

Form 3160-3
(August 2007)

HOBBS OCD

OCT 25 2011

OCD-ARTESIA

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

APPLICATION FOR PERMIT TO DRILL OR REENTER

FORM APPROVED
OMB No 1004-0137
Expires July 31, 2010

FA 11-1187

5 Lease Serial No
NMLC029338A

6. If Indian, Allottee or Tribe Name

7 If Unit or CA Agreement. Name and No.

8. Lease Name and Well No
Jackson A 39

9. API Well No.

10. Field and Pool, or Exploratory
LOCO HILLS11. Sec., T. R. M. or Blk. and Survey or Area
SEC. 12, T17S, R30E12 County or Parish
EDDY13. State
NM1a. Type of work: ☒ DRILL☐ REENTER1b. Type of Well: ☒ Oil Well ☐ Gas Well ☐ Other ☐ Single Zone ☐ Multiple Zone

2. Name of Operator BURNET TOIL CO., INC.

3a. Address 801 CHERRY ST., STE 1500
FORT WORTH, TEXAS 760123b Phone No. (include area code)
817-332-5108

4. Location of Well (Report location clearly and in accordance with any State requirements *)

At surface UNIT O, 210' FSL, 1650' FEL

At proposed prod. zone SAME AS ABOVE

Non-Standard Location

14 Distance in miles and direction from nearest town or post office*
6 miles North and East of LOCO HILLS15 Distance from proposed*
location to nearest
property or lease line, ft
(Also to nearest drig. unit line, if any)

330'

16 No. of acres in lease
55017 Spacing Unit dedicated to this well
4018. Distance from proposed location*
to nearest well, drilling, completed,
applied for, on this lease, ft

330'

19 Proposed Depth
6100'20 BLM/BIA Bond No. on file
#00197
NMLB 00019721 Elevations (Show whether DF, KDB, RT, GL, etc.)
3771'22 Approximate date work will start*
10/01/201123. Estimated duration
15 days

24. Attachments

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

1. Well plat certified by a registered surveyor.

2. A Drilling Plan.

3. A Surface Use Plan (if the location is on National Forest System Lands, the
SUPO must be filed with the appropriate Forest Service Office)4. Bond to cover the operations unless covered by an existing bond on file (see
Item 20 above).

5. Operator certification

6. Such other site specific information and/or plans as may be required by the
BLM

25. Signature

Mary Carter Starkey

Name (Printed/Typed)

Mary Carter Starkey

Date

07/22/2011

Approved by (Signature)

/s/ Don Peterson

Name (Printed/Typed)

/s/ Don Peterson

Date

OCT 25 2011

Title

FIELD MANAGER

Office

CARLSBAD FIELD OFFICE

Application approval 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.

Conditions of approval, if any, are attached

APPROVAL FOR TWO YEARS

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.

(Continued on page 2)

ns on page 2)

ROSWELL CONTROLLED WATER BASIN

OCD CONDITION OF APPROVAL for Drilling
Intent to drill ONLY --- CANNOT produce until the Non-Standard
Location has been approved by OCD Santa Fe office.SEE ATTACHED FOR
CONDITIONS OF APPROVALAPPROVAL SUBJECT TO
GENERAL REQUIREMENTS
AND SPECIAL STIPULATIONS
ATTACHED

HOBBS OCD

DISTRICT I

1625 N. French Dr., Hobbs, NM 88240

DISTRICT II

1301 W. Grand Avenue, Artesia, NM 88210

DISTRICT III

1000 Rio Brazos Rd., Aztec, NM 87410

DISTRICT IV

1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico

Energy, Minerals and Natural Resources Department

Form C-102

Revised July 16, 2010

Submit one copy to appropriate
District Office

OIL CONSERVATION DIVISION

1220 South St. Francis Dr.
Santa Fe, New Mexico 87505

RECEIVED

WELL LOCATION AND ACREAGE DEDICATION PLAT

☐ AMENDED REPORT

API Number 30-015-3584	Pool Code 96718	Pool Name Loco Hills Cedar Lake (Glorieta Yeso)
Property Code 20767	Property Name JACKSON "A"	Well Number 39
OGRID No. 03080	Operator Name BURNETT OIL COMPANY, INC.	Elevation 3771

Surface Location

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
0	12	17 S	30 E		210	SOUTH	1650	EAST	EDDY

Bottom Hole Location If Different From Surface

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County

Dedicated Acres	Joint or Infill	Consolidation Code	Order No.
40			

NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED
OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION

	OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief, and that this organization either owns a working interest or unleased mineral interest in the land including the proposed bottom hole location or has a right to drill this well at this location pursuant to a contract with an owner of such a mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division. Signature <u>Mary Carter Starkey</u> Date _____ Printed Name <u>Mary Carter Starkey</u> Email Address <u>mstarkey@burnettoid.com</u>
	SURVEYOR CERTIFICATION I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision and that the same is true and correct to the best of my belief. Date Surveyed <u>MAY 23, 2013</u> Signature & Seal of Professional Surveyor <u>GARY L. JONES</u> W.O. <u>24296</u>
	Certificate No. Gary L. Jones 7977 BASIN SURVEYS 24296

OCT 25 2011

**MASTER DEVELOPMENT PLAN
BURNETT OIL CO., INC.**

ALL VERTICAL CEDAR LAKE YESO/ LOCO HILLS PADDOCK WELLS **RECEIVED**

FEDERAL LEASE (NM) LC029338A, LC029339A, LC030570A, LC055264, LC055958, NM2746, NM2747, NM2748, NM 05067 & NM 074939.

