearsall Queen Sand Unit 11 API 30-025-00851 September 10, 2013

Work to be completed by December 10, 2013.

- 1. Operator shall place a CIBP at 3680' and place 35' of bailed cement on top. Tag required.
- 2. Must conduct a casing integrity test before any perforating or fracturing can be done. Submit results to BLM. The CIT is to be performed on the production casing to max treating pressure.
- 3. Before casing or a liner is added or replaced, prior BLM approval of the design is required. Use notice of intent Form 3160-5.
- 4. Surface disturbance beyond the originally approved pad must have prior approval.
- 5. Closed loop system required.
- 6. All waste (i.e. drilling fluids, trash, salts, chemicals, sewage, gray water, etc.) created as a result of work over operations shall be safely contained and disposed of properly at a waste disposal facility. No waste material or fluid shall be disposed of on the well location or surrounding area. Porto-johns and trash containers will be on-location during fracturing operations or any other crew-intensive operations.
- 7. Operator to have H2S monitoring equipment on location.
- 8. A minimum of a 2000 (2M) BOP to be used. All blowout preventer (BOP) and related equipment (BOPE) shall comply with reasonable well control requirements. A two ram system with a blind ram and a pipe ram designed for the size of the work string shall be adequate. Tapered work strings will require an additional pipe ram. The manifold shall comply with Onshore Oil and Gas Order #2 Attachment I (2M Diagrams of Choke Manifold Equipment). The accumulator system shall have an immediately available power source to close the rams and retain 200 psi above pre-charge. The pre-charge test shall follow requirements in Onshore Order #2.
- 9. Operator shall submit a sundry after recompletion for a name change removing "unit" from the name.

- 10. Subsequent sundry required detailing work done, C-102 with new formation, and completion report for the new formation. Operator to include well bore schematic of current well condition when work is complete.
- 11. Operator shall update POD and address as to why this well is no longer needed as a unit well.

NOTE: Operator will no longer report production to the unit, but to the lease.

**JAM 091013** 

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