

## OCD-ARTESIA

Form 3160-5  
(August 2007)UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENTFORM APPROVED  
OMB No. 1004-0137  
Expires: July 31, 2010**SUNDRY NOTICES AND REPORTS ON WELLS**  
**Do not use this form for proposals to drill or to re-enter an abandoned well. Use Form 3160-3 (APD) for such proposals.**5. Lease Serial No.  
NM6014

6. If Indian, Allottee or Tribe Name

SUBMIT IN TRIPLICATE - Other instructions on page 2.

1. Type of Well

☐ Oil Well ☒ Gas Well ☐ Other2. Name of Operator  
Conoco Phillips3a. Address  
29 Vacuum Complex Lane  
Lovington, NM 88260

3b. Phone No. (include area code)

575-391-3198

4. Location of Well (Footage, Sec., T., R., M., or Survey Description)  
660FWL, 1980' FSL SEC. 4, T22N, R22E

660FWL T22S

7. If Unit of CA/Agreement, Name and/or No.  
Rocky Arroyo8. Well Name and No.  
Rocky Arroyo D Conn No. 29. API Well No.  
280-152-10060081 300152100610. Field and Pool or Exploratory Area  
Rocky Arroyo / Cisco11. Country or Parish, State  
Eddy, NM

12. CHECK THE APPROPRIATE BOX(ES) TO INDICATE NATURE OF NOTICE, REPORT OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION			
<input checked="" type="checkbox"/> Notice of Intent	<input type="checkbox"/> Acidize	<input type="checkbox"/> Deepen	<input type="checkbox"/> Production (Start/Resume)	<input type="checkbox"/> Water Shut-Off
<input type="checkbox"/> Subsequent Report	<input type="checkbox"/> Alter Casing	<input type="checkbox"/> Fracture Treat	<input checked="" type="checkbox"/> Reclamation	<input type="checkbox"/> Well Integrity
<input type="checkbox"/> Final Abandonment Notice	<input type="checkbox"/> Casing Repair	<input type="checkbox"/> New Construction	<input type="checkbox"/> Recomplete	<input type="checkbox"/> Other
	<input type="checkbox"/> Change Plans	<input type="checkbox"/> Plug and Abandon	<input type="checkbox"/> Temporarily Abandon	
	<input type="checkbox"/> Convert to Injection	<input type="checkbox"/> Plug Back	<input type="checkbox"/> Water Disposal	

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 recompleat 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 recompleat 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.)

See attached workplan

**CONDITION OF APPROVAL:** Contact this office prior to backfill of old pit area, completion of phase one, and removal of equipment upon completion of reclamation for inspection. Contact: Duncan Whitlock 234-5926 or 361-2630 or Jim Amos 234-5909 or 361-2648. Verbal approval given to Bernie Bockisch 3/4/2014 with attached COAs.

Accepted for record

NMCCS

Tes  
8-8-14NM OIL CONSERVATION  
ARTESIA DISTRICT

AUG 08 2014

RECEIVED

14. I hereby certify that the foregoing is true and correct.

Name (Printed/Typed)

David C. Hathaway

Title ConocoPhillips Program Manager

Signature

Date 02/24/2014

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 lease which would entitle the applicant to conduct operations thereon.

Title

EBS

Date

3-5-2014

Office

CFO

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)



**CONESTOGA-ROVERS  
& ASSOCIATES**

6121 Indian School Road NE, Suite 200  
Albuquerque, New Mexico 87110  
Telephone: (505) 884-0672 Fax: (505) 884-4932  
www.CRAworld.com

February 24, 2014

Reference No. 085637

David C. Hathaway, P.E.  
ConocoPhillips RM&R  
1380-E POB  
315 Johnstone Ave.  
Bartlesville, Ok 74004

Dear Mr. Hathaway:

Re: Proposed Workplan for Reclamation of the  
Former Rocky Arroyo Gas Well Site  
Sec 4, T22S, R22E  
Eddy County, New Mexico

On behalf of ConocoPhillips, Conestoga-Rovers and Associates (CRA) is pleased to present this workplan for the reclamation of the above referenced site. This workplan presents CRA's proposed approach for performing site reclamation for the above referenced Site. This approach was discussed with the United States Bureau of Land Management (BLM) and local ConocoPhillips (CoP) business unit personnel.