Section 1, 8, 11, 12, 13, 14, 23, 24 & 25, Township 17 South, Range 30 East, Eddy County, New Mexico

A: DRILLING PROGRAM

1. Geological Name of Formation with Estimated Depth:

- a. Alluvium.....Surface
- b. Anhydrite..... 390'
- c. Salt.....530'
- d. Base Salt.....1290'
- e. Yates..... 1450'
- f. Seven Rivers..1604'
- g. Queen..... 2222'
- h. Grayburg..... 2670'
- i. San Andres.....2985'
- j. Glorieta.....4460'
- k. Yeso.....4580'

2. Estimated tops of Geologic Markers & Depths of Anticipated Fresh Water, Oil or Gas:

- a. Seven Rivers.....1604' Oil
- b. Queen..... 2222' Oil
- c. Grayburg..... 2670' Oil
- d. San Andres..... 2985' Oil
- e. Glorieta..... 4460' Oil
- f. Yeso..... 4580' Oil
- g. Total Depth 6100'

No other formations are expected to yield oil, gas or fresh water in measurable volumes. Deepest water is expected to be above 400'. We will set 10-3/4" casing @ approx. +/- 400' in the Anhydrite, above the Salt and circulate cement to surface.

We will isolate the oil zones by running 7" casing to total depth and circulating cement to surface.

3. Casing Program: (ALL CASING WILL BE NEW API APPROVED MATERIAL.)

** See COA*

<u>Hole</u> <u>Size</u>	<u>Interval</u>	<u>OD Csg</u>	<u>Weight</u>	<u>Collar</u>	<u>Grade</u>	<u>Collapse</u> <u>Design</u> <u>Factor</u>	<u>Burst</u> <u>Design</u> <u>Factor</u>	<u>Tension</u> <u>Design</u> <u>Factor</u>
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(MW = 10 PPG IN DESIGN FACTOR CALCULATIONS.)

14-3/4"	0'-400'	10-3/4"	32.75#	ST&C	H40	1.125	1.00	1.80
8-3/4"	0'-6100'	7"	23.00#	LT&C	J55	* 1.125	1.00	1.80

* 500' of fresh water gradient (.433 psi/ft) fluid will be maintained inside casing to keep SF 1.125. If fluid is not at the surface, the fluid level inside 7" Casing will be determined by wireline to insure a 500' minimum of standing fluid.

4. Cementing Program (Note Yields and DV Tool Depth if Multiple Stage.)

BLM WILL BE NOTIFIED TO HAVE THE OPTION TO WITNESS ALL CEMENTING AND TAG OPERATIONS.

- a. **10-3/4" Surface** Cement to surface Lead with 150 sx Class C cement +10% A-10, + 10#/sx LCM-1. 1% CaCl, 0.01 gps FP-6L, 14.6 ppg, 1.67 CF/Sk Yield. Tail with 500 sks Class C

cement + 2% CaCl + 0.01 gps FP-6L.14.8 ppg, 1.35 CF/Sx yield. TOC Surface.
Excess cement 100%

See COA
If cement does not circulate to surface, BLM will be notified of same, plus the plans to bring the cement to surface so BLM may witness tagging and cementing. The plan to bring the cement to surface will be to run 1" and tag top of cement at four positions 90° apart to verify cement depth.

Appropriate cement volumes will be pumped through 1" to bring cement to surface.

b. 7" Production Casing

Stage 1 Cement: 500 sks (50:50) Poz (Fly Ash): Class C cement + 2% Bentonite + 0.01 gps FP-6L + 0.3% FL-52A + 1.2% CD-32 + 5% Sodium Chloride.14.2 ppg, Yield 1.27 CF/Sx. DV @ approx. 2600' 30% excess cement

Stage 2 Cement: Lead with 525 sks (35:65) Poz (Fly Ash): Class C cement + 6% Bentonite + 5 lbs/sx LCM-1 + 0.125 lbs/sx Cello Flake + .01 gps FP-6L + 5% Sodium Chloride,12.6 ppg Yield 1.89 CF/Sx. Tail with 100 sx Class C + 1% CaCl + 0.01 gps FP-6L.14.8 ppg, Yield 1.62 CF/Sx. TOC Surface. 140% excess cement.

The above cement volumes may be revised pending the caliper measurement from the open hole logs. **Casing design is to bring cement to the surface.**

5. Pressure Control Equipment:

The blowout prevention equipment (BOPE) shown in **Drilling Exhibit E & E1** will consist of a 2000 PSI Hydril Unit (annular) with hydraulic closing equipment. The equipment will comply with Onshore Order #2 and will be tested to 50% of rated working pressure (RWP), and maintained for at least 10 minutes. The 10-3/4" drilling head will be installed on the surface casing and in use continuously until total depth is reached. An independent testing company will be used for the testing. Other accessory BOP equipment will include a Kelly cock, floor safety valve, choke lines and choke manifold having 2000 PSI WP rating.

