

ABOVE THIS LINE FOR DIVISION USE ONLY

**NEW MEXICO OIL CONSERVATION DIVISION**  
- Engineering Bureau -  
1220 South St. Francis Drive, Santa Fe, NM 87505



**ADMINISTRATIVE APPLICATION CHECKLIST**

THIS CHECKLIST IS MANDATORY FOR ALL ADMINISTRATIVE APPLICATIONS FOR EXCEPTIONS TO DIVISION RULES AND REGULATIONS WHICH REQUIRE PROCESSING AT THE DIVISION LEVEL IN SANTA FE

**Application Acronyms:**

[NSL-Non-Standard Location] [NSP-Non-Standard Proration Unit] [SD-Simultaneous Dedication]  
[DHC-Downhole Commingling] [CTB-Lease Commingling] [PLC-Pool/Lease Commingling]  
[PC-Pool Commingling] [OLS - Off-Lease Storage] [OLM-Off-Lease Measurement]  
[WFX-Waterflood Expansion] [PMX-Pressure Maintenance Expansion]  
[SWD-Salt Water Disposal] [IPI-Injection Pressure Increase]  
[EOR-Qualified Enhanced Oil Recovery Certification] [PPR-Positive Production Response]

[1] **TYPE OF APPLICATION** - Check Those Which Apply for [A]

- [A] Location - Spacing Unit - Simultaneous Dedication  
☐ NSL ☐ NSP ☐ SD

Check One Only for [B] or [C]

- [B] Commingling - Storage - Measurement  
☐ DHC ☐ CTB ☐ PLC ☐ PC ☐ OLS ☐ OLM

- [C] Injection - Disposal - Pressure Increase - Enhanced Oil Recovery  
☐ WFX ☐ PMX ☒ SWD ☐ IPI ☐ EOR ☐ PPR

- [D] Other: Specify \_\_\_\_\_

[2] **NOTIFICATION REQUIRED TO:** - Check Those Which Apply, or ☐ Does Not Apply

- [A] ☐ Working, Royalty or Overriding Royalty Interest Owners  
[B] ☒ Offset Operators, Leaseholders or Surface Owner  
[C] ☒ Application is One Which Requires Published Legal Notice  
[D] ☒ Notification and/or Concurrent Approval by BLM or SLO  
U.S. Bureau of Land Management - Commissioner of Public Lands, State Land Office  
[E] ☒ For all of the above, Proof of Notification or Publication is Attached, and/or,  
[F] ☐ Waivers are Attached

[3] **SUBMIT ACCURATE AND COMPLETE INFORMATION REQUIRED TO PROCESS THE TYPE OF APPLICATION INDICATED ABOVE.**

[4] **CERTIFICATION:** I hereby certify that the information submitted with this application for administrative approval is **accurate** and **complete** to the best of my knowledge. I also understand that **no action** will be taken on this application until the required information and notifications are submitted to the Division.

Note: Statement must be completed by an individual with managerial and/or supervisory capacity.

BRIAN COLLINS  
Print or Type Name

Signature

SENIOR OPERATIONS ENGINEER  
Title

18 Jan 13  
Date

bcollins@concho.com  
e-mail Address

advised  
3/18/13

Processed 1/28/13

Some BLM ISSUES

(NOT EVALUATED)

Delaware Perf

30-015-29560



RECEIVED OGD

2013 JAN 14 P 1:36

January 9, 2013

New Mexico Oil Conservation Division  
Attn: William V. Jones  
1220 South St. Francis Drive  
Santa Fe, NM 87505

RE: Application For Authorization To Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

1/28/13 OXY Project  
with aaron  
1/17/13 BLM FSSUES

Dear Mr. Jones:

COG Operating LLC respectfully requests administrative approval for authorization to inject for the Cottonwood 36 SWD #1 well as referenced above. Attached, for your review, is a copy of the C-108 application. Once we receive the newspaper publication and all certified return receipts, I will send you a copy.


Please do not hesitate to contact me at (575) 748-6940 should you have any questions.

Sincerely,

Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures

**APPLICATION FOR AUTHORIZATION TO INJECT**

- I. PURPOSE: Secondary Recovery Pressure Maintenance X Disposal Storage  
Application qualifies for administrative approval? X Yes No
- II. OPERATOR: COG OPERATING LLC  
ADDRESS: 2208 W. Main Street, ARTESIA, NM 88210  
CONTACT PARTY: BRIAN COLLINS PHONE: 575-748-6940
- III. WELL DATA: Complete the data required on the reverse side of this form for each well proposed for injection.  
Additional sheets may be attached if necessary.
- IV. Is this an expansion of an existing project? Yes X No  
If yes, give the Division order number authorizing the project: \_\_\_\_\_
- V. Attach a map that identifies all wells and leases within two miles of any proposed injection well with a one-half mile radius circle drawn around each proposed injection well. This circle identifies the well's area of review.
- VI. Attach a tabulation of data on all wells of public record within the area of review which penetrate the proposed injection zone. Such data shall include a description of each well's type, construction, date drilled, location, depth, record of completion, and a schematic of any plugged well illustrating all plugging detail.
- VII. Attach data on the proposed operation, including:
1. Proposed average and maximum daily rate and volume of fluids to be injected;
  2. Whether the system is open or closed;
  3. Proposed average and maximum injection pressure;
  4. Sources and an appropriate analysis of injection fluid and compatibility with the receiving formation if other than reinjected produced water; and,
  5. If injection is for disposal purposes into a zone not productive of oil or gas at or within one mile of the proposed well, attach a chemical analysis of the disposal zone formation water (may be measured or inferred from existing literature, studies, nearby wells, etc.).
- \*VIII. Attach appropriate geologic data on the injection zone including appropriate lithologic detail, geologic name, thickness, and depth. Give the geologic name, and depth to bottom of all underground sources of drinking water (aquifers containing waters with total dissolved solids concentrations of 10,000 mg/l or less) overlying the proposed injection zone as well as any such sources known to be immediately underlying the injection interval.
- IX. Describe the proposed stimulation program, if any.
- \*X. Attach appropriate logging and test data on the well. (If well logs have been filed with the Division, they need not be resubmitted).
- \*XI. Attach a chemical analysis of fresh water from two or more fresh water wells (if available and producing) within one mile of any injection or disposal well showing location of wells and dates samples were taken.
- XII. Applicants for disposal wells must make an affirmative statement that they have examined available geologic and engineering data and find no evidence of open faults or any other hydrologic connection between the disposal zone and any underground sources of drinking water.
- XIII. Applicants must complete the "Proof of Notice" section on the reverse side of this form.
- XIV. Certification: I hereby certify that the information submitted with this application is true and correct to the best of my knowledge and belief.
- NAME: BRIAN COLLINS TITLE: Senior Operations Engineer  
SIGNATURE:  DATE: 12 Mar 2013  
E-MAIL ADDRESS: bcollins@concho.com
- \* If the information required under Sections VI, VIII, X, and XI above has been previously submitted, it need not be resubmitted. Please show the date and circumstances of the earlier submittal: \_\_\_\_\_

C-108 Application for Authorization to Inject  
Cottonwood 36 SWD No. 1  
1980' FSL, 1980' FWL  
K-36-T25S-R26E, Eddy County

3/12/13

COG Operating LLC proposes re-enter the captioned well for salt water disposal service into the Delaware Sand from 3595-3775' and 4206-4550'. We propose to tie back 5 ½" casing from 3014' to surface and cement the 5 ½" to surface with 950 CF cement slurry.

- V. Map is attached.
- VI. One well is located inside the ½ mile radius area of review. A wellbore schematic is attached.
- VII.
  - 1. Proposed average daily injection rate = 2000 BWPD  
Proposed maximum daily injection rate = 5000 BWPD
  - 2. Closed system
  - 3. Proposed maximum injection pressure = 719 psi  
(0.2 psi/ft. x 3595' ft.)
  - 4. Source of injected water will be Delaware Sand and Bone Spring Sand produced water. No compatibility problems are expected. Analyses of Delaware and Bone Spring waters from analogous wells are attached. We have numerous Delaware SWD's in this area and have not encountered any compatibility issues with our Delaware and Bone Spring injected waters.
- VIII. The injection zone is the Delaware Sandstone, a fine-grained sandstone from 3595-3775' and 4206-4550'. Any underground water sources will be shallower than 353' (surface casing depth).
- IX. The Delaware sand injection interval might be acidized with approximately 20 gal/ft of 7 ½ % HCl acid. We don't plan to fracture treat the injection interval.
- X. Well logs are filed with the Division. A section of the dual laterolog resistivity log showing the injection interval is attached.
- XI. There are no fresh water wells within a mile of the proposed SWD well.
- XII. After examining the available geologic and engineering data, no evidence was found of open faults or any other hydrologic connection between the disposal zone and any underground sources of drinking water.
- XIII. Proof of Notice is attached.

# III.

## WELL DATA

Side 1

## INJECTION WELL DATA SHEET

OPERATOR: COG Operating, LLCWELL NAME & NUMBER: Cottonwood 36 SWD No. 1 (Formerly Cottonwood 36 State 1)WELL LOCATION: 1980' FGL 1980' FWL K 36 25s 26e  
FOOTAGE LOCATION UNIT LETTER SECTION TOWNSHIP RANGEWELLBORE SCHEMATICWELL CONSTRUCTION DATASurface CasingHole Size: 17 1/2" Casing Size: 13 3/8" @ 353'Cemented with: 390 sx. or - ft<sup>3</sup>Top of Cement: Sur Face Method Determined: CirculatedIntermediate CasingHole Size: 12 1/4" Casing Size: 8 5/8" @ 1860'Cemented with: 1000 sx. or - ft<sup>3</sup>Top of Cement: Sur Face Method Determined: CirculatedProduction CasingHole Size: 7 7/8" Casing Size: 5 1/2" 3014-5850'Cemented with: 650 sx. or - ft<sup>3</sup>Top of Cement: 3100' Method Determined: CBLTotal Depth: 5850'Injection Interval3595-3775' feet to 4206-4550'

(Perforated or Open Hole; indicate which)

See Attached Before & After  
Schematics

INJECTION WELL DATA SHEET

Tubing Size: 2 7/8" or 3 1/2" Lining Material: IPC or Duoline 20  
 Type of Packer: 10K nickel coated double grip retrievable  
 Packer Setting Depth: ± 3950'  
 Other Type of Tubing/Casing Seal (if applicable): N/A

Additional Data

1. Is this a new well drilled for injection? Yes X No

If no, for what purpose was the well originally drilled? Oil and gas.