## **1.0 Background Information**

The Rocky Arroyo Site (Site) is a plugged and abandoned (P&A'd) gas well located in Eddy County, approximately 28.8 miles west of Carlsbad, New Mexico (see Figure 1). The coordinates for the site are north 32.418427°, west 104.714553°. The site is extremely remote and difficult to access. Road conditions are poor and access with heavy equipment under current conditions is limited.

The surface estate at the Site is owned by the U.S. Government, under management by the Bureau of Land Management (BLM). A petroleum production lease for the Site was held by CoP, which was operated under provisions of an approved Application for Permit to Drill. Plugging and abandonment reports dated February and May 1993 have been filed with the U.S. Geological Survey.

A tank battery was formerly co-located on the rock working-pad where the well was located. Tanks for the battery have been removed; however, some one-inch (in.) diameter steel pipe still remains at the site. An abandoned 4-in. diameter gas line is still present to the north of the pad.

The working pad occupies approximately 1.55 acres in size. It appears that the pad was hewn out of the rock slope where the well was located. This created a cut wall that is approximately 20 feet high on the north side of the pad. The spoils from the cut were pushed to the north to create the pad. The height of the rock pad varies from ground surface where it intersects the slope to approximately 20 feet above ground surface.

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The pad appears to be constructed of weathered limestone. The top of the pad is relatively smooth due to the presence of finer limestone used to construct the pad. However, observation of the sides of the pad indicates that the majority of the pad is comprised of boulder-sized material.

All of the production equipment has been removed. The well plugging marker is the only permanent surface feature on the Site. Immediately north and adjacent to the working-pad is an approximately 0.25 acre area occupied by the old reserve pit. The associated brine-impacts to the site increase this area to approximately 0.5 acre (see Figure 2).

A site visit was held on January 28, 2014. Attending the meeting were Mr. Duncan Whitlock and Mr. Jim Amos with the BLM, Mr. Justin Wright with CoP, and Mr. Bernard Bockisch with CRA. During the site visit, the following scope of work was discussed

## **2.0 Scope of Work**

Proposed reclamation activities are based on the physical limitations of the Site (poor site access, remote location, limited available fill soil) and discussions with the BLM. A borrow pit is located approximately 0.2 mile northeast of the Site. The coordinates for the borrow pit are north 32.4201°, west 104.7116°. This borrow pit is located on BLM-owned land and a permit to remove material will not be required. If additional fill material is needed it can be taken from the borrow pit. However, use of the borrow pit will require that it be contoured and reseeded (see below).

### **Proposed Site Restoration Activities**

The generalized Site reclamation tasks will be performed in four main phases. The first phase will consist of excavating and relocating the first one to two feet of soil from the former pit. The tasks to complete this phase will consist of:

- Fine material will be scraped from the top of the pad where excavated pit material will be placed. This material will be stockpiled for later use.
- A 20 mil liner will be placed on the pad adjacent to, and up the side of the cut wall (see Figure 3). The edges of the liner will be overlapped a minimum of 24 inches to create a continuous liner.
- The unvegetated portion of the former pit (see Figures 2 and 3) will be excavated to a depth of approximately 18 inches below the existing ground surface. Areas that contain any vegetation will not be excavated.
- The excavated material from the former pit will be relocated to the pad and placed on the liner. The liner material placed up the cut wall will be folded over the top of the excavated soil. Additional liner material will be added to completely cover the excavated soil.



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- Approximately one foot of fine material will be placed over the top of the liner. The fine material will be used to minimize the possibility of puncturing the liner once the pad material is placed over it (see below).

