

HOBBS OCDForm 3160-3
(March 2012)

APR 27 2016

RECEIVEDUNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT**APPLICATION FOR PERMIT TO DRILL OR REENTER**FORM APPROVED
OMB No. 1004-0137
Expires October 31, 2014

(V)

5. Lease Serial No.
NMLC-063645 (unit: NMNM-070937X)6. If Indian, Allottee or Tribe Name
N/A1a. Type of work: ☒ DRILL ☒ REENTER7. If Unit or CA Agreement, Name and No.
E-K QUEEN UNIT1b. Type of Well: ☒ Oil Well ☐ Gas Well ☐ Other ☒ Single Zone ☐ Multiple Zone8. Lease Name and Well No. 22434
E-K QUEEN UNIT 211 (fka, Sivley 5-13)

2. Name of Operator SEELY OIL COMPANY

20497

9. API Well No.
30-025-016063a. Address 815 W. 10TH STREET
FT. WORTH, TX 761023b. Phone No. (include area code)
817 332-137710. Field and Pool, or Exploratory 19950
E-K; YATES-SEVEN RIVERS-QUEEN4. Location of Well (Report location clearly and in accordance with any State requirements.)
At surface 1980' FNL & 2296' FEL (1957 plat showed 1980 FNL & 2310 FEL)
At proposed prod. zone SAME11. Sec., T. R. M. or Blk. and Survey or Area
SWNE 13-18S-33E14. Distance in miles and direction from nearest town or post office*
11 AIR MILES SE OF MALJAMAR, NM12. County or Parish
LEA13. State
NM15. Distance from proposed* 344' (lease)
location to nearest
property or lease line, ft. 1980' (unit)
(Also to nearest drig. unit line, if any)16. No. of acres in lease
800 in lease
2895.36 in unit17. Spacing Unit dedicated to this well
SWNE18. Distance from proposed location* lease: 645' (#210)
to nearest well, drilling, completed, unit: same
applied for, on this lease, ft.19. Proposed Depth
4500' (now 4369')20. BLM/BIA Bond No. on file
NM-181621. Elevations (Show whether DF, KDB, RT, GL, etc.)
3,984' UNGRADED22. Approximate date work will start*
03/01/201523. Estimated duration
2 WEEKS

24. Attachments

The following, completed in accordance with the requirements of Onshore Oil and Gas Order No. 1, must be attached to this form:

- Well plat certified by a registered surveyor.
- A Drilling Plan.
- A Surface Use Plan (if the location is on National Forest System Lands, the SUPO must be filed with the appropriate Forest Service Office).
- Bond to cover the operations unless covered by an existing bond on file (see Item 20 above).
- Operator certification
- Such other site specific information and/or plans as may be required by the BLM.

25. Signature

Name (Printed/Typed)

BRIAN WOOD (PHONE: 505 466-8120)

Date

12/16/2014

Title

CONSULTANT

(FAX: 505 466-9682)

Approved by (Signature)

/s/Cody Layton

Name (Printed/Typed)

Date

APR 20 2016

Title

FIELD MANAGER

Office

BLM-CARLSBAD FIELD OFFICE

The NMOCD Gas Capture Plan notice has been posted on the web site under Announcements/Notice to Operators. A copy of the GCP form is included with the notice and is also in the Forms section under Unnumbered forms. Please submit accordingly in a timely manner.

legal or equitable title to those rights in the subject lease which would entitle the applicant to
APPROVAL FOR TWO YEARS

for any person knowingly and willfully to make to any department or agency of the United States any matter within its jurisdiction.

*(Instructions on page 2)

**APPROVAL SUBJECT TO
GENERAL REQUIREMENTS AND
SPECIAL STIPULATIONS
ATTACHED**

**SEE ATTACHED FOR
CONDITIONS OF APPROVAL**

Lea County Controlled Water Basin

APR 29 2016

Seely Oil Company
E-K Queen Unit 211
1980' FNL & 2296' FEL
Sec. 13, T. 18 S., R. 33 E.
Lea County, NM

DRILL PLAN PAGE 1

Drilling Program

Well (30-025-01606) was drilled to 4369' by T. J. Sively as the Sively Federal 5-13 in 1957. Well was plugged in 1958 without production. No long string was run. Survey of P&A marker in 2014 shows slight difference (2296 FEL vs. 2310 FEL) from pre-drill survey in 1957. Seely will re-enter and deepen to 4500'.

1. ESTIMATED TOPS

<u>Name</u>	<u>Depth</u>	<u>Subsea Elevation</u>	<u>Fluid Content</u>
Quaternary	0'	+3,984'	fresh water
Rustler	1,569'	+2,415'	---
Salt top	1,770'	+2,214'	---
Salt base	3,051'	+933'	---
Yates	3,168'	+816'	water, brine
Seven Rivers	3,569'	+415'	oil, gas, water, brine
Queen	4,328'	-344'	oil, gas, water, brine
TD	4,500'	-516'	---

2. NOTABLE ZONES

Water zones are and will be protected with casing, cement, and weighted mud. Fresh water found while drilling will be recorded. Closest water well (CP 00689) is 1,633' northwest. Water in that 100' deep well was found from 70' to 95'.