2. Name of the Injection Formation: Delaware Sand

3. Name of Field or Pool (if applicable): Cottonwood Draw

4. Has the well ever been perforated in any other zone(s)? List all such perforated intervals and give plugging detail, i.e. sacks of cement or plug(s) used:

See attached wellbore schematics.

5. Give the name and depths of any oil or gas zones underlying or overlying the proposed injection zone in this area:

Overlying: Delaware 1880' - 4975' (Most wells in 1883-3884' range 2 miles + away,

Well in P-35-25s-26e 4758-4973' Well in E-6-26s-27e 4864-4924', 4050'-4060')

Underlying: Bone Spring 6050'-6500', Wolfcamp 9240-9935', U. Penn/Strawn 10236-10556'  
Atoka 11342-11354', Morrow 11483-12263'

30-015-29560

(Formerly Cottonwood 36 St. 1)

1980' FSL, 1980' FWL

K-36-253-26e

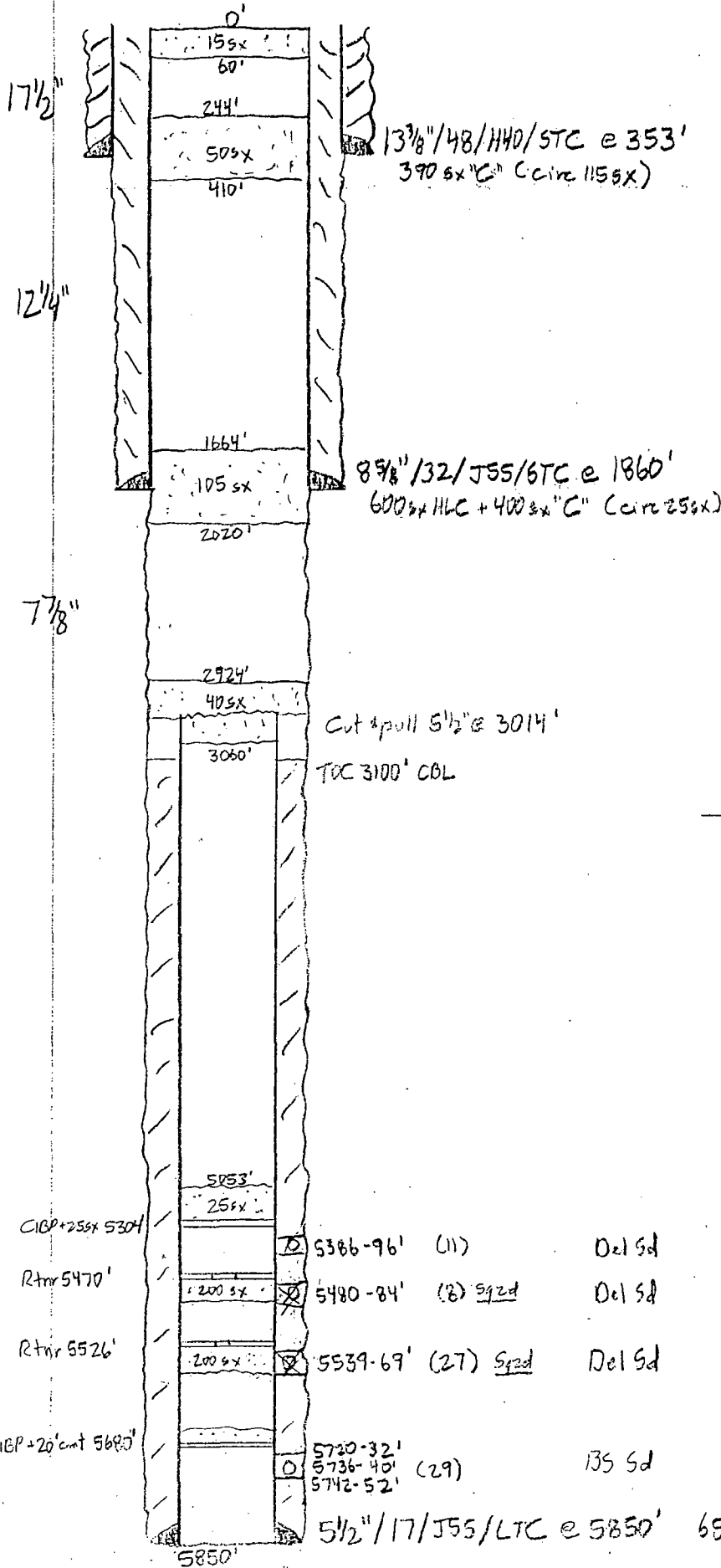
Eddy NM

Zero'

K13'

GL: 3322'

TOS 350'  
BOS 1770'



Before SWD Conversion

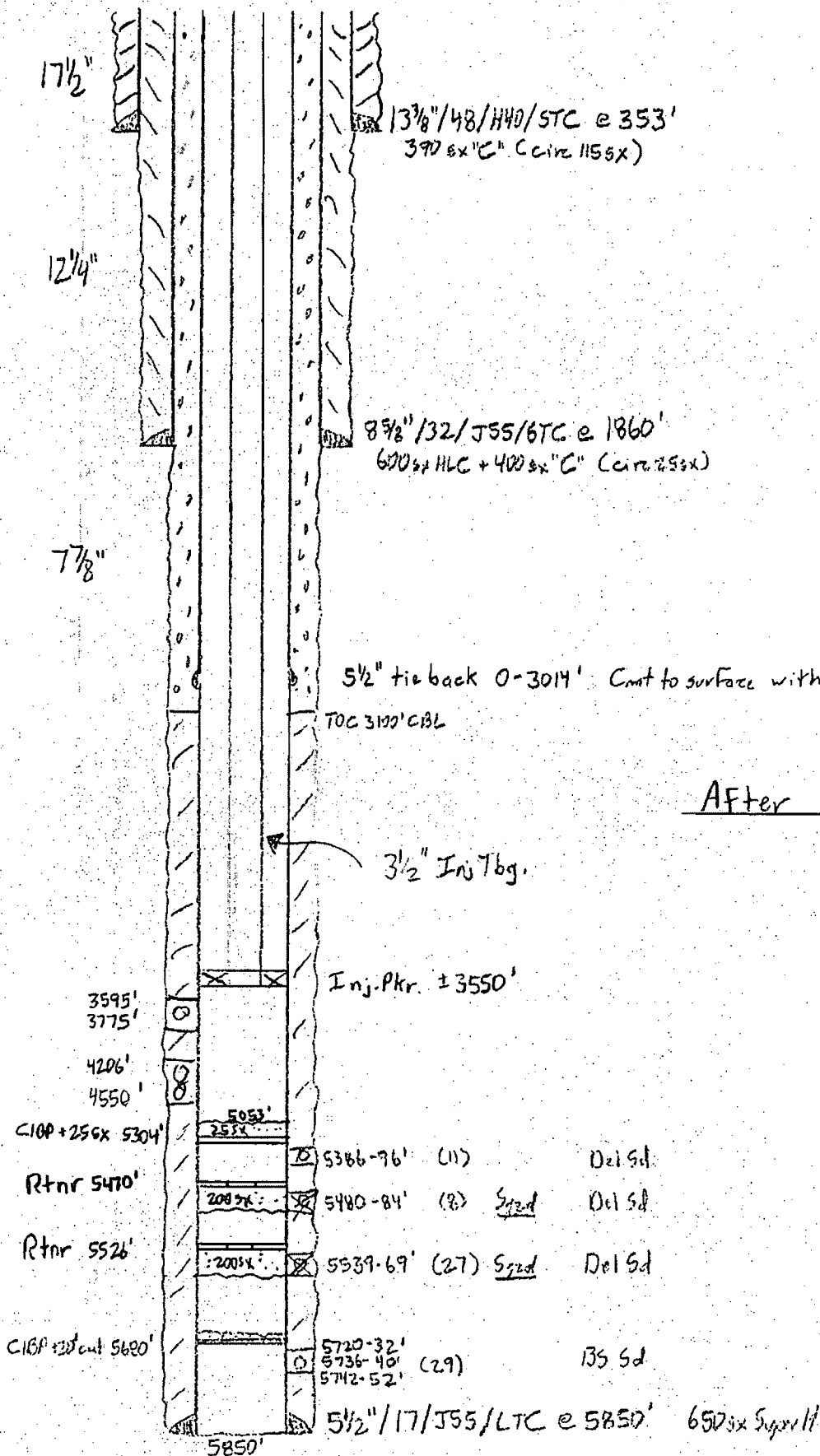


30-D15-29560

(Formerly Cottonwood 36 St. 1)  
1980' FSL, 1980' FWL  
K-36-253-26e  
Eddy NM

Zero: 12' AGL  
KB: 3334'  
GL: 3322'

TDS 350'  
BOS 1770'



After SWD Conversion

V.