The second phase will consist of placing a liner and backfilling the pit excavation. The tasks to perform this phase will consist of:

- A second 20 mil liner will be placed in the bottom of the excavated portion of the former pit area. The edges of the liner will be overlapped a minimum of 24 inches to create a continuous liner in the bottom of the excavation.
- Approximately 18 inches of fine material will be placed in the excavation to protect the liner.
- An N-P-K fertilizer will be applied and a season-appropriate seed mix will be broadcast over the new soil. The fertilizer and seed mix will be selected based on requirements by the BLM. The seed will be tracked into the soil using on-site equipment.

The third phase will consist of reducing the size of the existing pad and attempting to shape the slope to approximate the existing grade. The tasks to perform this phase will consist of:

- The well marker will be cut below the surface of the pad material. The GPS location of the well marker will be recorded.
- Material from the edges of the pad will be excavated on either side of, and up to the P&A'd well and placed adjacent to the cut wall. Pad material will be left around the P&A'd well to prevent it from being exposed.
- The pad material will be pushed up against the cut and brought as close to existing contours as practical.
- An N-P-K fertilizer will be applied and a season-appropriate seed mix will be broadcast over the newly placed pad material. The fertilizer and seed mix will be selected based on requirements by the BLM.

The fourth phase will consist of reclaiming the access road. Approximately 800 feet of road will need to be reclaimed. The upper portion of the road (approximately 300 feet long) was cut from the slope of the hill and the spoils pushed to the side to create the road bed. The lower portion of the road (approximately 500 feet long) appears to consist of a two-track. Reclamation of the road will be performed as follows:

- The lower portion of the road will be ripped.
- The loose material on the downslope side will be placed on the road. These materials will be contoured to match the existing grade.



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- A soil berm will be placed across the entrance to the road to minimize vehicle entry onto the road.
- An N-P-K fertilizer will be applied and a season-appropriate seed mix will be broadcast over the new soil. The fertilizer and seed mix will be selected based on requirements by the BLM. The seed will be tracked into the soil using on-site equipment.

As previously mentioned, if fill material is taken from the borrow pit, the area of disturbance will be reclaimed. Reclamation will consist of recontouring the impacted area to match surrounding contours. Following recontouring, an N-P-K fertilizer will be applied and a season-appropriate seed mix will be broadcast over the new soil. The fertilizer and seed mix will be selected based on requirements by the BLM. The seed will be tracked into the soil using on-site equipment.

**Schedule**

CRA is prepared to initiate the scope of work immediately, subsequent to ConocoPhillips approvals, the availability of resources and stakeholder concurrence. A start date and schedule of report submittals will be provided following formal BLM approval.

If you have any questions or comments with regards to this work plan, please do not hesitate to contact CRAs Albuquerque office at (505) 884-0672. Your timely response to this correspondence is appreciated.