3. PRESSURE CONTROL

A 10" 3000 psi double ram BOP will be installed before drilling out of the surface casing and used as a 2000 psi system. Casing and BOP will be tested as required by Onshore Order 2 before drilling out of the surface casing. Request a waiver to test to a maximum of 1000 psi, which is the maximum expected surface pressure. Auxiliary equipment will include a gas detector and Kelly cock.

See
COA

Seely Oil Company
 E-K Queen Unit 211
 1980' FNL & 2296' FEL
 Sec. 13, T. 18 S., R. 33 E.
 Lea County, NM

DRILL PLAN PAGE 2

4. CASING & CEMENT

Hole O. D.	Casing O. D.	Pounds/foot	Grade	Set Interval	Collar	Age
?	8.625"	32	?	0' - 335'	?	Set
7.785"	5.5"	15.5	J-55	0' - 4500'	L T & C	New

Production casing is designed with these parameters:

Collapse: $4500' \times 9.5 \text{ lb/gal} \times 0.052 = 2223 \text{ psi}$

Casing collapse resistance = 4040

Safety factor = $4040/2223 = 1.82$

Yield: $4500 \times 15.5 \text{ \#/ft} = 69,750 \text{ pounds}$

Casing yield strength = 202,000

Safety factor = $202,000/69,750 = 2.89$

Burst: $4500' \times 9.5 \text{ lb/gal} \times 0.052 = 2223 \text{ psi}$

Burst resistance = 4810 psi

Safety factor = $4810/2223 = 2.16$

casing	casing depth	sacks	TOC	pounds per gallon	cubic feet per sack	total cubic feet	excess	blend
surface	335'	175	GL	no report	no report	no report	no report	no report
production	4500'	200	GL	12.7	1.97	394	35%	lead
		585		16	1.13	661		tail

Surface casing was cemented to the surface with Halliburton in 1957. Cement specifications were not reported.

Production casing will be cemented to GL with >35% excess (1,055 cubic feet).

Lead with 200 sacks Halliburton light mixed with 9.9 gallons water per sack.

Seely Oil Company
E-K Queen Unit 211
1980' FNL & 2296' FEL
Sec. 13, T. 18 S., R. 33 E.
Lea County, NM

DRILL PLAN PAGE 3

Tail with 585 sacks premium poz with 10% salt + 0.75% CFR-III mixed with 4 gallons per sack.

5. MUD PROGRAM

Fresh water mud (weight = 9.3 ppg, viscosity = 33) will be used to drill to 1,750' (just above the salt which is at 1,770'). Remainder of production hole will be drilled with brine (weight = 9.5 ppg, viscosity = 32) with lignite and gel. An electronic/mechanical mud monitor with a minimum pit volume totalizer, stroke counter, and flow sensor will be used. Circulation could be lost in any section of the hole. Lost circulation material (e.g., fiber) will be on location.

6. CORES, TESTS, & LOGS

No drill stem test or core is planned. Gamma ray density neutron and dual induction logs will be run.

7. DOWN HOLE CONDITIONS

No abnormal pressure or temperature is expected. Maximum expected bottom hole pressure = 1,947 psi. Maximum expected bottom hole temperature = 105° F. No H₂S has been found to date.

8. OTHER INFORMATION

The anticipated spud date is upon approval. It is expected it will take 2 weeks to drill and complete the well.