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MAP



# VI.

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**Wells Penetrating  
Proposed Disposal  
Interval Within Half  
Mile Area of Review**

30-015- 37466

Craig State Com 1H  
380' FSL, 330' FWL, Unit M (SURF)  
414' FSL, 394' FEL, Unit P (EOL)  
36-25s-26e  
Eddy, NM

17 1/2"

12 1/4"

7 7/8"

13 3/8" / 48 / H40 / STC @ 363' 400sx "C" (circ 137sx)

9 5/8" / 36 / J55 / BTC @ 1898' 500sx "C" 4" gdl + 250sx "C" (circ 186sx)

Within 1/2 Mile Area of Review

DV 5390'  
KOP 5520'

6310 - 10325'

5 1/2" / 17 / N80 / LTC  
@ 10396' MD

10396' MD

TVD 6035-6166'

1st: 475sx Acid Sol (circ 85sx)  
2nd: 800sx HLC + 100 "C" (circ 15sx)

8900'

# **VII.**

## **Water Analysis Produced and Receiving Formation Water**

WATER SAMPLES REPRESENTATIVE OF WATER BEING INJECTED INTO THE PROPOSED SWD-WELL												
Bone Spring												
Lab Test #	Lease	Location	Salesman	Date Out	Sample Date	Specific Gravity	Ionic Strength	TDS	pH	conductivity	Ca (mg/L)	Mg (mg/L)
2011128832	Craig St. Com	1H	William D Polk	9/30/2011	9/21/2011	1.13	3.15	194940.50	6.80		2390.00	664.00
Delaware												
Lab Test #	Lease	Location	Salesman	Date Out	Sample Date	Specific Gravity	Ionic Strength	TDS	pH	conductivity	Ca (mg/L)	Mg (mg/L)
2011128361	Chicken Hawk State	1	William D Polk	9/28/2011	9/13/2011	1.12	3.17	189454.89	6.90		4133.30	725.18

Water Sample Representative of Receiving Formation Water

TH (CaCO3)	Na (mg/L)	K (mg/L)	Zn (mg/L)	Fe (mg/L)	Ba (mg/L)	Sr (mg/L)	Mn (mg/L)	Resistivity	HCO3 (mg/L)	CO3 (mg/L)	OH (mg/L)	SO4 (mg/L)	Cl (mg/L)	CO2 (mg/L)	H2S (mg/L)
9171.56	55296.00	815.00		0.32	2.00	403.00	0.18		1220.00	0.00		150.00	134000.00	540.00	0.00
TH (CaCO3)	Na (mg/L)	K (mg/L)	Zn (mg/L)	Fe (mg/L)	Ba (mg/L)	Sr (mg/L)	Mn (mg/L)	Resistivity	HCO3 (mg/L)	CO3 (mg/L)	OH (mg/L)	SO4 (mg/L)	Cl (mg/L)	CO2 (mg/L)	H2S (mg/L)
13854.58	69462.63	1056.00	37.48	2.25	0.00	468.07	0.00		1220.00	0.00		950.00	111400.00	500.00	17.00



**X.**

**Resistivity Log Across  
Proposed Delaware  
Sand Injection Interval**

COMPANY: Penwell Energy Incorporated

WELL: Cottonwood '36' State #1

FIELD: Cottonwood Draw - Delaware

COUNTY: Eddy STATE: New Mexico

Cottonwood Draw - Delaware 1980 FWL and 1980 FSL Well: Cottonwood '36' State #1 Company: Penwell Energy Incorporated		9/1/983 Platform/Express Schlumberger Azimuthal Laterolog MCFL / Gamma Ray	
LOCATION 1980 FWL and 1980 FSL		Elev. K.B. 3334 F G.L. 3322 F D.F. 3333 F	
Permanent Datum: Ground Level		Elev.: 3322 F	
Log Measured From: Kelly Bushing		12.0 F above Perm. Datum	
Drilling Measured From: Kelly Bushing			
API Serial No. 30-015-26560	SECTION 36	TOWNSHIP 25S	RANGE 26E

Logging Date: 31-May-1997  
 Run Number: One  
 Depth Driller: 5650 F  
 Schlumberger Depth: 5652 F  
 Bottom Log Interval: 5652 F  
 Top Log Interval: 1861 F  
 Casing Driller Size @ Depth: 8.625 IN @ 1861 F  
 Casing Schlumberger: 1862 F  
 Bit Size: 7.875 IN  
 Type Fluid In Hole: Cut Brine / Starch  
 Density: 9.3 LB/G 29 S  
 Fluid Loss: 16 CC 10  
 Source Of Sample: Circulation Tank  
 RMF @ Measured Temperature: 0.078 OHMM @ 75 DEGF  
 RMF @ Measured Temperature: 0.078 OHMM @ 75 DEGF  
 RMF @ Measured Temperature: 0.078 OHMM @ 75 DEGF  
 Source RMF: RMF @ MRT: 0.055 @ 110 0.055 @ 110  
 Azimuthal Recorded Temperatures: 110 DEGF  
 Circulation Stopped Time: 31-May-1997 0630  
 Logger On Bottom Time: 31-May-1997 1045  
 Unit Number: 3005 Location: Roswell, NM  
 Recorded By: Tony DeRubeis  
 Witnessed By: Gary Stewart

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 OCS - AMESIA

Logging Date: 31-May-1997  
 Run Number: One  
 Depth Driller: 5650 F  
 Schlumberger Depth: 5652 F  
 Bottom Log Interval: 5652 F  
 Top Log Interval: 1861 F  
 Casing Driller Size @ Depth: 8.625 IN @ 1861 F  
 Casing Schlumberger: 1862 F  
 Bit Size: 7.875 IN  
 Type Fluid In Hole: Cut Brine / Starch  
 Density: 9.3 LB/G 29 S  
 Fluid Loss: 16 CC 10  
 Source Of Sample: Circulation Tank  
 RMF @ Measured Temperature: 0.078 OHMM @ 75 DEGF  
 RMF @ Measured Temperature: 0.078 OHMM @ 75 DEGF  
 RMF @ Measured Temperature: 0.078 OHMM @ 75 DEGF  
 Source RMF: RMF @ MRT: 0.055 @ 110 0.055 @ 110  
 Azimuthal Recorded Temperatures: 110 DEGF  
 Circulation Stopped Time: 31-May-1997 0630  
 Logger On Bottom Time: 31-May-1997 1045  
 Unit Number: 3005 Location: Roswell, NM  
 Recorded By: Tony DeRubeis  
 Witnessed By: Gary Stewart