** See COA*
6. Proposed Mud Circulation System

<u>Depth</u>	<u>Mud Wt</u>	<u>Visc</u>	<u>Fluid Loss</u>	<u>Type System</u>
0'-400'	8.6-9.5			Fresh Water
400' - 6100'	10.0 max.			Brine Water

The necessary mud products for weight addition and fluid loss control will be on location at all times.

7. Auxiliary Well Control and Monitoring Equipment:

- See COA **
- a. A Kelly cock will be in the drill string at all times.
 - b. A full opening drill pipe stabbing valve with the appropriate connections on the rig floor at all times.
 - c. Hydrogen Sulfide detection and breathing equipment will be installed and in operation at drilling depth of 1800' (which is more than 500' above top of Grayburg) until 7" casing is cemented. An H2S compliance package will be on all sites while drilling.

8. Hydrogen Sulfide Plan and Training:

Based on our area testing H2S at 100 PPM has a radius of 139' and does not get off our well sites. There are no schools, residences, churches, parks, public buildings, recreation area or public within 2+ miles of our area.

All personnel, whether regularly assigned, contracted, or employed on an unscheduled basis, will receive training from a qualified instructor in the following areas prior to commencing drilling operations on each well:

- a. The hazards and characteristics of Hydrogen Sulfide (H2S).
- b. The proper use and maintenance of personal protective equipment and life support systems.

~~X~~ b. The openhole electrical logging program will be: ~~X~~ See COA

1. Total depth to 1000': Dual Laterolog-Micro Laterolog with Compensated Neutron, Spectral Density log with Spectral Gamma Ray and Caliper.
2. Total depth to Surface: Compensated Neutron with Gamma Ray.
3. Coring program will be planned and submitted on a well by well basis.
4. Additional testing will be done subsequent to setting the 7" production casing. The specific intervals will be based on log evaluation, geological sample shows and drill stem tests.

10. Potential Hazards:

No abnormal pressures or temperatures are expected. There is known H₂S in this area. The operator will comply with the provisions of Onshore Oil and Gas Order #6. No lost circulation is expected to occur. All personnel will be familiar with the safe operation of the equipment being used to drill this well. The maximum anticipated bottom hole pressure is 2715#. This is based upon the following formula of .445 X BH ft. estimate. The anticipated bottom hole temperature is 105°F. This is based upon logs of wells drilled surrounding this well.

11. Anticipated Start Date and Duration of Operation

Road and location construction will begin after BLM has approved the APD and has approved the start of the location work. Anticipated spud date will be as soon as the location building work has been completed and the drilling rig is available to move to the location. Move in and drilling is expected to take approx 25 days. If production casing is run, an additional 60 days would be required to complete the well and install the necessary surface equipment (pumping unit, electricity, flowline and storage facility) to place the well on production.

B: SURFACE USE PROGRAM

1. EXISTING ROADS:

- a. The well site and elevation plat for the proposed well are reflected on the well site layout; Form C-102. This well was staked by Basin Surveys or John West Survey.
- b. All roads into the location are shown on the Vicinity Map (Surface Exhibit A.)
- c. Directions to location: from junction of Square Lake and Skelly, go east on Skelly go east 0.2 miles to Old Lease Road. Follow Surface Exhibit A and A2 to the proposed well pad.

2. New or Reconstructed Access Roads:

- a. The well site layout, Form C-102 and Surface Exhibit A1 & A2 show the existing area. **Any additional required access road will be shown on Surface Exhibit A2 and Exhibit B.**
- b. All construction material will be native caliche. It may be available at the proposed location. If unavailable on location or road, caliche will be hauled from nearest BLM approved caliche pit.

3. Location of existing wells:

See attached Surface Exhibit B plat showing all wells within a ½ mile radius of the proposed well site.

4. Location of existing and/or proposed production facilities:

- See Surface Exhibit B, C and C1 for the location of existing on lease Jackson A -2 Tank Battery facility on this Federal Lease NMLC029330A.
- a. This battery is an existing above ground pool commingled Grayburg/Loco Hills Glorieta Yeso on lease production facility.
 - b. The well site will require electricity for the prime mover. We will contact the electric cooperative. to provide the electric power poles and the electric line from their nearest connection. The routing and pole placement will be provided in their ROW application. All electrical installation will be done in accordance with all existing state and federal regulations.
 - c. All flowline from the new well pad site is on Federal leases. (See Surface Exhibit B, C and C1 plat.) The required flowline will be laid, above ground, along existing road and flowline routing. All flowline will be 3" poly pipe.

All water to be used in drilling this well will be brine or fresh water transported by truck over existing and above proposed lease road from Loco Hills, New Mexico or produced water furnished from our existing waterflood facilities in the area. We may install a pump and lay a **temporary 2"** poly line on the lease from the battery to the rig for this drilling water.

6. Construction Materials:

All construction material for the roadway and drilling pad will be native caliche from the nearest BLM approved pit or from existing available deposits found on the location. All will be in accordance with the drilling stipulations for this well.