Yours truly,

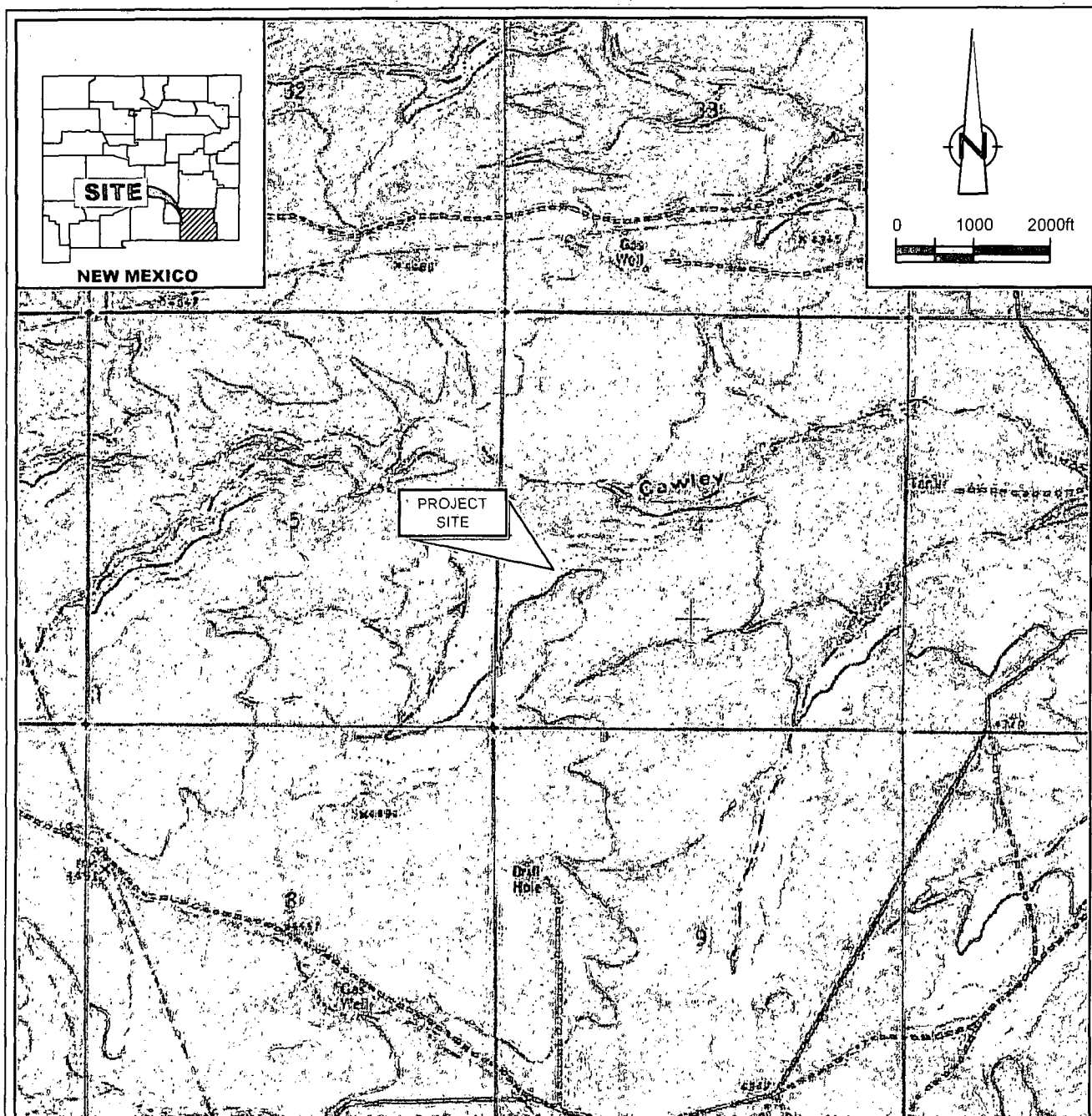
CONESTOGA-ROVERS & ASSOCIATES

Bernard Bockisch, PMP  
Senior Project Manager

Jeffrey Walker,  
Senior Project Manager

BB/mc/1  
Encl. (3)

## Figures



SOURCE: USGS 7.5 MINUTE QUAD  
"CAWLEY DRAW AND TEXAS HILL, NEW MEXICO"

LAT/LONG: 32.4184° NORTH, 104.7155° WEST  
COORDINATE: NAD83 DATUM, U.S. FOOT  
STATE PLANE ZONE - NEW MEXICO EAST

Figure 1

SITE LOCATION MAP  
ROCKY ARROYO SITE  
EDDY COUNTY, NEW MEXICO  
*ConocoPhillips Company*








LEGEND	
	Pit Location
	Borrow Pit Location
	Cut Wall

Figure 2  
SITE MAP  
ROCKY ARROYO SITE  
EDDY COUNTY, NEW MEXICO  
*ConocoPhillips Company*