Run 1

Run 2

Run 3

Run 4

Run 5

Run 6

Run 7

Run 8

Run 9

Run 10

Run 11

Run 12

Run 13

Run 14

Run 15

Run 16

Run 17

Run 18

Run 19

Run 20

Run 21

Run 22

Run 23

Run 24

Run 25

Run 26

Run 27

Run 28

Run 29

Run 30

Run 31

Run 32

Run 33

Run 34

Run 35

Run 36

Run 37

Run 38

Run 39

Run 40

Run 41

Run 42

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Run 45

Run 46

Run 47

Run 48

Run 49

Run 50

Run 51

Run 52

Run 53

Run 54

Run 55

Run 56

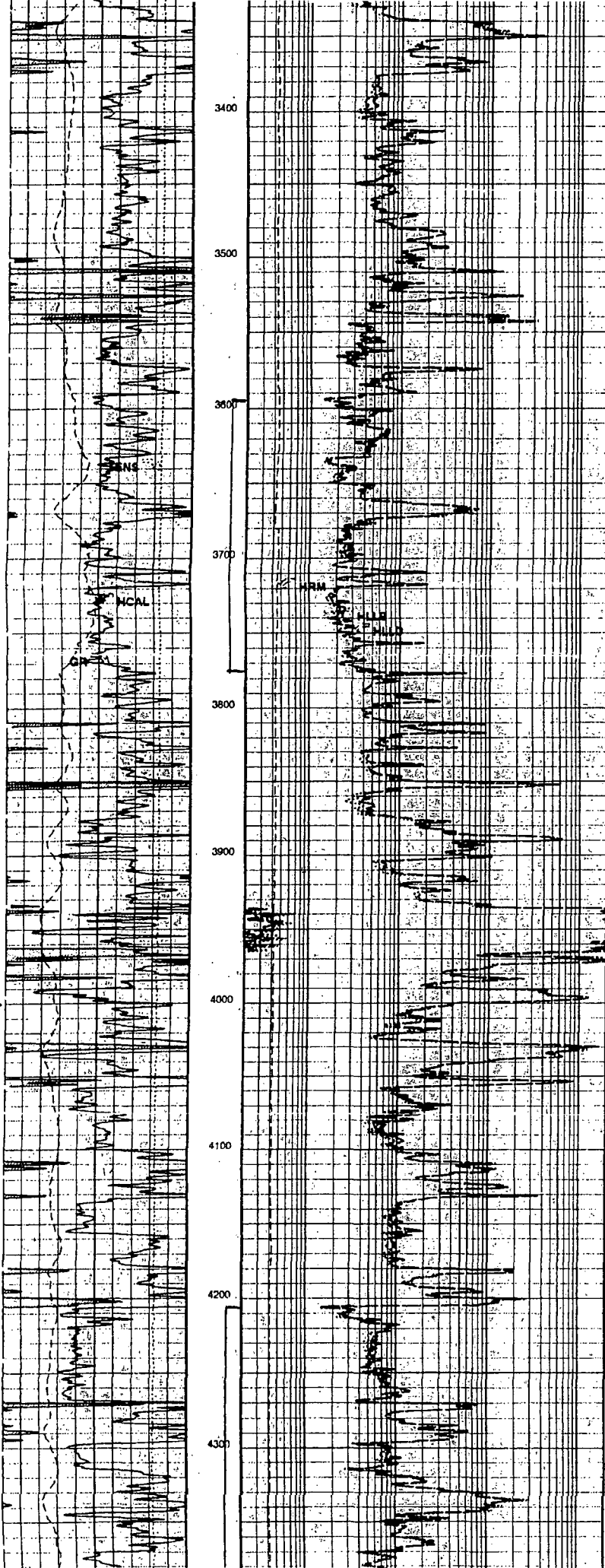
Run 57

Run 58

Run 59

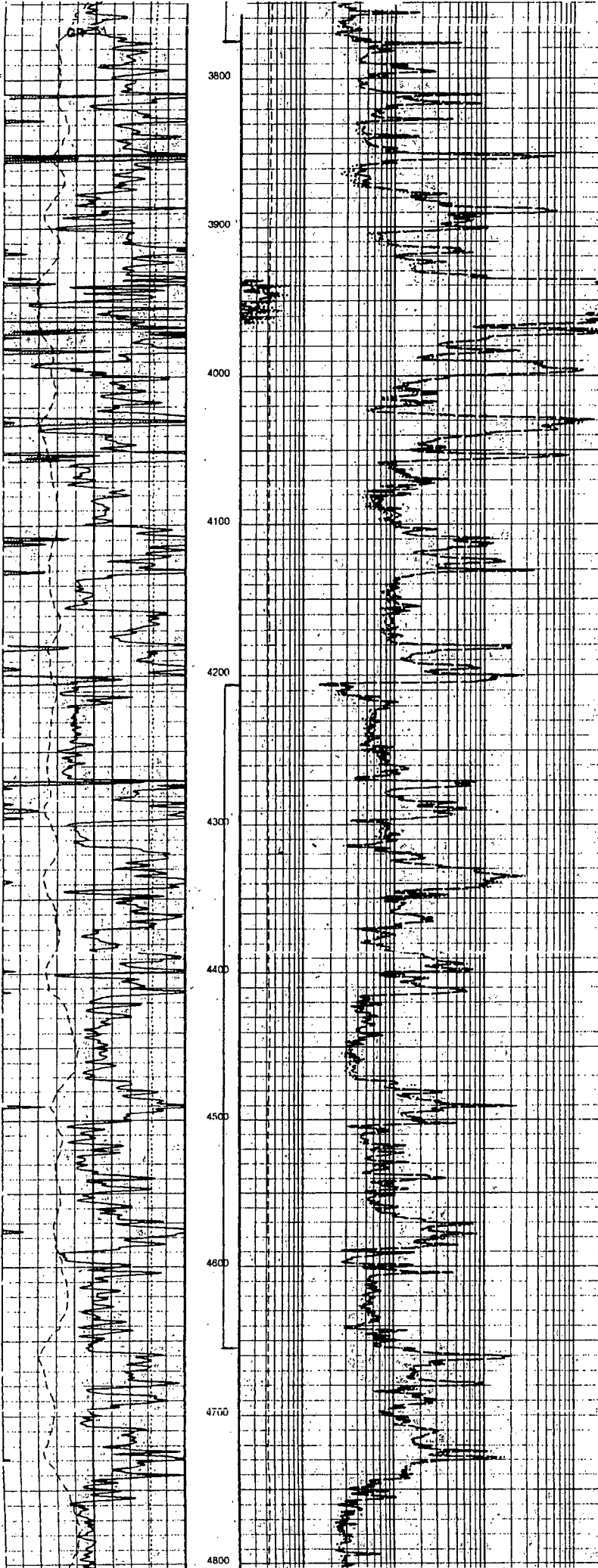
Run 60

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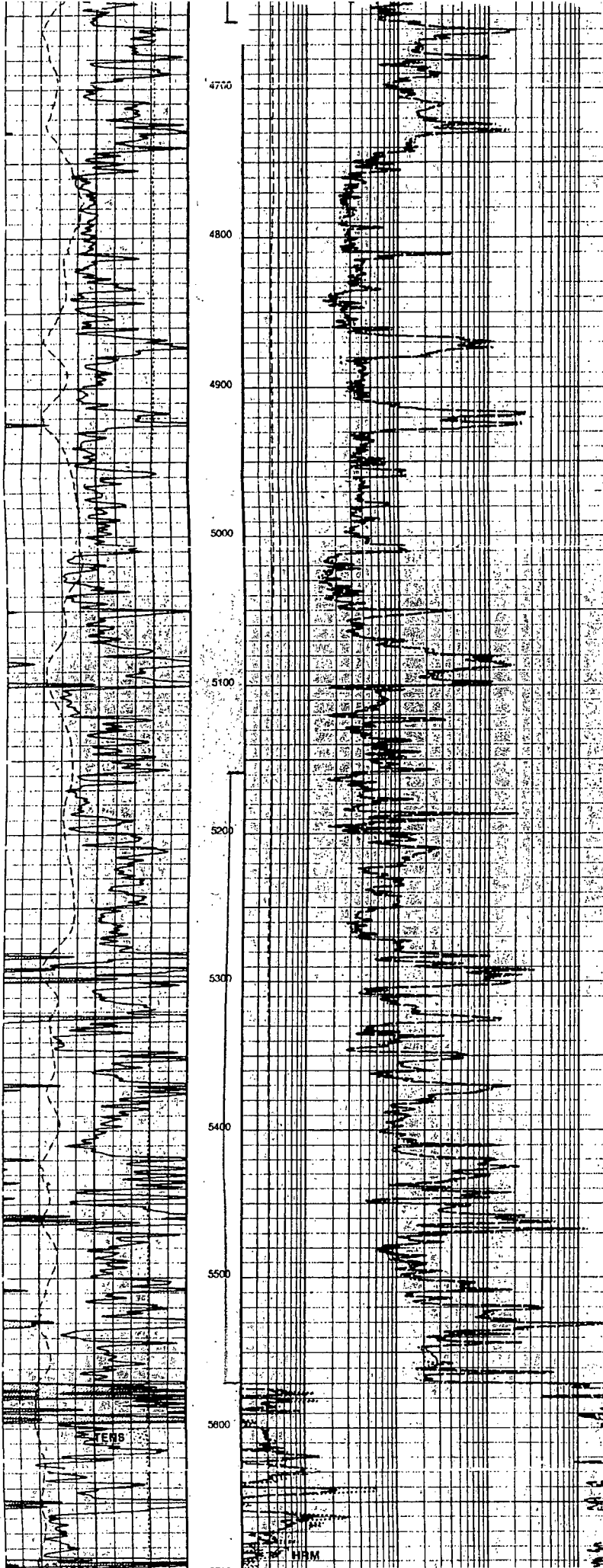


3595- 3775'

4706



4206-4654'



5158 - 5569'

**XI.**

**Fresh Water Sample  
Analyses**



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*New Mexico Office of the State Engineer*  
**Active & Inactive Points of Diversion**  
(with Ownership Information)

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No PODs found.

**PLSS Search:**

**Section(s):** 30, 31

**Township:** 25S

**Range:** 27E



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*New Mexico Office of the State Engineer*  
**Active & Inactive Points of Diversion**  
(with Ownership Information)

---

No PODs found.

**PLSS Search:**

**Section(s): 6**

**Township: 26S**

**Range: 27E**





# New Mexico Office of the State Engineer

## Active & Inactive Points of Diversion

(with Ownership Information)

(R=POD has been replaced  
and no longer serves this file, (quarters are 1=NW 2=NE 3=SW 4=SE)  
C=the file is closed) (quarters are smallest to largest) (NAD83 UTM in meters)

(acre ft per annum)		Sub		Owner	County	POD Number	Code	Grant	q q q				X	Y
WR File Nbr	basin	Use	Diversion						Source	6416 4	Sec	Tws Rng		
C 00974	C	DOM		3 CARLSBAD CITY SCHOOLS	ED	C 00974		Correct location Sec 35-21s-26e			3 35	21s 26E	569074	3549831*
C 01013	C	DOM		3 BILLIE B CHESTER	ED	C 01013		Correct location Sec 25-22s-26e	Shallow		4 25	22s 26E	571505	3551456*
C 02220	CUB	PLS		3 FOREHAND RANCHES INC.	ED	C 02220		35' deep 1911			3 1 2	26 25S 26E	569598	3552352*
C 02221	CUB	PLS		3 FOREHAND RANCHES INC	ED	C 02221		35' deep 1914			4 3 2	25 25S 26E	571412	3551961*

Record Count: 4

### PLSS Search:

Section(s): 25, 26, 35, 36 Township: 25S Range: 26E

Sorted by: File Number

\*UTM location was derived from PLSS - see Help

The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, usability, or suitability for any particular purpose of the data.

11/15/12 7:18 AM

Page 1 of 1

ACTIVE & INACTIVE POINTS OF DIVERSION



# New Mexico Office of the State Engineer

## Point of Diversion Summary

(quarters are 1=NW 2=NE 3=SW 4=SE)

(quarters are smallest to largest)

(NAD83 UTM in meters)

**POD Number**

C 02220

**Q64 Q16 Q4 Sec TwS Rng**

3 1 2 26 25S 26E

**X**

**Y**

569598 3552352\*

**Driller License:**

**Driller Name:** S O PAXTON

**Drill Start Date:**

**Drill Finish Date:** 05/01/9111

**Plug Date:**

**Log File Date:**

**PCW Rcv Date:**

**Source:**

**Pump Type:**

**Pipe Discharge Size:**

**Estimated Yield: 7**

**Casing Size:** 7.00

**Depth Well:** 35 feet

**Depth Water:**

\*UTM location was derived from PLSS - see Help

The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, usability, or suitability for any particular purpose of the data.



# New Mexico Office of the State Engineer

## Point of Diversion Summary

(quarters are 1=NW 2=NE 3=SW 4=SE)

(quarters are smallest to largest)

(NAD83 UTM in meters)

POD Number

Q64 Q16 Q4 Sec Tws Rng

X

Y

C 02221

4 3 2 25 25S 26E

571412 3551961\*

Driller License:

Driller Name: J D FOREHAND

Drill Start Date:

Drill Finish Date: 11/15/1914

Plug Date:

Log File Date:

PCW Rcv Date:

Source:

Pump Type:

Pipe Discharge Size:

Estimated Yield: 7

Casing Size: 6.50

Depth Well: 35 feet

Depth Water:

\*UTM location was derived from PLSS - see Help

The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, usability, or suitability for any particular purpose of the data.

11/15/12 7:19 AM

Page 1 of 1

POD SUMMARY - C 02221



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*New Mexico Office of the State Engineer*  
**Active & Inactive Points of Diversion**  
(with Ownership Information)

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No PODs found.