7. Methods of Handling Waste Disposal:

- See COA*
- a. Drill cuttings will be disposed of in a closed loop system using steel haul off tanks. All drilling fluids will be hauled off location to a contracted off lease disposal location.
 - b. Trash, waste paper, garbage and junk will be placed in a portable, screened trash container on location. All trash and debris will be transported to an authorized off-lease disposal station within 30 days following the completion activities.
 - c. A properly maintained Porto-john will be provided for the crews during drilling and completion operations. All will be removed after all completion operations have ended.
 - d. Oil produced during testing will be put into steel storage tank for later sales.
 - e. Water produced during testing operations will be put in the steel frac. tanks pit until well is turned to the lease tank battery. All produced water will be disposed of through one of our approved disposal methods.

8. Ancillary Facilities: There are no planned ancillary facilities for this well.

9. Well Site Layout:

Surface Exhibit D shows the relative location and dimensions of the drilling pad and related components. Only minor differences, if any, in length and/or width of the drilling pad are anticipated, depending on which drilling contractor is selected to drill the well. Only minor leveling of the drilling site is anticipated.

10. Plans for surface Reclamation:

- a. After drilling and successful completion operations are finished, all equipment and other materials not required for normal production operations will be removed. **See Exhibit F**
- b. Burnett Oil respectfully requests two (2) years to downsize the drilling location in order to have room for equipment to fracture stimulate 3 to 4 intervals. Each one requires a large volume fracture treatment with several pumps, a large sand mover, several frac tanks, a treating van and various other vehicles and equipment. Burnett will, if all fracs are completed before the 2 years, contact BLM to downsize the location.

See attached plat outlining the resulting location after downsizing, and showing the sides of location where the caliche would be left for use of kill trucks, hot oil trucks, foam units or whatever is needed to service the well during its life. It is very unsafe rig up equipment inside the safety guide wires of the service unit which is what has to happen if the location is reclaimed on all 4 sides to the safety anchors.

- c. The pad size will be reduced to the amount required for normal operation of the producing well. This reduced portion will be restored to the BLM stipulations in section a.
- d. If a well is abandoned, the surface location and unneeded road will be restored according to BLM stipulations within 90 days of final abandon and sit re-seeded with BLM (B) seed mix.

11. Surface ownership:

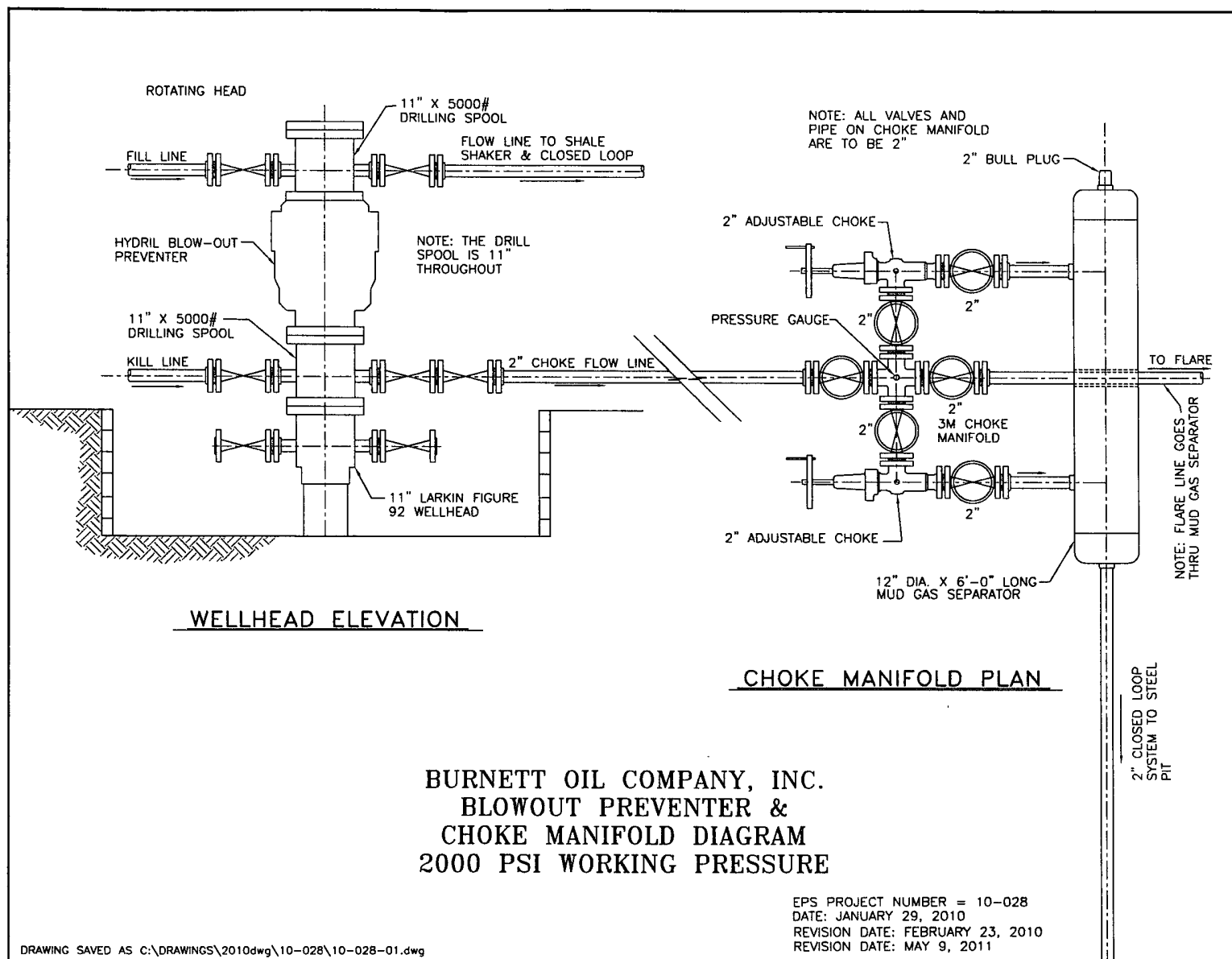
All lands are owned by the U.S. Government and is administered by the Bureau of Land Management. The surface is multiple uses with the primary use of the region for the production of oil and gas and the grazing of livestock.