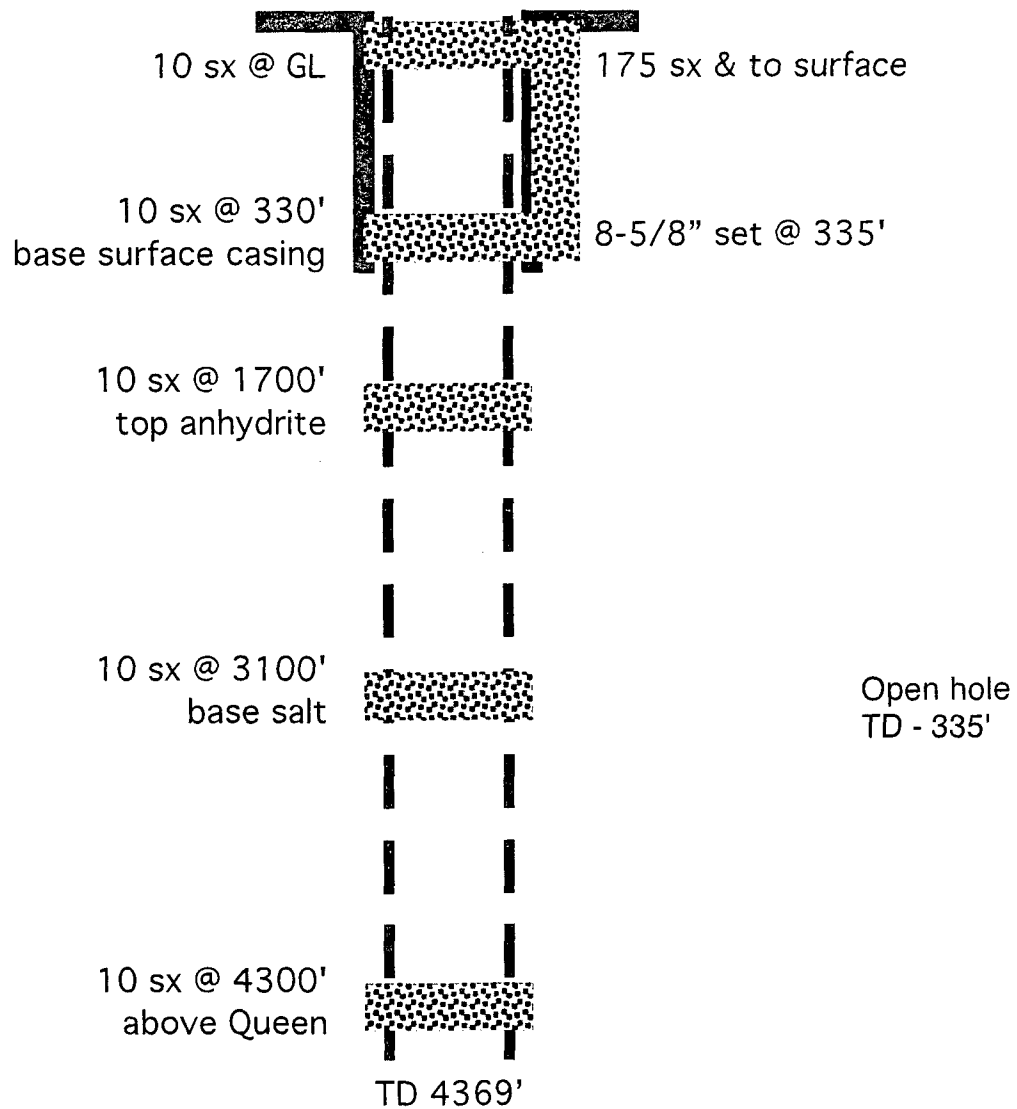
E-K Queen Unit 211 (fka, Sively Federal 5-13)

API 30-025-01606

Spud: 1957 and Plug: 1957

no production

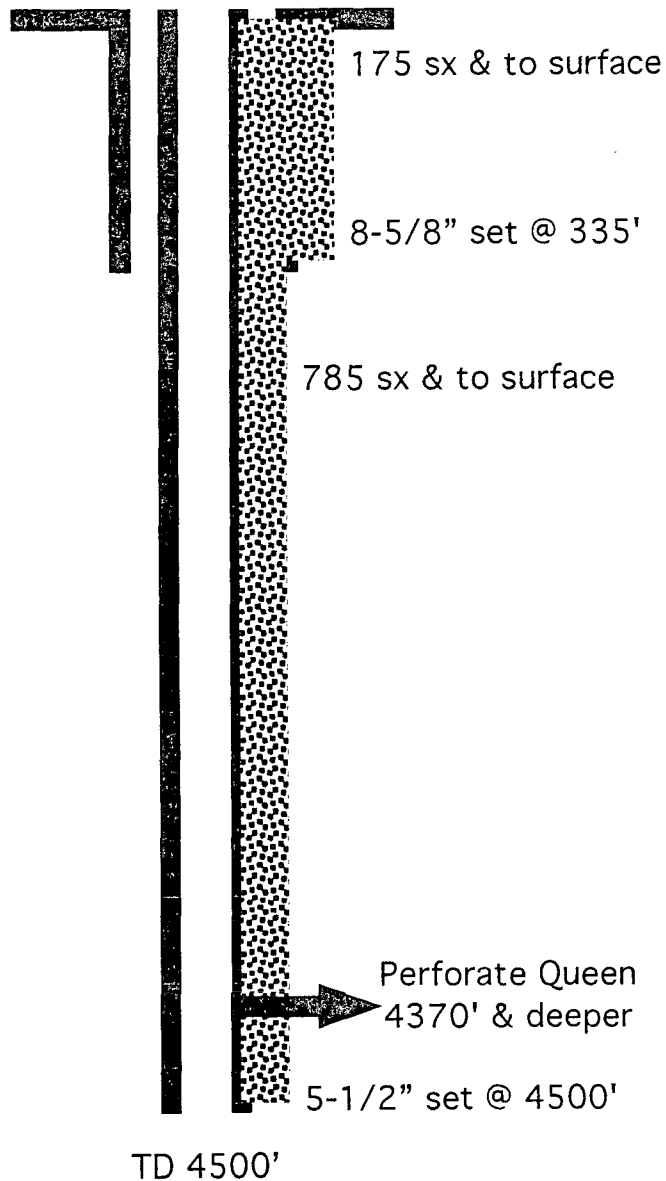
"AS IS"



(not to scale)

E-K Queen Unit 211 (fka, Sively Federal 5-13)
API 30-025-01606
Spud: 1957 and Plug: 1957
no production

"PROPOSED"



(not to scale)