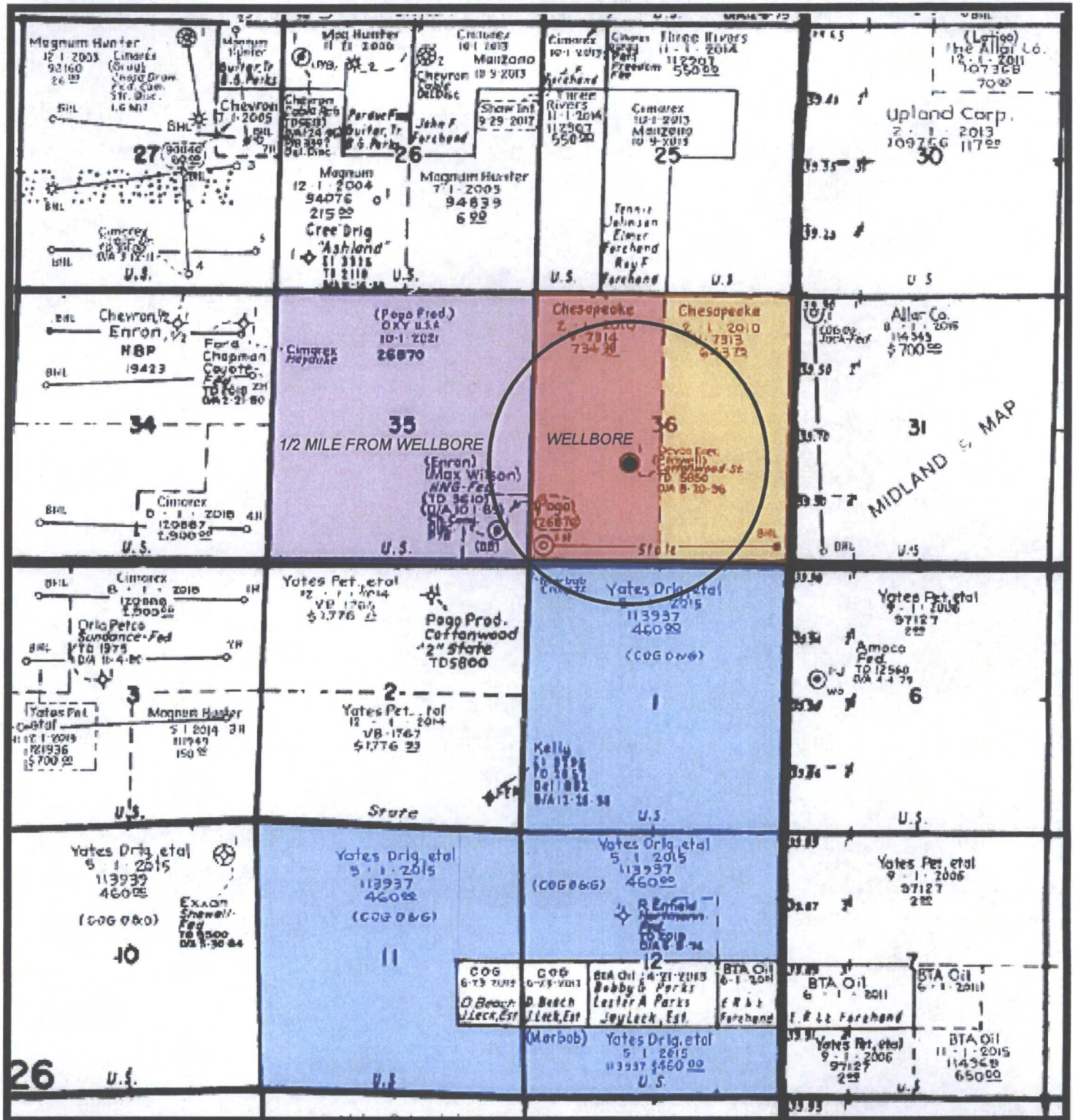
**PLSS Search:**

**Section(s):** 1, 2

**Township:** 26S

**Range:** 26E

Cottonwood 36 SWD No. 1  
Unit K, Sec. 36: T25s-R26e  
Eddy County, New Mexico



OXY USA INC

Abo Petroleum Corp; MYCO Industries  
COG Operating; OXY Y-1 Company

Chesapeake Exploration LLC

Chesapeake Exploration LLC

chevron



January 9, 2013

Artesia Daily Press  
P. O. Box 190  
Artesia, NM 88211-0190

Re: Legal Notice  
Salt Water Disposal Well  
Cottonwood 36 SWD #1

To Whom It May Concern:

Enclosed is a legal notice regarding New Mexico Oil Conservation Division C-108  
Application for Authorization to Inject for a salt water disposal well.

Please run this notice and return the proof of notice to the undersigned at:

**COG Operating LLC, 2208 W. Main St., Artesia, NM 88210**

Sincerely,

A handwritten signature in cursive script, appearing to read "Brian Collins".

Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures

**ARTESIA DAILY PRESS**  
**LEGAL NOTICES**

COG Operating LLC, 2208 W. Main, Artesia, New Mexico, 88210, has filed Form C-108 (Application for Authorization to Inject) with the New Mexico Oil Conservation Division seeking administrative approval for a salt water disposal well. The proposed well, the Cottonwood 36 SWD #1, is located 1980' FSL 1980' FWL, Sec. 36, Township 25 South, Range 26 East, Eddy County, New Mexico. Disposal water will be sourced from area wells producing from the Delaware and Bone Spring formations. The disposal water will be injected into the Delaware formation at depths of 3595-3775', 4206-4654' and 5158-5569' at a maximum surface pressure of 719 psi and a maximum rate of 5000 BWPD. This well is located approximately 15 miles southwest of the village of Loving. Any interested party who has an objection to this must give notice in writing to the Oil Conservation Division, 1220 South Saint Francis Street, Santa Fe, New Mexico, 87505, within fifteen (15) days of this notice. Any interested party with questions or comments may contact Brian Collins at COG Operating LLC, 2208 W. Main, Artesia, NM 88210, or call 575-748-6940.

Published in the Artesia Daily Press, Artesia, New Mexico  
\_\_\_\_\_, 2013.

# Affidavit of Publication

NO.

22431

STATE OF NEW MEXICO

County of Eddy:

Danny Scott

being duly sworn, says that he is the

Publisher

of the Artesia Daily Press, a daily newspaper of general circulation, published in English at Artesia, said county and state, and that the hereto attached

## Legal Notice

was published in a regular and entire issue of the said Artesia Daily Press, a daily newspaper duly qualified for that purpose within the meaning of Chapter 167 of the 1937 Session Laws of the state of New Mexico for

1 Consecutive weeks/days on the same

day as follows:

First Publication

January 16, 2013

Second Publication

Third Publication

Fourth Publication

Fifth Publication

Subscribed and sworn to before me this

16th

day of

January

2013



OFFICIAL SEAL

Latisha Romine

NOTARY PUBLIC-STATE OF NEW MEXICO

My commission expires: 5/12/2015

Latisha Romine

Latisha Romine

Notary Public, Eddy County, New Mexico

# Copy of Publication:

## LEGAL NOTICE

COG Operating LLC, 2208 W. Main, Artesia, New Mexico, 88210, has filed Form C-108 (Application for Authorization to Inject) with the New Mexico Oil Conservation Division seeking administrative approval for a salt water disposal well. The proposed well, the Cottonwood 36 SWD #1, is located 1980' FSL, 1980' FWL, Sec 36, Township 25 South, Range 26 East, Eddy County, New Mexico. Disposal water will be sourced from area wells producing from the Delaware and Bone Spring formations. The disposal water will be injected into the Delaware formation at depths of 3595-3775', 42A6-4654' and 5158-5569' at a maximum surface pressure of 710 psi and a maximum rate of 5000 BWPD. This well is located approximately 15 miles southwest of the village of Loving. Any interested party who has an objection to this must give notice in writing to the Oil Conservation Division, 1220 South Saint Francis Street, Santa Fe, New Mexico, 87505, within fifteen (15) days of this notice. Any interested party with questions or comments may contact Brian Collins at COG Operating LLC, 2208 W. Main, Artesia, NM 88210, or call 575-748-6940.

Published in the Artesia Daily Press, Artesia, N.M., Jan. 16, 2013. Legal No 22431.



## SENDER: COMPLETE THIS SECTION

- Complete items 1, 2, and 3. Also complete item 4 if Restricted Delivery is desired.
- Print your name and address on the reverse so that we can return the card to you.
- Attach this card to the back of the mailpiece, or on the front if space permits.

## 1. Article Addressed to:

Attn: William V. Jones  
NM Oil Conservation Division  
1220 S. St. Francis Drive  
Santa Fe, NM 87505

## 2. Article Number

(Transfer from service label)

7011 1570 0000 7781 4827

PS Form 3811, February 2004

Domestic Return Receipt

102595-02-M-1540

## COMPLETE THIS SECTION ON DELIVERY

## A. Signature

x *[Signature]*☐ Agent☐ Addressee

## B. Received by (Printed Name)

*Heather M. [Signature]*

## C. Date of Delivery

*1/14/13*

## D. Is delivery address different from item 1?

If YES, enter delivery address below:

☐ Yes☐ No

## 3. Service Type

☒ Certified Mail☐ Express Mail☐ Registered☒ Return Receipt for Merchandise☐ Insured Mail☐ C.O.D.

## 4. Restricted Delivery? (Extra Fee)

☐ Yes

## SENDER: COMPLETE THIS SECTION

- Complete items 1, 2, and 3. Also complete item 4 if Restricted Delivery is desired.
- Print your name and address on the reverse so that we can return the card to you.
- Attach this card to the back of the mailpiece, or on the front if space permits.

## 1. Article Addressed to:

BUREAU OF LAND MANAGEMENT  
620 E GREENE ST  
CARLSBAD NM 88220

## 2. Article Number

(Transfer from service label)

7011 1570 0000 7781 3943

PS Form 3811, February 2004

Domestic Return Receipt

102595-02-M-1540

## COMPLETE THIS SECTION ON DELIVERY

## A. Signature

x *[Signature]*☐ Agent☐ Addressee

## B. Received by (Printed Name)

*Heather M. [Signature]*

## C. Date of Delivery

*1-14-13*

## D. Is delivery address different from item 1?

If YES, enter delivery address below:

☐ Yes☐ No

## 3. Service Type

☒ Certified Mail☐ Express Mail☐ Registered☒ Return Receipt for Merchandise☐ Insured Mail☐ C.O.D.

## 4. Restricted Delivery? (Extra Fee)

☐ Yes

## SENDER: COMPLETE THIS SECTION

- Complete items 1, 2, and 3. Also complete item 4 if Restricted Delivery is desired.
- Print your name and address on the reverse so that we can return the card to you.
- Attach this card to the back of the mailpiece, or on the front if space permits.

## 1. Article Addressed to:

ABO PETROLEUM CORPORATION  
105 S FOURTH ST  
ARTESIA NM 88210

## 2. Article Number

(Transfer from service label)

7011 1570 0000 7781 3967

## COMPLETE THIS SECTION ON DELIVERY

## A. Signature

x *[Signature]*☐ Agent☐ Addressee

## B. Received by (Printed Name)

*Heather M. [Signature]*

## C. Date of Delivery

*1-14-13*

## D. Is delivery address different from item 1?

If YES, enter delivery address below:

☐ Yes☐ No

## 3. Service Type

☒ Certified Mail☐ Express Mail☐ Registered☒ Return Receipt for Merchandise☐ Insured Mail☐ C.O.D.

## 4. Restricted Delivery? (Extra Fee)

☐ Yes



SENDER: COMPLETE THIS SECTION

- Complete items 1, 2, and 3. Also complete item 4 if Restricted Delivery is desired.
- Print your name and address on the reverse so that we can return the card to you.
- Attach this card to the back of the mailpiece, or on the front if space permits.

1. Article Addressed to:

MYCO INDUSTRIES INC  
105 S FOURTH ST  
ARTESIA NM 88210

2. Article Number

(Transfer from service label)

7011 1570 0000 7781 3974

PS Form 3811, February 2004

Domestic Return Receipt

102595-02-M-1540

A. Signature

x Winderwood☒ Agent☐ Addressee

B. Received by (Printed Name)

Winderwood

C. Date of Delivery

1-14-13D. Is delivery address different from item 1? ☐ YesIf YES, enter delivery address below: ☐ No

3. Service Type

☒ Certified Mail☐ Express Mail☐ Registered☒ Return Receipt for Merchandise☐ Insured Mail☐ C.O.D.