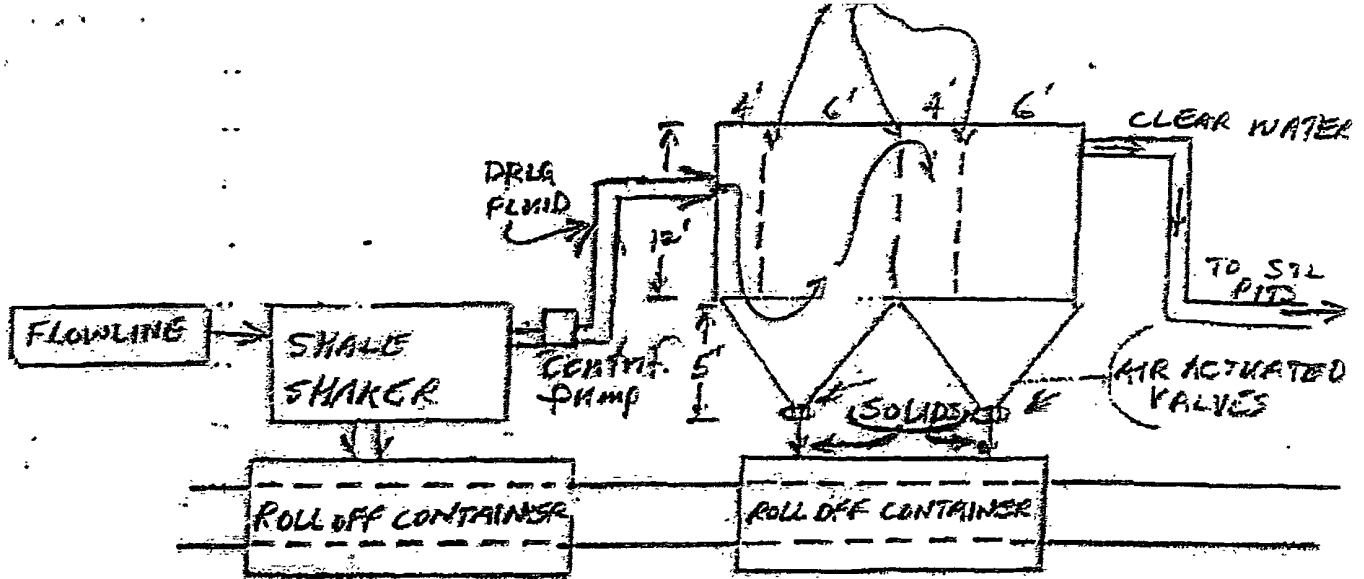
12. Other information:

- a. The area surrounding the well site is grassland. The area is relatively flat with small hills and sand dunes. The topsoil is fine, deep sand underlain by caliche. Vegetation cover is generally sparse and consists of mesquite, yucca, shinnery oak and sparse native grasses. Wildlife in the area includes deer, coyotes, rabbits, rodents, reptiles, dove and quail.
- b. No permanent or live water is found in the general proximity of this area.
- c. No dwellings are found within two (2) miles of this location.
- d. There is intermittent cattle grazing and hunting in the area; however, the principal land use is for oil and gas production.
- e. An archaeological clearance report from Boone Archaeological Services will be sent to the BLM office in Carlsbad, N.M.

13. Bond Coverage:

Current Bond is BLM Bond # NMB000197. The Surety Bond is #B000863. Both are effective May 21, 2004 and remain in place





OPERATIONAL & MAINTENANCE

DRILLING FLUIDS FROM THE WELLBORE WILL GO THROUGH FLOWLINE ACROSS SHALE SHAKER. SOLIDS WILL DROP INTO ROLL-OFF CONTAINERS WITH BAFFLES AS DRAWN ABOVE. BAFFLES SLOW FLUID VELOCITY TO ALLOW SOLIDS TO FALL DOWN THROUGH 6" AIR AIR ACTUATED VALVES INTO ROLL- OFF CANTAINERS. CLEAN WATER GOES OUT BACK TO THE DRILLING FLUID STEEL PITS. SOLIDS ARE HAULED TO DISPOSAL. ANY LEFTOVER LIQUID WILL BE HAULED TO DISPOSAL.