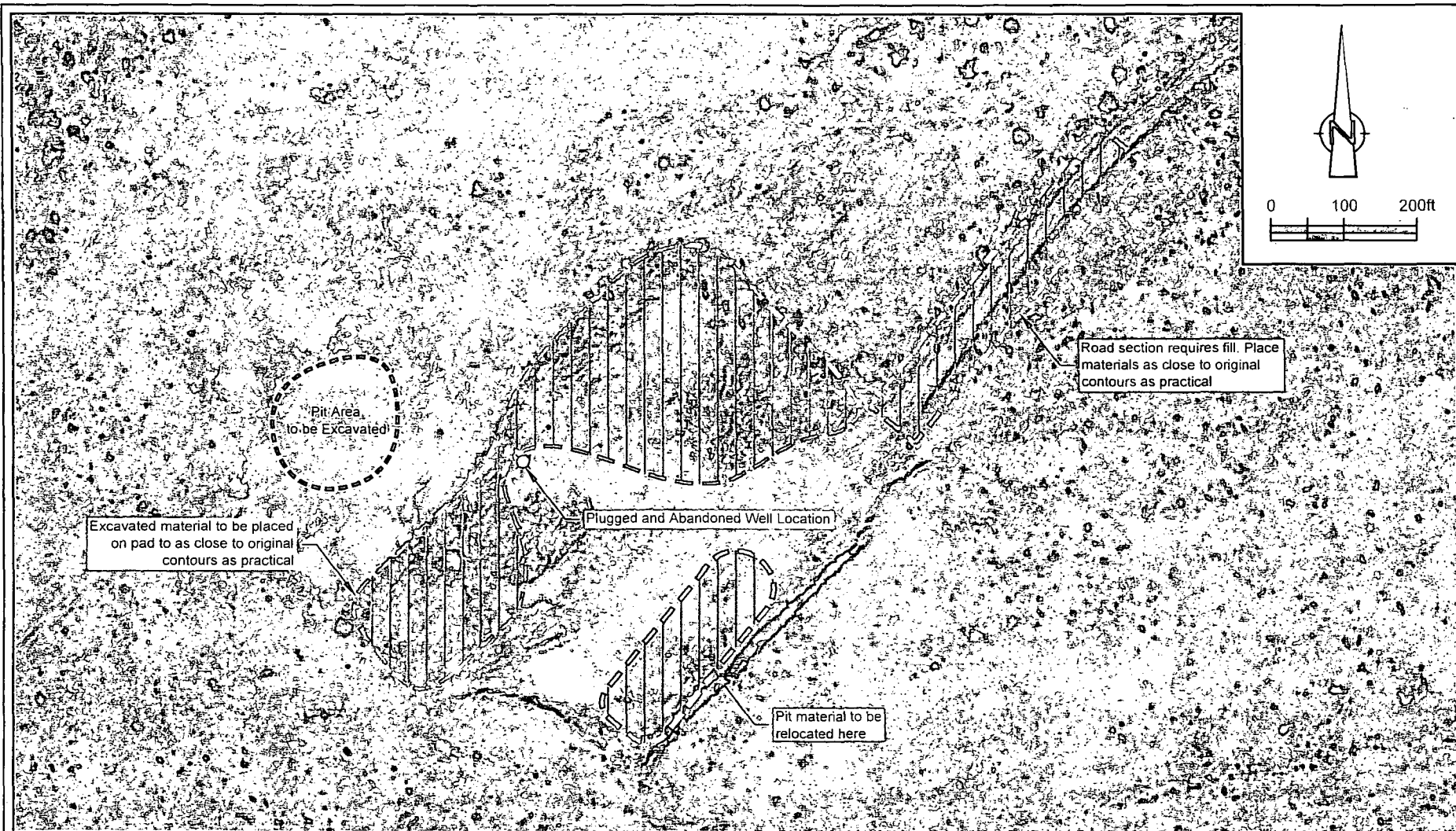


Figure 3

PROJECT DETAIL MAP  
 ROCKY ARROYO SITE  
 EDDY COUNTY, NEW MEXICO  
*ConocoPhillips Company*