4. Restricted Delivery? (Extra Fee)

☐ Yes

SENDER: COMPLETE THIS SECTION

- Complete items 1, 2, and 3. Also complete item 4 if Restricted Delivery is desired.
- Print your name and address on the reverse so that we can return the card to you.
- Attach this card to the back of the mailpiece, or on the front if space permits.

1. Article Addressed to:

Chevron USA Inc  
P.O. Box 2100  
Houston, TX 77252

2. Article Number

(Transfer from service label)

7011 1570 0000 7781 4834

PS Form 3811, February 2004

Domestic Return Receipt

102595-02-M-1540

COMPLETE THIS SECTION ON DELIVERY

A. Signature

x Anthony Allen☐ Agent☐ Addressee

B. Received by (Printed Name)

Anthony Allen

C. Date of Delivery

1-15-13D. Is delivery address different from item 1? ☐ YesIf YES, enter delivery address below: ☐ No

3. Service Type

☒ Certified Mail☐ Express Mail☐ Registered☒ Return Receipt for Merchandise☐ Insured Mail☐ C.O.D.

4. Restricted Delivery? (Extra Fee)

☐ Yes

SENDER: COMPLETE THIS SECTION

- Complete items 1, 2, and 3. Also complete item 4 if Restricted Delivery is desired.
- Print your name and address on the reverse so that we can return the card to you.
- Attach this card to the back of the mailpiece, or on the front if space permits.

1. Article Addressed to:

CHESAPEAKE EXPLORATION LLC  
P O BOX 18496  
OKLAHOMA CITY OK 73154-0496

2. Article Number

(Transfer from service label)

7011 1570 0000 7781 3936

PS Form 3811, February 2004

Domestic Return Receipt

102595-02-M-1540

COMPLETE THIS SECTION ON DELIVERY

A. Signature

x RECEIVED☐ Agent☐ Addressee

B. Received by (Printed Name)

JAN 14 2013

C. Date of Delivery

D. Is delivery address different from item 1? ☐ YesIf YES, enter delivery address below: ☐ No

3. Service Type

☒ Certified Mail☐ Express Mail☐ Registered☒ Return Receipt for Merchandise☐ Insured Mail☐ C.O.D.

4. Restricted Delivery? (Extra Fee)

☐ Yes



## SENDER: COMPLETE THIS SECTION

- Complete items 1, 2, and 3. Also complete item 4 if Restricted Delivery is desired.
- Print your name and address on the reverse so that we can return the card to you.
- Attach this card to the back of the mailpiece, or on the front if space permits.

1. Article Addressed to:

OXY USA INC  
P O BOX 4294  
HOUSTON TX 77210

2. Article Number  
(Transfer from service label)

7011 1570 0000 7781 3998

PS Form 3811, February 2004

Domestic Return Receipt

102595-02-M-1540

## COMPLETE THIS SECTION ON DELIVERY

A. Signature

*[Signature]*
☐ Agent  
☐ Addressee

B. Received by (Printed Name)

C. Date of Delivery

D. Is delivery address different from item 1? ☐ Yes  
If YES, enter delivery address below: ☐ No

3. Service Type

☒ Certified Mail ☐ Express Mail  
☐ Registered ☒ Return Receipt for Merchandise  
☐ Insured Mail ☐ C.O.D.
4. Restricted Delivery? (Extra Fee) ☐ Yes

## SENDER: COMPLETE THIS SECTION

- Complete items 1, 2, and 3. Also complete item 4 if Restricted Delivery is desired.
- Print your name and address on the reverse so that we can return the card to you.
- Attach this card to the back of the mailpiece, or on the front if space permits.

1. Article Addressed to:

OXY-1 COMPANY  
P O BOX 27570  
HOUSTON TX 77227-7570

2. Article Number  
(Transfer from service label)

7011 1570 0000 7781 3981

PS Form 3811, February 2004

Domestic Return Receipt

102595-02-M-1540

## COMPLETE THIS SECTION ON DELIVERY

A. Signature

*[Signature]*
☐ Agent  
☐ Addressee

B. Received by (Printed Name)

C. Date of Delivery

D. Is delivery address different from item 1? ☐ Yes  
If YES, enter delivery address below: ☐ No

3. Service Type

☒ Certified Mail ☐ Express Mail  
☐ Registered ☒ Return Receipt for Merchandise  
☐ Insured Mail ☐ C.O.D.
4. Restricted Delivery? (Extra Fee) ☐ Yes

## SENDER: COMPLETE THIS SECTION

- Complete items 1, 2, and 3. Also complete item 4 if Restricted Delivery is desired.
- Print your name and address on the reverse so that we can return the card to you.
- Attach this card to the back of the mailpiece, or on the front if space permits.

1. Article Addressed to:

OXY USA INC  
P O BOX 27570  
HOUSTON TX 77227-7570

2. Article Number  
(Transfer from service label)

7011 1570 0000 7781 3950

## COMPLETE THIS SECTION ON DELIVERY

A. Signature

*[Signature]*
☐ Agent  
☐ Addressee

B. Received by (Printed Name)

C. Date of Delivery

D. Is delivery address different from item 1? ☐ Yes  
If YES, enter delivery address below: ☐ No

3. Service Type

☒ Certified Mail ☐ Express Mail  
☐ Registered ☒ Return Receipt for Merchandise  
☐ Insured Mail ☐ C.O.D.
4. Restricted Delivery? (Extra Fee) ☐ Yes



January 9, 2013

Oil Conservation Division  
Attn: Richard Inge  
811 South 1<sup>st</sup> Street  
Artesia, NM 88210

RE: Application For Authorization To Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

Dear Mr. Inge:

COG Operating LLC respectfully requests administrative approval for authorization to inject for the Cottonwood 36 SWD #1 well as referenced above. Attached, for your review, is a copy of the C-108 application. Once we receive the newspaper publication and all certified return receipts, I will send you a copy.

Please do not hesitate to contact me at (575) 748-6940 should you have any questions.

Sincerely,

A handwritten signature in black ink, appearing to read "Brian Collins".

Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures



January 9, 2013

Carlsbad Field Office  
Bureau of Land Management  
620 E. Greene St  
Carlsbad, NM 88220

Re: Application For Authorization to Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

To Whom It May Concern:

Enclosed for your review is a copy of COG Operating LLC's C-108 Application to Inject for the above referenced well. We plan to reenter this well for SWD service if our C-108 is approved. This well has a split estate, the BLM owning the surface and the State owning the minerals. As a requirement of the New Mexico Oil Conservation Division, we are notifying you because you have been identified as an operator or surface owner. Any objections must be submitted in writing to NMOCD, 1220 S. St. Francis Drive, Santa Fe, New Mexico 87505. Objections must be received within fifteen (15) days of receipt of this letter.

Please do not hesitate to contact us at 575-748-6940 should you have any questions.

Sincerely,

A handwritten signature in black ink, appearing to read "Brian Collins".

Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures





January 9, 2013

ABO Petroleum Corp.  
105 S. Fourth St  
Artesia, NM 88210

Re: Application For Authorization to Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

To Whom It May Concern:

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Please do not hesitate to contact us at 575-748-6940 should you have any questions.

Sincerely,

A handwritten signature in black ink, appearing to read "Brian Collins".

Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures



January 9, 2013

Chevron USA, Inc.  
P O Box 2100  
Houston, TX 77252

Re: Application For Authorization to Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

To Whom It May Concern:

Enclosed for your review is a copy of COG Operating LLC's C-108 Application to Inject for the above referenced well. We plan to reenter this well for SWD service if our C-108 is approved. As a requirement of the New Mexico Oil Conservation Division, we are notifying you because you have been identified as an operator or surface owner. Any objections must be submitted in writing to NMOCD, 1220 S. St. Francis Drive, Santa Fe, New Mexico 87505. Objections must be received within fifteen (15) days of receipt of this letter.

Please do not hesitate to contact us at 575-748-6940 should you have any questions.

Sincerely,

A handwritten signature in black ink, appearing to read "Brian Collins".

Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures



January 9, 2013

Chesapeake Exploration, LLC  
P O Box 18496  
Oklahoma City, OK 73154-0496

Re: Application For Authorization to Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

To Whom It May Concern:

Enclosed for your review is a copy of COG Operating LLC's C-108 Application to Inject for the above referenced well. We plan to reenter this well for SWD service if our C-108 is approved. As a requirement of the New Mexico Oil Conservation Division, we are notifying you because you have been identified as an operator or surface owner. Any objections must be submitted in writing to NMOCD, 1220 S. St. Francis Drive, Santa Fe, New Mexico 87505. Objections must be received within fifteen (15) days of receipt of this letter.

Please do not hesitate to contact us at 575-748-6940 should you have any questions.

Sincerely,

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Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures





January 9, 2013

MYCO Industries Inc.  
105 S. Fourth St  
Artesia, NM 88210

Re: Application For Authorization to Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

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Sincerely,

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Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures



January 9, 2013

Oxy USA, Inc.  
P O Box 27570  
Houston, TX 77227-7570

Re: Application For Authorization to Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

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Sincerely,

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Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures



January 9, 2013

Oxy-1 Company  
P O Box 27570  
Houston, TX 77227-7570

Re: Application For Authorization to Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

To Whom It May Concern:

Enclosed for your review is a copy of COG Operating LLC's C-108 Application to Inject for the above referenced well. We plan to reenter this well for SWD service if our C-108 is approved. As a requirement of the New Mexico Oil Conservation Division, we are notifying you because you have been identified as an operator or surface owner. Any objections must be submitted in writing to NMOCD, 1220 S. St. Francis Drive, Santa Fe, New Mexico 87505. Objections must be received within fifteen (15) days of receipt of this letter.

Please do not hesitate to contact us at 575-748-6940 should you have any questions.

Sincerely,

A handwritten signature in cursive script, appearing to read "Brian Collins".

Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures



January 9, 2013

Oxy USA, Inc.  
P O Box 4294  
Houston, TX 77210

Re: Application For Authorization to Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

To Whom It May Concern:

Enclosed for your review is a copy of COG Operating LLC's C-108 Application to Inject for the above referenced well. We plan to reenter this well for SWD service if our C-108 is approved. As a requirement of the New Mexico Oil Conservation Division, we are notifying you because you have been identified as an operator or surface owner. Any objections must be submitted in writing to NMOCD, 1220 S. St. Francis Drive, Santa Fe, New Mexico 87505. Objections must be received within fifteen (15) days of receipt of this letter.