BURNETT OIL CO., INC.

Operations and Maintenance

Closed Loop equipment will be inspected daily by each tour and any necessary maintenance performed. Any leak in system will be repaired and/or contained immediately.

QCD notified within 48 hours

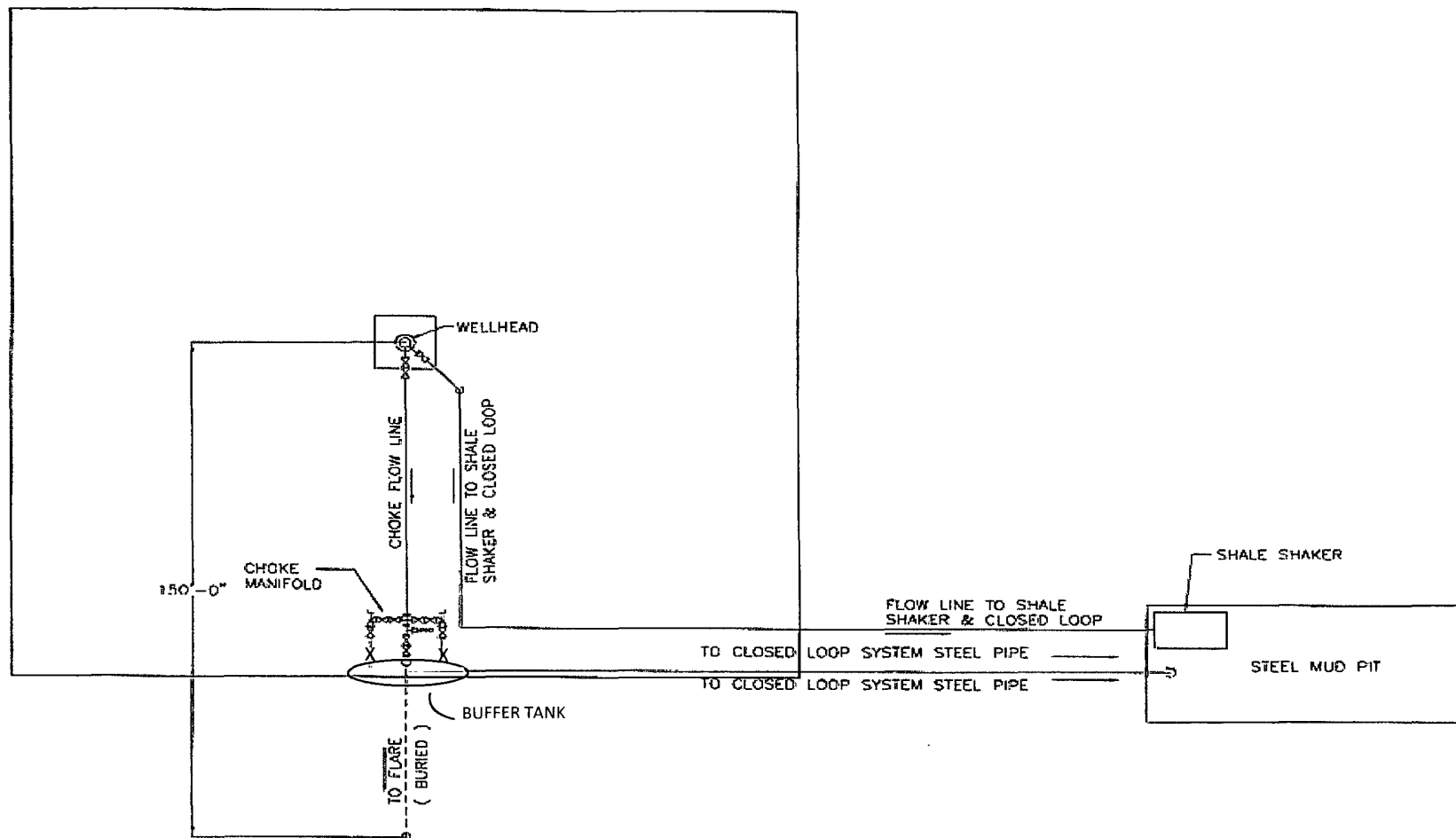
Remediation process started

Closure Plan

During drilling operations all liquids, drilling fluids and cutting will be hauled off via CRO (Controlled Recovery Incorporated Permit R-9166.)