Please do not hesitate to contact us at 575-748-6940 should you have any questions.

Sincerely,

A handwritten signature in cursive script, appearing to read "Brian Collins".

Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures



March 14, 2013

Oil Conservation Division  
Attn: Richard Inge  
811 South 1<sup>st</sup> Street  
Artesia, NM 88210

RE: Application For Authorization To Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

Dear Mr. Inge:

COG Operating LLC respectfully requests administrative approval for authorization to inject for the Cottonwood 36 SWD #1 well as referenced above. Attached, for your review, is a copy of the C-108 application revisions made after discussions with OXY and Mr. Will Jones. We have changed the injection interval to 3595-3775' and 4206-4550' to stay above nearby potentially productive Delaware Sand intervals. I've also added that we don't plan on fracture treating the proposed injection interval.

Please do not hesitate to contact me at (575) 748-6940 should you have any questions.

Sincerely,

A handwritten signature in cursive script, appearing to read "Brian Collins".

Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures



March 14, 2013

Carlsbad Field Office  
Bureau of Land Management  
620 E. Greene St  
Carlsbad, NM 88220

Re: Revisions to Original Application For Authorization to Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

To Whom It May Concern:

Enclosed for your review is a copy of COG Operating LLC's revised C-108 Application to Inject for the above referenced well. This revision should satisfy concerns voiced by OXY and the NMOCD about the proposed injection interval relative to a potentially productive Delaware Sand zone. We also added that we don't plan to fracture treat the proposed injection interval.

We changed the proposed injection interval to 3595-3775' and 4206-4550', which puts the bottom perforation in excess of 250' above the potentially productive Delaware Sand zone.

We plan to reenter this well for SWD service if our C-108 is approved. This well has a split estate, the BLM owning the surface and the State owning the minerals. As a requirement of the New Mexico Oil Conservation Division, we are notifying you because you have been identified as an operator or surface owner. Any objections must be submitted in writing to NMOCD, 1220 S. St. Francis Drive, Santa Fe, New Mexico 87505. Objections must be received within fifteen (15) days of receipt of this letter.

Please do not hesitate to contact us at 575-748-6940 should you have any questions.

Sincerely,

A handwritten signature in dark ink, appearing to read "Brian Collins".

Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures



March 14, 2013

OXY USA, Inc.  
P O Box 4294  
Houston, TX 77210-4294

Re: Revised Application For Authorization to Inject  
Cottonwood 36 SWD #1  
Township 25 South, Range 26 East, N.M.P.M.  
Section 36: 1980' FSL & 1980' FWL  
Eddy County, New Mexico

To Whom It May Concern:

Enclosed for your review is a copy of COG Operating LLC's revised C-108 Application to Inject for the above referenced well. This revision should satisfy concerns voiced by OXY and the NMOCD about the proposed injection interval relative to a potentially productive Delaware Sand zone. We also added that we don't plan to fracture treat the proposed injection interval.

We changed the proposed injection interval to 3595-3775' and 4206-4550', which puts the bottom perforation in excess of 250' above the potentially productive Delaware Sand zone. The original proposed injection interval was 3595-3775', 4206-4654' and 5158-5569'. The potentially productive Delaware Sand zone correlates to approximately 4835-5045' in the proposed SWD. We plan to reenter this well for SWD service if our C-108 is approved.

Per conversations with Ms. Prithi Balaji and Ms. Donna Havens, we believe the revised proposed injection interval is now acceptable to OXY. Please send Mr. Will Jones with the NMOCD an email or letter stating that OXY is withdrawing its objection to the proposed SWD application after you receive this letter.

Please do not hesitate to contact me at 575-748-6940 should you have any questions.

Sincerely,

A handwritten signature in cursive script, appearing to read "Brian Collins".

Brian Collins  
Senior Operations Engineer

BC/bg  
Enclosures

**GALLAGHER & KENNEDY**  
P.A.  
LAW OFFICES

DALVA L. MOELLENBERG  
DIRECT DIAL: (505) 982-9798  
E-MAIL: DLM@GKNET.COM

1233 PASEO DE PERALTA  
SANTA FE, NM 87501  
PHONE: (505) 530-8000  
FAX: (505) 983-8160  
WWW.GKNET.COM

January 28, 2013

**HAND DELIVERED**

Oil Conservation Division  
1220 South Saint Francis Street  
Santa Fe, New Mexico 87505

**Re: OXY USA Inc. Protest and Request for Hearing**  
**Application for Authorization to Inject**  
**Applicant: COG Operating LLC**  
**Cottonwood 36 SWD #1**  
**Township 25 S, Range 26 E, NMPM**  
**Section 36: 1980' FSL & 1980' FWL**  
**Eddy County, New Mexico**

RECEIVED OGD  
2013 JAN 28 P 4:06

Dear Sir or Madam:

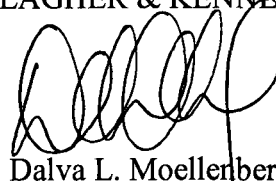
Gallagher & Kennedy, P.A., on behalf of OXY USA, Inc., submits this written protest of the above-described application submitted by COG Operating LLC. OXY USA, Inc. is the owner/operator of a well known as HNG 35 Federal #1 well located in Section 35, Township 25S Range 26 E and located approximately one-half mile from the Cottonwood 36 well that is the subject of the application. OXY USA, Inc. produces from its well from the same formation and from one or more of the same intervals as the zones proposed for injection in the subject application. Consequently, OXY USA, Inc.'s production may be impacted by the subject application.

OXY USA, Inc. received written notice of the subject application on or about January 16, 2015. Pursuant to section 19.15.26.8.D NMAC, upon filing of a timely objection, the division shall set the application for hearing and give notice of the hearing. Please give notice of the setting of a hearing to the undersigned.

Very truly yours,

GALLAGHER & KENNEDY, P.A.

By:



Dalva L. Moellenberg

cc: Brian Collins, COG Operating LLC



**Jones, William V., EMNRD**

---

**From:** Jones, William V., EMNRD  
**Sent:** Tuesday, January 29, 2013 8:36 AM  
**To:** 'djm@gknet.com'; Brian Collins  
**Cc:** Ezeanyim, Richard, EMNRD  
**Subject:** Protested COG Operating LLC SWD application for the Cottonwood 36 SWD #1 Unit letter K, Section 36, T25S R26E, Eddy County

Mr. Collins and Mr. Moellenberg;

Acknowledging the OCD has received OXY USA Inc.'s protest by mail of the Concho application. Please let us know if OXY USA Inc. withdraws its protest and if so, under what conditions.

Please note, the Division prefers that if this is pursued to hearing, that one of the parties initiates that Examiner hearing.

Regards,

William V. Jones, P.E.  
505-476-3448W 505-476-3462F  
Engineering Bureau, Oil Conservation Division  
1220 South St. Francis Dr.  
Santa Fe, NM 87505

**Jones, William V., EMNRD**

---

**From:** Wesley\_Robertson@oxy.com  
**Sent:** Tuesday, March 12, 2013 2:20 PM  
**To:** Jones, William V., EMNRD; BCollins@concho.com  
**Cc:** Prithi\_Balaji@oxy.com; Donna\_Havins@oxy.com; jcorbitt@concho.com; BGoodloe@concho.com  
**Subject:** Revised COG Cottonwood 36 SWD 1 C-108  
**Attachments:** cottonwood 36 swd 1 scan revised c108 12 mar 2013.pdf

Will,

As a result of the attached revision of the COG Cottonwood 36 SWD 1 C-108 limiting the injection interval to 3,595'-3,775' and 4,206'-4,550', OXY USA Inc. withdraws its protest dated January 28, 2013. Please let me know if you need any additional information.

Thanks,

Wesley Robertson, RPL  
Land Negotiator  
Occidental Oil & Gas Corporation  
5 Greenway Plaza, Suite 110 | Houston, TX 77046  
Office: (713) 366-5022 | Mobile: (713) 918-9064  
Fax: (713) 985-4944  
E-Mail: [Wesley\\_Robertson@oxy.com](mailto:Wesley_Robertson@oxy.com)

WITHDRAWN

**Jones, William V., EMNRD**

---

**From:** Ingram, Wesley <wingram@blm.gov>  
**Sent:** Thursday, January 17, 2013 3:29 PM  
**To:** Jones, William V., EMNRD  
**Subject:** Cottonwood 36 SWD #1

Will,

There is good Delaware production approximately 3500' away. It appears nothing was found when drilled, but there could possibly be something in the middle of the requested injection zone at the depth of the well perforations in the well 3500' away. This is one that could affect Federal leases. Also, the fact that they state that they might frac is a problem as that could definitely effect Federal minerals. Will NMOCD address these items in their standard approval? Since this is into a State lease, I will not have a chance to formally require this. If these are not items that will be addressed, the BLM will write a formal objection letter particularly with regards to the frac, but also requesting a review of all logs correlated with the offset.

Second item, OXY called this past weekend and on their Federal 12 14H, they encountered a water flow at approximately 4900'. ~~The Yates Flamenco Federal 1~~ is a little less than 0.5 miles away. The flow rate is 10-15 bph. I thought this might be useful information for you.

*4550' will be above THIS*

Sincerely,  
Wesley W. Ingram  
Supervisory Petroleum Engineer  
Bureau of Land Management  
Carlsbad Field Office  
620 E. Greene Street  
Phone: 575-234-5982  
Fax: 575-234-5927

**Jones, William V., EMNRD**

*OLD BUT PERTINENT*

**From:** Brian Collins [bcollins@marbob.com]  
**Sent:** Monday, June 28, 2010 7:46 AM  
**To:** Jones, William V., EMNRD  
**Subject:** Re: Disposal application from Marbob: Cottonwood 36 SWD #1 30-015-29560

Will:

Sorry I'm so late replying to your questions on the captioned well. It's been pretty hectic around here and I just now got back to this well. Hopefully I'll answer you questions here.

a. Debbie is in Brazil right now--I hope she sent you the newspaper notice. If she didn't let me know.

b. Our land department looked at lease ownership and came up with Oxy and Marbob as the Delaware rights owners. We have a deal with Chesapeake making us the operator in Section 36 where the well is.

c. The proposed well in K-36-25s-26e is 57' low in the Cherry Canyon to the Oxy producer in P-35-25s-26e. The proposed injection interval in our well is 160' above and 100' below the stratigraphic equivalent to the pay in the Oxy well. I intentionally left the Oxy pay zone out of our proposed injection interval. We can certainly put a little more vertical distance from the Oxy pay zone if you want us to.