SURFACE EXHIBIT D1

Jackson A 35

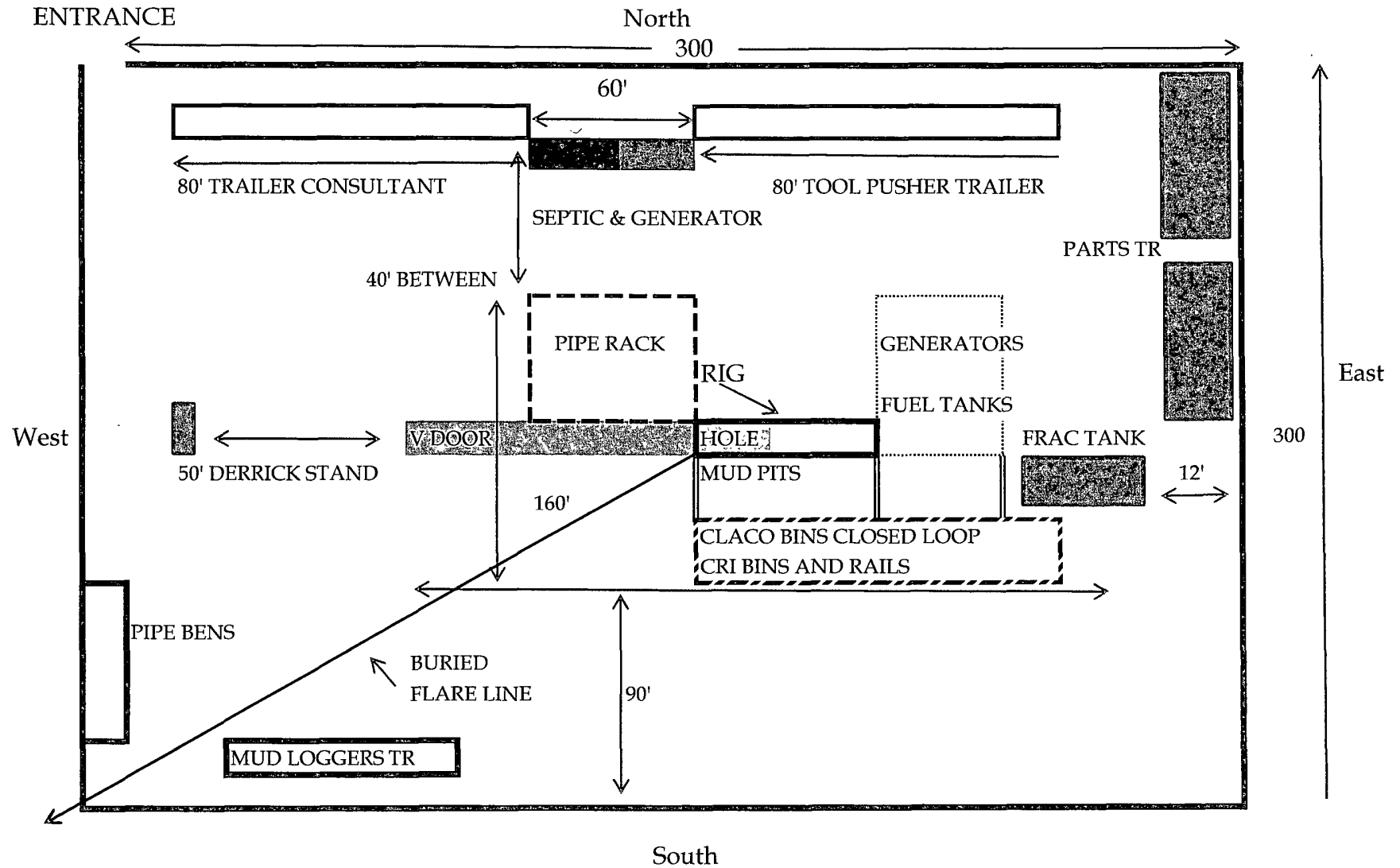


BURNETT OIL COMPANY, INC.
DRILLING OPERATIONS
WELL PAD PLAN LAYOUT
 NOT TO SCALE

DRAWING SAVED AS C:\DRAWINGS\2010dwg\10-028\10-028-02.dwg

EPS PROJECT NUMBER = 10-028
 DATE: JANUARY 29, 2010

BURNETT OIL CO., INC. PLANNED DRILL SITE LAYOUT, UNITED RIG #5



JACKSON A39

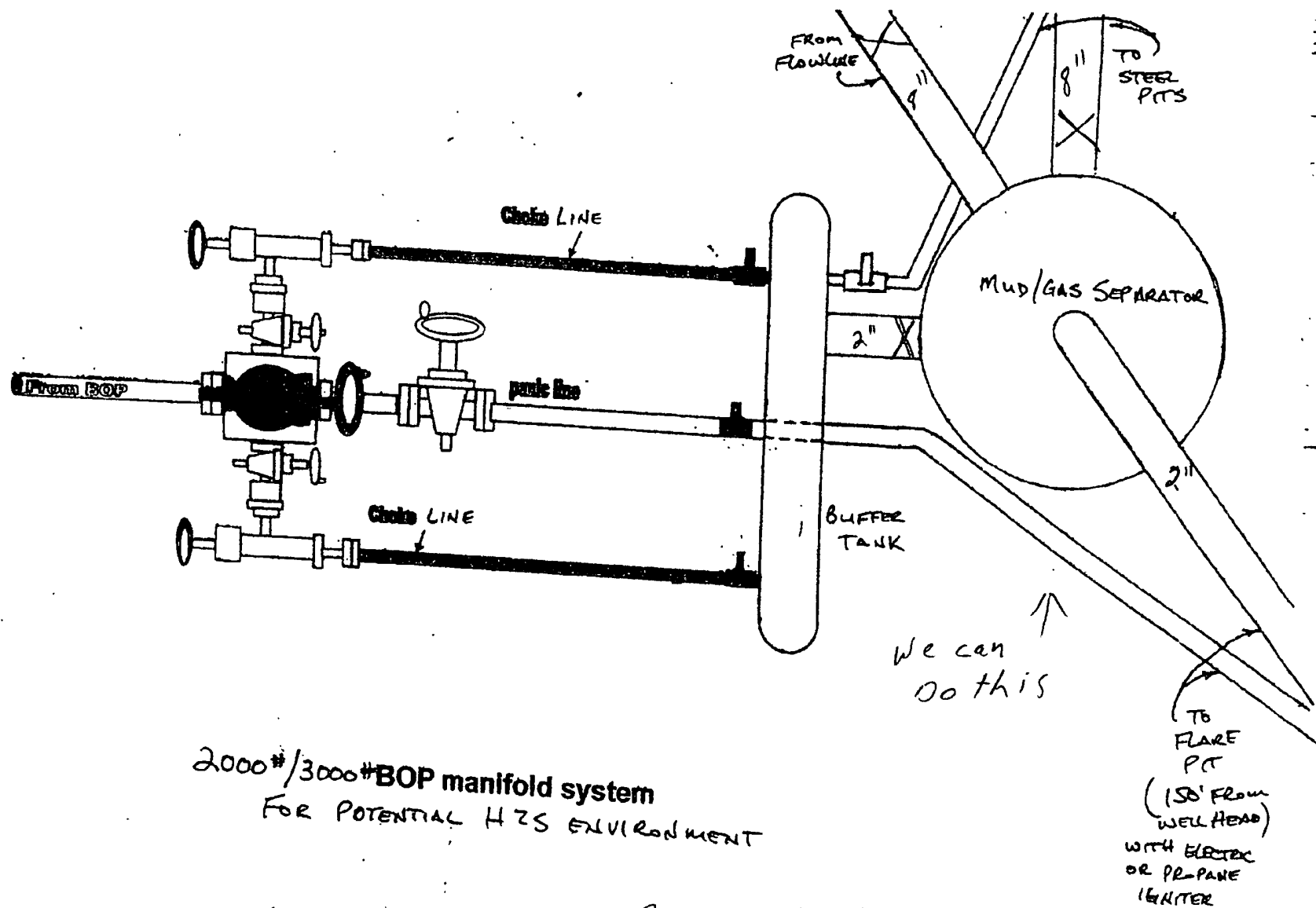


Exhibit E3

DISTRICT I --- CHECKLIST FOR INTENTS TO DRILL

APD is for N ☒ P ☒ E ☒ A ☒ D ☒WELL TYPE: O ☒ G ☒ I ☒ S ☒ OTHER ☒Operator Burnett Oil Co Inc OGRID # 3080Well Name & # Tackson Ad#39 Surface Type (F) (S) (P)Location: UL 10, Sect 12, Township 17 s, RNG 32 e, Sub-surface Type (F) (S) (P)1: BHL @: UL , Sect , Township s, RNG e, H DD 2: BHL @: UL , Sect , Township s, RNG e, H DD A. Date C101 rec'd / / C101 reviewed / /

B. 1. Check mark, Information is OK on Forms:

OGRID , BONDING ☒ PROP CODE ☒ WELL # , SIGNATURE 2. Inactive Well list as of: 10/25/11 # wells , # Inactive wells

a. District Grant APD but see number of inactive wells:

No letter required ☒; Sent Letter to Operator , to Santa Fe 3. Additional Bonding as of: 10/01/2011

a. District Denial because operator needs addition bonding:

No Letter required ☒; Sent Letter to Operator , To Santa Fe

b. District Denial because of Inactive well list and Financial Assurance:

No Letter required ☒; Sent Letter to Operator , To Santa Fe C102 YES ☒ NO ☒ Signature 1. Pool Cedar Lake Glorieta - Yeso, Code 96831a. Dedicated acreage 40, What Units b. SUR. Location Standard : Non-Standard Location XXXc. Well shares acres: Yes ☒ No ☒ # of wells 1 plus this well # 392. 2nd Operator in same acreage, Yes , No ☒ WELL(S) SHARING:WELL(S) BY 2nd OPER: Agreement Letter , Disagreement letter # 37-15-374943. Intent to Directional Drill Yes , No ☒Dedicated acreage , What Units Bottomhole Location Standard , Non-Standard Bottomhole 4. Downhole Commingle: Yes , No ☒a. Pool #2 , Code , Acres Pool #3 , Code , Acres Pool #4 , Code , Acres 5. POTASH Area Yes , No ☒C. Blowout Preventer Yes ☒ No D H2S Yes ☒ No E C144 Pit Registration Yes , No

F. Does APD require Santa Fe Approval:

1. Non-Standard Location: Yes , No NSL # 2. Non-Standard Proration: Yes , No NSP # 3. Simultaneous Dedication: Yes , No SD # Number of wells Plus # 4. Injection order Yes , No ☒ PMX # or WFX # 5. SWD order Yes , NO ☒ SWD # 6. DHC from SF ; DHC-HOB ; Holding 7. OCD Approval Date 11/07/2011API # 30-015-395848. Reviewers Jes