Thanks!

Brian Collins  
Marbob Energy

----- Original Message -----

**From:** Jones, William V., EMNRD  
**To:** Debora Wilbourn ; Brian Collins  
**Sent:** Tuesday, June 08, 2010 3:38 PM  
**Subject:** Disposal application from Marbob: Cottonwood 36 SWD #1 30-015-29560

Brian and Debora:

- a. Would you please mail or email a copy of the actual newspaper notice as posted in the paper for this well only?
- b. Is it true that Oxy and Marbob are the only owners in this area and have the Delaware rights controlled?
- c. The subject well was tested non-productive in the Brushy Canyon. There is a well SW of this location that makes 3 to 6 Bopd from the Cherry Canyon. What does the subject well's structural location compare to this? In otherwords, is it lower on structure and therefore likely water bearing? The resistivity log appears lower resistivity - I believe. Does Marbob intend to swab test these new upper Cherry Canyon intervals?

Thanks again,

William V Jones, P.E.  
Engineering, Oil Conservation Division  
1220 South St. Francis Drive, Santa Fe, NM 87505  
Tel 505.476.3448 ~ Fax 505.476.3462



## **Jones, William V., EMNRD**

---

**From:** Jones, William V., EMNRD  
**Sent:** Saturday, March 16, 2013 3:12 PM  
**To:** Brian Collins; Bobbie Goodloe (BGoodloe@concho.com)  
**Cc:** Ezeanyim, Richard, EMNRD; Goetze, Phillip, EMNRD; Brooks, David K., EMNRD; 'wesley\_Robertson@oxy.com'  
**Subject:** Disposal application from COG Operating LLC: Cottonwood 36 SWD #1 30-015-29560 Delaware disposal

Hello Brian and Bobbie,

This well was permitted before as SWD-1226 but expired without being used for disposal, so this may be called SWD-1226-A.

I received a note from Wesley Robertson, with OXY that the protest was withdrawn with stipulation the application was revised as last sent. They had protested through an attorney and usually that same attorney should have withdrawn the protest – I will clear this with my managers here.

I am still lacking the actual newspaper notice that was published and the mailer proofs (outgoing).

Also don't see that the State Land Office was noticed as the surface owner.

Also hasn't Chesapeake sold interests to Chevron? If so, please send notice to Chevron.

Would you guys ask the Geo to send a top for the Cherry Canyon and the Brushy Canyon in this well?

Probably concerning the attempt to only perf water productive intervals, the BLM was asking whether you intended to frac the well – what do you think? If so, how big?

Thanks in Advance,

**William V. Jones, P.E.**

505-476-3448W 505-476-3462F

Engineering Bureau, Oil Conservation Division

1220 South St. Francis Dr.

Santa Fe, NM 87505

**Jones, William V., EMNRD**

---

**From:** Brian Collins <BCollins@concho.com>  
**Sent:** Monday, March 18, 2013 7:26 AM  
**To:** Jones, William V., EMNRD  
**Cc:** Bobbie Goodloe  
**Subject:** RE: Disposal application from COG Operating LLC: Cottonwood 36 SWD #1 30-015-29560 Delaware disposal

Will:

This well is a split estate with the BLM being the surface owner and the State owning the minerals, hence no notice to the SLO. I'm not planning on fracing this well at this time. I'll get you the tops you requested. Bobbie will send you the newspaper notice and will send notification to Chevron. Thanks. ----Brian

---

**From:** Jones, William V., EMNRD [<mailto:William.V.Jones@state.nm.us>]  
**Sent:** Saturday, March 16, 2013 3:12 PM  
**To:** Brian Collins; Bobbie Goodloe  
**Cc:** Ezeanyim, Richard, EMNRD; Goetze, Phillip, EMNRD; Brooks, David K., EMNRD; [wesley.Robertson@oxy.com](mailto:wesley.Robertson@oxy.com)  
**Subject:** Disposal application from COG Operating LLC: Cottonwood 36 SWD #1 30-015-29560 Delaware disposal

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**Jones, William V., EMNRD**

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**From:** Brian Collins <BCollins@concho.com>  
**Sent:** Monday, March 18, 2013 1:35 PM  
**To:** Jones, William V., EMNRD  
**Cc:** Bobbie Goodloe  
**Subject:** RE: Disposal application from COG Operating LLC: Cottonwood 36 SWD #1 30-015-29560 Delaware disposal

Will:

Here's the Delaware tops you requested:

Delaware: 1970'  
Cherry Canyon: 2910'  
Brushy Canyon: 4586'  
Bone Spring: 5595'

Thanks. ---Brian

---

**From:** Jones, William V., EMNRD [<mailto:William.V.Jones@state.nm.us>]  
**Sent:** Monday, March 18, 2013 9:03 AM  
**To:** Brian Collins  
**Cc:** Bobbie Goodloe  
**Subject:** RE: Disposal application from COG Operating LLC: Cottonwood 36 SWD #1 30-015-29560 Delaware disposal

Thanks Brian and Bobbie!

---

**From:** Brian Collins [<mailto:BCollins@concho.com>]  
**Sent:** Monday, March 18, 2013 7:26 AM  
**To:** Jones, William V., EMNRD  
**Cc:** Bobbie Goodloe  
**Subject:** RE: Disposal application from COG Operating LLC: Cottonwood 36 SWD #1 30-015-29560 Delaware disposal

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**From:** Jones, William V., EMNRD [<mailto:William.V.Jones@state.nm.us>]  
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**To:** Brian Collins; Bobbie Goodloe  
**Cc:** Ezeanyim, Richard, EMNRD; Goetze, Phillip, EMNRD; Brooks, David K., EMNRD; [wesley.Robertson@oxy.com](mailto:wesley.Robertson@oxy.com)  
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Injection Permit Checklist: Received \_\_\_\_\_ First Email Date: 3/18/13 Final Reply Date: 3/18/13 Final Notice Date: 3/18/13

Issued Permit: Type: WFX/PMX/SWD, Number: 1226-A Permit Date: 3/29/13 (Legacy Permit: SWD 1226)

# Wells: 1 Well Name(s): COTTONWOOD 36 SEC #1

API Num: 30-015-29560 Spud Date: 6/18/97 New/Old: N (UIC Cl II Primacy March 7, 1982)

Footages: 1980 FSL/1980 FUL Lot: \_\_\_\_\_ Unit: K Sec: 36 Tsp: 25S Rge: 26E County: EDDY

General Location or Pool Area: S. of WATE CITY

Operator: COG OPERATING LLC Contact: Brian Counts

OGRID: 229137 RULE 5.9 Compliance (Wells): 6/3454 (Finan Assur): OK IS 5.9 OK? OK

Well File Reviewed: ✓ Current Status: EXPIRED SWD / PEA well

Planned Work to Well: Recenter / install Top of G 1/2"

Diagrams: Before Conversion: ✓ After Conversion: ✓ Are Elogs in Imaging?: ✓

Well Details:	Sizes Hole.....Pipe	Setting Depths	Stage Tool	Cement Sx or Cf	Cement Top and Determination Method
Planned ___ or Existing <u>✓</u> Surface	<u>17 1/2 13 3/8</u>	<u>353</u>	<u>—</u>	<u>390</u>	<u>CIRC</u>
Planned ___ or Existing <u>✓</u> Interm	<u>12 1/4 8 5/8</u>	<u>1860'</u>	<u>—</u>	<u>100 SX</u>	<u>CIRC</u>
Planned <u>✓</u> or Existing <u>✓</u> LongSt	<u>7 1/8 5 1/2</u>	<u>300' 500'</u>	<u>—</u>	<u>650 SX</u>	<u>CBL (3100')</u>
Planned ___ or Existing ___ Liner		<u>(TIE BACK IN)</u>			
Planned ___ or Existing ___ OpenHole					

Depths/Formations:	Depths, Ft.	Formation	Tops?
Above	<u>1970</u>	<u>Del</u>	<u>✓</u>
Above	<u>2910</u>	<u>Cherry C.</u>	<u>✓</u>
Proposed Interval TOP:	<u>3595</u>	<u>Cherry C.</u>	
Proposed Interval BOTTOM:	<u>4550</u>	<u>Cherry C.</u>	
Below	<u>4586</u>	<u>Bona S.</u>	<u>✓</u>
Below	<u>5595</u>	<u>Bona S.</u>	<u>✓</u>

Max. PSI: 719 OpenHole: Perfs ✓  
Tubing: 2 1/2 3 1/2 Packer Depth: \_\_\_\_\_

Capitan Reef? (in \_\_\_ / thru \_\_\_), Retain? \_\_\_ Noticed? \_\_\_ [WIPP? \_\_\_ Noticed? \_\_\_] Salado Top: \_\_\_\_\_ Bot: \_\_\_\_\_ Cliff House? \_\_\_\_\_

Fresh Water: MaxDepth: \_\_\_\_\_ FW Formation: \_\_\_\_\_ Wells? yes Analysis? ✓ Affirmative Statement: ✓

Disposal Fluid: Formation Source(s): Del / BS On Lease: \_\_\_\_\_ Only from Operator: ✓ or Commercial: \_\_\_\_\_

Disposal Interval: Protectable Waters? NO H/C Potential: Log: ✓ /Mudlog: ✓ /DST: ✓ /Tested: ✓ /Depleted: ✓ Other: \_\_\_\_\_

Notice: Newspaper Date: 1/16/13 Mineral Owner: \_\_\_\_\_ Surface Owner: PRESTON N. Date: 3/14/13

RULE 26.7(A) Identified Tracts? \_\_\_\_\_ Affected Persons: OXY Y-1 / ABO / C. Hargrave / EXPL. LLC N. Date: 3/18/13

AOR: Maps? ✓ Well List? ✓ Producing in Interval? NO Formerly Produced in Interval? NO

Penetrating.....No. Active Wells: 1 Num Repairs? 0 on which well(s): \_\_\_\_\_

Penetrating.....No. P&Aed Wells: 0 Num Repairs? 0 on which well(s): \_\_\_\_\_ Diagrams? ✓

Permit Conditions: SWAB Test (upper part of Seal)

Issues: \_\_\_\_\_

Issues: \_\_\_\_\_

Issues: \_\_\_\_\_